



### **SERO 2019 Annual General Meeting**

in Association with the Nottawasaga Valley Conservation Authority

### RESTORATION PROGRESS IN ONTARIO:

Moving towards the UN Decade of Restoration







### in association with:



Registration: <a href="http://sero.eventbrite.com">http://sero.eventbrite.com</a>

On the cover: Minesing wetland creation project. Top: abandoned hay field circa 2016. Bottom: excavated wetland area after one growing season. (*source: NVCA*)





### A MESSAGE FROM SERO

SER Ontario (SERO) is part of an international organization committed to the ecologically sensitive repair and management of ecosystems. While the focus of our efforts is the Ontario region, we strive to share ideas and initiatives across borders and around the globe. Our mission is to promote the practice of ecological restoration and provide educational opportunities and materials for members and for the community at large.

This event is focused on the progress of restoration practitioners in Southern Ontario. As we move towards the United Nations' Decade on Ecosystem Restoration (2021-2030), restoration practitioners, policy makers, non-governmental organizations and the public are encouraged to address the challenges posed by climate change, development, biodiversity loss and politics and also to reflect on decades of progress in the field of restoration.

SERO and the Nottawasaga Valley Conservation Authority (NVCA) are excited to provide this opportunity for organizations and individuals to come together to learn and exchange experience. The day features field trips, presentations, student participation and networking at the Tiffin Centre for Conservation in Utopia, Ontario. This will provide an excellent opportunity for students, scientists and practitioners to interact with authorities on various types of restoration. Proceeds of the event will go to support the SERO Scholarship Fund and other activities benefiting members.

Kind regards,

Society for Ecological Restoration Ontario



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# Certified Ecological Practitioner Program Continuing Education Credits

The Society for Ecological Restoration's Certified Ecological Restoration Practitioner Program, launched in 2017, certifies practitioners and practitioners-in-training who meet the certification requirements based on knowledge base, experience, references, ethics, and understanding of the foundations of the profession and encourages a high professional standard for those who are designing, implementing, overseeing, and monitoring restoration projects throughout the world.

Both certification types are valid for five years after approval. In order to be recertified, CERPs and CERPITs must earn a minimum of 50 continuing education credits within the five-year period since they were last certified. Appropriate continuing education opportunities are those that keep practitioners abreast of rapidly evolving knowledge, approaches, strategies, techniques and requirements in the field of ecological restoration. Credits may be provided for approved short courses, webinars, symposia, workshops, technical publications, and other events that contribute to the field of ecological restoration

SERO is pleased to announce that conference attendees are eligible for the following CERP and CERPIT continuing education credits:

- Friday Conference 4.5 credits
- Seed Workshop 2 credits
- Kidd's Creek FieldTrip 1 credit
- Willow Creek Field Trip 2 credits

For details, see <a href="https://www.ser.org/page/Certification">https://www.ser.org/page/Certification</a>.









## CONFERENCE AGENDA: Friday November 1st

Time	Title	Agency
9:00 - 9:30	Registration	
9:30 - 9:45	Opening Remarks & NVCA Watershed Restoration	SERO & NVCA
9:45 – 10:15	Minesing Wetlands – Shannon Stephens	NVCA
10:15 – 10:35	Shared perspectives and approaches to effectively restore habitat for an endangered songbird and ecosystem in Southern Ontario – Peter Burke and Laura Williamson	Savanta A GEI Company
10:35 - 10:50	Break	
10:50 – 11:15	Turning Lemons into Lemonade – a New Ecological Trajectory for an Otherwise Barren Landscape – Andrew Promaine	Parks Canada - Georgian Bay Islands National Park
11:15 – 11:35	SAR Habitat Offsetting: Lessons Learned – Dave Hawke	Couchiching Conservancy
11:35 – 12:00	2019 SERO Field Trips & Scholarship Summary	SERO
12:00 – 12:45	Lunch (provided)	
12:45 – 1:45	Restoration Networking Roundtables  This session will allow participants to share and collaborate through open discussion. Table topics will be submitted at the registration desk and attendees will move to their table of interest for an open discussion.	
1:45 – 2:05	Boyne Valley Restoration: Alternative Delivery Model for Developer Restoration – Nigel Finney	Conservation Halton
2:05 – 2:15	Break	
2:15 – 2:45	The Meadoway – Paul Morris	TRCA
2:45 – 3:05	Corporate Landowners Take the Lead by Investing in Nature Through CVC's Greening Corporate Grounds Program — Deborah Kenley	Credit Valley Conservation
3:05 – 3:15	Workshop & Field Trip Preview Seed Processing, Restoration of Willow Creek, Daylighting Kidd's Creek	SERO
3:15 – 3:30	Open Forum	
3:30 – 3:45	Closing Remarks	SERO

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## Field Trips & Workshops: Saturday November 2nd

## 9:00 – 11:00 Hands on Seed Processing Workshop for Ecological Restoration Projects, Research and Volunteers

- Mary Gartshore
- Location: Tiffin Centre for Conservation

### 9:30 – 11:00 Kidd's Creek Revitalization

- Brook Piotrowski, Urban Restoration Construction Specialist, LSRCA
- Location: Lilian Cres., Barrie. See details on next page.

### 1:00 – 3:00 Putting the Wiggle Back in Willow Creek

- Shannon Stephens, Healthy Waters Program Coordinator, NVCA
- Location: Willow Creek Canoe Launch

Most field trips involve walking and will proceed rain or shine so please wear appropriate clothing and footwear. Food and beverages will <u>not</u> be provided; bring your own or plan to find a restaurant after or in between workshops / field trips. Participants are responsible for their own transportation and are encouraged to carpool.

Nottawasaga Valley Conservation Authority

On behalf of the organizing committee:

Nigel Finney, nfinney@hrca.on.ca

JeffWarren, jeff.warren@wsp.com

Ash Baron, abaron@beaconenviro.com

Ryan Stephenson, ryan.stephenson@trca.ca





### FIELD TRIPS & WORKSHOPS

### **Kidd's Creek Revitalization**

The Lake Simcoe Region Conservation Authority (LRSCA) has been working with the City of Barrie on a special project to revitalize Kidd's Creek. Many sections of the engineered streambank protection that was constructed in the 1980's has failed, resulting in unstable banks with erosion and sediment filling up potential fish habitat areas downstream. The LSRCA formed a partnership with the City to encourage a holistic restoration. This involved completing a full hydro-geomorphic assessment and channel survey to study the entire reach of this creek in order to better make decisions on how to maintain the ecological integrity of the creek and to avoid ineffective spot repairs. This study spanned from 2015 - 2017 and included hydrology, topography, natural heritage, Species at Risk, and fluvial geomorphology; and resulted in the development of a preferred design for the entire Upper Kidd's Creek catchment.

#### **Details**

Trip Leader: Brook Piotrowski, Urban Restoration Construction Specialist, LSRCA

Location: Park near 192 Lilian Cres., Barrie for meeting point (nearest intersection:

Cundles Rd. W. & Sunnidale Rd.)

**Time:** Sat. Nov. 2<sup>nd</sup>, 9:30 am **Duration:** approx. 1.5 hours

Notes: Participants will be walking over 1 km and are advised to wear appropriate

footwear.





### FIELD TRIPS & WORKSHOPS

### Putting the Wiggle Back in Willow Creek

This degraded reach of Willow Creek was historically dredged, over-widened and straightened. Sediment transport was impaired. The flat, increasingly shallow bed of the creek lacked aquatic insects or fish habitat. From a fish's perspective, it was something like Hwy 400: ok to travel through, but not a place you'd want to call home. From 2010-2017, NVCA staff and volunteers installed 'wing-deflectors' – triangle-wedges of Christmas trees, cabled into the bank to narrow and restore the natural meander or 'wiggle' of the creek. Volunteers have planted thousands of native trees and shrubs along the riparian corridor. Monitoring has shown improvement in both benthic invertebrates, and a doubling of the number of fish species, and near tripling of abundance.

### **Details**

**Trip Leader:** Shannon Stephens, Healthy Waters Program Coordinator, NVCA **Location:** Meet at the Willow Creek Canoe Launch, 2233 George Johnson Rd.

(sign for Minesing Wetlands) **Time:** Sat. Nov. 2<sup>nd</sup>, 1:00 pm

**Duration:** 2 hours

**Notes:** Participants will be meeting at the Willow Creek Canoe Launch and then travelling to a different location to view

restoration area(s).



Nature Conservancy Volunteers in Willow Creek(source: photographybymigeul.com)





### FIELD TRIPS & WORKSHOPS

## Hands on Seed Processing Workshop for Ecological Restoration Projects, Research and Volunteers

This workshop will introduce and demonstrate simple techniques using home and garden tools for processing native seed for projects. The hands-on portion will allow participants to try these techniques for themselves. This will be an indoor workshop held at the Tiffin Centre for Conservation.

#### **Details**

Trip Leader: Mary Gartshore

**Location:** Tiffin Centre for Conservation

**Time:** Sat. Nov. 2<sup>nd</sup>, 9:00

**Duration:** 2 hours



Workshop facilitator biography: Mary was born and raised on a large farm in the Dundas Valley. Growing up, the family had show quality Angus cattle, Dorset sheep, Nubian goats and fancy poultry. Most of the farm was the forested glacial drift hills of the Dundas Valley. She attended University of Guelph graduating in Honours Zoology in 1973. For the next 30 years Mary worked and travelled carrying out biological inventories, teaching and conducting research in Nigeria, Cameroon, Ivory Coast, Australia and Canada, etc. In 1990 Mary purchased a 200 acre farm with her life partner Peter Carson to produce native plant materials. At the same time they started seed-based restoration using propagated and wild supplies of seed. Today Mary will share what she has learned first hand, including the materials, methods and short-cuts for collecting, cleaning and storing native seed.





### Savanta Inc. a GEI Company

#### **Peter Burke**

### Senior Ecologist, Ornithologist

Peter Burke is a Senior Ecologist at Savanta Inc., an environmental consulting firm based in Southern Ontario. Peter has experience working throughout Ontario and across North and South America. He has been involved with the recovery of Kirtland's Warbler. He has also contributed illustrations to natural history publications, including the Birds of Brazil, by Bret M. Whitney.

#### Laura Williamson

### **Intermediate Ecologist**

Laura Williamson is an Intermediate Ecologist specializing in terrestrial ecology and ecosystem restoration. She is a member of the Society for Ecological Restoration and is working towards earning her Certified Ecological Restoration Practitioner (CERP) designation. She is passionate about habitat protection and creation for Species at Risk and hopes to continue to be a part of projects that create the environments currently missing from Ontario's landscape.

## Shared Perspectives and Approaches to Effectively Restore Habitat for an Endangered Songbird and Ecosystem in Southern Ontario



Kirtland's Warbler (source: Ontario.ca)

Kirtland's Warbler is a globally threatened songbird, listed as Endangered under federal and provincial legislation. A plan to restore 50 ha of breeding habitat at the Simcoe County Museum was initiated in 2016. The site is a former Canada Pacific Rail loading spur that had been replanted with native and non-native tree species and was subject to annual soil disturbances. We will examine how the partners (ranging from federal (Canada and US), provincial, municipal government and private companies) involved have worked together in planning and design of restoring pine-oak savanna. We will also discuss the implementation of that plan, barriers to success, lessons learned and how challenges have been tackled.







### Shannon Stephens Healthy Waters Program Coordinator Nottawasaga Valley Conservation Authority

Shannon Stephens has been with the NVCA since 2006, coordinating water quality enhancement projects, habitat restoration, river rehabilitation and fish community monitoring projects, drinking source water protection projects. She delivers NVCA stewardship programs that provide technical and financial assistance to farmers, rural residents, business, industry and community to implement water quality improvement and habitat restoration projects.

### **Minesing Wetlands**

The Minesing is an incredible ecological jewel found in the heart of Southern Ontario. Designated as a wetland of international significance it spans over 6,000 hectares. It's home to a diverse array of habitats and flora and fauna, some rare or endangered. Also it provides significant flood attenuation to downstream community of Wasaga Beach. But it is beset by challenges from invasive species, sedimentation, eutrophication, historical channelization, forest cover loss, and changing water regimes are stressing this system. This is the story of how Nottawasaga Valley Conservation Authority and Nature Conservancy Canada work in partnership to acquire, protect, and restore this incredible wetland.



Minesing Swamp (source: NVCA.on.ca)







### David Hawke Stewardship Program Manager Couchiching Conservancy

David Hawke is the Stewardship Program Manager at the Couchiching Conservancy, a non-profit, non-governmental land trust that has helped protect over 13,000 acres of natural lands since 1993. With a varied career in natural resources management, David has worked for or supported various government agencies including the Canadian Wildlife Service (at the Wye Marsh Wildlife Centre), Ontario Ministry of Natural Resources (at the Tiny

Marsh Provincial Wildlife Area), Severn Sound Environmental Association; and at various private resorts as a tourism manager. Of his current position, Davis states. "Everything I've done in the past, every contract, every experience, comes into play with this position. Farm management, interacting with people, biology, report researching and writing, working outdoors, or giving a persuasive presentation to an organization, they all help me do the task at hand." Hawke is also award winning writer and is known for his nature photography.

### Species at Risk Habitat Offsetting: Lessons Learned

One of the programs undertaken by the Couchiching Conservancy is habitat offsetting, an interesting trade-off by developers to gain permits for construction by agreeing to enhance habitat elsewhere for displaced Species at Risk. This program has definite pros and cons, and has been a point of discussion for some of their supporters. David will review his 'boots on the ground' projects and reveal the ups and downs of rehabilitation efforts.







Paul Morris Project Manager, Restoration Projects Toronto and Region Conservation Authority

Paul Morris is a man who wears many hats. Now at the TRCA as a project Manager for Restoration Projects (Special Projects), he is perhaps most well-known in the Southern Ontario restoration community for his time as Principal, Biologist and Restoration Ecologist at Acorus Restoration Plant Nursery. Paul is also currently the Co-director of the Earth Connection Centre for Eco-Education and Leadership and the Sasil Ka'an Ecovillage located in the Mérida Area of Mexico.

### The Meadoway

The Meadoway is emerging as one of the most innovative meadow revitalization projects in Canada. Over the past 5 years, the TRCA in partnership with the City of Toronto and The W. Garfield Weston Foundation, have worked together to establish native meadows on lands within an Electrical Utility Corridor in Toronto, Ontario. This 16 km stretch of publicly accessible greenspace, which previously consisted of mown turf grass, is now a thriving meadow with native wildflowers, grasses, berry producing shrubs, and songbird boxes. Cyclists and pedestrians will soon be able to travel from the heart of downtown Toronto to the Rouge valley without ever leaving nature. This project was intended to be applied as a model that could be replicated across the Greater Toronto Area (GTA). There is a growing interest in restoring meadows within urban areas, expressed not only by TRCA and the City of Toronto, but by other municipalities, agencies and local communities. The three main project objectives are: to improve the natural cover of the area for wildlife and increase biodiversity; to improve the aesthetic appeal of the site for trail and park users with the establishment of native wildflowers and grasses; and to decrease the maintenance costs of continuously mowing 200 ha of Electrical Utility Corridor. Electrical Multi-use trails are becoming more common within utility corridors as important transportation connections for people travelling from one place to another. Typically, utility corridors are mown in order to maintain access to power lines and vegetation is cleared to prevent trees and shrubs from obstructing these areas. Meadows are an excellent alternative to mown grass, remaining compatible with utility corridor management requirements and other land uses. By re- imagining electrical utility corridors as linear habitat, cities across the world could look to incorporating similar restoration projects."







### Deborah Kenley Sr. Coordinator, Greening Corporate Grounds Credit Valley Conservation Authority

Deborah Kinley is the Senior Coordinator of the Credit Valley Conservation Authority's Greening Corporate Grounds program. "Since 2009, Greening Corporate Grounds (GCG) has been helping businesses, institutions and places of worship create long-term social and environmental value through their landscaping practices." (CVC, 2019)

### **Greening Corporate Grounds: Two Project Profiles**

With 50-70% of the land in urban areas privately owned, municipalities are looking to corporate landowners to manage storm water, reduce heat island effects and increase canopy coverage on their lands. Greening Corporate Grounds provides the technical guidance they need to understand and plan for sustainable landscaping projects on their property, helping them take the lead in corporate social responsibility. CRH Canada Inc.'s Lake Ontario Flyway Habitat Project and Mitutoyo Canada Inc.'s large-scale habitat restoration projects will be profiled.









Nigel Finney
Project Manager, Restoration & Conservation
Conservation Halton
SERO Chair

Nigel Finney has worked for Conservation Halton for over ten years, and currently holds the position of Program Manager for Restoration and Conservation Projects. In this position, Nigel is responsible for the coordination and implementation of conservation and restoration projects on public properties. He works on developing plans, designs and

oversees the implementation or projects to improve watershed health, mitigate flood and erosion, improve natural heritage systems and enhance biodiversity. He has a Bachelor of Environmental Studies from the University of Waterloo and a Diploma in Ecological Restoration and Rehabilitation. Previously, Nigel has worked for the Canadian Wildlife Service, Nature Conservancy of Canada, Parks Canada, and Environment Canada. Nigel has been on the Board of the Ontario Society of Ecological Restoration since 2012.

### Sixteen Mile Creek Valley Restoration in Halton Region

Conservation Halton has entered into an agreement with the Milton Phase 3 Landowners Group to project manage a \$4 million restoration project on their behalf. The projects will be located along the Sixteen Mile Creek valley including wetlands, meadows, forests and significant wildlife habitat. The implementation is being initiated in autumn 2019 and will be carried out the for the next several years. The presentation will focus on the partnership, expected outcomes and high level restoration objectives.







### Andrew Promaine Manager, Resource Conservation Georgian Bay Islands National Park

Andrew has worked for both provincial and federal parks for close to 30 years. For 15 years he bounced around in a variety of capacities within protected areas at the same time completing degrees at Trent and Lakehead University (Forestry). However, since 2004, he has been working at Georgian Bay Islands National Park starting as a regional ecologist before filling the role of Resource Conservation Manager in 2008. As a small yet complex park, there isn't much he isn't involved in....from invasive species to species-at-

risk; cultural integration to integrated planning. When he is not making people envious of his career on Georgian Bay, he is in Costa Rica looking for birds.

## Turning Lemons into Lemonade – a New Ecological Trajectory for an Otherwise Barren Landscape

Beausoleil Island is the largest island within Georgian Bay Islands National Park and is home to all of its visitor services. Located on the east side of Beausoleil, a large gravel infill area that extends out into Georgian Bay, also known as the "Cruiser Dock", is being transformed. For decades, the area slowly decayed to the point where it was inhospitable both to the visitor, and to the ecosystem. However, through a series of events, the area has been reborn and supports a much richer biodiversity including wide array of habitats for Species at Risk and pollinators. This presentation will describe the various approaches that have reclaimed this derelict landscape into a tool to demonstrate greater land stewardship.





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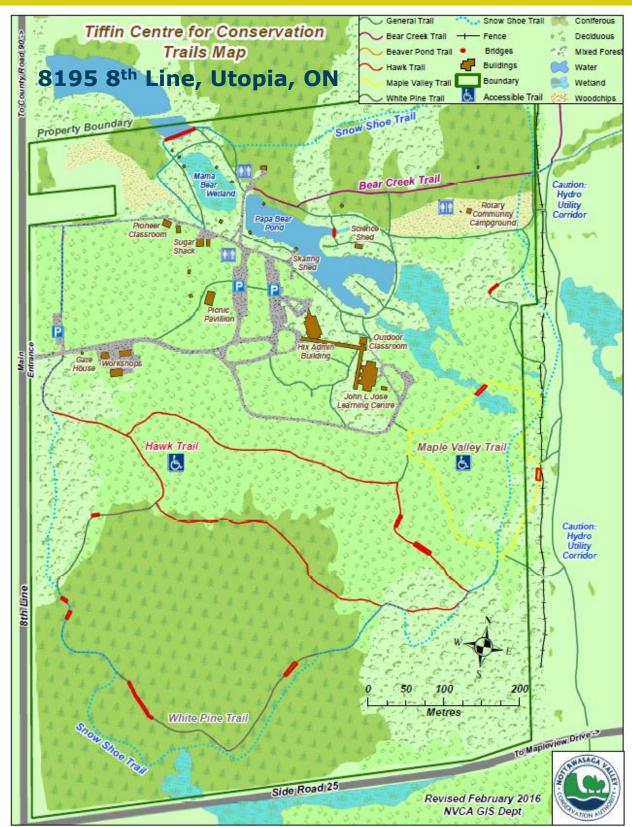


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### **NOTES**





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