



## Summary of Key Points

From the 2009 EGBSC Lake Stewardship Workshop

Held June 22, 2009 at C.W. Stockey Centre – Parry Sound

**Note: Detailed presentations (PowerPoint) given by these speakers are available on our website – Look under the “Annual Workshop” tab at the top of our Home Page at [www.helpourfisheries.com](http://www.helpourfisheries.com)**

Presenter	Key Points
<p><b>Eric McIntyre</b> E. Geo. Bay Stewardship Council</p>	<p><b>Opening Comments:</b></p> <ul style="list-style-type: none"> <li>• Welcome / thank-you for attending</li> <li>• Purpose – for cottage association representatives to relay key stewardship messages to their members; you are our partners</li> <li>• Please distribute <i>Firesmart</i> materials and “Healthy Waterfronts” brochures to your members</li> <li>• “Lake Planning Handbook for Community Groups” – all FOCA members get one; available from FOCA; for viewing go to <a href="http://www.lakeplan.com">www.lakeplan.com</a></li> <li>• Our Ontario Stewardship Ranger Crew (Crew Leader + 4 high school students) is available to work on <u>YOUR</u> environmentally related projects. Contact Eric for details.</li> </ul>
<p><b>Lila Tabobandung &amp; Wasausking Women’s Env. Group</b></p>	<ul style="list-style-type: none"> <li>• Anishinabek tradition that women are the ‘keepers’ of water; inherent in rebirth and giving of life</li> <li>• Hold dearly the spiritual and intrinsic values of water</li> <li>• Prayer song to open the workshop</li> </ul>
<p><b>Ngan Diep (MOE)</b></p>	<p><b>Topic: Georgian Bay Water Quality Monitoring by MOE</b></p> <ul style="list-style-type: none"> <li>• 3-yr (2003-06) water quality survey conducted from Killarney to Severn Sound (135 stations)</li> <li>• Georgian Bay – high quality, oligotrophic waters</li> <li>• Chemistry is combination of mixing by open water and riverine inputs with a gradient between the two</li> </ul>

	<ul style="list-style-type: none"> <li>○ Total phosphorus – generally low (oligotrophic condition); some localized problem areas</li> <li>○ Chlorophyll <u>a</u> (algal biomass / primary productivity) - low</li> <li>○ Generally low dissolved and particulate matter in water – Dissolved Organic Carbon (DOC): 1.4 - 9.4 mg/L; Total Suspended Solids (TSS): 0.2 – 9.6 mg/L</li> <li>○ Conductivity (dissolved ions in water) – lower at inland locations (Shield water has few ions; soft water)</li> <li>○ Chloride – low in northern portions; increase as you move south</li> <li>○ Seasonal patterns are evident</li> </ul>
<p><b>Keith Somers</b> (MOE – Supervisor of Dorset Environmental Centre)</p>	<p><b>Topic: Water Quality Monitoring at Dorset Environmental Centre &amp; MOE’s Lake Partner Program</b></p> <ul style="list-style-type: none"> <li>• Provided brief history of Dorset Environmental Centre; many partners in environmental monitoring program</li> <li>• Phosphorus the limiting nutrient in controlling algal growth</li> <li>• Phosphorus sources: atmosphere, watershed, lake sediments and anthropogenic (man-made) sources (fertilizer / septic systems)</li> <li>• 8 lakes in Dorset area have long-term data set (1981 – 2003 presented) and can be viewed as a sensitive, ‘early warning’ system <ul style="list-style-type: none"> <li>○ All lakes show a consistent decrease in phosphorus</li> <li>○ Highly significant reduction in sulphate (linked to reduced SO<sub>2</sub> emissions from Sudbury)</li> <li>○ Calcium decreasing in 7 of 8 lakes</li> <li>○ Drought and climate change also affect water quality</li> </ul> </li> <li>• Lake Partner Program: <ul style="list-style-type: none"> <li>○ Partnership with FOCA and 800 volunteer lake stewards</li> <li>○ Samples collected from 500 lakes annually</li> <li>○ Monitor total phosphorus and lake clarity (secchi readings – as an index measure of nutrients and productivity)</li> </ul> </li> </ul>
<p><b>Karl Schiefer</b> (E. Geo. Bay Stewardship Council)</p>	<p><b>Topic: Community Based Water Quality Monitoring</b></p> <ul style="list-style-type: none"> <li>• Water quality the #1 issue for cottagers</li> <li>• Health Unit does bacterial monitoring on public beaches only</li> <li>• Sturgeon Bay is a case history of processes on-going elsewhere on Georgian Bay and inland lakes <ul style="list-style-type: none"> <li>○ Water levels and water retention times exacerbating water quality problems</li> <li>○ Anaerobic (no oxygen) decomposition results in re-suspension of phosphorus from sediments into the water column; once the thermocline hits the bottom in late summer – phosphorus available for blue green algal production.</li> <li>○ Habitat for cold-water fish species is compressed (or eliminated) by anoxic waters from below and warm temperature waters from above</li> </ul> </li> </ul>

- Water clarity is reflective of primary production (algae production resulting from available nutrients including phosphorus); easy to monitor with a secchi disc
- Legal septic beds are not retaining phosphorus (and other nutrients) on the Canadian Shield; need modifications to the building code

**Community Based Water Quality Monitoring:**

- Currently being conducted at 12-Mile Bay; Healey & Kapikog Lakes; Blackstone & Crane Lakes; North & South Bay in Twp. of Georgian Bay
- Accomplishments:
  - Enhanced water quality data set
  - Enthusiastic & concerned community; active and engaged in water quality issues
  - Enhanced public awareness of water quality issues
  - Community (Lake) Plan inputs to protect water quality
  - Voluntary upgrades through peer pressure
  - Composting toilets & pit privies (much more environmentally friendly than septic systems)
  - Phosphate free product use
  - Dock talk program
  - Code of Practices – (e.g. Boating community)
- Community based program costs approx. \$6 / household; isn't the #1 issue for cottagers worth that cost?
- **Municipal Approaches:**
  - **Regulations**
    - Increased septic system setbacks
    - Pesticide and fertilizer ban
    - Prohibit new lot creation
  - **Stewardship**
    - Lake planning – community-based planning
    - Information exchange (Twp communications, community folders)
  - **Coordination**
    - -Sturgeon Bay Water Quality Action Group – inter-government working group created by Twp to ensure on-going focus and coordination of activities

Municipal Planning Approaches – other possibilities

- Regulations
  - Reduce development intensity
  - Increase building setbacks
  - Shoreline development controls
- Site Plan Control
  - Shoreline vegetation retention
  - Improved septic system technologies (remove nutrients)

<p><b>Liza Vandermeer</b> (MOE)</p>	<p><b>Topic: Water Quality – The Role of MOE District Office Staff</b></p> <ul style="list-style-type: none"> <li>• Env. Protection Act &amp; Ont. Water Resources Act administered by MOE are primary legislation for water quality protection</li> </ul> <p>Liza presented a very detailed and comprehensive outline relating to a multitude of topics including (among others):</p> <ul style="list-style-type: none"> <li>• Legislation</li> <li>• Compliance and enforcement of legislation</li> <li>• Key elements of the Ontario Water Resources Act</li> <li>• Sewage Program Overview</li> <li>• Certificates of Approval – Key guidelines and procedures</li> <li>• Septic Systems</li> <li>• Permit to take water program</li> <li>• Emergency Response (spills) Protocols</li> <li>• Role in blue-green algae blooms</li> <li>• Great Lakes priorities</li> </ul> <p>Due to the detailed information presented relating to the above topics and more – we suggest you view the actual presentation available on our website.</p>
<p><b>Judi Brouse</b> – District of Muskoka, Director of Water Programs</p>	<p><b>Topic: Water Quality Stewardship by Individuals (Cottagers)</b></p> <ul style="list-style-type: none"> <li>• If you have water quality problems ... stand on your dock and look behind you. Problems originate from the upstream watershed.</li> <li>• Reviewed major stresses ... things you can do</li> <li>• Reviewed sources of phosphorus (hypothetical)</li> </ul> <p>Proposed Stewardship Program</p> <ul style="list-style-type: none"> <li>• At the lot level ... what you can do (slide 7)</li> <li>• At the bay or lake level ... set a vision (slide 8) <ul style="list-style-type: none"> <li>○ Stewardship Monitoring Programs: <ul style="list-style-type: none"> <li>▪ What are you monitoring and why?</li> <li>▪ Engage in municipal planning &amp; programs (slide11)</li> </ul> </li> </ul> </li> <li>• At the macro level (slide 12)</li> <li>• Other suggestions: land trusts, re-naturalization</li> </ul> <p>Key Resources:</p> <ul style="list-style-type: none"> <li>▶ FOCA – A shoreline Owner’s Guide to Healthy Waterfronts</li> <li>▶ FOCA – Lake planning Handbook for Community Groups</li> <li>▶ Kipp and Callaway – On the Living Edge</li> <li>▶ <a href="http://www.muskokawaterweb.ca">www.muskokawaterweb.ca</a></li> </ul>

<p><b>Gord Miller,</b> Environmental Commissioner of Ontario</p>	<p>The Environmental Commissioner of Ontario is the province's independent environmental watchdog. Appointed by the Legislative Assembly, the ECO is tasked with monitoring and reporting on the government's compliance with the Environmental Bill of Rights to ensure that Ontario's natural environment is protected and conserved for future generations.</p> <p>Your rights under the Environmental Bill of Rights:</p> <ol style="list-style-type: none"> <li>1. <b>Right to Notice:</b> Environmental Acts, Regulations and policies to be posted on the Environmental Registry</li> <li>2. <b>Right to Review and Comment:</b> Instructions on the Environmental Registry</li> <li>3. <b>Right to appeal</b> Ministry decisions ministry decisions such as the licences, permits, approvals and other instruments issued to industrial and commercial facilities</li> <li>4. <b>Right to apply for review:</b> formal process for proposing that existing environmental Acts, regulations, instruments or policies be reviewed, changed or improved. You can also ask the government to consider establishing new ones.</li> <li>5. <b>Right to apply for an Investigation:</b> If you think that environmental Acts or regulations are being broken, you can ask the government to investigate the alleged violation. In some cases, you can go to court if you're still not satisfied with a ministry's response to your request.</li> <li>6. <b>Right to Sue:</b> The EBR gives you the right to sue someone (for example, a polluter) for causing environmental harm to a public resource. In addition, if you experience economic or personal loss because of a public nuisance that's causing environmental harm, you can now sue for personal damages.</li> <li>7. <b>Whistleblower Protection:</b> The EBR gives you added protection if you "blow the whistle" on the unsafe environmental practices of your employer. You now have legal protection from harassment if you report spills, unlawful emissions or other hazardous activities at your workplace.</li> </ol> <p><i>Note: Gord's presentation given as a 'fireside chat'; not PowerPoint . For additional information on the Office of the Environmental Commissioner of Ontario, go to <a href="http://www.eco.on.ca">www.eco.on.ca</a>.</i></p>
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"Tell me and I forget. Show me and I remember.  
Involve me and I understand."  
(Motto of the EGBSC)