



CANADIAN CARTOGRAPHIC ASSOCIATION



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Canadian Cartographic Association
l'Association canadienne de cartographie

Cover illustration: Selections from postcard maps submitted for CCA2024 AGM & Conference.
Cover imagery compiled by Marikka Williams.

Cartouche content compiled and edited by Stephanie Pyne & Marikka Williams.

Layout by Marikka Williams. Conference Photographs: Courtesy of Yegane Vahidi, Lori Martin & Marikka Williams

Cartouche is the Association's annual publication, featuring updates by the executive committee, news about conferences and events, member submitted articles and much more. CCA members receive Cartouche as part of the membership. Current versions are sent directly to members, and past editions are added to the website: <https://cca-acc.org/cartouche>

PRESIDENT'S MESSAGE

Glenn Brauen

Associate Professor, Teaching Stream
in the Department of Human Geography
at the University of Toronto Scarborough



I hope you have had an enjoyable autumn and early winter. I am writing this a few days after the winter solstice and am looking forward to seeing the days start to lengthen again over the coming weeks.

CCA has had a good year and plans for 2025 are shaping up. Watch for more news about our 2025 conference soon, including a call for abstracts and session proposals. CCA volunteers have begun meeting with Canadian Association of Geographers (CAG) organizers to plan a joint conference to be held at Carleton University in Ottawa. Please hold the dates May 21-22 for the conference. We might have workshops on May 23, depending on proposals received. The CAG conference will run May 20-23. Other than the Annual General Meeting session itself, to be scheduled during one of the lunch periods, there will be no online attendance option for the conference.

2025 is the 50th anniversary of the CCA and we are working this into plans for the conference and a 2025 commemorative issue of *Cartouche*. For the 30th anniversary, CCA collected reflections, memories and tributes from the first 30 years of the association (see *Cartouche* No. 60, Winter 2005, available at cca-acc.org/cartouche). It would be excellent in 2025 to create a companion issue, covering at least the 20 years since, and I would be delighted to hear ideas from any members concerning any part of our first 50 years. Please get in touch if you have suggestions.

CCA held our 2024 Annual Conference & General Meeting, May 23-24, at University of Toronto Scarborough with a pre-conference field trip and ice breaker on May 22. Please see the conference summary on pages 8-13 in this issue.

The International Cartographic Association will hold the International Cartographic Conference in Vancouver, August 16-22. This is the first time the ICC will be in Canada since 1999. We have decided not to co-locate our annual conference and AGM with the ICC over concerns about cost to members. The ICC organizers

have been unwilling to offer 1- or 2-day registrations and the executive decided that, combined with peak season accommodation costs, a full ICC registration plus organizing costs for our own conference would be cost prohibitive for our members.

Executive Committee and Recruiting

The CCA Executive Committee is a collaborative group, relying almost exclusively on consensus decisions for most business. We seldom vote to reach decisions. The group meets once a month through much of the year, and occasionally more frequently when required. The current executive is listed on the last page of this issue.

The following changes have occurred within the CCA executive:

- We have a new Treasurer. Andy Black joined the Executive Committee as incoming treasurer in January 2024 assuming the role at the AGM. Many thanks to Andy for volunteering for this important role and to Byron Moldofsky, outgoing treasurer, for his 8 years of service and for helping to ensure that Andy had all the information he needed to take over!
- Byron Moldofsky, while resigning as treasurer, will continue as Chair of the History of Cartography Interest Group.
- Paul Heersink became our Vice-President at the May AGM. The plan is for Paul to complete a 1-year term as VP and then become President for a 2-year term. Paul comes back into the executive with a good knowledge of the CCA from his tenure as treasurer (2010-2016). Welcome back, Paul!
- Due to changing commitments, Alex McPhee decided to not become the President of the CCA after his term as VP. Thank you for your service, Alex!
- Both Ted MacKinnon and I agreed to remain in our current executive roles until the 2025 AGM. Thank you, Ted, for your continued participation in the executive and as our webmaster!

- For Issue 100, Marikka Williams became Co-Editor of Cartouche, along with Stephanie Pyne (Co-Editor) and Gordon Campbell (layout design). For this issue of Cartouche, Marikka designed the cover, edited presentation summaries, and formatted the layout. Stephanie compiled content, edited executive content and presentation summaries as well. Thank you Marikka and Stephanie for continuing to assemble excellent issues of the newsletter! A special thank you to Gordon Campbell who formatted the layout for Cartouche from 2018 to 2024 (Issues 95-100)!
- Roger Wheate resigned as Membership Coordinator, effective at the AGM. Thank you, Roger for all of your support and contributions to Executive Committee discussions, decisions and conference planning. We will miss your participation within the executive but hope to continue seeing you at CCA events!
- Yegane Vahidi and Jessica Murdoch, both former Student Representatives, are now Communication Co-Leads for us, keeping our social media active (mainly Instagram and LinkedIn) and assisting with graphics design and outreach for conferences and map competitions.
- Jamison Cooper-Leavitt has volunteered to be our Membership Coordinator going into 2025. Welcome Jamison!
- Juliette Bricker, currently enrolled in the Cartography M.Sc. International Master of Science Programme, has volunteered as a Student Representative. Welcome, Juliette!

We are looking for a volunteer to organize Canada's contribution to the Barbara Petchenik International Children's Map Competition for the 2025 ICC (Vancouver, August 16-22) and a volunteer to become our new Vice-President at the 2025 AGM. If you are interested or want more information, please contact me.

Organizing CCA2024

CCA held our 2024 conference at University of Toronto Scarborough in May. Organizers started to plan the conference in October/November of 2023. The Conference organizing committee and programming committee met alternate weeks January through March and merged into a single weekly meeting in April. Thanks to everyone on the conference committees and to Ted MacKinnon for his work keeping the website running smoothly. The conference could not have happened without all of your efforts.

Program committee:

- Thomas Herbreteau (Chair)
- Glenn Brauen
- Stephanie Pyne
- Julia Siemer
- Roger Wheate

Organizing committee:

- Glenn Brauen (Chair)
- Byron Moldofsky
- Yegane Vahidi
- Marikka Williams

Student volunteers:

- Kiran Duwadi, Fleming College
- Emmanuel Ignatius, Fleming College
- Jainiben Jayeshkumar Pokar, Fleming College
- Sharmila Wagle, Fleming College
- Yegane Vahidi, University of Toronto Scarborough
- Sasha Van, University of Toronto Scarborough
- David Huang, University of Toronto Scarborough

Completion of Transition to Membee

Ted MacKinnon led this effort to integrate Membee into <https://cca-acc.org>, with support from Byron Moldofsky.

- Membership renewal for 2024 was done using Membee. You should now have received at least one membership renewal for 2025. If you have not received a renewal reminder, please get in touch and we will investigate if messages went astray.
- Although Membee automates emails for membership renewal, it does not provide an email distribution service similar to the phpList service we have been using. We will continue to use this.

Roger Wheate Award of Distinction for Exceptional Contributions to Canadian Cartographic Association

At the 2024 conference, the Awards Committee of the CCA Executive decided to rename one of our Awards of Distinction in honour of Roger Wheate's long and valued service to the association. Please see the rationale for this change in a separate item in this issue.

Best wishes for the new year! I look forward to seeing you at CCA / CAG 2025, Carleton University, Ottawa, May 2025. Please see the separate announcement in this issue and mark your calendar.

Glenn Brauen
President

Canadian Cartographic Association
glenn.brauen@utoronto.ca

UPCOMING CCA ANNUAL CONFERENCE AND GENERAL MEETING



CCA2025 – Carleton University – May 21-22, 2025

CCA will hold its 2025 Conference and Annual General Meeting May 21-22 in Ottawa. Hosted by Carleton University's Department of Geography and Environmental Studies, our 50th annual conference will be held concurrently with the 75th Annual Meeting of the Canadian Association of Geographers, May 20-23, 2025. Please hold the date and stay tuned for updates coming soon: <https://www.cag-acg.ca/cag-2025-home>

Our objective is to create a single-track conference of CCA sessions with the intention that some of these will be held jointly with CAG interest groups. To make this work, we will need proposals for abstracts and, especially, special session proposals that can be integrated into the joint conference schedule.

Please consider submitting an abstract, a special session proposal, a workshop suggestion, or other ideas about what you would like to see or contribute for the conference!



The local organizing committee at Carleton University is Chaired by Scott Mitchell and CCA representatives have been collaborating to develop conference plans. Many thanks to the Carleton organizers for their willingness to develop a joint plan.

If you have ideas for the conference (a session, a workshop, a presentation, an event), please get in touch with any of the CCA representatives helping with organizing: Glenn Brauen, (glenn.brauen@utoronto.ca), Paul Heersink (pheersink@gmail.com), Stephanie Pyne (sapyne@gmail.com), or Thomas Herbreteau (thomas.herbreteau.gis@gmail.com).



Above: Carleton University, Ottawa, Ontario. More info about the Campus at <https://carleton.ca/>
Image source: https://en.wikipedia.org/wiki/Carleton_University

CCA TREASURER'S REPORT FOR 2024

Byron Moldofsky

This is a summary of the CCA annual financial report for 2023, presented at our AGM in May 2024. The full report was sent out to members – copies may be requested at cancartassoctreasurer@gmail.com.

In the tables below, I included columns for three previous years for comparison, although the comparisons are not always exact due to differences in cell definitions. I am excluding 2020 due to the impact of COVID.

Canadian Cartographic Association Statement of Revenue and Expenditures December 31, 2023

Association-Specific Revenue and Expenses¹

Association Revenue	2023	2022	2021	2019
Membership fees (balance of year)	\$11,031	\$6,402	\$6,741	\$7,177
Membership/conference fees (2023 transfer from ACMLA)	\$1,380	\$378	\$2,020	\$21,105
Interest received CCA-specific term deposits	\$2619	\$793	\$3,440	\$386
Total Association Revenue	\$15,030	\$7,573	\$12,201	\$28,668
Association Expenditures	2023	2022	2021	2019
Cartographica distribution (5 issues)	\$5,399	\$3,480	\$3,347	\$2,345
AGM Travel for Executive (2021-22 Online only)	\$2,165	\$0	\$0	\$3,729
Website expenses (hosting and domain) ²	\$605	\$0	\$36	\$72
Conference expenses (2023 incl. in transfer from ACMLA)	n/a	\$525	\$4,632	\$19,516
Bank service fees (not incl. deductions Paypal, Stripe) ³	\$327	\$132	\$157	\$375
Membership in ICA for 2 years (shared with CIG)	n/a	\$457	\$0	\$800
Administrative/Office Expenses	\$226	\$76	\$958	\$282
Student Awards – President's prize, Webmap, Presentation	\$750	\$1,500	\$1,000	\$1,000
Association Management – MEMBEE license	\$1,329	-	-	-
Consulting accountant – Business income tax	\$1,000	-	-	-
Total Association Expenditures	\$11,801	\$6,170	\$10,130	\$28,119
Excess of Association revenue over expenditures	+ \$3,229	+ \$1,403	+ \$2,071	+ \$549

Notes:

1 Association-specific revenues and expenditures are those revenues and expenditures dedicated to the running of the organization and are not designated to other funds such as Student Awards.

2 Website expenses shown include some catch-up fees from 2022.

3 Bank service fees in 2023: These do not include fees which Paypal and Stripe both charge of approximately 3% on each transaction deducted at source – not included as expenses here.

continued on page 7

Generally, the executive considers our goal is to break even on an annual basis, while investing in the activities and growth of the association. In 2023 we continued this trend, despite some unusual circumstances or new start-up costs. To list some of these:

- A CCA-specific 5-year GIC matured resulting in \$2,365 interest in additional revenue
- Cartographica distribution – 5 issues this year due to irregular publishing schedule
- Website hosting – some costs deferred from 2022 were paid in 2023
- Membee license – decision to acquire Membee Association Management system
- Consulting accountant – needed to file initial tax returns as non-profit business

In addition to these factors, in 2023 our annual conference was an in-person/hybrid meeting jointly with the Association of Canadian Map Libraries and Archives (ACMLA) in Calgary. CCA executive members were very active on the program and organizing committees, but ACMLA assumed most of the responsibility for registration and administration, through the Membee Association Management System (AMS). Since the CCA had been considering adopting an AMS to streamline membership applications and renewals, and conference registration, seeing Membee in action spurred us to decide to acquire Membee for ourselves. It has worked out quite well in the processing of membership renewals and conference registration in 2024.

The Joint conference was successful, but it changed the way our 2023 conference financials appear in the table. ACMLA collected all payments for conference registrations, which included membership in both associations for the 2023 balance, as well as access to CARTO2023.

After the conference there was a reckoning of all the funds coming in and going out, and there was an overall surplus of \$2,760. ACMLA transferred half of this to our bank account, which appears in Association Revenue as Membership/conference fees of \$1,380. Also, Membee sent out renewal reminders in December, which resulted in many more renewals than previous years, and thus the inflated number for Membership (balance of year). 2024 membership proceeds will probably be back to normal, or lower, to balance this one-time spike.

At the end of 2023, CCA was still in good financial shape, having overall investment assets of around \$42,000 dollars, invested at relatively high interest rates, and an operating balance of around \$16,000. The use of Membee for recording registrations and issuing receipts has simplified keeping track of financial information and the preparation of financial reports and tax returns.

At our AGM in May 2024 the new Treasurer, Andy Black, took over. Thanks go to Andy for taking on this role and managing a smooth transition. I also want to thank all the members of the executive who I have worked with so enjoyably over the last eight years, and especially Ted McKinnon and Glenn Brauen.



Above: the 'Lost Rivers' Tour was one of the highlights of this past year's CCA Conference.

CCA ANNUAL GENERAL MEETING

May 24th, 2024

Stephanie Pyne CCA Secretary

The CCA held its 2024 Annual General Meeting (AGM) on May 24, 2024, 12:40 PM EDT (9:40 AM PDT; 1:40 PM ADT) during CCA2024. The meeting was attended both in-person at CCA2024 (University of Toronto Scarborough) and online via Zoom. Box lunches were provided for in-person participants. Full minutes are available at <https://cca-acc.org/membership/agm>

Welcome and Reports from CCA President:

Glenn Brauen

Glenn thanked participants for joining the meeting and then reviewed CCA executive priorities and updates, including executive committee recruitment, membership management with Membee software, the CCA map competition, and the President's Prize. Glenn welcomed Yegane Vahidi as the CCA's student representative and thanked her for much appreciated help in conference organizing. He welcomed and thanked Andy Black for volunteering to be CCA's new treasurer, and thanked Byron Moldofsky for all of his years of service as CCA's treasurer. Glenn also thanked Paul Heersink for volunteering to be CCA's new vice president, and thanked Alex McFee for his service as vice president. Glenn thanked all of the volunteers involved in organizing and running conference 2024, and discussed some early ideas for the CCA 2025 conference venue with the membership.

Treasurer's Report and Summary of Finances:

Byron Moldofsky

Byron shared information from the treasurer's report, concluded that CCA is in a good position with respect to its financial position, and noted the potential to devote some funds to productive and CCA-growing initiatives, including promoting scholarships and youth initiatives.

Membership

Roger Wheate

Roger reviewed membership options and clarified details relating to student memberships.

Membership Management - Membee

Ted MacKinnon

Ted reported on the recent transition to the Membee membership management software and made a request for feedback from members.

Changes to CCA Executive Committee

Glenn Brauen

Glenn noted the following changes and needs for the CCA executive committee:

- Incoming Vice President - Paul Heersink
- Incoming Treasurer - Andy Black
- Co-editor for Cartouche (beginning with Cartouche 100): Marikka Williams
- One-year extensions in positions: Glenn Brauen (President) and Ted MacKinnon (Past President)
- Open position: Membership Coordinator
- Open position: Communications

Motions to approve executive appointments / extensions were put forward and adopted.

Awards of Distinction

Roger Wheate and Glenn Brauen

Roger Wheate presented Byron Moldofsky with an Award of Distinction for Exceptional Contributions to the Canadian Cartographic Association in recognition of Byron's extended active participation in the association and as a member of the Executive. Please see separate item this issue (p.9).

Glenn announced that the Award of Distinction for Exceptional Contributions to the Canadian Cartographic Association would be renamed the "Roger Wheate Award of Distinction for Exceptional Contributions to the Canadian Cartographic Association", effective 2025, in honour of Roger's exemplary level of contributions to the association. Glenn presented Roger, a previous recipient of the award for contributions to the association, with a certificate explaining the planned renaming. Please see separate item this issue (p.9) for an overview of the rationale and summary of Roger's contributions.

Closing Remarks and Adjournment

Glenn Brauen

Awards of Distinction

Byron Moldofsky: Award of Distinction for exceptional contributions to the Canadian Cartographic Association presented by Roger Wheate

Byron has been a CCA member since 1978, a frequent presenter and session chair, involving historical census and health data, at CCA conferences.

He also helped design and manage our first website. He has chaired the Historical Cartography Interest Group since 2014 and was a major player in planning the success of the 2015 conference, our first in the province of PEI, along with most annual meetings over the new millennium.

He fulfilled the office of treasurer from 2016-2024, one of the busiest Association positions, and guided the

transition of CCA conferences through the covid era into the present remote/hybrid environments.

Congratulations and Happy belated retirement Byron!



Certificate presented to Roger Wheate along with Rationale for Renaming the Award of Distinction for exceptional contributions to the Canadian Cartographic Association by Glenn Brauen

At the 2024 Annual Conference, the Award Committee decided unanimously to rename the “Canadian Cartographic Association Award of Distinction for Exceptional Contributions to the CCA” in recognition of Roger Wheate’s exemplary level of contributions to the association. Glenn Brauen, CCA President, then announced the renaming of the Award of Distinction for future recipients and presented Roger with a certificate.

Roger became a member of CCA in 1975 while a graduate student at Queen’s University, continuing his membership since, and has been active as an Executive Committee member or Appointment of the Executive for more of that period than not — an extraordinary demonstration of commitment. With his knowledge of cartographers and geoscientists with connections to Canada and internationally, and of how the CCA has conducted business, Roger’s advice has been invaluable within the Executive. The following is a brief list of Roger’s contributions to the CCA through roles held:

- 1984-1986: Chair, Map Use Interest Group
- 1986-1988: Secretary, including editing the newsletter
- 1988-1992: Office Manager (membership management, editing Cartouche, other duties)
- 1997-1998: Vice President
- 1998-1999: President
- 1999-2000: Past President

- 2007-2013: CCA representative to Canadian National Committee (CNC) for the International Cartographic Association (ICA)
- 2013-2023: Canadian delegate to ICA (Chair, CNC)
- 2016-2023: Membership Coordinator

The CCA presented Roger with an Award of Distinction for Exceptional Contributions to the CCA in 2002. The 2024 Award Committee considered options to recognize Roger’s continued contributions to and participation in the CCA and decided that redesignating the award was well justified and appropriate.

From 2025, deserving individuals demonstrating exceptional contributions to the association will be awarded the “Roger Wheate Award of Distinction for Exceptional Contributions to the Canadian Cartographic Association”. The Awards of Distinction for Exceptional Contributions to the Practice of Cartography and for Exceptional Scholarly Contributions to Cartography will continue to be awarded with their existing names.

Congratulations and many thanks, Roger!





Canadian Cartographic Association l'Association canadienne de cartographie

Canadian Cartographic Association Awards of Distinction

The Canadian Cartographic Association (CCA) Awards of Distinction program was initiated in 1994 to help recognize individuals or groups who have made exceptional contributions in the field of Cartography in one of three categories:

1. Exceptional professional contributions to the practice of cartography
2. Exceptional scholarly contributions to cartography
3. Roger Wheate Award of Distinction for Exceptional Contributions to the Canadian Cartographic Association.

Nominations for future awards may be forwarded by any CCA member to the *Past-President or any member of the CCA Executive*, refer to page 42 of this issue or <https://cca-acc.org/about-us/contact-us>

Note: Awards of Distinction are not necessarily awarded every year.

Visit the [CCA website](https://cca-acc.org/about-us/awards-of-distinction) at <https://cca-acc.org/about-us/awards-of-distinction> to view lists of all the distinguished recipients from over the years, as well as links to other CCA awards and scholarships.



Several conference attendees joined the pre-conference Lost Rivers Walk at Morningside Park to learn about the rich history of the area, how the creek has changed over the years and the associated impacts on the rural-urban landscapes.

OVERVIEW OF CCA 2024

Conference Event Summary

Marikka Williams

This year the Canadian Cartographic Association (CCA) hosted the annual conference from May 23rd to the 24th at the University of Toronto Scarborough in Ontario. <https://cca-acc.org/conferences/cca-conference-2024>

We were truly honored to have top Canadian Geographic Freelance Cartographer and Co-owner of *As the Crow Flies Cartography* <https://www.atcfc.ca/>, Chris Brackley, as Keynote for Day 1 and renowned *US National Park Service Cartographer (retired)*, Tom Patterson, whose mastery of shaded relief is an inspiration to students, armchair enthusiasts, software vendors, academics, and professional cartographers alike, as Keynote for Day 2. Presentations were streamed online to accommodate members that were not able to attend in person.

The 2024 Conference presentations focused on multiple aspects of cartography including: spatial data collection and quality, analysis, design, multi-platform dissemination; cartographic methods; narratives, historical themes; the business of cartography; and much more. A few maps were showcased at the conference, including student maps that were entered into this year's mapping competitions. Unfortunately, there were not many submissions this year. However, there was an excellent collection of postcard maps (see cover) submitted by CCA members and presenters that were given to attendees.

The event also included a pre-conference scenic and informative hike exploring the Lost Rivers of Morningside Park, an Ice-Breaker event was held at the University of Toronto - Scarborough Campus Pub, a few panel discussions, an AGM, and an un-banquet at a popular local pub. With 25 different presentations, participants were easily able to immerse themselves in the varied aspects of cartography. It was a great event and nice to be able to get together and network in-person.

The first day of conference presentations began with a keynote talk by Chris Brackley, a freelance cartographer and co-owner of *As the Crow Flies cARTography*, who talked about 3 maps he created. The first was a map of the most recent glaciation of North America, where he worked to find a new way of showing temporal iterations in a single frame. The second was a Giant Floor Map created for Canadian Geographic called *Biinaagami*, which strives to highlight an Indigenous view of the

Great Lakes/St. Lawrence Watershed. The final map he talked about renders the world's oceans through a multi-data lens employing some novel visualization techniques.

The first day continued with cartographic presentations on a variety of themes including multi-platform map design, the power of collaboration, certification schemes, social and political narratives, skating rink and healthy food accessibility in urban environments, greenhouse gas emissions, urban off-road trail networks, and a Panel about Narrative Online Cartography.

The next day began with a virtual keynote talk by Tom Patterson, a leading Cartographer, who after retiring as a *US National Park Service Cartographer*, continues to



Canadian Cartographic Association 2024 Conference and Annual General Meeting

University of Toronto Scarborough

influence Cartographers across the world through his website <https://www.shadedrelief.com/> and volunteer roles in the Cartographic Community. Tom served as a former president and executive director of the North American Cartographic Information Society (NACIS). He also remains active in the ICA Commission on Mountain Cartography. During his Keynote, Tom walked us through the history of his 1:250,000-scale wall map of Prince William Sound and talked about the techniques that he utilized to render the character of the landscape.

His presentation was followed by a variety of cartographic themes from virtual reality, to LiDAR data acquisition to solar energy to historical themed presentations, the CCA AGM, a panel discussing the Business of Cartography and concluded with a CCA Executive Meeting. A full list of presentation titles and their presenters can be found on the CCA website at the following link:

<https://cca-acc.org/conferences/2024-cca-conference-program>

A world of thanks to the presenters, to those who volunteered in the roles listed in the President's Message and to the people who supported the conference by chairing or moderating sessions, and to the attendees! The conference could not happen without your support.



Highlights from the 2024 CCA AGM & Conference *University of Toronto, Scarborough.*
Photographs Courtesy of Yegane Vahidi and Lori Martin

CCA 2024 CONFERENCE REVIEW

from the perspective of Geovisualization & Map Design IG Chair

Thomas Herbreteau

The Geovisualization and Map Design IG Chair is held by Thomas Herbreteau, a CCA member located in New Brunswick. A graduate from COGS and SAIT, Thomas has a wealth of experience in cartography and GIS in the private, public, and non-profit sectors, including with Indigenous Nations from coast to coast to coast. He joined the CCA in 2020 and has chaired annual conference planning committees since 2021. He also volunteers in his community and with province-wide organizations.

The main role of the Geovisualization and Map Design IG Chair at the AGM is to be part of the the judging panel for the mapping competition alongside the President and another member. Every submission for each yearly competition (please refer to our website for more details on our prizes and scholarships) is greatly appreciated and it was difficult once more to choose winners. The judging panel and the CCA thank every submission for 2024 and hope to get an even greater number in 2025.

The annual conference and AGM of the Canadian Cartographic Association (CCA) is an important event for members to connect, share, and advance their work. It provides a platform for GIS and Cartography professionals to exchange ideas and present their latest research or project work. This year's conference took place at the University of Toronto, Scarborough, on May 23 and 24. I helped organize and promote it over the past year. The conference featured informative presentations and productive discussions in the field. Annual meetings are crucial for fostering collaboration and promoting collective growth within the fields of cartography and GIS.

The two conference keynotes, Chris Brackley and Tom Patterson are well-renowed cartographers in North America, and it was fantastic to have them present their latest work.

Chris Brackley's main focus are educational, national and regional size maps. He showed us a demo of how he created a temporal story on a static map; a magazine requested a map of the glacial retreat in North America on a two-page spread. He used a 1987 map as a reference guide, textures and colours to help evoke the topic of the map – in this case, glaciers. He then added moraines, eskers, pro-glacial lakes and a visual

of the furthest extend of the land and ocean as well. He then showed his work creating a series of tile maps for National Geographic and Canadian Geographic on the global oceans, including sea ice and the loss of it in the Arctic and Antarctic, coral reefs and add phytoplankton (using density dot mapping and a green colour scheme), bathymetry and finally the average of cold and warm ocean currents.

Tom Patterson focused on the significant amount of details for his Price William Sound, Alaska, map. It features a large amount of details, including different data sources from 5 to 10 years ago, which did not apply anymore due to the devastating impacts of climate change; most notably the extent area of glaciers, which are melting at an incredible speed. The glaciers and glacial lakes were mapped based on their recent satellite imagery and compared with old paper maps of the area. They were given texture on the map to show their topography and details using a DEM. The significant 30+ kilometres retreat of the Colombia glacier was mapped with precision, from 1978 to 2023. Contour lines were added on the areas where the glacier retreated. Natural colours were given to the map using elaborate textured and shaded relief as well as land cover datasets. A high resolution jpeg of the map is found at the following link <https://shadedrelief.com/pws>. The map is also found on Avenza MAPS for mobile devices.

The conference also featured several presenters sharing their incredible cartographic work, whether it was for school or for work. A few highlights include:

- **Marikka Williams** shared her work integrating the functionality of several software products including: ArcGIS Pro, Adobe Illustrator, Avenza MAPublisher and Avenza MAPS to support field data collection.
- **Jeff Allen & Teresa Lay** from the "School of Cities" shared their geovisualization work mapping access to Toronto's outdoor skating rinks.
- **Julia Siemer** from the University of Regina did great work mapping accessibility of healthy food in Regina, Saskatchewan, outlining food deserts in the city.
- **Paul Heersink** shared his work mapping German U-boat Logs from World War Two. He presented his thorough work decrypting historical documents and maps, compiling the data, and then mapping it.



CCA 2024 Presentation Summaries

THE SCARBOROUGH GREENWAY: BUILDING AN OUTSTANDING OFF-ROAD TRAIL NETWORK *University of Toronto Scarborough*

André Sorensen, Allison Oki, Amaan Jabbar, Anastasiia Ostrovskaia and Karen Khan

Background

In the City of Toronto, a major policy priority is to facilitate the shift towards a mobility culture that centers active transportation. However, this can be a challenge in areas with a primarily car-oriented built form that makes travel by walking and cycling unsafe and inconvenient.

Scarborough, an outer postwar suburb of Toronto, exemplifies this form, which has resulted in roads with high rates of traffic incidences and only a small percentage of trips being taken by active transportation. There is fortunately an enormous opportunity to provide new, eco-friendly, low-cost options for people to get around by connecting existing trails and pathways.

Project Overview

The Scarborough Greenway Network Report (2022) presents an ambitious vision for a connected network of off-road multi-use trails (called greenways) through publicly owned parks, green spaces, and hydro corridors throughout Scarborough. This report is intended to provide useful and achievable recommendations to help inform future transportation projects. It builds off of a report produced a year earlier called the Scarborough Opportunity Report (2021), which outlines a comprehensive on-street active transportation network.

The Greenway Network spans 165 km of which 51% already exists. It is within 1 km of 93% of Scarborough's residents, and links to several rapid transit stations and key destinations. The Network (Figure 1) consists of six new greenways that follow along creeks and corridors, stitching together existing trail segments with new connections. The Network is also characterized according to three trail classifications – high-capacity, primary, and secondary – to inform design standards based on the anticipated volume of users for each trail.

The Role of Mapping

The Greenway Network is envisioned through an array of maps. Data was collected and recorded to detail which segments are proposed and which are existing (Figure 1). ArcGIS, Mapbox and OpenStreetMap were used to design the maps. Zoomed-in versions of these maps

were included in the Route Profiles done for each of the Greenways, detailing the status of existing segments (e.g., trail condition) and the feasibility of creating new proposed segments (e.g., planned future studies).

Detailed maps created for the Greenways represent another major visual component of this report (Figure 2). These detailed maps utilize GoogleEarth satellite imagery as the base, overlaid with the Greenway route and its connections to other parts of the Network, fun facts, photographs, and key amenities and destinations. They were designed in Canva, an online graphic design platform. These maps were inspired by maps of *The Meadoway*, a hydro corridor stretching diagonally across Scarborough containing trails and connections to natural features and several points of the Greenway Network.

Considerations for Implementation

As discussed in the presentation, it is important to acknowledge implementation considerations and geographic obstacles to achieving the entirety of the network. Major barriers include Highway 401 which runs east to west, railway tracks, and certain sections of the Scarborough Bluffs that are difficult to access. Our report proposes interim on-road solutions to work around these obstacles until long-term infrastructure projects are implemented (e.g., bridges, underpasses/tunnels, and boardwalks).

There is also a recognition that completing this network would require political will and buy-in to invest in a more robust active transportation network for the betterment of current and future generations, especially as residential development and population growth continue to rise.

Overall, a major takeaway from this project is that much of the network could be completed through merely connecting existing trails, enabling better continuity and convenience for users to complete leisurely and utilitarian trips. There is so much potential and opportunity to transform Scarborough for the better, and realizing The Greenway Network would put Scarborough on the map not just as a local leader, but a world-leader in active transportation.

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Figure 1. The Scarborough Greenway Network interactive map (created by Jeff Allen)



Figure 2. Excerpt from Detailed Map of East Highland Creek Greenway (created by Allison Oki)

ADMINISTRATIVE BOUNDARIES OF ELEVENTH AND
TWELFTH CENTURY NORMANDY

Christopher Macdonald Hewitt

Introduction

In the 11th and 12th centuries, the duchy of Normandy contributed knights and soldiers to many of the campaigns of that era. Modern historians writing on the period have included a map of Normandy for reference in discussing the duchy and these campaigns. However, they are not developed from digital files. It was the purpose of this project to create a digital documented dataset of the duchy for future research and use.

The previously published maps vary in their depiction of the duchy. A number of maps depict the local pagus administrative boundaries from the Roman period or the local bishopric boundaries. Current digital datasets, such as *Mapping Past Societies* by Harvard University accessible at <https://sohp.fas.harvard.edu/digital-atlas-roman-and-medieval-civilizations> cover the boundaries of Normandy and the medieval world in

general and only depict either the duchy as a whole or the bishopric boundaries. In addition, they are either crudely drawn and/or not accessible to others. In many of these maps, the southern boundary of Normandy was defined either as the ecclesiastical province of Rouen or as the coutume which was the limit of where Norman law was practiced in the Middle Ages.

Data Sources

Several sources were collected in the development of the dataset. A base map was required to use as a reference for digitization. Of all the maps considered, John Le Patourel's map in *The Norman Empire* from 1976 was selected because it was the most detailed including the coutume, bishopric and pagus boundaries and where they are the same and different. This option would provide future researchers with the most options for adapting the data to suit their needs.

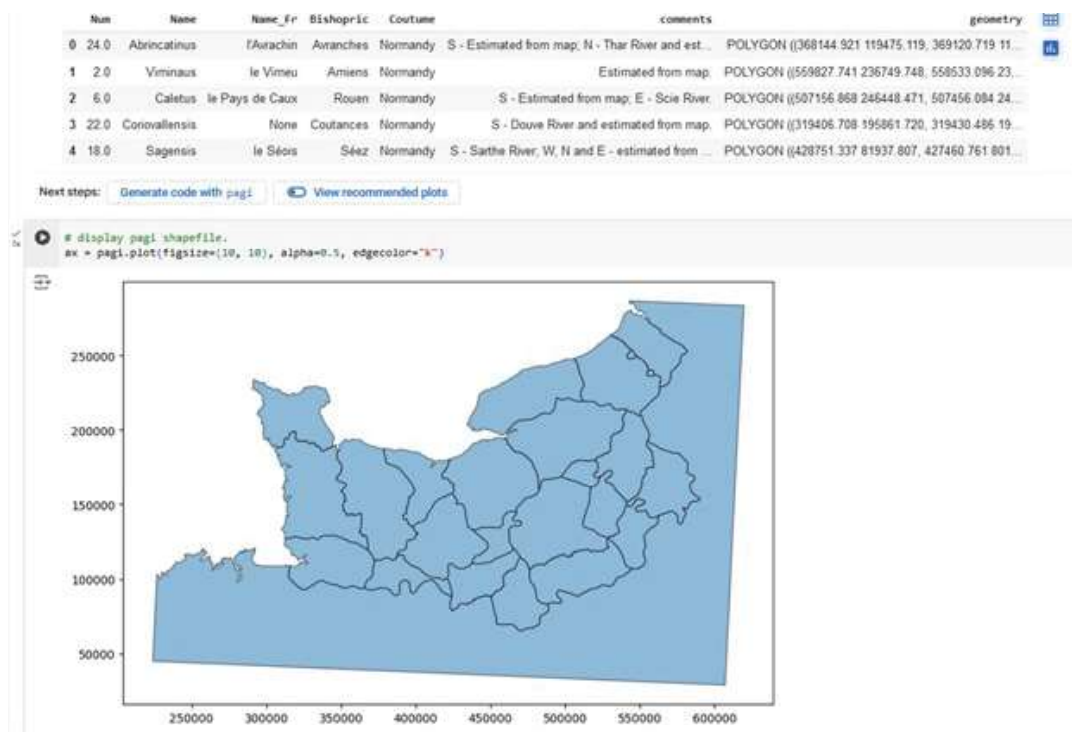


Figure 1: Norman Pagi and Attributes *(the Google Collab Book can be found at the following link:

<https://colab.research.google.com/drive/1Rt837XI1O1G85ZOyElBpz0efTRIjNrxw?usp=sharing>

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The HydroSHEDs (<https://www.hydrosheds.org/>) river dataset was included for reference because 82% of the boundaries were defined by at least one river. England's Domesday Shires published by the UK Archaeology Data Service (<https://doi.org/10.5284/1058999>) were included for comparison purposes.

Georeferencing

First the map was georeferenced to the main centres on the map. Then, the boundaries were digitized based on the rivers and map. Each pagus or section of one was provided with detailed attributes including the pagus name in Latin and French, the bishopric, coutume and comments about the boundaries.

Standardization and Analysis

To compare with England, the data was restricted to the coutume of Normandy and the attributes included the Latin name, kingdom (France), unique ID number and area in square kilometres. Where applicable, the same were provided for the English Domesday shires.

Attribute standardization and analysis were conducted in Google Colab*, an online Python Jupyter Notebook, which can be accessed through a Google account (refer

to Figure 1 for a link to the project). The benefits of the platform are that the Python packages are pre-installed and researchers do not have to worry about updating them. Additional packages can be easily installed each time the analysis is run. Likewise, the original data also has to be uploaded each time.

Results

The result of this project is a GIS dataset for Normandy that covers the 11th and 12th centuries. This was the period when the Normans were the most active on the European and wider Mediterranean stages. Figure 1 presents a screenshot of Google Colab with the Normandy attributes printed out and the data displayed cartographically.

Conclusions

In conclusion, it is possible to produce standardized contextual maps of Normandy and England for the eleventh and twelfth centuries. This dataset could also serve as a base map for geographic studies on the Anglo-Norman World, which could focus on climate change, development patterns, narrative mapping and Norse settlement patterns. Thus, there are many opportunities for this dataset.



**CCA 2024
Presentation
Summaries**

A GREENER LA DÉFENSE? THE CHALLENGE OF MAPPING URBAN NATURE AND ITS POTENTIAL IN BUSINESS DISTRICTS

Mohamed-Jawad Chaïl

Urban Context and Challenges

In the context of climate emergency and biodiversity loss, urban nature has become a major political concern for contemporary cities. Yet its development raises major challenges, especially in highly anthropic environments, such as large-scale purpose-built business districts. La Défense, one of the largest European business districts in Europe, is a case in point. While it is hardly recognized for its potential as a thriving urban natural environment, the public institution in charge of its supervision, Paris La Défense, seeks to promote green infrastructure and wildlife amid its high-rise buildings. In order to do this, in 2021, Paris La Défense adopted a “raison d’être”, a new strategic direction aimed at becoming the world’s first post-carbon business district.

The term “post-carbon” emphasizes the paradigm shift needed to address multiple challenges, including minimizing environmental impact, combating climate change, and improving the quality of life of residents, in particular by increasing urban nature. The challenge of my work at Paris La Défense is to apply GIS to the institution’s missions. One of these missions is to improve the management of urban nature.

GIS Strategy

A notable initiative using GIS is the internal development of the GESDIF application (differentiated green space management / gestion différenciée des espaces verts in French), which uses ESRI tools. This GIS application, built with Web AppBuilder for ArcGIS, is designed to

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facilitate adaptive management of green spaces across the territory. It allows real-time monitoring and effective planning of maintenance tasks. The data seamlessly integrates with the Paris La Défense GIS database, ensuring regular updates and thus produces reliable, high-quality data. The application allows users, including service providers, to view and modify intervention schedules directly in the GIS database. This functionality not only enhances operational efficiency but also supports informed decision-making in urban green space management. For example, users can monitor planned and completed maintenance activities, track deviations from planned schedules, and record environmental conditions influencing management practices. This exemplifies how GIS and urban nature management are intertwined.

Significant efforts are also being made at Paris La Défense to enhance biodiversity data, which enables the development of key performance indicators (KPIs) related to flora and fauna. This work helps to understand the territory's biodiversity and informs associated decision-making. Furthermore, data can also be showcased through maps, providing valuable insights into the spatial distribution of urban nature data across the territory.

Governance and Stakeholder Involvement

In my Master's thesis, I investigated the stakeholders

involved in geographic data production. This research is based on interviews with various employees from Paris La Défense and other public organizations, and emphasizes the need for strengthened collaboration to improve urban nature management practices through data. The objective of these interviews was to engage in discussion with public actors to understand the processes of collecting, processing, and disseminating naturalistic data. These discussions explored the underlying motivations of actors for their engagement in collecting and managing geographic data, as well as the goals pursued by these open data initiatives.

Conclusion

This work explores the challenges and initiatives aimed at integrating urban nature into a dense urban environment like La Défense. The application of geomatics, through tools such as the GESDIF application, demonstrates how GIS technologies can effectively support adaptive management of urban green spaces. This approach allows not only more efficient management, but also informed decision-making based on accurate and up-to-date data, showcasing the clear added value of GIS for a data-driven strategy. An Esri StoryMap, was created to provide a dynamic, in-depth exploration, and educational cartographic narrative, within the institution to represent urban nature in the Paris La Défense area.



Figure 1. Paris La Défense (Photo credit : Constance Decorde)



CCA 2024 Presentation Summaries

NAUTICAL GEOSPATIAL SPECIALIST CERTIFICATION SCHEME

Shelly Leighton P.Eng., CLS, and Derrick Peyton P.Eng.

Introduction

Standards of Competence for Hydrographic Surveyors and Nautical Cartographers exist under the guidelines of the Federation Internationale des Geometres (FIG), the International Hydrographic Organization (IHO) and the International Cartographic Association (ICA), and are consistent with the International Board on Standards of Competence (IBSC):

"The IBSC is composed of members of known competence in the civil, governmental or educational sectors of hydrographic surveying and nautical cartography, selected to provide as wide as possible a spectrum of knowledge and experience in educational practices, hydrography and nautical cartography, from different geographical areas. The IBSC shall have up to twelve members, four provided by FIG, four provided by IHO and four provided by ICA" (<https://iho.int/en/ibsc>).

The Standards that are administered by the Board include the Standards of Competence for Category "A" and Category "B" Nautical Cartographers (Ed. 1.0.0, September 2017), often referred to as the S-8 Standard. The "A" and "B" indicate two levels of competence recognized by the Board. This Standard is incredibly important as it provides a minimum competency required for the continuance of best practices and high standards required for nautical charting worldwide.

There are several programs globally that offer training in the Category S-8B level. This indicates the IBSC has reviewed the programme and has "recognized" the programme as meeting the learning outcomes provided in the Standard.

Certification Pathways

A programme itself is not certified and those individuals graduating from a recognized program are not considered to be certified upon graduation. The Standards of Competence for Hydrographic Surveyors (often referred to as the S-5 Category "A" or "B") has similar recognized programmes worldwide. The graduates of a recognized S-5 programme are not certified upon graduation, but they do have pathways to certification through various certification schemes. In Canada, for example, an individual can apply through the Association of

Canada Lands Surveyors (ACLS), which administers the International Hydrographic Certification Scheme (IHCS). The ACLS has a committee, the International Hydrographic Certification Panel (IHCP), which will review the academic study, relevant employment history and continuous professional development of the individual applicant and award certification based on the IBSC recognized certification scheme. This provides individual hydrographic surveyors a way to show professional development and have their skills recognized through certification.

Increasingly in Canada and the United States (following Australasia), government organizations responsible for the data collection of near shore, harbours and shipping routes are requiring that their contractors have team members certified against an IBSC recognized scheme administered by a professional body. This provides confidence that the contracted company will adhere to responsible data collection where information is used for safety of navigation and the creation of the nation's nautical charts.

For a graduate of a recognized S-8 program there is no pathway to certification. This means that the IBSC has not recognized any certification schemes that will assess an individual's academics, work history and professional development. In the past three years, IIC Academy has graduated 75+ students from a recognized, portable S-8B programme, but these individuals have no means of becoming certified professionals.

Certification Framework

A framework exists for the Certification of Nautical Geospatial specialists, based on existing recognized certification schemes of the S-5 or Hydrographic Surveying Standard. The Nautical Geospatial Specialist Certification Scheme would see a partnership between Canada, USA, Europe and Australia in the administration of the program to certify individual applicants against the Standard. The proposed framework, the Nautical Geospatial Specialist Certification Scheme (NGSCS), is to be recognized by the FIG/IHO/ICA IBSC and would exist to review and assess candidates against the Nautical Cartographic Standard (S-8).

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The NGSCS would be comprised of a panel consisting of members from each of the four regions. It is suggested that each region have three panel members: one from public sector, one from academia and one representative from industry. Managing the administrative duties would rotate biannually, where the panel chair would move between regions every second year.

Canada could be a champion for the NGSCS as there is capacity within our current professional associations. A partnership between the Canadian Hydrographic Association and the Canadian Cartographic Association could provide leadership to other similar associations such as the Hydrographic Society of America (THOSA), the International Federation of Hydrographic Surveyors

(IFHS), and the Geospatial Council of Australia (GCA). The framework proposed has outlined the rotational administrative schedule, proposed fees for certification and the registration and processing of applicants.

As with the ACLS certification scheme there are also proposed levels for certification, based on the applicant's academic, employment and professional background. Prior to certification, an individual could be designated with the "in-training" designation to indicate their status within the certification pathway. Within the framework, an approach to certification has also been defined. The table provided below (shown in Figure 1) highlights the fast, medium and slow tracks to certification, at Levels 1 and 2.*

Figure 1. Pathways to Certification

Track	Category	Education	Experience	Reporting
Fast Track	Category S-8A (Level 1)	Up to 2 years in practical nautical charting, database management, S100 and ENC production with 60% in a managerial lead role	Evidence of high-level management (e.g. Project Charter, Product Development, Policy and/or Standards Development, National/ International Committees, Publications)	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 1 criteria
	Category S-8B (Level 2)	Category S-8B	Up to 2 years in practical nautical charting, database management, S100 and ENC production.	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 2 criteria
Medium Track	Category S-8A (Level 1)	BSc (Geomatics or Nautical Sciences) + Limited Category S-8A Modules	Up to 3 years in practical nautical charting, database management, S100 and ENC production with 60% in a managerial or technical lead role	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 1 criteria
	Category S-8B (Level 2)	Technical Diploma (Geomatics or Nautical Sciences) + Limited Category S-8B Modules	Up to 3 years in practical nautical charting, database management, S100 and ENC production	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 2 criteria
Slow Track	Category S-8A (Level 1)	BSc or Technical Diploma (nonrelated) + Significant Category S-8A modules	Up to 5 years in practical nautical charting, database management, S100 and ENC production with 60% in a managerial or technical lead role	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 1 criteria
	Category S-8B (Level 2)	Non-related Technical Diploma + Significant Category S-8B Modules	Up to 5 years in practical nautical charting, database management, S100 and ENC production	2 Project Reports to demonstrate the candidate's skills, knowledge, and ability as they pertain to the competencies required for the Level 2 criteria

*For more information on Nautical Cartographic program available in Canada, or the NGSCS, contact IIC Academy at nauticalcartographer@iicacademy.com



CCA 2024 Presentation Summaries

From Design to Device: *Creating and Sharing Maps with Avenza*

Riley Sweeney, Avenza Systems Inc.

Introduction

“From Design to Device: Creating and Sharing Maps with Avenza” showcased the transformative potential of Avenza’s suite of tools for cartographers. The session began by introducing the objective: To demonstrate how Avenza solutions, in particular MAPublisher and Avenza Maps, can be integrated into current cartographic workflows to streamline the process of map creation and distribution.

MAPublisher in Adobe Illustrator

The journey began with MAPublisher in Adobe Illustrator, where a detailed map of the University of Toronto Scarborough campus was created. The process involved importing geospatial data, utilizing filtering options to manage large datasets, and applying custom styles to enhance the map’s visual appeal. Key features included a 3D effect for buildings and the use of custom symbols for important points.

Adding Contextual Information

The next phase involved adding relevant contextual information to the map such as Points of Interest.

- The *Find Places* tool was the most appropriate with respect to supporting the particular business practice.
- The demonstration included how to search for and add points of interest, such as cafes, around the campus.
- Points were styled appropriately and integrated

Vector Basemaps from Maptiler server were used to provide a visually cohesive background. Custom Basemap styles were applied to align with the map’s existing color scheme.

Final Edits and Enhancements

This section focuses on refining the map with additional elements and using advanced tools:

- Adding Legends and Layout Text: Visual map elements such as legend, layout text and drawn

details using Illustrator’s vast design tools were added to enhance the maps usability and aesthetics.

- Using the Knockout Tool: The upcoming Create Knockouts tool was demonstrated to create clear areas around text and symbols in a batch process. In this revamped tool, Jobs and rules can be set up to apply different knockout styles for symbols and text, ensuring legibility and visual clarity.

Avenza Map Store Integration

The presentation also covered the process of preparing and uploading the map to the Avenza Map Store which involved:

- Creating a Map Store Package: Using MAPublisher’s export and upload tools, a map store package was created that can be listed for sale or free download, allowing cartographers to monetize or share their maps easily.
- Comment on the Vendor Experience: The benefits of being an Avenza Map Store vendor were discussed, including the potential for profit and the opportunity to reach a wider audience.

Interactive Element for Attendees

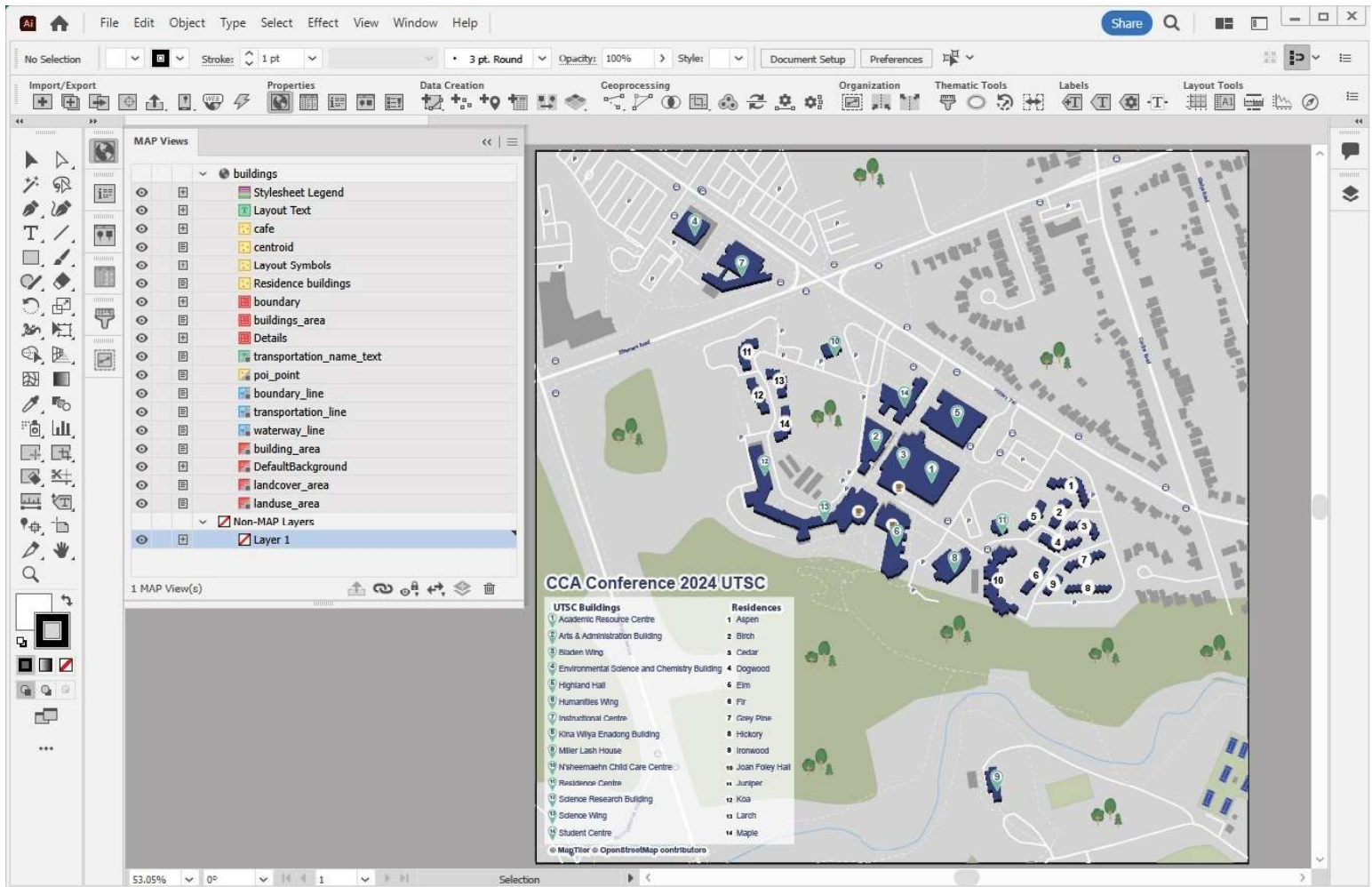
The following QR Code was provided to provide access to download the *Avenza MAPS App* and *Example Map*.



The QR Code enabled CCA Conference attendees to access and use the campus map created during the session, which demonstrated a practical application of Avenza MAPS Mobile App.

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Figure 1 - Completed map in the Illustrator & MAPublisher workspace. Geospatial layers can be viewed in the MAP Views Panel.



Conclusion and Additional Resources

The session concluded by encouraging attendees to explore Avenza's free trials and virtual training classes, available on Avenza.com. These resources provide additional support for integrating Avenza tools into

their workflows. This comprehensive demonstration underscores the efficiency and versatility of Avenza's solutions, highlighting their ability to streamline the entire map creation and sharing process from design to device.

Learn more about Avenza Software utilized in this demo at <https://avenza.com/>



CCA 2024 Presentation Summaries

What is SUP with Avenza?

Marikka Williams, MSc. GISP

Introduction

It was a beautiful sunny day and I wanted to spend some time in the 'Great Outdoors' so I thought it would be a perfect opportunity to test *Avenza MAPS Mobile App* with my *Algonquin Group of Seven Portolan Map Series* that I presented at the 2022 Canadian Cartographic Association (CCA) AGM & Conference. Inspired by the theme, I chose to head to Algonquin Provincial Park, a lovely, peaceful and picturesque place, in Ontario, Canada, to SUP Canoe Lake, a favored location rendered in many of the *Group of Seven* paintings.

The *Avenza MAPS Mobile App* is easy to use with a OSM Basemap that is freely available to facilitate field data collection (Figure 1a). It helped me navigate and evaluate the efficacy of the *Group of Seven Portolan Map Series* I created (Figure 1b), while pacing myself to return safely to the dock by sunset. It also enabled me to collect data to document my experience so that I could later follow up and create a map of my memories with *Adobe Illustrator* and *Avenza MAPublisher*. I hope this presentation helps you navigate with *Avenza* through any outdoor activity you seek to experience.

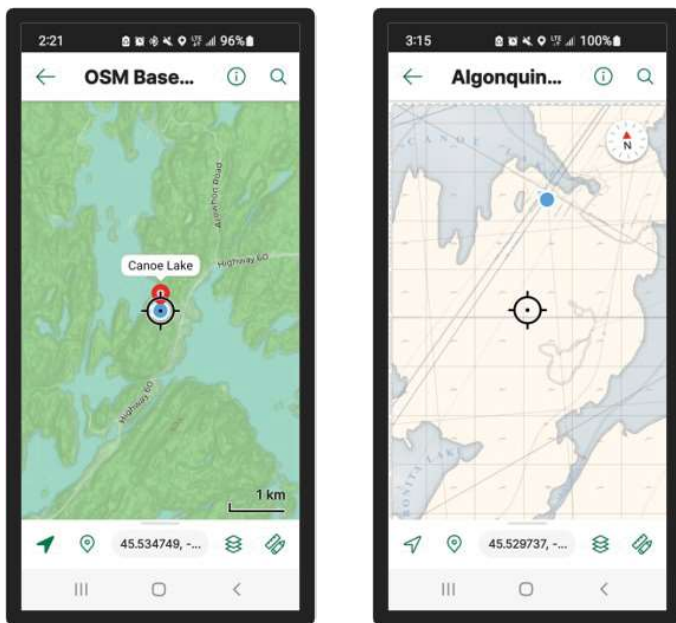


Figure 1a. Avenza MAPS with web-based OSM Base Map (Left image) Figure 1b. Avenza MAPS with GeoPDF of a customized *Group of Seven Portolan Map Series* that I created (Right image)

The Workflow

In this presentation, I share the organic workflow that I go through when creating a cartographic product to support a specific activity, it involves research on the study area, identifying relevant data resources to inform the activity, determining the most appropriate scale, acquiring the data that I need to support that activity, investing time to get to know the data, customizing my palette and symbol set to intuitively communicate efficiently, labeling the knowns, identifying and demystifying the unknowns, integrating appropriate measures and analysis that support the activity and making it accessible so that it can be utilized to support future decisions related to that particular activity. In this scenario, the activity was a *Stand-Up Paddle Board (SUP)* lake excursion.

Data Acquisition

The data acquisition phase requires an understanding of the activity and the data sources that are available to support that activity. Data selection choices are not only impacted by the scale of the activity but by the information needs related to that activity, further to that there are data quality concerns that need to be addressed, so these various facets require multiple strategies to navigate through.

- *OpenStreetMap* is an open-source global resource that provides a means to evaluate data and download data packages. The data is *crowdsourced* so cross-checks are necessary, and caution should be exercised when utilizing this data. *Tracestrack Topo* is a downloadable web-based themed data resource that provides context for an outdoor activity and the web interface provides an opportunity to get to know the data before exporting it and importing it into *Adobe Illustrator* with *Avenza MAPublisher*. <https://www.openstreetmap.org/#map=3/71.34/-96.82>
- *USGS* is another global means of acquiring data such as satellite imagery or elevation data to create new data, cross reference existing data, or provide context. <https://earthexplorer.usgs.gov>
- *The Geospatial Data Extraction tool* accessible at <https://maps.canada.ca/czs/index-en.html> is maintained by *Natural Resources Canada (NRCAN)*,

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and a means of acquiring Canadian data. It is possible to search for a location and define the extent of a study area or use predefined clipping areas. I selected the *National Topographic Standard (NTS) mapsheets* which worked well for my purposes. It is easy to download and provides data compiled at a 1:50,000 scale which is a good starting point for creating a base map for an activity of this nature.

- *Ontario GeoHub* at is another resource for creating maps to support outdoor activities in Ontario. I acquired *Land Information Ontario (LIO)* bathymetry data from this resource. <https://geohub.lio.gov.on.ca>

The data resources that I have highlighted above provide access to freely available data.

Setting up the Workspace

Once the data is acquired it is necessary to set up the workspace to scale. During this phase the workspace is configured so that it is aligned with the activity in relation to scale, projection and study area extent. First I select an appropriate local projection. Then I specify the format and import the data. I can create queries to filter and select only the data that supports the activity. It is also important to set up the *MAP View* to specify the destination coordinate system and the scale. I designed the map for a 1:5,000 scale because it makes sense in relation to the resolution of the information that I wanted to make available to support the activity.

Customizing the Palette

My first priority after I set up the workspace is to customize a color palette and symbol set. I import swatches and symbols from *MAPublisher* and *Adobe* libraries. Then I customize them to support the activity.

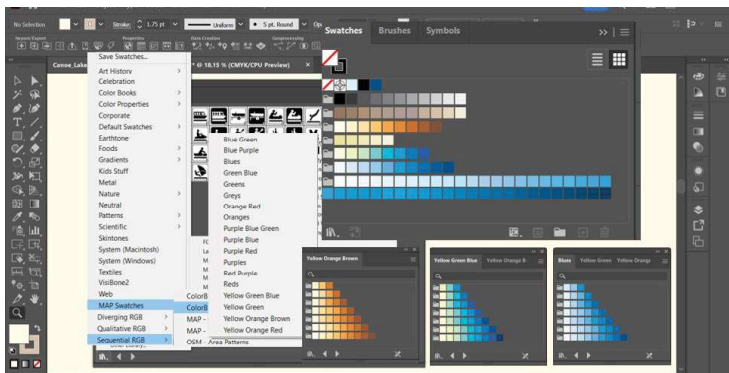


Figure 2. Screenshot of Imported and Customized Palettes

The swatches are customized to reflect the natural colors of the landscape (Figure 2) and the symbols (Figure 3) are customized to integrate with the historic theme.

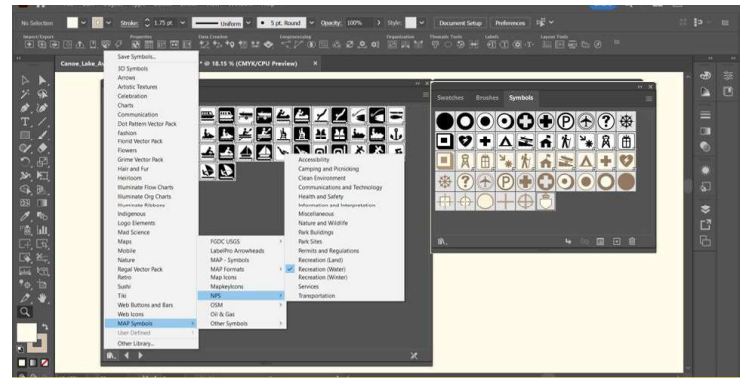


Figure 3. Screenshot of Imported and Customized Symbols

Symbolizing the Data

Once I have the palette and symbols customized I am ready to start symbolizing the data. *MAPublisher themesheets* is the best way to manage the process of symbolizing data. This involves creating a new theme, selecting the geometry type, linking to the source feature, setting up rules which are basically attribute queries which can be achieved using one rule for all of the features in the data set or performing a batch process based on an attribute to set the fill, stroke, weight and opacity.

First, I set up a *themesheet* with one rule for one feature to define water area features with a fill but no stroke. I set up another *themesheet* with one rule for more than one feature to define multiple features with the same geometry with the same symbology, noting it is important to define the fill as 'no color' and 0% opacity to avoid the wedge shapes appearing in linear features. I apply a fill and a stroke to differentiate the land from water and utilize batch rules to set up symbology based on a category such as road class in this instance.

The *Visual Properties* then need to be modified to render road features hierarchically by applying larger widths for the primary roads and smaller widths for the service roads, tracks and trails. I convert the trails to a dashed line manually by selecting those features and modifying the dash weight, cap and gap pattern. Now I have a sense of scale, the land is differentiated from the water, I know where the roads and trails are, and I feel like I have a good foundation to paddle on.

Integrating Imagery

Adobe Photoshop and *Avenza Geographic Imager* provide a means to harvest, enhance and mosaic *USGS Landsat Satellite Imagery* which is useful for getting to know the terrain, creating new data or ground-truthing the accuracy of the existing data.

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With this software it is possible to combine satellite imagery bands by merging channels. It is also possible to crop satellite imagery to a vector file extent to focus in on the study area and then adjust the curves to reveal the landscape. Further to that it is possible to remove the clouds with the spot healing brush tool and integrate the pan band to a 15-meter resolution.

Once the post processing of the imagery is complete it is exported to a GeoTIFF and the image is imported into Adobe Illustrator with the Avenza MAPublisher multiple data import tool so that it stays in alignment with the MAP view. I can then proceed with cross-checking the spatial data extent of the water features and the accuracy of the road and trail features and create new data by digitizing with reference to the imagery.

Improving the Cartographic Appeal

Esri ArcGIS Pro is a software that provides access to geoprocessing tools that I can use to simplify or improve the cartographic appeal of the data or integrate terrain visualization techniques when it makes sense. I wanted to render the bathymetry contour data with a combination of filled contours and illuminated contours so I interpolated a Digital Elevation Model (DEM) with ArcGIS Pro and utilized it to generate filled contours (Figure 4) with the *Terrain Tools Python Script*.

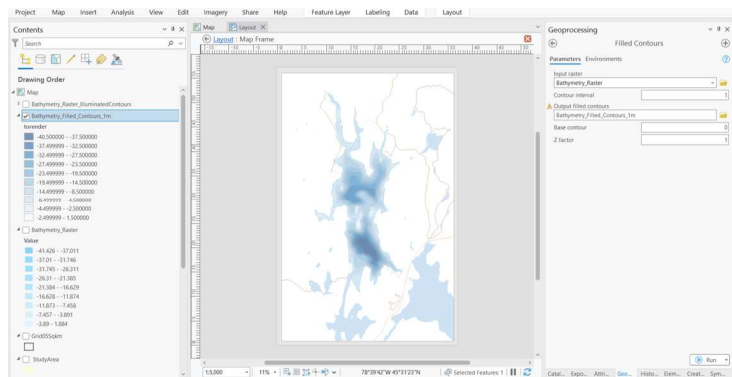


Figure 4. ArcGIS Pro Geoprocessing Workspace

I also utilized the *Terrain Tools Python Script* to create illuminated contours with the interpolated bathymetry to accentuate the water depth intervals. I used the *Esri Living Atlas Topobathy data* to generate illuminated contours to accentuate the character of the terrain.

Advanced Symbolology

The 1.5 km paddle between Grand Island and the Sandbar was very rough due to the strong winds. The water was incredibly choppy and there was no turning back. Looking back with reference to the bathymetry I can see that I was mostly challenged by turbulence in

deeper water. This experience further validated the importance of symbolizing contours both in water and on land. The illuminated contours I created to accentuate the water depth are rendered in relation to light and shadow with light originating in the northwest and shadowed areas rendered in the southeast (Figure 5).

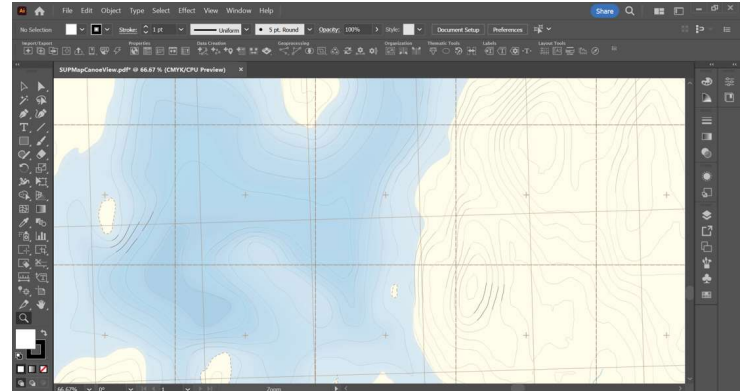


Figure 5. Filled Contours and Illuminated Contours rendered in Adobe Illustrator with Avenza MAPublisher functionality

I also wanted to render the depth with filled contours in 1-meter increments which is why I customized a blue color ramp. This made it easy to batch generate rules, set the fill ramp, and apply opacity settings globally. The illuminated bathymetry contours are overlain on a semi-transparent water area layer with the filled bathymetry contours placed below both the bathymetry illuminated contours and the semi-transparent water feature layer. The illuminated contours on the land are simply overlain on the light yellow background (Figure 5).

Labelling

Once I reached a shallow area filled with jagged stumps I felt it was worth noting as they are a hazard to watercraft and particularly to air-filled SUP Boards. It occurred to me at that point that it would be helpful to label the bathymetry. Avenza LabelPro functionality supports the labelling process but manual placement is still required.

The workflow is fairly simple. It involves connecting to the feature that you wish to label, indicating if it is labelled or an obstacle or both. Applying a filter, if applicable, specifying the label field, the style and the placement rules. After that there is a fair amount of manual labor involved in adjusting labels so that they are easy to read in context which is an iterative process as more labels are added. At the stumps I focused on labelling the bathymetry contours. I set style and placement rules, leaving the grouping rules as is and enabling the labels to repeat so I would not have to look very far for water depth values while zoomed in on the Mobile App.

continued on page 26

In the conflict avoidance settings, I uncheck the option to allow it to cross obstacles in an attempt to resolve overlaps. I made amendments to make values readily available and ease interpretation of the water depth.

The Influence

As I paddled along I saw a sign that honored the memory of Tom Thomson, the renowned artist who painted landscapes in Algonquin Park from 1912 to 1917 and who influenced my theme. At that point it made sense to label contours and roads. The contour labels reveal the hilly character of the landscape. I set the size of the font to 12 pt, and applied a halo the same color as the land to make the labels accessible and easier to read, I decided to apply a label filter for the roads so that I could symbolize Highway 60 with a Shield. I set the style to 12 pt and selected an Ontario Provincial Highway Shield. The roads around Canoe Lake are mostly unnamed in the data that I have so I selected Arrowhon Road (the only named Road) and activated the Label Tagger tool to label it by specifying the name field, the target label layer and Normal Style. Then I bolded it in a 14pt font so it would be easy to read.

The Confluence

At the Confluence of the Oxtongue River and Potter Creek it seemed obvious that it was time to label the water features as the aging wooden sign was a bit misleading. I specified waterway labels to follow similar rules as other linear features by setting the font to 14 pt with a halo. For the water area features I paid attention to visual hierarchy principles but because there were so few I performed this process manually. I started with a 16pt font for larger water features. I enabled stacking and automated font reduction for smaller water features. I did not set the rule to enable the labels to cross obstacles to prompt the automated font reduction. I specified placement settings with a preference for a horizontal angle. I then made manual adjustments as needed to create a sense of balance in relation to other symbols and labels.

By this time I was starting to become a bit conscious of the time, from the perspective of a Stand-Up Paddleboard it seemed like the home stretch was just around the bend but Avenza Maps indicated that I had a ways to go so I decided that I probably should label the points of interest so that I would have an improved understanding of where I was. I set the font at a 14pt Semi Bold Style with a Halo. Since I chose not to use icons for points of interest I place the label priority at the center of the point and once the labels are created

I turn off the spatial data layer. I allow for stacking and font reduction. I also allow it to cross obstacles since there were so few in the data that I have. After labeling the points of interest I felt a greater sense of connection to the cultural history of Canoe Lake.

Navigational Measures

Fortunately, the weather and the water was fairly calm by this time, but as I paddled along, I thought it might be a good idea to calculate measures to the shore with azimuth lines. I drew the azimuth lines manually and then performed manual distance calculations using a calculator and my scale bar text where 1 cm = 50 meters (shown in Figure 6b). This helped provide some perspective and gave me strength to paddle on.

Eventually I saw the miniature lighthouse in the distance (Figure 6a). It was truly a beacon of hope and I knew that it would not be very long until I reached the dock but I thought that it might be helpful to create some half kilometer buffers to get a sense of how much further it was. I created buffers at 0.5 km Intervals from the center of the northern part of Canoe Lake (Figure 6b). With this information I could measure the distance intuitively to determine that I had about 2 kilometers remaining if I traveled along the shoreline on the west side of the lake to avoid the deep water in the center and round out my circuit.

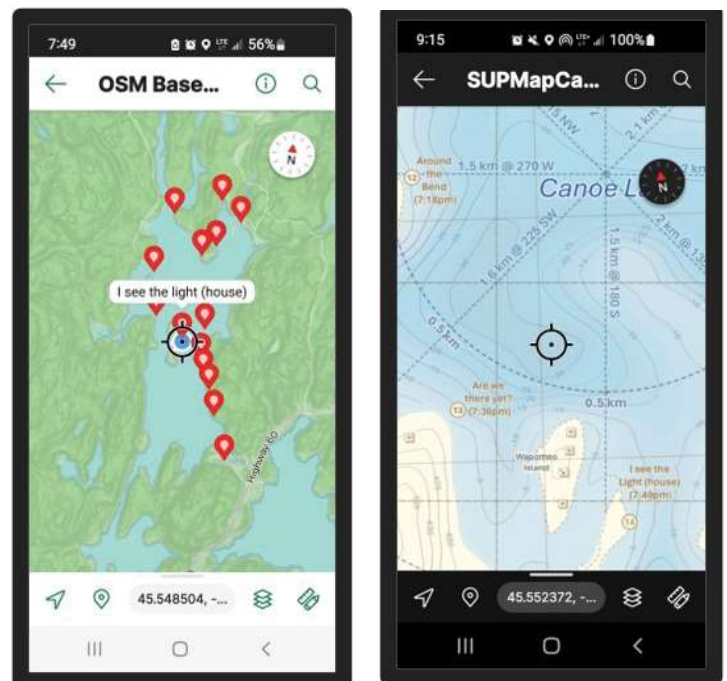


Figure 6a. Avenza MAPS Data Collection with OSM Base Maps (left image) and Figure 6b. Avenza MAPS with customized map design (right image)

continued on page 27

Saving the Day

As I paddled on, I was stunned by the peacefulness, the entire lake seemed wrapped in peace, the wind was calm, the water was smooth, and I heard a loon calling out in the distance, so I felt that it was time to save my work and listen for awhile.

I saved my map layers (see Figure 7), my customized symbols and swatches (see Figure 8), my map themes, my label settings, my scale bar settings (see Figure 9) and my graticule settings which will ultimately save time in the future.

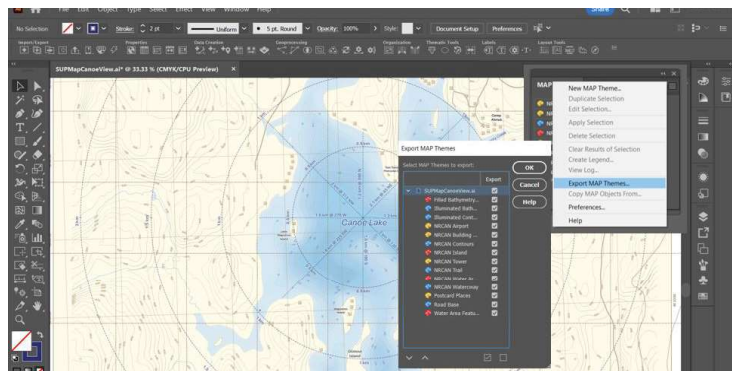


Figure 7. Avenza MAPublisher Map Theme Setting Export

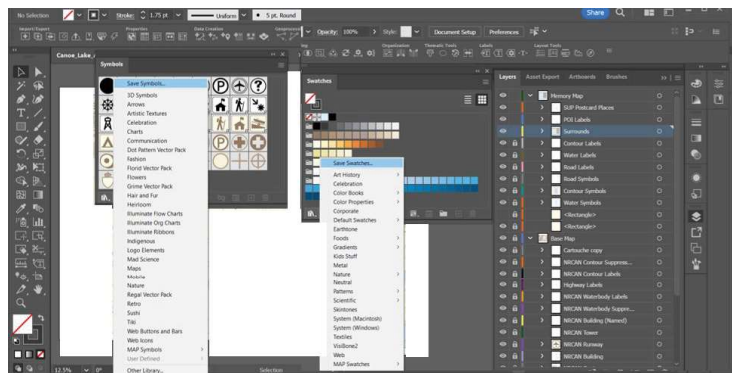


Figure 8. Avenza MAPublisher Customized Symbology Export

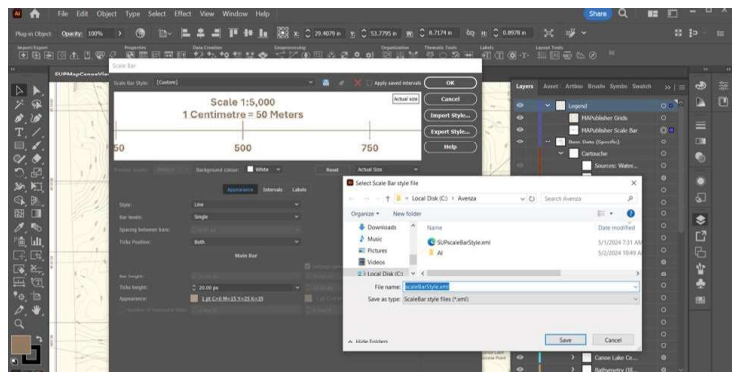


Figure 9. Avenza MAPublisher Scale Bar Setting Export

As the Sun began to set, I paddled on, to arrive at the Dock just before Sunset (Figure 10a). The next step is to export the *Map Layers* to a *KML format* (Figure 10b) to save the data collected with Avenza MAPS. The KML file can then be imported with Avenza MAP Publisher functionality into the Adobe Illustrator map document where I can access the data collection results.

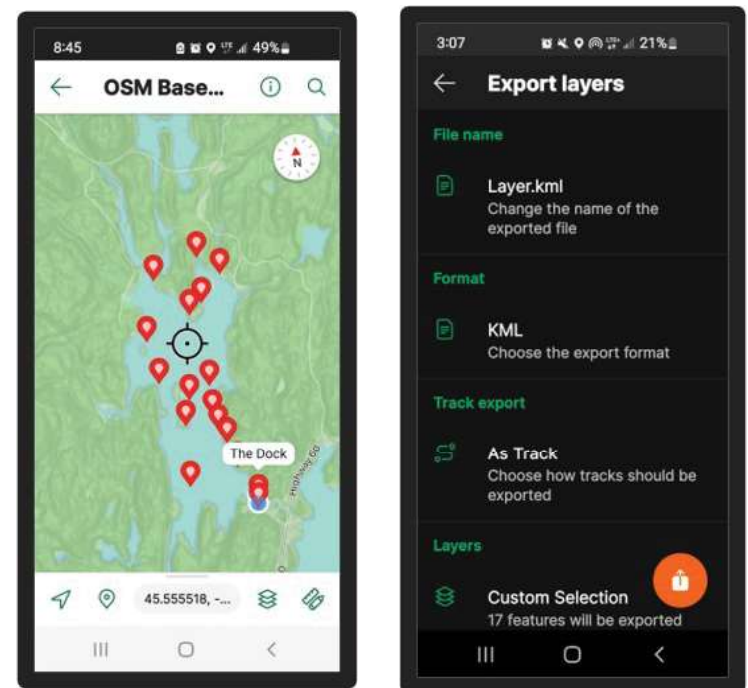


Figure 10a. Avenza MAPS Data Collection Results with OSM Base Maps (Left image) Figure 10b. Avenza MAPS KML Export functionality (Right image)

Finishing the Map

Once I imported the KML file to *Adobe Illustrator* using *Avenza MAPublisher* I am able to access the attribute table containing the description field, links to the photos and metadata (Figure 11). With this information I label the data collected in the field, my new points of interest,

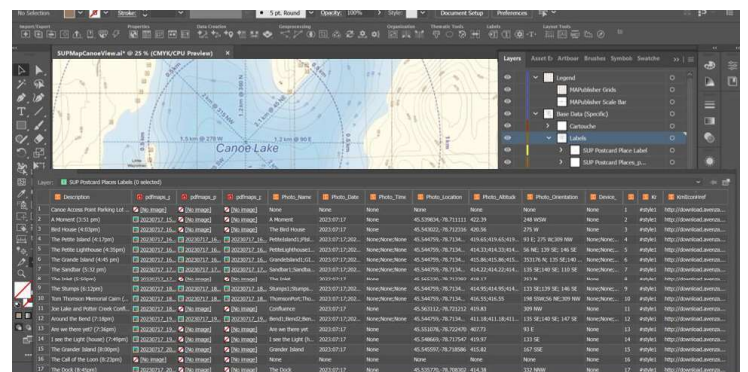
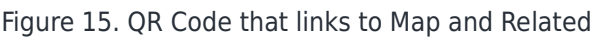


Figure 11. Screenshot of KML attribute table with links

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It challenged me to take a deeper dive into how I can apply software functionality to support a specific activity. It has also helped me create a blueprint for a map concept that can be delivered on multiple platforms to support a particular activity from a variety of perspectives. Investing time to create a customized map before heading out into the field leads to a safer, more enjoyable experience.

Figure 14. SUP Canoe Lake: Algonquin Provincial Park
Map designed for *Avenza MAPS Mobile App* with *Adobe Illustrator* and *Avenza MAPublisher* functionality



Once everything is complete, I export my map to a *GeoPDF* format (Figure 14) to be shared with others or utilized for a future SUP with *Avenza MAPS*.

All of the information integrated together in the map provided me with the opportunity to reflect on the entire experience, to learn more about the character of the areas that were either easier or more difficult to navigate, on the distance that I travelled and how long it took me to travel between each point, and then utilize this knowledge to plan for the future. My experience in the field prompted me to explore how map design can provide support with greater depth by taking into account the specific information needs of the activity.



**CCA 2024
Featured
Map**

THE ESSENTIAL GEOGRAPHY FROM SEA TO SKY

Jeff Clark
Principal, Clark Geomatics

ÁTL'KA7TSEM - Howe Sound, a UNESCO Biosphere Region, is recognized for its unique ecological and cultural significance, showcases the stunning natural beauty and complex geological features shaped by volcanic and glacial activity over millions of years.

Essential Geography

"The Essential Geography of the Sea To Sky," published in December 2024, was designed to express the geographic essence of the Sea To Sky landscape, situated in beautiful southwest British Columbia. The term "Sea To Sky" reflects a journey from the coastal waters of Howe Sound, Canada's southernmost fjord, to the mountain ranges of Whistler and Pemberton. The Sea to Sky area is also within the traditional territories of the Squamish and Lil'wat First Nations - since time immemorial.

The Sea to Sky Highway

Highway 99, also known as the Sea To Sky Highway in this area, is a world-class scenic route that heads north from Vancouver and hugs the coast of Howe Sound to Squamish, through the Municipality of Whistler and finally into the small town of Pemberton - for a total of 137 kilometres. By the time you get to Pemberton, you've transitioned through four distinct biogeoclimatic zones - from a coastal temperate rain forest with Douglas Fir and Hemlock trees to a much drier climate with Ponderosa Pine and Interior Douglas Fir.

A Climber's Heaven

Squamish stands as a hub for outdoor activities, dominated by the Stawamus Chief, North America's second largest granite monolith - a climber's heaven. Nearby, Shannon Falls offers a more accessible natural wonder, with water cascading 335 metres down a series of rocky ledges, making it a spectacular sight. The Tantalus Range, known for its sharp ridges and glaciated peaks, forms a strikingly jagged landscape that becomes even more dramatic in the early morning sun. Each peak tells a story of the geological forces that sculpted this landscape over millennia, creating a sea of mountainous terrain that is both daunting and beautiful.

A World Class Location

Whistler, located in British Columbia, Canada, is one of the most spectacular and renowned resort destinations

in the world. Known for its breathtaking landscapes and world-class recreational activities, Whistler offers a unique blend of adventure, culture, and natural beauty that attracts visitors from all over the globe.

A Hidden Gem

The Pemberton area in British Columbia is a hidden gem, renowned for its spectacular natural beauty and a range of outdoor activities. Nestled in a valley surrounded by towering mountain ranges and lush forests, Pemberton offers a scenic and tranquil escape from the bustling energy of nearby Whistler.

The town is situated in a stunning landscape that is characterized by rugged mountains such as Mount Currie, which looms majestically over the valley. The area is dotted with pristine lakes and rivers, offering breathtaking views and tranquil settings.

Designed with a Purpose

As with all my map designs, this map was designed to help build geographic literacy and cultural awareness for this beautiful area by providing clear, easy to read information over a visually appealing backdrop.

As the first general "essential geography" map for the Sea To Sky area, it breaks new ground and presents a weave of rivers, lakes, mountains, valleys, landmarks and manmade features that make up the stunning landscape we see today.

An Inspiration

This map is meant to inspire interest in the beauty of a vast landscape, advance peoples' awareness of the integrated environment that sustains them and give a better sense of place and history by including colonial and Indigenous place names to promote cross-cultural understanding.

"The Essential Geography of the Sea To Sky," (Figure 1) is a visually striking map that offers a wealth of information from up close or at a distance.

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Otherworldly Terrain

If you are geeking out on the beautiful shaded relief, we understand. I used an innovative combination of traditional analytical shaded relief blended with a 3D rendered elevation model to create a realistic, visually textured landscape. The addition of soft, late afternoon, directional illumination engages the viewer and gives the impression of third dimensional relief. Look closely at the bigger lakes and you'll see soft shadows cast over their surfaces.

Not just another pretty map!

This is a 'high-effort' map (and takes a long time)! The US National Park Service, known for its innovative map design, believes very strongly that to get park visitors to look at a map, first and foremost, it must be pretty to pique their interest and then it must hold their interest with relevant and accurate content. Clark Geomatics subscribes to that belief.

At first glance

The Sea To Sky map may look like maps often seen in an atlas; it includes names of towns, rivers, lakes and highways along with landmarks, mountain peak names, etc. So what makes it different? Attention to detail and intuitive design.

Every piece of information or symbol placed on this map was based on research with its placement tweaked to make the map easier to read and help the reader make sense of the complex geography.

The colour scheme, derived from satellite imagery, is based on Nature's palette and resembles colours you would see if you were viewing it from an airplane. This works because people can easily make sense of green valleys, blue lakes, gray rocks and blue-white glaciers.

Indigenous place names

The map recognizes a long Aboriginal presence in this area and now co-exists with other names that are part of our colonial history. These place names also serve to help us re-evaluate what we think we know about the area while challenging the colonial narrative.

There are many reasons to include Indigenous place names, but in the end, by doing so, cartographers can contribute to a more inclusive and truthful mapping practice that honours the diversity and richness of the world's cultural and historical landscapes.

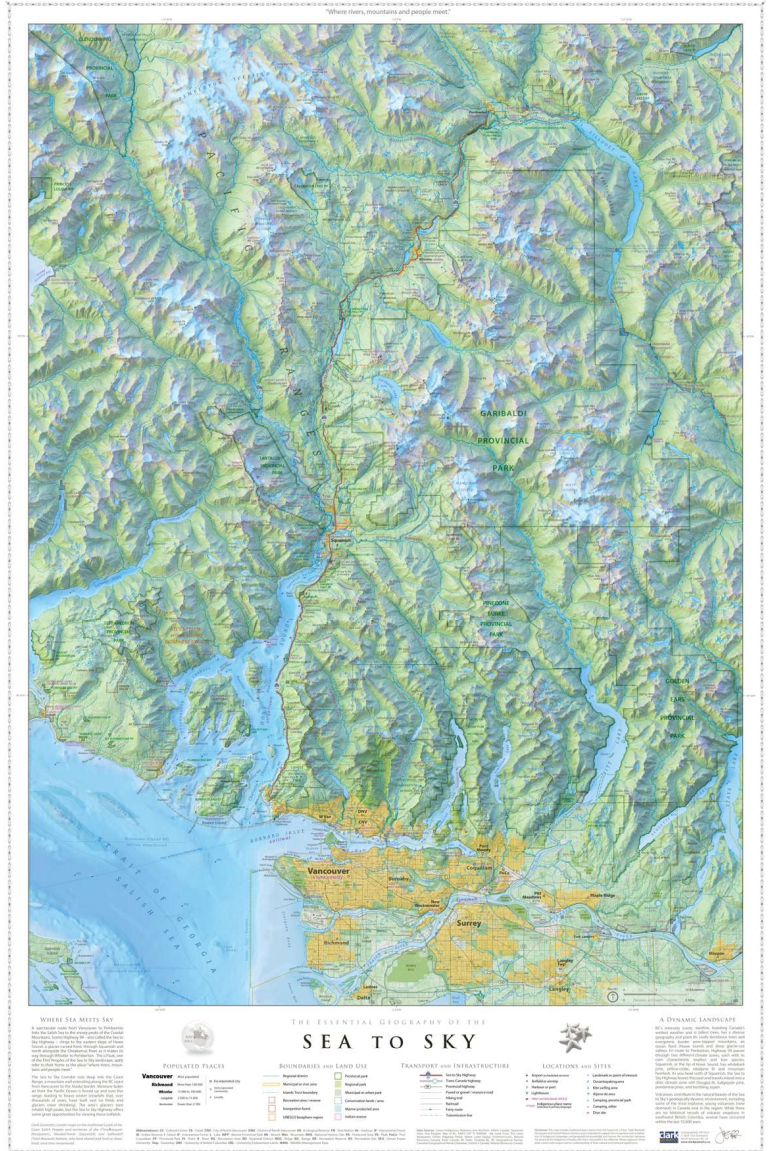


Figure 1 : "The Essential Geography of the Sea To Sky," published in December 2024 by Jeff Clark, Clark Geomatics

About Clark Geomatics. Jeff Clark, cartographer and a principal at Clark Geomatics, a small map design firm based in North Vancouver, British Columbia, is the driving force behind its award-winning maps. With a simple goal to design and publish the best maps possible, Jeff uses a combination of state-of-the-art satellite image processing methods, geographic data analysis and cartographic techniques - and a dash of "black art" - to achieve this goal and produce trendsetting maps.

Clark Geomatics
North Vancouver, BC, Canada
<https://www.clarkgeomatics.ca>





**Featured
Freelance
Cartographer**

A YEAR OF MAPS

Julie Witmer Custom Map Design

Julie Witmer

As a self-employed cartographer with my own business since 2013, I am able to choose the projects that I work on and I have the opportunity to make maps every day!

In 2024, I worked on 41 distinct projects for 31 clients. Approximately 40% of my clients were authors or publishers, the rest were a mix of municipalities, tourism associations and businesses, non-profits, other small businesses, etc.

Most of the book and tourism brochure projects that I worked on were multi-map projects, so in 2024 I designed 70 maps!

In this feature I share examples of my work:

- Property Maps for Businesses (see Figures 1-2)
- Wayfinding Maps (see Figures 3-4)
- Tourism Brochures (see Figures 5-6)
- Book Maps (see Figures 7-9)

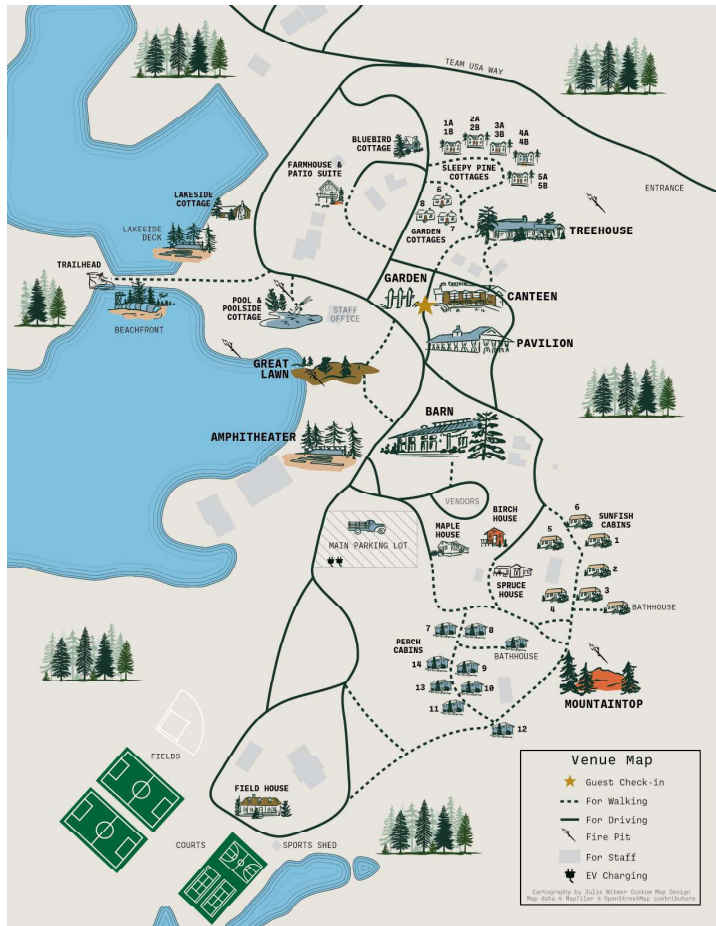


Figure 1 : Cedar Lakes Estates (example of a property map I designed for a business)

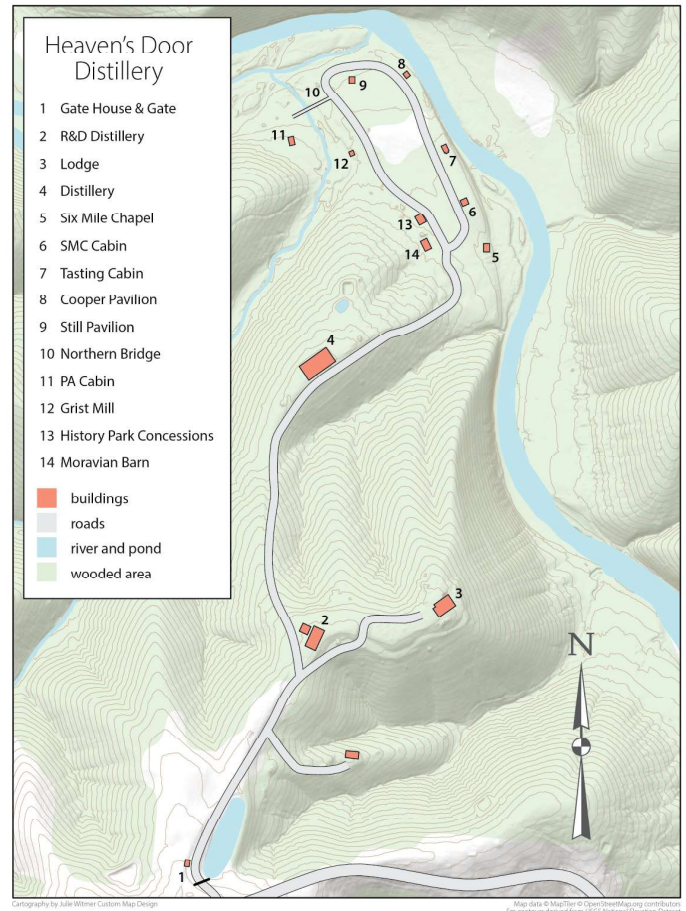


Figure 2 : Heaven's Door Distillery (example of a property map I designed for a business)

continued on page 32

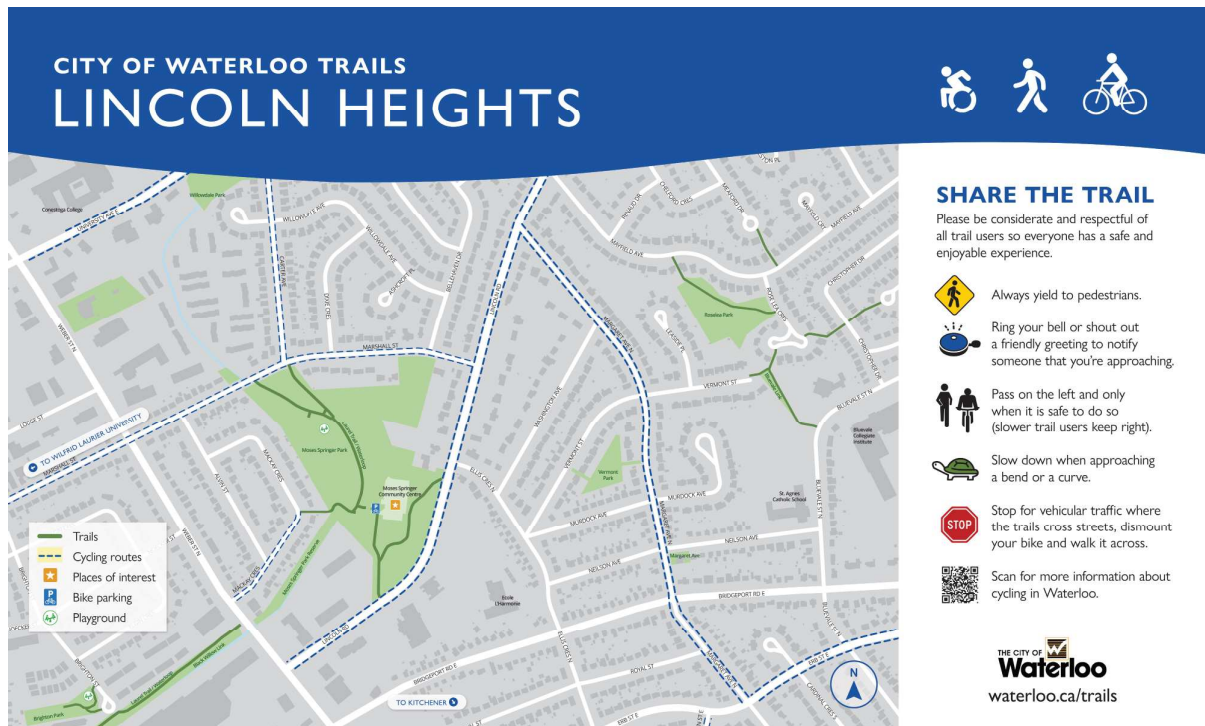


Figure 3 : City of Waterloo Trails (example of wayfinding map I designed for a municipality)

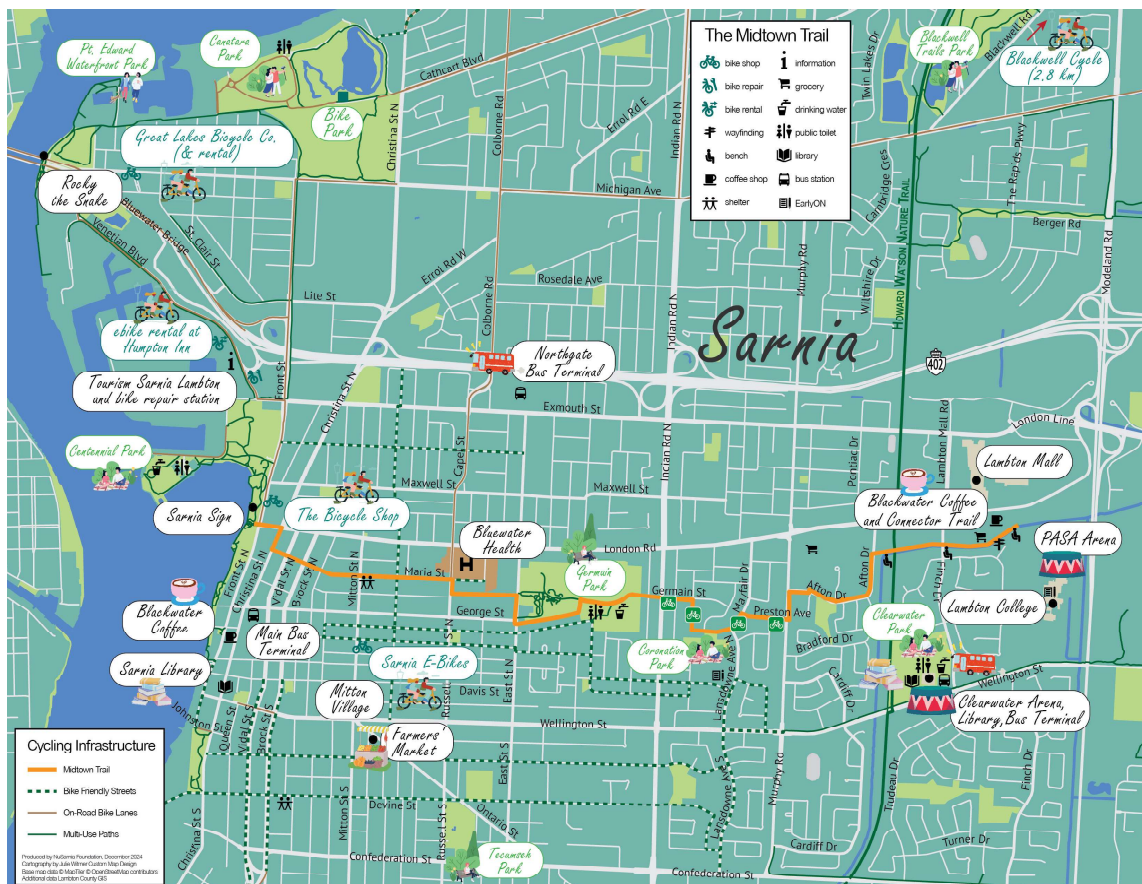
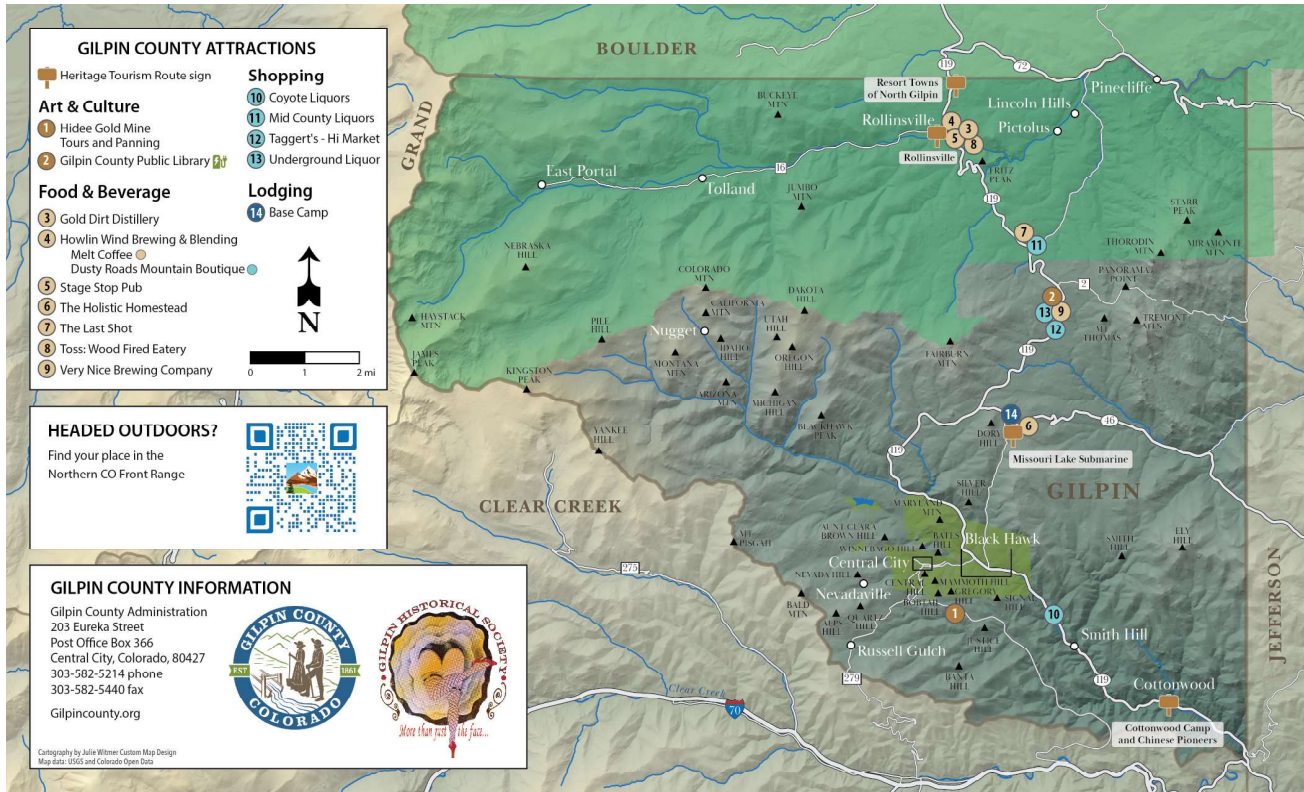


Figure 4 : nuSarnia Foundation (example of wayfinding map I designed for a non-profit)

continued on page 33



(Top image: Brochure inside and Bottom image: Brochure outside)

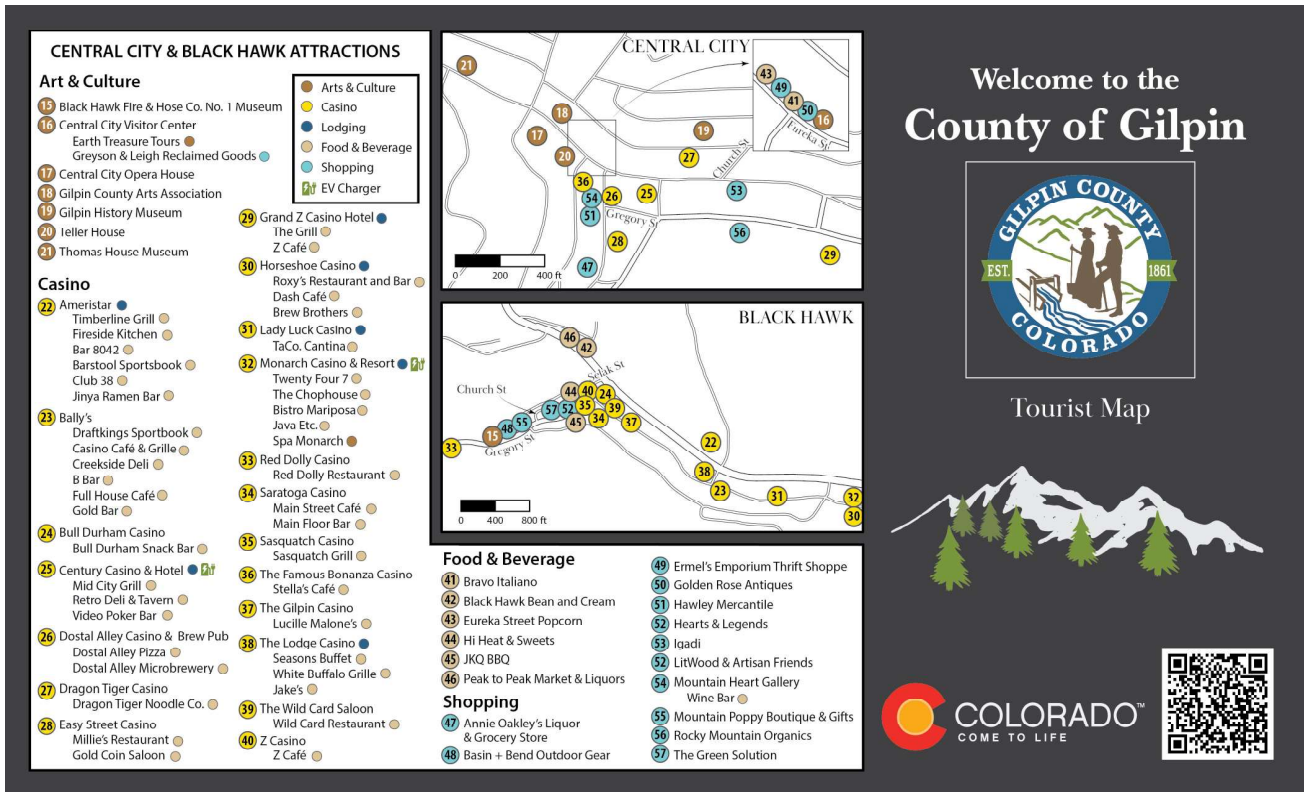


Figure 5 : Gilpin County, Colorado Tourism Brochure (example of tourism brochure I designed)

continued on page 34



(Top image: Map front and Bottom image: Map back)



Figure 6 : Plano Texas Tourism Map (example of tourism map I designed for a municipality)



Figure 7 : Radius Book Group published an English translation of an Italian novel from the 18th century: (examples of maps I designed for a book)

continued on page 36

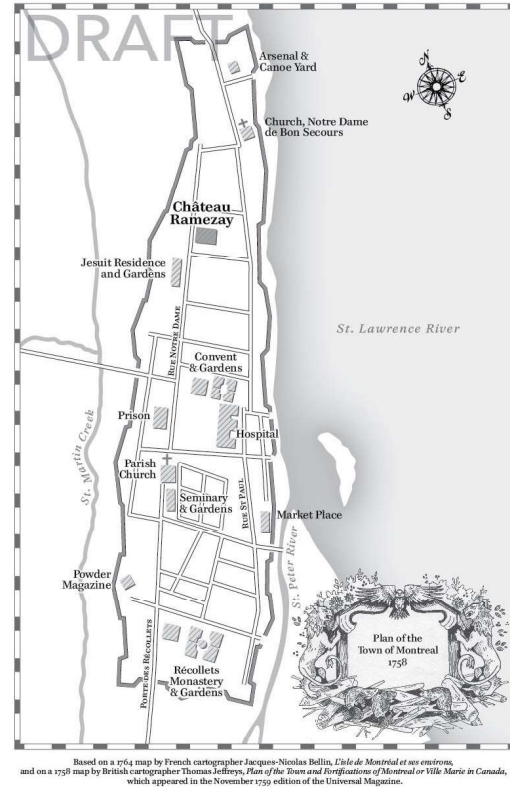
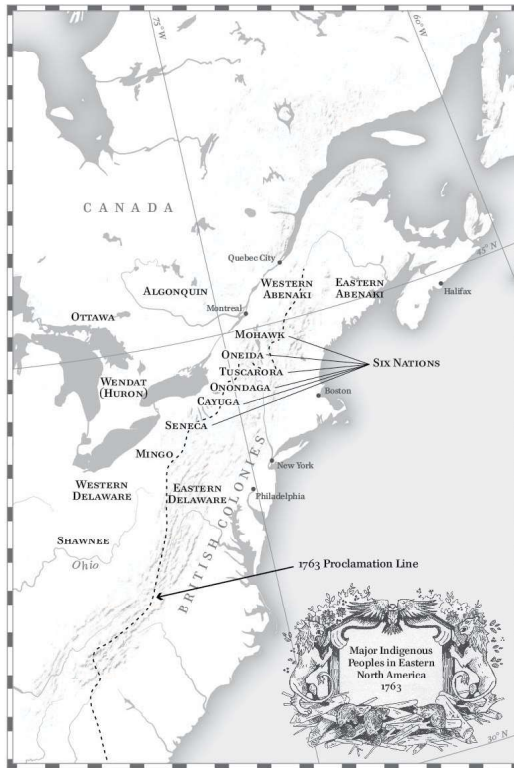


Figure 8 : Dundurn Press book about Benjamin Franklin by author Madelaine Drohan
(examples of maps I designed for a book)

Murphy Scott wrote a book of poetry and short stories set in south Los Angeles County and the map in figure 9 is half of the map that I created to render some of the locations mentioned in the book.

I am starting 2025 with a new 8-map project for a New York City tour guide and a tourist map of Whitby, a map for a children's camp, finishing up a tourist brochure for Bristol, RI, three book map projects started last year; and two projects for First Nations communities in Ontario.

You can view more examples maps at the Julie Witmer Custom Maps Design website at the following link:

<https://witmaps.ca/portfolio/>

If you want someone to help you get the best map for your needs, you can talk to me.

<https://witmaps.ca/>
1-226-666-4735
hello@witmaps.ca



Figure 9 : Partial Map from a book of poetry written by Murphy Scott



President's Prize Map Competition and Best Student Paper

The CCA President's Prize recognizes excellence in student map design and is open to all students at Canadian post-secondary institutions who have completed and produced a cartographic thematic map during the preceding school year.

2024 President's Prize (College or CEGEP)

Awarded to: Megan O'Brien

The 2024 college-level / CEGEP award was presented to Megan O'Brien, Centre of Geographic Sciences (COGS) [Map Title: "Urban Mobility in Greater London, England"] (see Figure 1).

You can view a higher resolution image at this link
<https://cca-acc.org/about-us/awards-prizes-and-scholarships/presidents-prize>

2024 Canadian Cartographic Association Best Student Paper / Presentation

Awarded to: Allison Oki

Allison Oki, University of Toronto, "The Scarborough Greenway: Building an Outstanding Off-road Trail Network"

The presentation summary associated with this award includes map examples and excerpts. It is included on pages 14-15 of this newsletter.

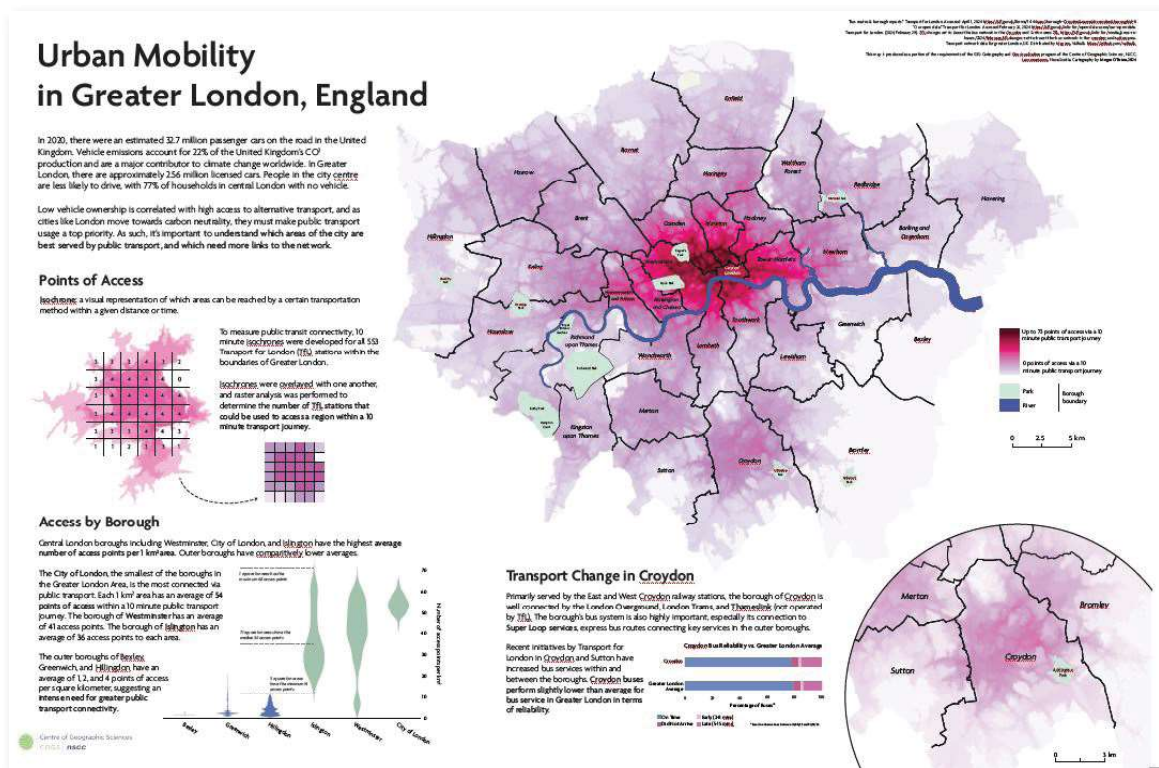


Figure 1 : “Urban Mobility in Greater London, England” Map by Megan O’Brien

CARTOGRAPHICA

Heather McGrath

General Call for Papers

Cartographica invites submissions for upcoming issues

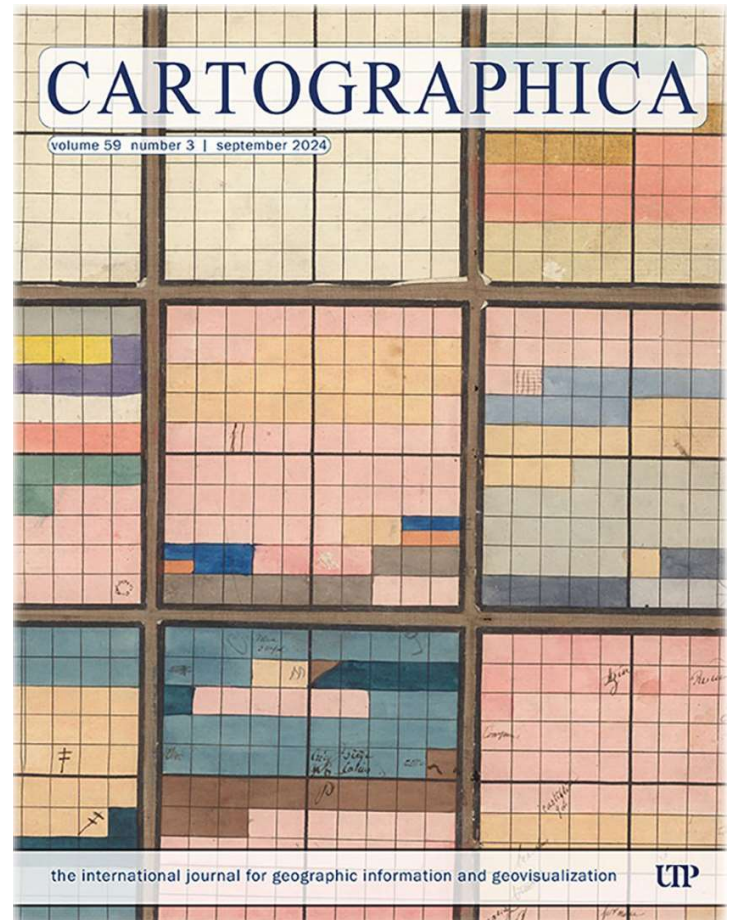
Cartographica is an international journal for geographic information and geovisualization. It is an interdisciplinary peer-reviewed journal that publishes transformative research, education, and practice contributions to the social, political, technological, and historical aspects of cartography.

An official publication of the Canadian Cartographic Association, Cartographica provides a forum for the exchange of original perspectives and innovative findings in the production, design, use, cognitive understanding, and novel applications of maps in arts, cartography, computer science, economy, engineering, geography, history, medicine, health, and surveying.

The digital version is available to CCA members at <https://utppublishing.com/journal/cart>.

The editorial team welcomes submissions of articles describing original research contributions in all aspects of cartography. The papers will be peer reviewed. Submissions are accepted on an ongoing basis.

Please submit manuscripts through the [online submission and peer review management system](https://mc04.manuscriptcentral.com/cart) at <https://mc04.manuscriptcentral.com/cart>.



For more information, read the Cartographica Submission guidelines at <https://utppublishing.com/journals/cart/guidelines-for-authors>

GoGeomatics EXPO 2024 SUMMARY



Canada's National GoGeomatics Expo 2024, October 28-30

Roger Wheate

For the second year, this event was held at *The Big Four Roadhouse, BMO Centre* in Calgary, Alberta. The display floor housed approximately 25 commercial, government and educational display vendors, three huge RCGS floor maps plus the Canada Maps & Poster Gallery organized by Ted MacKinnon.

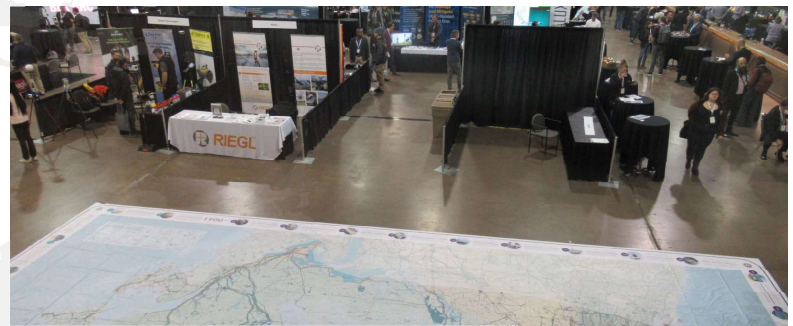
GoGeomatics is the brainchild of Jonathan Murphy, CEO, President, and Founder. He is also the founder and chair of *Geolgnite*, Canada's national geospatial leadership conference. The Expo (and *Geolgnite*) have helped fill the vacant niche of a national geomatics conference in Canada.

Program sessions covered the gamut of geomatics technologies involving data gathering, processing, analysis and display with 70+ presentations within a series of 8 themes covering 1/2 day and 1 day programs, plus 2 full days for building information modeling (BIM) and geospatial technologies. Each program incorporated a keynote talk either at the start or to conclusion. RPAS, BIM, AI and Digital Twins

were strongly represented, as perhaps a central focus of the gathering. Presenters and audience came from a balance of corporate, government, institutional and education, as well as interested individuals.

The 8 themes were: Annual BIM summit, Geomatics for the Public Good, Geospatial AI, Hydrospace for Water Resilience, Reality Capture & Digital Twins, Remotely Piloted Aircraft Systems (RPAS), Subsurface Utility Engineering Advances and Earth Observation. There was also an innovative session of 'Fast Pitches' where speakers were invited to deliver their ideas, products or projects in 3 minutes with an additional 2 minutes for questions. A welcome feature which helped reduce registration costs was a long western style buffet near the displays that provided access to food and beverages throughout the conference, at the attendees' expense.

I'm looking forward to this event next year in the same location in Calgary, November 3-5, 2025
<https://gogeomaticsexpo.com>



Above Images: Map and Poster Gallery at Canada's National GoGeomatics Expo 2024 in Calgary, Alberta

Submit your Map or Poster to the Geolgnite 2025 Gallery in Ottawa

Geolgnite is hosting a *Map and Poster Gallery*, in Ottawa, in May 2025, and we are inviting submissions from across Canada! The initiative is in partnership with the Canadian Cartographic Association (CCA). Submissions are welcome from individuals, organizations, educational institutions, departments, and private companies. The submissions will be showcased at *Geolgnite 2025* in Ottawa, and the best will be featured at the *GoGeomatics Expo* in Calgary in November 2025. Please refer to the following link for more information:
<https://gogeomatics.ca/your-map-our-stage-submit-to-the-geolgnite-2025-gallery-in-ottawa/>

Submission Deadline: Send your maps and posters by May 7, 2025 to the following address:
C/O Jonathan Murphy, GoGeomatics Canada, PO BOX #421 – 207 Bank Street, Ottawa, Ontario K2P 2N2, Canada

ANNUAL CONFERENCE SUMMARY

NORTH AMERICAN CARTOGRAPHIC INFORMATION SOCIETY

nacis

NACIS 2024, October 16-19

Roger Wheate

The North American Cartographic Information Society held its annual meeting in Tacoma, WA, October 16-19.

This is always a lively well-attended event with ~450 members present, including a smattering of Canadians mostly from nearby lands. The first day is designated as Practical Cartography, featuring short ~15 minute talks on a wide range of software tips and tricks.

The map gallery exhibit had almost 100 topographic and thematic examples by cartographers and students.

The day ended with an evening keynote by geologist Nick Zentner, including dramatic animation of the post-glacial Missoula floods. His many videos in the PBS TV series "Nick on the Rocks" are online at: <https://www.youtube.com/@GeologyNick>

The next two days contained three concurrent sessions, four sessions per day with up to six talks in each session. It was especially pleasant to see Daniel Cole's summary talk of his four decades mapping

and GIS at the Smithsonian Institute and to join in his retirement dinner. Dan did a great service for the CCA when he stepped in as President in 2009.

Talks cover the broad gamut of cartographic applications from historical cartography to future visualisations. Each room was mostly full or sometimes overflowed. The organisers admit they may be the victims of their own success and might have to limit numbers in future.

Not many hotels have sufficient meeting space which is why it was back in Tacoma again only five years on from 2019. But it is a great location for western Canadians easily reached from the Seattle-Tacoma airport.

The meeting tends to rotate between east, midwest and west locations - NACIS2025 will be in Louisville, Kentucky.

Program details for NACIS2024 can be viewed at <https://nacis2024.sched.com>



NACIS 2024 Group Photo

REPORT FROM THE CCA DELEGATE TO THE INTERNATIONAL CARTOGRAPHIC ASSOCIATION (ICA)



Dear CCA Members

Julia Siemer

The International Cartographic Conference (ICC 2025) will be hosted in Vancouver, B.C. this Summer. As the coordinator of the Canadian submissions to the International Map Exhibition and Competition, I invite you to submit the best map products you or your organization have created since August 2023 (the last ICC in Cape Town, South Africa).

The organizers of ICC 2025 have decided to hold the International Map Exhibition entirely as an in-person display of maps and other cartographic products. A true map lover's dream! Digital products can also be part of the exhibition but must be displayed as posters, including a QR code to allow conference attendees access to the product on their individual devices.

The categories eligible for submission of cartographic products are the following:

1. Maps – digital and non-digital
2. Charts – digital and non-digital, including navigational accessories
3. Atlases – digital and non-digital
4. Educational cartographic products – digital and non-digital
5. Physical cartographic products – tactile maps, globes, 3D reliefs, etc.
6. Digital cartographic products and services – online (web-based) digital products and services, geoportals, etc.

To be considered for Canada's submission your work must be submitted by April 1, 2025.

Please contact me by email about submission details at julia.siemer@uregina.ca

Did you know that the ICA hands out two awards for cartographic products in the exhibition at the conference? A jury of the ICA will award a prize for the best submission in each category (excluding category 6), and a second award will be based on the vote of conference attendees.

Let's celebrate Canada's cartography with many submissions to the International Map Exhibition on home turf. For more information, please contact me directly or check out the conference website at <https://www.icc2025.com>



Happy Mapping,

Julia

*Coordinator of the National Map Exhibition
University of Regina
Dept of Geography & Environmental Studies
julia.siemer@uregina.ca
<https://www.icc2025.com>*

Newsletter of the/Bulletin de Canadian Cartographic Association/l'Association canadienne de cartographie

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Interest Group Chairs/ Présidents des groupes d'intérêt

History of Cartography/ Histoire de la cartographie

Byron Moldofsky

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