



Great Lakes United

CANADIAN ENVIRONMENTAL LAW ASSOCIATION L'Association canadienne du droit de l'environnement







May 16, 2007

Ms. Carolyn O'Neill, Manager, Great Lakes Office Land and Water Policy Branch 135 St. Clair Avenue West, 6th Floor Toronto, Ontario, M4V 1P5

Ms. Susan Humphrey, Manager Ontario Head – Integrated Ecosystem & Public Engagement Programs Environment Canada 4905 Dufferin St. Toronto, Ontario, M3H 5T4

Dear Ms. O'Neill and Ms. Humphrey:

Re: Comments to the Proposed Canada- Ontario Agreement Respecting the Great Lakes Ecosystem Basin posted under Environmental Registry Number: 010-0063 and Canada Gazette Vol. 141, No. 11 — March 17, 2007

We are extremely disappointed and concerned that the governments' approach to renewing the Canada-Ontario Agreement Respecting the Great Lakes Basin Ecosystem has not been comprehensive and the proposed COA released for public comments under *Environmental Registry Number: 010-0063 and Canada Gazette Vol. 141, No. 11 — March 17, 2007* does not provide a renewed vision for protecting and restoring the Great Lakes.

In our submissions of February 18<sup>th</sup> and 19<sup>th</sup>, 2007 submission the Canadian Environmental Law Association and Great Lakes United made a number of very specific comments that demonstrate the need for strong federal and provincial government commitment to the Great Lakes, the importance of the COA as the implementing mechanism for the *Great Lakes Water Quality Agreement* (GLWQA), the need for targets and timelines for taking action on specific obligations and very specific comments and explicit recommendations on how COA should address harmful pollutants and integrate source protection in COA. Furthermore, the submissions made brief comments on the need for annual determination of adequate funds towards Great Lakes initiatives because your budgets for the Great Lakes have been stagnant for over a decade as the stresses on the ecosystem grow each year. We urge your departments to consider these comments as you conclude your negotiations on a revised COA. We have attached our February 2007 submissions to this brief.

Here we highlight six issues that we identify as significant weaknesses in the proposed COA. This brief also includes a section that highlights selected sections from each of the four Annexes to provide examples where a commitment could be strengthened or amended to improve protection of the Great Lakes Basin and its habitants. The absence of comments on specific sections of an annex does not imply agreement on the section.

#### 1. Government approach to public involvement in the renewal of COA is flawed

Public engagement in the process to renew COA has been very limited. After some initial interviews in 2005 and in early 2006 with members of our organizations, the engagement of the public stakeholders has been very limited in the most crucial last moments of the COA discussions, i.e., during the writing of a proposed new COA. Our participation in the COA renewal has been limited to one bilateral meeting between the NGOs and the Minister of Environment Department and the recent public information sessions. The lack of a fulsome and substantial consultation process to discuss the scope of COA and goals and targets has left many citizens' groups questioning the level of the governments' commitments to public engagement on Great Lakes matters.

Such an approach is very troubling. There were no attempts by the government to establish dialogue with stakeholders on several important, but related Great Lakes initiatives that were ongoing in the past year. The federal government, who has been engaged with the US government to review and negotiate the Great Lakes Water Quality Agreement (the cornerstone for COA), will be entering a critical phase this fall when Environment Canada makes its recommendations to the Department of Foreign Affairs and International Trade. There is no commitment for the public to be part of the next steps.

In our view, the review of the Great Lakes Water Quality Agreement and the Canadian Environmental Protection Act (CEPA) would have benefited significantly from a parallel and comprehensive COA review process that included full public engagement. Instead, the current approach to the management and protection of the Great Lakes ecosystem is very piecemeal.

According to the presentations made at the information session, the ability to influence the outcome of the renewed COA will be minimal and any greater efforts will have to wait for 2009. We are concerned that the two Parties to the agreement did not allow adequate time to resolve issues and prepare adequately before the expiry of the Agreement in March 2007. In light of this approach, we urge the governments to establish a transparent and effective mechanism for public engagement in the renewal of COA that is proposed to be carried out in 2009 that allows adequate time for a truly thorough review and modernisation of the Agreement.

Recommendation: The governments should provide explicit wording in this COA on:

a) How the next COA review process will be undertaken?

b) Clarifying when the review process will begin while providing adequate time to prepare for the next review.

c) Defining the approach to integrating the outcome of the GLWQA review conclusions with the 2009 COA.

d) Reporting back on progress on each commitment in this COA.

e) Setting out how public engagement will be sought.

f) Determining in advance what resources are required to carry out the next review including broad public engagement in the review. Making this information available to the public so that both governments can commit adequate staff resources and funds in their budget allocations for COA review and implementation.

# 2. The governments have failed to develop a new vision and program for the Great Lakes.

The governments should have seen this as an opportunity to truly address our new understanding of the crises confronting the Great Lakes ecosystem and to take a significant step forward. Instead, the new COA is basically a "business as usual" approach, with only piecemeal changes.

Now is the opportune time for the new COA to take a leap forward for a couple of reasons:

- a) Environment is high on public opinion polls, which provides the government an opportunity to establish a more serious Great Lakes agenda.
- b) Two separate reviews on the Canadian Environmental Protection Act (CEPA) have been carried out. Great Lakes issues were an integral component of the CEPA review hearings. However, the government missed an opportunity to find the synergies within these processes to establish and define a Canadian agenda on the Great Lakes.

**Recommendation:** The governments should take this opportunity to develop a new COA that takes a leap forward to more fully address the crises that the Great Lakes are confronted by.

# **3.** Absence of assessment of a governance framework and of improvements in the governance process

The most significant issue that has been raised in the review of the Great Lakes Water Quality was the effectiveness of the current governance framework on Great Lakes. Such an assessment is also absent in the proposed COA. The federal and provincial governments have not undertaken a substantive review and assessment of the current intergovernmental arrangements on Great Lakes matters. It is urgently needed. For example, the recent report, *Doing Less with Less* released by the Environmental Commissioner of Ontario on April 24, 2007 paints a very stark picture of the ability of the Ontario Ministry of Environment to effectively fulfill its mandate due to lack of capacity. The inability to provide adequate resources for the task is a product of inadequate governance. Nothing in the proposed COA would address those kinds of problems.

**Recommendation:** The Federal and Provincial governments should undertake a comprehensive assessment of the governance framework as it pertains to the Great Lakes. This assessment should include a strategy for ensuring that adequate resources are provided.

#### 4. Precaution and prevention should be overarching approach in COA

The proposed COA currently notes pollution prevention and precautionary principle as two key principles. However, for COA to be effective, the appropriate implementation of precaution and

prevention are essential. It means that COA should effectively address any emerging challenges to the Great Lakes.

The inclusion of climate change impacts and source protection under Annex 3 is a good attempt to address and incorporate emerging issues. The proposed COA also attempts to mention the potential harm of emerging substances of concern, including pharmaceuticals. Generally, however, the proposed COA is not precautionary. It may mention or integrate several of these emerging issues, but does not outline a strategic, comprehensive and effective process to address them. For example, there is a federal commitment related to a program for the safe collection and disposal of unused veterinary pharmaceuticals, but does not go beyond this to address the problem of prophylactic use of antibiotics and of hormones as animal growth promoters. The proposed COA only lays out a plan that extends by three years the work that it outlined in COA 2002, in particular in the Areas of Concern (AOC), the harmful pollutants, and research and monitoring annexes. Nor has it offered more than incremental progress to address rising concerns on substances of concern, or identified specific targets to complete work on all of the Canadian AOCs. COA is relying on other processes such as the Council of Canadian Ministers of the Environment, which does not have any regulatory authority, to address the growing concerns around the pollution discharges from sewage treatment plants as well as other voluntary initiatives to achieve significant reductions on hazardous substances.

It is anticipated that the Great Lakes basin will be a focal point for population growth over the next several decades. Projections estimate that Ontario's population will grow by 4 million people in the next 25 years - a million within the next five years alone - and most of that population lives in the Great Lakes basin. The expected growth in the basin would provide added incentive for the governments to protect the Great Lakes from the various threats and challenges in a very strategic manner by effective application of precaution and prevention. For example, Annex 3 commits to "Reduce the threat of aquatic invasive species" instead of committing to "prevent new AIS invasions into the Great Lakes."

**Recommendation:** Prevention and precaution should be explicit goals throughout the proposed COA as it pertains to Areas of Concern, harmful pollutants from both direct dischargers and indirect dischargers (i.e., sewage treatment plants), invasive species, climate change, source protection, and act as a driver for monitoring and research activities.

#### 5. Timelines and Targets not available for key components

Timelines and targets strengthen the accountability element in the proposed COA. Furthermore, the absence of timelines or targets makes it difficult to assess the effectiveness of efforts undertaken to date on each activity. The proposed COA is severely weakened as several key areas are without timelines and targets. For example, but not limited to, the following:

- a) Article V Resources. This Article should outline the resource commitment by each level of government for each year (2007-2010) in this COA. Failure to outline this commitment for each of the years significantly challenges the government departments responsible for carrying out the activities for completing their work. Without committed resources COA is more vulnerable to the whims of government funding. If not adequately funded, the implementation of COA will be compromised.
- b) Article X review the Agreement. It fails to indicate a start date for the review of COA.

c) Annex 1 – Areas of Concern. Goal 2 does not provide timelines for the work to be completed under this goal nor does it indicate what is meant by "significant progress." In many of the results no target dates are outlined for completing certain tasks (i.e, Results 1.6 (a), (c), (e); Results 2.3 (b), (c); Results 2.4 (a), (d); Results 2.6 (a), (b), (e), etc.). We also need timetables for all RAP commitments. This COA has addressed some of the achievable easier RAP goals but does not indicate when the more difficult goals will be addressed. COA should include a matrix listing all RAP goals with timelines for them to be addressed so that the more challenging areas of concerns do not languish while waiting for attention.

Futhermore the progress to delist AOCs has been slow due to a number of factors including the lack of adequate resources to complete the implementation and eventual delisting of the Area.

It also is important to specify when the polluter will be responsible for providing the funding and to specify the mechanisms that will be used to ensure that the polluters will provide that funding in a timely manner. In the case of RAPs, for example, this applies to clean up of contaminated sediments.

d) Annex 2 – Harmful Pollutants. Goals are not provided for virtual elimination of Tier 1 substances and no reduction targets are established for other harmful pollutants. Result 1 – the targets established under COA 2002 for Tier 1 substances have been removed in the proposed COA. The lack of targets for virtual elimination does not provide the public confidence that any substantial investment or incentives are given to facilities responsible for Tier 1 substances. Results 2 – does not outline the obligations of the federal and provincial governments required under each of the initiative listed: Result 3(a), (c), (d), (f); Results 4(a), (b), (c), (e), (f), (g); Results 5(a), (d); results 6 (c), (d) from each of these agreements.

Additional comments on selected sections of Annex 2 are highlighted in a separate section of the report (see below).

e) Annex 3 – Generally this Annex is entirely lacking in clear commitments tied to timelines. While many of the initiatives sound laudable the lack of specifics and timelines will make it difficult to measure progress.

The additional comments under Annex 2, result 3 in the separate section below also apply to Annex 3, Result 2.1.

f) Annex 4 – Result 1(e); Result 2(a)

**Recommendation:** Explicit timelines and targets should be put in for completion of the work proposed in the above sections noted.

#### 6. The governments fail to commit to public involvement in the COA processes:

In the Principles section [Article III], the governments lay out the principle of "collaboration and cooperation." It states: "ensure that the decision-making process incorporates consideration of

public and Great Lakes community opinions and advice, and provide the Great Lakes community with meaningful opportunities to consult, to advise and to participate directly in activities that support the Agreement." This principle is completely ignored in the rest of the COA. There is no commitment to set up public advisory committees or to support bodies such as the public advisory committees in some areas of concern or the forums that are in two of the LaMPS. This is a horrendous omission.

**Recommendation:** The governments should commit to set up and support public engagement in the COA processes. These should include mechanisms such as:

- a) non-government representatives as members of the COA Management Committee or an advisory committee to the Management Committee similar arrangements as above for each of the Annex Implementation Committees;
- b) Set up and support advisory bodies for the RAPs and LaMPs.

Should you require further clarification on any of the issues noted above, please do not hesitate to contact us (see below).

Yours truly,

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Encl.

## APPENDIX

# Comments on selected goals and results in the proposed COA

#### Annex 2 – Harmful Pollutants

In the February 18<sup>th</sup>, 2007 submission, CELA outlined a number of components that should be integrated in proposed COA Annex 2- Harmful Pollutants. The list of issues noted in the CELA submission is replicated below for your further consideration.

- A *re-commitment to the goals of virtual elimination* of persistent toxic substances;
- *Emphasize the avoidance of toxic substance* use through pollution prevention strategies, including product and process design requirements that result in the elimination or reduction in the use and generation of toxic substances.
- **Promote the substitution** of less hazardous or non-hazardous substances or innovative technological processes to replace toxic substances.
- The **goal of virtual elimination should be broadened** to address other hazardous substances including carcinogens, mutagenic, neurological and reproductive toxicants, or endocrine disrupting toxicants.
- Establish a new obligation and process in COA to update the list of substances currently identified for action under Tier 1 and Tier 2. This obligation should include a mechanism for screening, assessing and triggering action on substances. This new requirement would build upon the federal government's recent categorization and prioritization of 23,000 substances for further work required under the Canadian Environmental Protection Act. Generally this obligation or process would aim to identify those substances that meet the following hazardous criteria: persistent, bioaccumulative, carcinogenic, mutagenic, endocrine disrupting, respiratory toxics, neurotoxics, or those having potential reproductive or developmental impacts on wildlife or human health. The relevant annex 2 for listing substances should be revised and timelines for elimination and reductions strategies be established.
- Shift the onus to industry to demonstrate safety of substances that are used, manufactured, imported, released or disposed in the Great Lakes.
- Expand and enhance research, monitoring, surveillance and reporting mechanisms in a new COA. For example, the expanded use of biomonitoring data can provide evidence of where priority action may be needed.
- Support the establishment of a toxics use reduction and elimination institute for the Great Lakes. The goal of this institute would be to provide technical assistance to businesses so as to meet elimination and reduction goals, and promote innovation in green chemistry and clean production.
- Support the establishment a Great Lakes Coordinating Office to strengthen and enhance the profile of the Great Lakes in the federal government. The Coordinating Office would be mandated to be the primary implementing agency

for Great Lakes programs federally and the primary coordinating body for interjurisdictional programs. The list of issues above guidance to identify gaps and opportunities proposed in Annex 2. The following commentary and recommendations are intended to provide examples of sections in Annex 2 that require additional attention by the federal and provincial governments.

Proposed COA Section	Commentary	Support /Object	Recommendations
Preamble	This section does not demonstrate the urgency required on elimination and reduction of toxic substances through the implementation of pollution prevention strategies.	Needs Strengthening	<ul> <li>Recommendation: This section should be significantly strengthened to:</li> <li>recognize the unique vulnerabilities of children to exposure to toxic substances explicitly;</li> <li>acknowledge that approximately 50% of facilities reporting to the NPRI are located in the Great Lakes Ecosystem and therefore responsible for significant levels of pollution in Canada;</li> <li>Acknowledge that pollution originating in the Great Lakes basin may have impacts to communities (ie., Northern communities) outside of the Great Lakes Basin through long range transport.</li> <li>Acknowledge that the categorization process completed under the Canadian Environmental Protection Act in September 2006 identified 4300 substances that need further action and outline the process by which COA will add the results of categorization to the list of substances under Tier 1 or 2 of the Annex.</li> <li>Recognize the importance of identifying, developing and implementing safe substitutes for the hazardous substances.</li> </ul>
	While the Preamble makes reference to the categorization process on the 23000 substances		<b>Recommendation:</b> Adopt specific paragraphs from COA 2002 to provide understanding on the linkages between human population and the Great Lakes. For example, use the following paragraphs in the introductory section of COA 2002
	under the Domestic Substances List completed under the		Human Dependence on the Lakes
	Canadian Environmental Protection Act, the proposed Annex does not provide the results of categorization which were known as of September		At the beginning of the twenty-first century, more than 33 million people inhabited the Basin, including about a third of Canada's population. Eight of Canada's largest cities including Toronto, Hamilton, Oshawa and Windsor sit in the Basin. The Basin provides drinking water to millions of Canadians and

	2007. This Annex does not provide an explicit plan on how these results will be applied under COA and the process for expanding the list of substances currently listed under Tier 1 and Tier 2 of this Annex. The tone and focus of the proposed preamble is on coordination and monitoring activities on initiatives already underway on toxic substances. There is no focus currently on the need to undertake activities that will result in elimination of persistent toxic substances as well as other hazardous substances by 2010. Finally, this section fails to effectively demonstrate the link between human health and exposure to toxic substances. This omission contributes to the further decrease in the level of urgency required to take mandatory regulatory action to eliminate the most toxic substances in the Great Lakes.		affects the health and wellbeing of additional Canadians living downstream along the St. Lawrence River. The Great Lakes are the source of water for shipping, power generation and industries. On both sides of the border, the Basin supports multibillion dollar manufacturing, service, tourism and outdoor recreation industries, commercial and recreational fisheries, as well as strong maritime transportation systems and diversified agricultural sectors. The Basin is home to 45 percent of Canada's industries. At the beginning of the twenty-first century, the Basin provided the foundation for trade between Canada and the United States, equalling 50 percent of Canada's annual trade with the United States. In Ontario, roughly 75 percent of the population lives and works in the Basin. Ontario accounts for more than 50 percent of Canada's manufacturing activity. In fact, Ontario's gross domestic product is about 40 percent of the nation's total. Clearly, the Basin is vitally important to the integrity of Canada's economy. Challenges to the environmental quality of the Basin directly affect the viability and vitality of this economic engine.
Goals The Parties have identified three goals that will demonstrate progress	The goals do not include explicit targets or timelines. The absence of targets and timelines is a significant omission that does will not allow for the public and	Object	<ul> <li>Recommendation: Establish an explicit goal for virtual elimination of persistent, bioaccumulative toxic substances (Tier 1) and interim reduction target of 50% of other harmful pollutants (Tier 2) by 2010.</li> <li>Recommendation: Add a goal for the elimination of substances that are</li> </ul>

toward the virtual	decision makers to effectively	found to be carcinogenic, endocrine disrupting substances and substances
elimination of persistent	determine the level of progress on	that are neurodevelopmental toxicants.
bioaccumulative toxic	these goals during the period of	
substances and	this COA.	<b>Recommendation:</b> Add a goal to establish a process for expanding the list
significant reductions of		of substances under Tier 1 and 2 by screening and identifying substances
other harmful pollutants.	Substances identified under Tier 1	that were not captured through the categorization process that are
They are:	have had targets of virtual	carcinogenic, endocrine disrupting substances and neurodevelopmental
	elimination since the first COA	toxicants. This process would build on the categorization work completed by
1 Continue	was signed. To date, the	Canada.
1. Continue	governments' approach to reach	Odhada.
progress toward	virtual elimination on these	Recommendation: Add a goal to protect children from the exposure to
virtual elimination	substances has focused mainly	toxic pollutants including those substances that are persistent,
of persistent	5	
bioaccumulative	on non-regulatory measures.	bioaccumulative and toxic, or carcinogenic, or neurodevelopmental
toxic substances;	Given the opportunities and time	toxiciants, or endocrine disrupting substances, or reproductive and
	provided by the government to	developmental toxicants, respiratory toxicant or genotoxicant.
2. Reduce other	affected industrial sectors to	
harmful pollutants	implement voluntary initiatives to	
and initiate a	achieve virtual elimination for Tier	
program for	1 substances, the governments of	
managing	Canada and Ontario should shift	
chemical	its emphasis towards a regulatory	
substances for	approach if it would like to make	
the Great Lakes	significant progress towards its	
Basin; and	goal of virtual elimination of these	
,	substances.	
3. Enhance		
knowledge		
regarding harmful		
pollutants for the		
development of		
policies and		
programs to		
further reduce		
releases and		
mitigate risk.		

Result 4 - Develop and initiate a program for the Sound Management	There are a number of opportunities to strengthen this section of COA to ensure that the	Object	<b>Recommendation:</b> Result 4 (a) should be deleted and replaced with to the following:
of Chemical Substances in the Great Lakes Basin.	protection of human health, wildlife and the environment are priority for the government during		Using the results of categorization under CEPA, revise the list of substances of concern for addition to Tier 1 and 2 by 2010.
In addition to Tier 1 substances and Criteria Air Pollutants, Tier 2 substances and	the term of this COA. In general, Result 4 outlines a number of initiatives that are currently on-going and does not outline specific activities that will		<b>Recommendation:</b> Add an obligation under Result 4(a) for the Ontario and Canada to undertake and complete a process to screen for substances that are carcinogenic, endocrine disrupting substances and neurodevelopmental toxicants and which have not been identified through the categorization process undertaken under CEPA. Such a process will identify substances that are of concern to children's health as well address the limitations of the
substances of emerging concern have been detected in the Great Lakes Basin. The Parties will identify substances for action and will work with sectors and Great	ensure that the levels of pollution in the Great Lakes basin will be reduced by 2010. The next three years provide significant opportunities for taking action to eliminate and significantly reduce		categorization process. <b>Recommendation:</b> It is recommended that COA list of substances (Tier 1 and 2) should be expanded to include all CEPA Schedule 1 including polybrominated diphenyl ethers (PBDEs) and perfluorooctanoic sulfonates (PFOS), substances that have been detected in levels of concern to human
Lakes communities to develop programs to reduce releases from the manufacture of chemical substances and from the	a number of harmful pollutants in the Great Lakes. The public and the environment should not have to wait another three years to determine adequate levels of reductions for these substances.		health and the environment. <b>Recommendation:</b> Ontario and Canada should identify the substances for addition under COA those substances that are identified through the "in commerce" process currently in progress.
use and disposal of agricultural and consumer products that contain	It was determined that Ontario based facilities contributed 43% of		Recommendation: Revise Result 4 (c) to read:
these substances. Canada and Ontario will:	the total releases (approximately 7.6 million kg) of cancer causing substances to air in Canada in Canada, leading all provinces in releases. <sup>1</sup> This data suggest that		Consult with sectors (i.e., industries, municipalities, agriculture) <b>and</b> <b>stakeholders</b> (including environmental and health organizations) to develop action plans for <b>elimination and reduction</b> of substances in uses and/or releases under Tier 1 and 2;
a. Develop a revised list of	a strategy to eliminate and reduce substances that are cancer causing should be given some		Recommendation: Revised Result 4(d) to read:

<sup>&</sup>lt;sup>1</sup> See: <u>www.PollutionWatch.org</u>. For 2005 data and fact sheet released in March 2007.

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	substances for	priority for Ontario.	"Promote and support the development of best practices including safe
	action and		alternatives for reducing or eliminating the production, use and/or release of
	associated	For example, under Results 4 (a)	substances identified for action. This includes support for applied scientific or
	sectors in the	no additional information has	technological studies as well as the demonstration of environmental
	Great Lakes	been provided to demonstrate	technologies and green chemistry.
	Basin;	how the COA lists will be revised	
	,	and when. The lack of such	<b>Recommendation:</b> Result 4(e) should be amended to reflect the need to
b.	Compile an	critical information significantly	integrate the educational and outreach activities proposed in COA related to
	inventory of	weakens the intent of Result 4.	the safe collection and disposal of pharmaceuticals with the efforts under the
	federal and		
	provincial	One opportunity for expanding the	Waste Diversion Act where pharmaceuticals have been designated as
	programs, and	list of substances under Annex 2	special waste. Furthermore, extended producer responsibility should be a
	consult with	is the results of categorization	key element of these efforts and the scope of Results 4(e) should be
	federal and state	under CEPA. This effort was a	expanded to include emerging substances of concern found in other
	agencies in the	significant achievement for	consumer products, including personal care products.
	United States on	Canada and the results are	
	joint reduction	important for establishing an	<b>Recommendation:</b> Add new obligation to establish a toxic use elimination
	•	agenda for the Great Lakes.	and reduction policy whose foundation will implement pollution prevention
	opportunities for the substances	Substances that are persistent	strategies and extended producers responsibility. The use, generation,
			manufacturing, import, release, and disposal of hazardous substances will
	identified for	and bioaccumulative as well as	be evaluated at every stages of its life cycle.
	action;	those substances that are found	
	0	in high production volumes merit	Recommendation: Revise Results 4 (f) to read:"Enhance pollutant
C.	Consult with	serious consideration for	releases profiles in the Great Lakes Basin <i>using the National Pollutant</i>
	sectors (i.e.,	government and industry action.	<i>Release Inventory</i> (NPRI) and the US Toxics Release Inventory for all
	industries,	The COA should take immediate	substances of substances released in the Great Lakes, and issue a report
	municipalities, agriculture) to	steps to review the results of	on this <i>information on an annual basis</i> .
	identify	categorization and update the	on this momation on an annual basis.
	opportunities and	COA list over the next year.	
	develop programs	Furthermore, additional resources	<b>Recommendation:</b> Revise Result 4(g) to reflect a joint approach required
	and projects for	and commitment should be	by federal and provincial government to implement activities on substances
	reductions in uses	directed to ensure that all	identified as a concern to Great Lakes. This result should require facilities
	and/or releases;	substances of concern, in	that respond to the surveys conducted under the Industry Challenge through
		particular to children, are	Section 71 to report that the substance of concern are used, manufactured,
d.	Promote and	identified for further attention. To	imported, generated, released, and disposed of in the Great Lakes. Such a
	support the	address the significant	claim would require immediate addition of the substance to Tier 1 and virtual
	development of	contributions of Ontario base	elimination. Finally, this section should refer to the substances identified
	best practices for	facilities to releases of cancer	under Results 4(a) to identify which substances will be targeted under results

eliminating the production, use and/or release of substances identified for action. This includes support for applied scientific or technological studies as well as the demonstration of environmental technologies especially willerable populations, to reduce their exposure and their contribution to consumer products consumer products c		reducing or	causing substances, Ontario and	4(g).
<ul> <li>and/or release of substances</li> <li>substances</li> <li>identified for action. This includes</li> <li>support for applied scientific or demonstration of environmental technological</li> <li>e. Carry out education and outreach to Great Lakes communities, especially</li> <li>vulnerable populations, to reduce their exposure and their contribution to environmental releases and disposal of</li> <li>f. Enhance pollution</li> <li>indiverse pollutions</li> <li>indiverse pollution</li> <li>indiverse po</li></ul>		5		
<ul> <li>substances of further action. This includes support for applied scientific or technological studies as well as the demonstration of environmental technologies</li> <li>e. Carry out education and outreach to Great Lakes communities, especially vulnerable populations, to environmental releases of safe collection and disposal of consumer product containing substances of</li> <li>e. Carry out education and outreach to Great Lakes communities, especially</li> <li>e. Carry out education and outreach to Great Lakes communities, especially</li> <li>e. Carry out education and outreach to Great Lakes communities, especially</li> <li>e. Carry out education and outreach to Great Lakes</li> <li>e. Carry out education and outreach to Great Lakes</li> <li>e. Carry out education and outreach to Great Lakes</li> <li>e. Specially</li> <li>vulnerable environmental releases and disposal of consumer products containing</li> <li>substances of concern, such as pharmaceuticals; environmental apharmaceuticals; environmental mentages of concern, such as pharmaceuticals; environmental mentages of concern, such as pharmaceuticals; environmental and health organizations that can make</li> <li>f. Enhance pollution and concern such as pharmaceuticals; environmental and health</li> <li>f. Enhance pollution and environmental environmental and health</li> <li>f. Enhance pollution and environmental environmental and health</li> <li>f. Enhance pollution and environmental environmental and health</li> <li>f. Enhance pollutions that can and the categorians that can an adve</li> </ul>				
<ul> <li>identified for action. This includes support for appied scientific or retechnological studies as well as the demonstration of environmental technologies</li> <li>e. Carry out education and outreach to Great Lakes communities, to reduce their exposed and the demostration and outreach to great Lakes communities, to reduce their exposed and develop additional programs for the safe collection and disposal of consumer products continuing substances of the develoption f. Enhance pollution</li> <li>f. Enhance pollution</li> <li>different action. For immediate purposes, the mounting monitoring data for substances such as polytorminated dipheryl ethers and perfluorooctanoic sulfonates (PFOS) demonstrating detectable levels of these substances in humans as well as wildlife should be added to Tier 1 and 2 of COA. address some 9000 substances substances some 9000 substances substances some 9000 substances substances in the cation. For immediate purposed. Substances in the cation. For immediate purposes. Substances some 9000 substances substances in the cation to contribution to concern, such as pharmaceuticals; f. Enhance pollutant</li> </ul>			identifying all cancer causing	
This includes support for applied scientific or technological studies as well as the demonstration of environmental technologies       For immediate purposes, the additions of substances to Schedule 1 of CEPA and the mounting mounting mounting data for substances such as the demonstration of environmental technologies         e.       Carry out education and outreach to Great Lakes communities, especially vuherable movinonmental releases and develop additional programs for the safe collection and disposal of consumer products consumer products			substances for further action.	
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studies as well as the demonstration of environmental technologies       substances such as polybrominated diphenyl ethers and perfluorooctanoic sulfonates (PFOS) demonstrating detectable levels of these substances in humans as well as wildlife should be added to Tier 1 and 2 of COA.         e.       Carry out education and outreach to Great Lakes communities, especially       Another opportunity to expand the list of substances under COA is to monitor and respond to the federal government's effort to address some 9000 substances considered as "in commerce" substances and develop additional programs for the safe collection and disposal of consumer products containing       Another opportunity to expand the list of substances substances substances         f.       Enhance pollutant       Under Results 4(c), excludes the participation of others stakeholders, including environmental and health and programs for the			Schedule 1 of CEPA and the	
the demonstration of environmental technologies       polybrominated diphenyl ethers and perfluorooctanoic sulfonates (PFCS) demonstrating detectable levels of these substances in humans as well as wildlife should be added to Tier 1 and 2 of COA.         e.       Carry out education and outreach to Great Lakes communities, especially       Another opportunity to expand the list of substances under COA is to monitor and respond to the federal government's effort to environmental programs for the safe collection and disposal of consumer products containing       Another opportunity to expand the federal government's effort to captured through the captured through the safe collection and disposal of consumer products containing       Under Results 4(c), excludes the participation of others stakeholders, including environmental and health orrigizations that can make		technological	mounting monitoring data for	
of environmental technologies       polybolicitates upper futures of upper futures of environmental technologies       and perfluorooctanoic sulfonates (PFOS) demonstrating detectable levels of these substances in humans as well iffe should be added to Tier 1 and 2 of COA.         e.       Carry out education and outreach to Great Lakes communities, especially       Another opportunity to expand the list of substances under COA is to monitor and respond to the federal government's effort to address some 9000 substances considered as "in commerce" substances that have not been categorization process.         evelop additional programs for the safe collection and disposal of consumer products substances of containing       Substances that have not been categorization process.         f.       Enhance pollutant       Under Results 4(c), excludes the participation of others stakeholders, including environmental and health organizations that can make		studies as well as	substances such as	
<ul> <li>technologies</li> <li>and periodiculation stating detectable</li> <li>e. Carry out education and outreach to Great Lakes</li> <li>communities, especially</li> <li>vulnerable</li> <li>unoitor and respond to the federal government's effort to address some 9000 substances considered as "in commerce"</li> <li>substances that have not been captured through the categorization process.</li> <li>Substances of consumer products</li> <li>substances of containing</li> <li>substances of pharmaceuticals;</li> <li>f. Enhance pollutant</li> </ul>			polybrominated diphenyl ethers	
<ul> <li>e. Carry out education and outreach to Great Lakes communities, especially</li> <li>Another opportunity to expand the list of substances under COA is to monitor and respond to the reduce their exposure and their contribution to environmental releases and develop additional programs for the safe collection and disposal of consumer products</li> <li>f. Enhance pollutant</li> <li>(H-VG) Gendulating detectable list of substances in humans as well as wildlife should be added to Tier 1 and 2 of COA.</li> <li>Another opportunity to expand the list of substances under COA is to monitor and respond to the address some 9000 substances considered as "in commerce" substances in this category are relevant and need to be assessed.</li> <li>Inder Results 4(c), excludes the participation of others stakeholders, including environmental and health origination of thers stakeholders, including environmental and health</li> </ul>			and perfluorooctanoic sulfonates	
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releases and       captured through the         develop additional       captured through the         programs for the       safe collection and         disposal of       Substances in this category are         consumer products       sessesed.         containing       substances of         substances of       Under Results 4(c), excludes the         participation of others       stakeholders, including         environmental and health       organizations that can make				
develop additional programs for the safe collection and disposal of consumer products containing substances of pharmaceuticals;captured through the categorization process. Substances in this category are relevant and need to be assessed.f.Enhance pollutantCaptured through the categorization process. Substances in this category are relevant and need to be assessed.				
programs for the safe collection and disposal of consumer products containing substances of concern, such as pharmaceuticals;       Categorization process.         f.       Enhance pollutant       Categorization process.				
safe collection and disposal of consumer products containing substances of concern, such as pharmaceuticals;       Substances in this category are relevant and need to be assessed.         f.       Enhance pollutant       Substances in this category are relevant and need to be assessed.				
consumer products       assessed.         containing       assessed.         substances of       Under Results 4(c), excludes the         concern, such as       participation of others         pharmaceuticals;       stakeholders, including         f.       Enhance pollutant				
containing substances of concern, such as pharmaceuticals;       Under Results 4(c), excludes the participation of others stakeholders, including environmental and health organizations that can make		disposal of		
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pharmaceuticals;       stakeholders, including         f.       Enhance pollutant				
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f. Enhance pollutant organizations that can make		pharmaceuticais,		
	f	Enhance pollutent		
	I.	releases profiles in	organizations that can make	
the Great Lakes Significant contribute to the			0	
Basin using various development of elimination and			development of elimination and	

available	reduction programs for hazardous		
inventories, such	substances.		
as the National			
Pollutant Release	Under Result 4 (d) should focus		
Inventory (NPRI)	and establish a toxic use		
and the US Toxics	elimination and reduction policy		
Release Inventory,	whose main foundation will be		
and issue a report			
on this information.	implementing pollution prevention		
	strategies and extended		
Canada will:	producers responsibility. The		
	current proposal suggests best		
g. Implement activities	practices but fails to outline		
to address substances	approaches that are considered		
identified under	best practices. By establishing a		
Canada's Chemicals	toxics use elimination and		
Management Plan that	reduction policy, the use, import,		
are of concern within	manufacture export, release,		
the Great Lakes Basin.	generation, and disposal of the		
This may include	most hazardous substances can		
examining substances	be addressed. Such a framework		
identified as high	will allow for technological		
priorities, collecting	innovation, promote efficiency and		
information on potential	implementation of non- or less		
releases to the Great			
Lakes, developing	hazardous substances, materials		
national preventive and	and processes.		
control measures, and			
promoting environmental	Under Result 4 (e), Ontario's		
monitoring to track	efforts to develop programs for		
progress; and	the safe collection and disposal of		
progress, and	pharmaceuticals should be		
	integrated with efforts under the		
	Waste Diversion Act as		
	pharmaceuticals have been		
	designated as special waste.		
	Extended producer responsibility		
	should be a key element of these		
	efforts. Emerging substances of		
	Shorton Enlorging Substantion of		

	concern found in other consumer
	products, including personal care
	products, should also be
	addressed.
	Under Results 4 (f) the
	requirement for a report on
	pollutant release profiles should
	be the National Pollutant Release
	Inventory (NPRI) and information
	on these pollutants should be
	reported on an annual basis. No
	other government inventory would
	meet reporting thresholds.
	facilities in the Great Lakes
	responsible for substances
	targeted under Chemicals
	Management Plan(CMP). The
	CMP currently focuses its efforts
	in the next three years on some
	process to address over 2500
	substances identified under
	be able to fill this need given the reporting under NPRI is mandatory for those facilities that meet reporting thresholds. Under subsection Result 4(g) the implementation activities to be undertaken should be specifically a joint responsibility for Ontario and Canada. The current proposal which uses the word "may include examining" does not provide any mandatory requirements to identify and target facilities in the Great Lakes responsible for substances targeted under Chemicals Management Plan(CMP). The CMP currently focuses its efforts in the next three years on some 200 substances through an Industry Challenge. No plan or process to address over 2500

	categorization has been		
	developed. The time required to		
	complete assessment on these		
	substances will mean that the		
	Great Lakes will remain under		
	tremendous stress from exposure		
	to hazardous substances.		
	More details are necessary to		
	outline how the CMP will identify		
	how substances that are of		
	concern to the Great Lakes will be		
	identified for further work. This		
	section should be directly linked		
	to subsection 4(a) so that it is		
	clear which substances will be		
	targeted under this provision.		
Annex 2	The CCME strategy is considering	Needs	These recommendations are relevant to the sections of the proposed COA
	requiring sewer use by laws be	Strengthening	pertaining to municipal wastewater and storm water.
Result 3 Coordinate	adopted by all as a precondition		
activities to reduce	to infrastructure funding.		Recommendation: Canada and Ontario will require all municipalities in the
releases from municipal	Municipal wastewater effluent is a		Great Lakes basin to adopt a comprehensive sewer use by law as a
wastewater.	growing source of toxics. Toxic		precondition for infrastructure funding.
	substances that enter sewage		
and	systems through the use and		<b>Recommendation:</b> Canada and Ontario will investigate the sources of toxic
	disposal of products are beyond		substances in sewage effluent and sludge and promote measures to reduce
Annex 3	the reach of municipal source		toxics at the source where possible.
	control programs. The use of		
Goal 2. Improve water	advanced sewage treatment plant		<b>Recommendation:</b> Canada and Ontario will promote priority action to assist
quality in each Great	technologies have been shown to		municipalities with CSO problems caused by aged outdated infrastructure.
Lake by making progress	substantially remove substances		
on virtual elimination of	of concern such as endocrine		Recommendation: Ontario and Canada will promote municipal best
persistent	disrupting substances found in		practices to reduce storm water flow into combined sewers and storm water
bioaccumulative toxic	municipal sewage. Therefore,		sewers.
substances and reduction	Canada must use its powers		
of other harmful	under CEPA to regulate the use		Recommendation: Ontario and Canada will promote tap water
pollutants	of toxics in products that enter the		conservation and water soft path management. Soft water management

	Great Lakes via municipal	strategies lead to innovative ways of managing or reducing water use such
Result 2.1 Reduce	sewage effluent or run off from	as reclamation, grey water recycling and waterless systems.
Nutrients, microbial and	sewage sludge.	
other contaminants from		
industrial and municipal		
wastewater, combined	On CSOs	
sewer overflows and		
urban stormwater	Sierra Legal surveyed 20 cities in	
sources consistent with	the Great Lakes basin the results	
actions specified in	were present in the <i>Great Lakes</i>	
Binational LaMPs and	Sewage Report Card. Based on	
binational action plan	the survey results, the 20 cities	
	dumped more than 90 billion litres	
	of untreated sewage mixed with	
	storm water into the Great Lakes	
	basin in one year due to	
	combined sewer overflows alone.	
	It is expected that climate change	
	will lead to an increases in the	
	volume and frequency of CSOs in	
	the Great Lakes basin.	
	To help municipalities	
	infrastructure, funding programs	
	should not require municipalities	
	to match funding as that will limit	
	-	
	progress.	
	While engineering infrastructure	
	fixes like end-of-pipe holding	
	tanks or storage tunnels may offer	
	some temporary relief, strategies	
	should take the problem to the	
	source by incorporating water	
	demand management and soft	
	path water strategies.	

	Best practices should be prompted to reducing wastewater and stormwater discharges to the Great Lakes by reducing stormwater discharges to sewers (storm and combined) and through tap water conservation		
	programs. Examples of best practices in an urban environment are the use of permeable ground surface materials, disconnection of downspouts and footing drains, encourage the use of rain barrels, remove sewer cross connections, direct storm water into storm water infiltration basins and		
	planting trees. Recognising the connection between tap water conservation and reductions in wastewater flow is key. Programs should encourage low or dual flush toilets, water efficient appliances, the use of drought tolerant plants for landscaping to reduce watering needs.		
Result 5 (d) – Maintain profiles of Tier 1 substances and develop and maintain inventories of substances targeted for action	This result should not be focused on Tier 1 substances only. Other substances of concern to the Great Lakes should be included. There is sufficient evidence to justify the need to virtually	Needs Strengthening	<ul> <li>Recommendation: Amend Result 5 (d) to reflect the need to establish and maintain profiles of substances of concern to the Great Lakes including Tier 1 and 2 substances as well as other substances identified through Results 4.</li> <li>Recommendation: Amend Result 5(k) to recognize the need to address the prophylactic use of antibiotics and of hormones as animal growth promoters.</li> </ul>

Canada will: k) Work with farm organizations and industry representatives to develop an enhanced program for the safe collection and disposal of agricultural pesticides and containers that includes expired/unused veterinary pharmaceuticals	eliminate substances currently listed under Tier 1. While additional efforts including monitoring may add value to the knowledge base, additional resources and commitment are required by the governments to identify additional substances that require action. Under 5(k), the federal government should go beyond working for the safe collection and disposal of unused veterinary pharmaceuticals, to also addressing the prophylactic use of antibiotics and of hormones as animal growth promoters. Governments should also review sewage sludge and animal manure management practices in light of issues related to pharmaceuticals and resistant bacteria in water.		Also, add a commitment on the part of both the federal and Ontario governments to review sewage sludge and animal manure management practices in light of issues related to pharmaceuticals and resistant bacteria in water.
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### Annex 3 – Lake and Basin Sustainability

Proposed COA Section	Commentary	Support/Object	Recommendations
Goal 2. Result 2.1 Reduce Nutrients, microbial and other contaminants from industrial and municipal wastewater, combined sewer overflows and urban stormwater sources consistent with actions specified in Binational LaMPs and binational action plan		Needs Strengthening	Recommendation: Annex 3, Revise 2.1 d) add "Canada will expand the Ballast Water Control and Management Regulation to include the management of sediment and non pumpable water in ships with no ballast on board."
Goal 2. Result 2.2 Reduce Nutrient, microbial and other contaminants from rural sources by undertaking actions specified in the binational LMPs and binational lake action plans	Ontario should evaluate and publicly report on progress on reducing non point source contamination from agriculture since the implementation of the <i>Nutrient</i> <i>Management Act.</i>	Needs Strengthening	<b>Recommendation:</b> Ontario will assess progress on reducing nutrients, microbial and other contaminants from agricultural sources under the Ontario <i>Nutrient Management Act.</i>
Goal 4. Reduce the threat of aquatic invasive species to Great Lakes aquatic ecosystems and species.			<ul> <li>Recommendation: Prevent new AIS invasions into the Great Lakes, and reduce threat to Great Lakes aquatic ecosystems and species by AIS already established</li> <li>Recommendation: Revise the introductory paragraph as follows:</li> <li>A new aquatic invasive species enters the Great Lakes approximately every six to nine months. Some of the invaders (<i>DELETE</i> <i>"become established"</i>, b/c if its an "invader" is has become established) <i>HAVE</i> <i>TREMENDOUS IMPACT TO THE GREAT</i> <i>LAKES BY</i> changing the ecology of the lakes, disrupting food webs, displacing native species, altering energy pathways, and affecting water clarity in near-shore zones. They not only lead to <i>PERMANENT</i> ecological changes and but can also alter</li> </ul>

			cycling of chemical contaminants and nutrients, and COST BILLIONS IN ECONOMIC DAMAGE TO FISHERIES, INDSUTRY and MUNICIPALITES WATER INTAKES, BOATING DOCKS AND INFRASTRUCTURE, and RECREATIONAL beaches. Both Canada and Ontario recognize the threat of aquatic invasive species to the ECOLOGICAL, ECONOMIC and SOCIAL health and WELL-BEING of the Great Lakes and will work cooperatively to implement a national plan in the Great Lakes region.
<ul> <li>Result 4.1 - Implementation of the "National Action Plan to Address the Threat of Aquatic Invasive Species" in the Great Lakes.</li> <li>Canada and Ontario will: <ul> <li>a. Coordinate</li> <li>implementation of the National Action Plan to Address the Threat of Aquatic Invasive Species specific to the Great Lakes;</li> </ul> </li> <li>b. Identify allowable species associated with each pathway or sector and the application of appropriate federal and/or provincial legislation and regulations to prevent new aquatic invasive species introductions;</li> </ul>	(NOTE: this recommendation was really poorly written, and needs clarification so that it doesn't read like the gov't will determine what "allowable" species from the ballast pathway are out there! This needs to clarify this is for *Purposeful* introductions that are currently or proposed to be brought into the country for trade)	Object	<ul> <li>Recommendation: Results 4.1 should be amended as follows:</li> <li>Canada and Ontario will:</li> <li>a) Coordinate implementation of the National Action Plan to Address the Threat of Aquatic Invasive Species specific to the Great Lakes;</li> <li>b) DEVELOP SCREENING PROGRAM FOR SPECIES PROPOSED FOR IMPORTATION AND TRADE, TO identify allowable species associated with each IMPORTATION pathway or sector and the application of appropriate federal and/or provincial legislation and regulations to prevent new aquatic invasive species introductions, with a DEADLINE FOR IMPLEMENTATION AND TRADE BY AS WELL AS EXISITING SPECIES ALREADY IMPORTED AND IN TRADE IN CANADA BY 2009;</li> <li>c) Develop AND IMPLEMENT early detection</li> </ul>

<b>—</b> • • • • •	
c. Develop early detection and rapid response to new aquatic invasive species; and	and rapid response <i>PLANS</i> to new aquatic invasive species, <i>ENSURING EFFICIENT</i> <i>COORDINATION WITH APPROPRIATE</i> <i>JURISDICTIONS</i> ; and
d. Increase public awareness and education to prevent the spread of aquatic invasive species	d) Increase public awareness and education to prevent the spread of aquatic invasive species and to report new occurrences.
and to report new occurrences.	Under Canada's responsibility <b>Recommendation</b> : For results 4.1 add the
Canada will:	following recommendations following Results 4.1(e)
e. Make prevention a priority by ensuring actions such as 100 percent compliance with Ballast	f) Make Ballast tank flushing for vessels in the NO Ballast On Board condition mandatory within the <i>Canada Shipping Act</i> ,
Water Regulations; and f. Implement the Great Lakes Sea Lamprey Control Program in cooperation with the United States government to reduce sea lamprey populations.	g) Establish a date certain by which national discharge standards, as articulated as the IMO standard within in the <i>Canada Shipping</i> <i>Act</i> , are to be implemented for the nation, whether or not the International Maritime Organization Ballast Water Convention comes into force. It is recommended that an implementation date of 2009 is set, and
	h) Implement the Great Lakes Sea Lamprey Control Program in cooperation with the United States government to reduce sea lamprey populations.
Proposed recommendations to support the Great Lakes from	Recommendation: Add the following recommendations under Annex 3
introduction of invasive species.	CANADA AND ONTARIO WILL:
	DEVELOP A MECAHNISM TO HARMONIZE BALLAST WATER REGULATIONS WITH

	BW standards emerging from the U.S (more stringent than IMO), including THE POSSIBILITY OF A more stringent FEDERALLY ESTABLISHED BALLAST WATER DISCHRAGE STANDARD FOR THE Great Lakes only, or PROVINCIAL REGULATIONS consistent with US standards.
	*Extend implementation of national standard to coast-wise vessels entering the Great Lakes by 2009. Such an action will ensure that domestic "coast-wise" vessels transiting to the Great Lakes from Canadian coastal waters through the Seaway, do not introduce new AIS, pathogens and disease from ballast.
	*Monitor the efficacy of implementation of ballast water regulations on the Great Lakes, with the intent of improving the standards and regulations until the goal of prevention of new AIS is achieved.
	*DEVELOP MECAHNISMS to ensure new AIS are not introduced via hull fouling, anchors or sea chests
	*Investigate the economic costs and benefits associated with transporting cargo currently moved by overseas ocean-going vessels by Lake, rail or truck, to determine if a transportation modal shift is economically feasible way to embrace the precautionary principle and prevent new AIS in the Great Lakes
	ONTARIO WILL:

			Investigate the risk of pathogen and disease contamination of the Great Lakes- a drinking water reservoir and ecosystem- by ballast discharge.
Goal 6: Make significant progress towards the development and implementation of locally-created, science-based source protection plans to identify and mitigate risks to drinking water sources in the Great Lakes Basin.	It is interesting and promising to note the inclusion of "ecosystem protection" in the last line of Goal 6. At the provincial level, the Ministry of Environment has systematically attempted to distinguish the new source protection legislation as a human health initiative as opposed to an environmental one. However, in order to	Needs Strengthening	Recommendation: Add the following definitions, results and government commitments: After Result 6.1: The "potential risks" to Great Lakes Basin drinking water sources are interpreted as including, in particular, cumulative risks.
More than 70% of Ontario's population draw their water directly from the Great Lakes and connecting channels. Others draw from the underground aquifers within the Great Lakes Basin, or from the Basin's streams, rivers and other surface waters. In total, about 95% of Ontarians, or more than 12 million people, depend on the waters of the Great Lakes Basin for water supply to their homes and communities. This area of special focus addresses the protection of the Great Lakes as sources of drinking	act in a truly precautionary manner, it is necessary to recognize the inherent inter- relationship between ecosystem health and human health.		Canada and Ontario will: c.1) As soon as possible, engage in meaningful consultation with those First Nations peoples who have reserve lands, traditional territories, and/or pending land claims within the Great Lakes Basin. Canada will: e.1) Develop a National Water Policy that explicitly adopts a precautionary approach to assessing and minimizing threats to the Great Lakes Basin drinking water sources.
water for the millions of people who rely on them. In Ontario, the Great Lakes and their major aquifers are generally very high quality sources of drinking water. However, additional effort and cooperation are warranted to ensure that growing populations in the Basin can continue to rely on Great Lakes water for the many generations to come. This renewed Agreement recognizes that what happens on the land affects the water, and commits to the watershed approach to protecting			Ontario will: f) Establish source protection authorities and support the creation of source protection committees that include municipal, conservation authority, First Nation, industrial, business, agricultural, <i>environmental</i> non-governmental organization and other watershed representatives and individuals, for the development of source protection plans. k) Establish a provincial multi-stakeholder standing committee to advise the source

the sources of drinking water in the		protection committees on the handling of
Great Lakes Basin. Source protection		Great Lakes threats.
in the Great Lakes Basin must		
integrate local watershed activities		I) In responding to the risks that have been
with lake- and basin-wide prevention		
and remediation action.		identified under Result 6.1, the Minister of the
		Environment will set targets to ensure that
The Destine have a support to exhibit		the human health and ecosystem risks to the
The Parties have agreed to achieve		Great Lakes are minimized.
progress during the duration of the		
Agreement on collaborative,		
watershed-based action to protect the		
waters of the Great Lakes Basin as		
safe, reliable and trusted sources for		
drinking water supply.		
Result 6.1 - The potential risks to		
Great Lakes Basin drinking water		
sources are identified and		
assessed, and early actions to		
address risks are undertaken.		
To protect the safety, reliability and		
quality of Great Lakes Basin waters		
for drinking water supply, we must go		
beyond reactive and remedial		
approaches to anticipate and avoid		
the activities that pose a risk to		
drinking water sources. Source		
protection is a science-based, locally-		
driven process to protect drinking		
water on a watershed-by-watershed		
basis. The Parties recognize that the		
Great Lakes, which integrate the		
impacts of pollution across the		
tributary watersheds of the Great		
Lakes Basin, require special		
protections. Municipalities,		
conservation authorities and		
individuals have a role to play in		
conducting the science assessments		
and then making locally-appropriate		
decisions to minimize risks to water		

supplies	5.			
	a and Ontario will:			
a.	Provide Source Protection Committees with access to provincial and federal data sets, studies and expertise to support the identification and assessment of issues and threats to drinking water sources;			
b.	Include the consideration of protecting drinking water sources from significant risks associated with wastewater, where such risks are identified, when setting priorities for Canada and Ontario infrastructure funding programs; and			
C.	Collaboratively pursue strengthening of protection of the Great Lakes as sources of drinking water through existing binational mechanisms.			
Canada	a will:			
d.	Support demonstration projects and technology transfer on municipal, wastewater treatment technologies to control pathogens and chemicals of emerging concern; and			
e.	Consult with agencies responsible for federal lands and facilities, to develop a			

	framework for their		
	participation in watershed-		
	based source protection.		
Ontario	will-		
Ontario	wiii.		
f.	Establish source protection		
	authorities and support the		
	creation of source protection		
	committees that include		
	municipal, conservation		
	authority, First Nation,		
	industrial, business,		
	agricultural, non-government		
	organization and other		
	watershed representatives		
	and individuals, for the		
	development of source		
	protection plans;		
g.	Provide regulations, rules		
· 9.	and guidelines for the		
	development of source		
	protection workplan		
	documents and scientific		
	assessment reports,		
	including the specific needs		
	of Great Lakes drinking water		
	systems;		
h.	Provide mechanisms through		
	regulations, rules and		
	guidance under the <i>Clean</i>		
	Water Act, 2006 for the		
	integration of source		
	protection plans with Great		
	Lakes plans and		
	agreements;		
i.	Engage with interested First		
	Nations to develop: the		
	framework for		
	representatives to hold a		
L	representatives to hold a		

seat on local source		
protection committees, and a		
process for Band Councils to		
opt in to participating in		
watershed-based source		
protection planning; and		
provide access to training		
and technical guidelines for		
interested First Nations to		
conduct source water		
protection assessments.		
j. Maintain a stewardship fund		
to provide education and		
outreach on the protection of		
drinking water sources, and		
to directly support action on		
mitigating potential threats to		
source waters.		
Result 6.2: Develop knowledge and		
understanding of water quality and		
quantity issues of concern to the		
Great Lakes as drinking water		
sources		
3001063		
Source protection planning is a		
science-based undertaking. It is also		
an inherently precautionary approach.		
To protect source water quality, it is		
necessary to understand the		
occurrence and significance of		
contaminants of existing or emerging		
concern on a lake-wide basis as well		
as on a site-specific basis. Water		
quantity in areas of the Basin might		
also be at risk, as land uses and		
climate change may threaten water		
levels or disrupt the processes that		
replenish underground aquifers.		
Canada and Ontario, working with		
other members of the Great Lakes		
community will contribute data and		
expertise to build a better		

understanding of the source water issues and concerns in the Great Lakes.		
Canada and Ontario will:		
a. Support improved collaboration on Great Lakes drinking water source protection research among governments, academics, industry, watershed groups and U.S. counterparts; and		
b. Provide source protection committees with access to provincial and federal data sets, studies and expertise on environmental monitoring and science concerning source water quality and quantity, occurrence and causes of water quality impairments, and related potential health risks.		
Ontario will:		
a. Ensure that watershed-based committees in the Great Lakes Basin collaborate to identify issues and threats shared by multiple watersheds in the basin, to inform the development of provincially-mandated Great Lakes source protection targets and other provincial actions as needed; and		
Support the engagement of conservation authorities and municipalities in the Great Lakes		

Basin for the assessment, restoration		
and protection of Great Lakes		
watersheds for both drinking water		
source protection and broader		
ecosystem protection purposes.		

## Annex 4 – Monitoring and Research

Proposed COA	Commentary	Support/Object	Recommendations
Section			
Result 1 (b) – Coordinate federal and provincial monitoring and research in support of Annex 2 to determine trends, impacts and sources of harmful pollutants	This result should be expanded to recognize the efforts at the international level to establish a Global Monitoring Program (i.e., Stockholm Convention on POPs). The research and monitoring activities in the 1980s and 1990s completed in the Great Lakes made significant contributions to the knowledge base on pollutants and policy development at the international level. By making the linkages to these international efforts, the knowledge gained from the Great Lakes as well as in other jurisdictions may assist in priority setting exercises.	Needs strengthening	<b>Recommendation:</b> Amend Result 1(b) to read include reference to international monitoring programs such as that under development under the Stockholm Convention on Persistent Organic Pollutants.
Result 3 – Increase sharing of data and information among governments, organizations and Basin residents	A Great Lakes Coordination Office should be establish to undertake key activities that are critical to the success of implementing the Great Lakes Water Quality Agreement. This Coordinating Office would be the coordinating body for inter-jurisdictional programs (including the implementation of obligations outlined in COA). One of its functions would be as an information clearinghouse to address the tasks outlined in Result 3 of the proposed Annex 4 of COA.		<b>Recommendation:</b> The Federal government should establish a Great Lakes Coordinating Office to strengthen and enhance the profile of the Great Lakes in the federal government. The Coordinating Office would be mandated to be the primary implementing agency for Great Lakes programs federally and the primary coordinating body for inter-jurisdictional programs.

The creation of a Great Lakes Coordinating Office would improve the current governance and institution framework in the Great Lakes.	