Greenspace Securement & Management Plan - GSMP

Project Introduction & Commenting Application

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Context

Toronto and Region Conservation Authority (TRCA) is a major landowner in the Toronto Region as land is a foundational piece of TRCA's work. TRCA has 16,201 hectares of greenspace secured throughout its watershed communities as of December 31, 2019, representing 6.5% of the total land area in TRCA's jurisdiction. Continued securement is needed to be able to deliver TRCA programs and services.

The Greenspace Securement & Management Plan (GSMP) is an aspect of the overall Greenspace Acquisition Project (GAP). The purpose is to identify lands for securement through a systematic approach, provide transparent rationale as to why properties are to be acquired, and identify how those lands will be managed in support of TRCA programs and services.

A new initiative for the GAP 2021-2030 is to identify properties through a criteria-based analysis, and then further refine those results with site-level input from staff. This in-turn will be presented to SLT as high-priority securement targets.

The GSMP was initially approved at Board of Directors Meeting #3/20, and a full report was received at Board of Directors #02/21.

The analysis involved assessing all 1,015,267 land ownership parcels within the jurisdiction based on a set of 24 criteria. The analysis was a simple presence/absence of that criteria within the ownership parcel. This way the total number of criteria in each parcel could be tallied and a ranking system devised to identify parcels for securement.

See next slides for the list of criteria.

GSMP Input Criteria

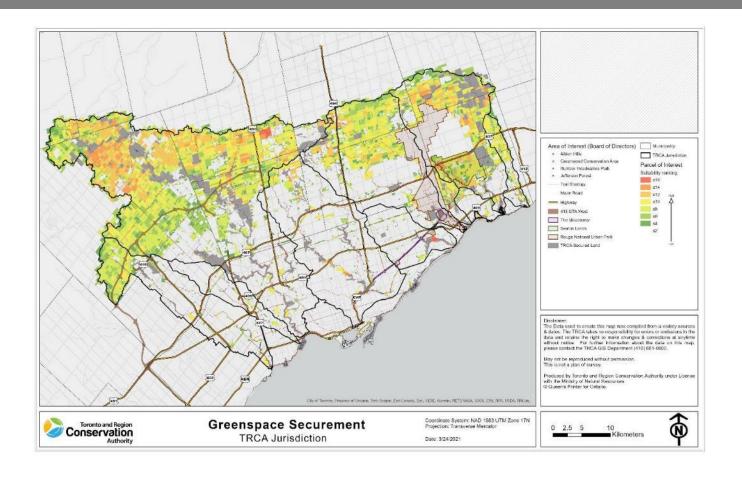
- 1. Flood control, flood vulnerable, erosion control and reservoir project lands, and associated access lands;
- 2. Valley and stream corridors;
- 3. Lake Ontario waterfront;
- 4. Environmentally Significant Areas;
- 5. Life Science Areas of Natural and Scientific Interest;
- 6. Wetlands;
- 7. Kettle lake or wetland features;
- 8. Highly Vulnerable Aquifers;

GSMP Input Criteria – continued

- 9. Carolinian forest;
- 10. Important woodland/vegetation/habitat linkages;
- 11. Interior forest areas, and/or lands which contribute to the expansion of interior forest habitats;
- 12. Riparian habitat zones;
- 13. Habitat for aquatic and terrestrial species of concern and sensitive species, including those listed under the Species at Risk Act and the Endangered Species Act;
- 14. Lands identified for the target system in TRCA's watershed plans and Terrestrial Natural Heritage System Strategy and municipal natural heritage systems;
- 15. Significant Groundwater Recharge Areas;
- 16. Landform Conservation Areas Categories 1 and 2 on the Oak Ridges Moraine;

GSMP Input Criteria - continued

- 17. Lands identified in the Niagara Escarpment Plan, especially Escarpment Natural Areas and Escarpment Protection Areas;
- 18. Lands that provide terrestrial and aquatic habitat restoration opportunities, including lands identified as priority for ecosystem restoration;
- 19. Links for a regional trail system;
- 20. Links to greenspace systems in neighbouring conservation authorities;
- 21. Lands that are identified by TRCA in cooperation with its member municipalities and/or the Province of Ontario as being complementary to the TRCA greenspace system;
- 22. Lands that provide access to lands secured by TRCA;
- 23. Lands that provide a buffer from surrounding land uses to the aforementioned areas; and
- 24. Lands to be used in support of conservation efforts.



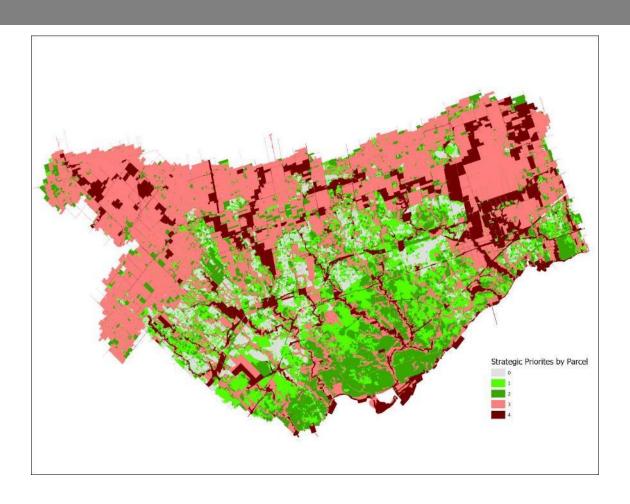
Once the analysis was complete the parcels were ranked on how many criteria were contained within and a heat map created to show spatial distributions.

While the result of the analysis provided excellent qualitative results on the presence or absence of features, the heat map of target parcels that this generated was largely concentrated on the periphery of TRCA's jurisdiction. In addition, ranking parcels on a simple low/medium/high based on the 24 criteria proved problematic.

The solution was to divide the 24 criteria into a smaller number, and for that purpose the following four <u>TRCA Strategic Priorities</u> were used.

Four Strategic Priorities

Green the Toronto region's economy	Manage our regional water resources for current and future generations	Rethink greenspace to maximize its value	Create complete communities that integrate nature and the built environment
14. Lands identified for the target system in TRCA's watershed plans and Terrestrial Natural Heritage System Strategy and municipal natural heritage systems;	Flood control, flood vulnerable, erosion control and reservoir project lands, and associated access lands;	21. Lands that are identified by TRCA in cooperation with its member municipalities and/or the Province of Ontario as being complementary to the TRCA greenspace system;	19. Links for a regional trail system;
Life Science Areas of Natural and Scientific Interest;	15. Significant Groundwater Recharge Areas;	18. Lands that provide terrestrial and aquatic habitat restoration opportunities, including lands identified as priority for ecosystem restoration;	22. Lands that provide access to lands secured by TRCA;
Environmentally Significant Areas;	6. Wetlands;	17. Lands identified in the Niagara Escarpment Plan, especially Escarpment Natural Areas and Escarpment Protection Areas,	23. Lands that provide a buffer from surrounding land uses to the aforementioned areas; and
	3. Lake Ontario waterfront;	16. Landform Conservation Areas Categories 1 and 2 on the Oak Ridges Moraine;	24. Lands to be used in support of conservation efforts.
	Valley and stream corridors;	13. Habitat for aquatic and terrestrial species of concern and sensitive species, including those listed under the Species at Risk Act and the Endangered Species Act;	20. Links to greenspace systems in neighbouring conservation authorities;
	7. Kettle lake or wetland features;	9. Carolinian forest;	
	Highly Vulnerable Aquifers;	12. Riparian habitat zones;	
		11. Interior forest areas, and/or lands which contribute to the expansion of interior forest habitats;	
		10. Important woodland/vegetation/habitat linkages;	



Instead of a ranking out of 24, each parcel now has a ranking out of four. This created a much simpler solution and resulted in approximately 1200 parcels out of 1,010,000 that have all four criteria present and are not publicly-owned.

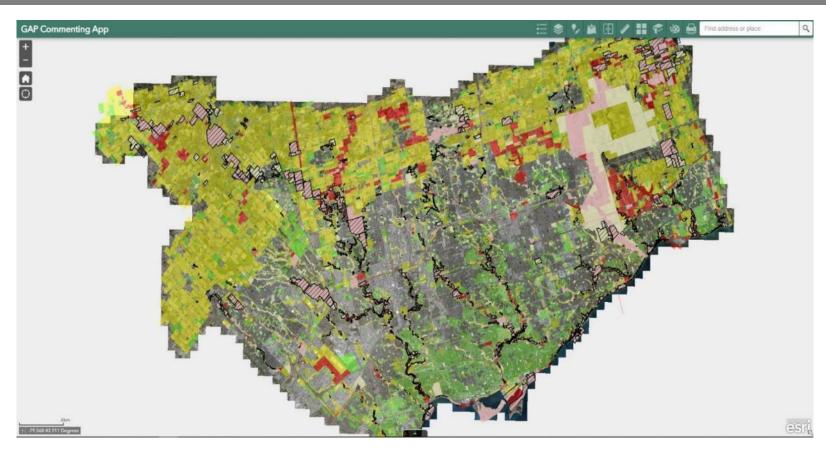
While this refinement greatly reduced the number of targets for securement and is a solid evidence-based analysis, it is still missing site-level detail and information. Which is where staff input comes in.

GSMP Commenting Application

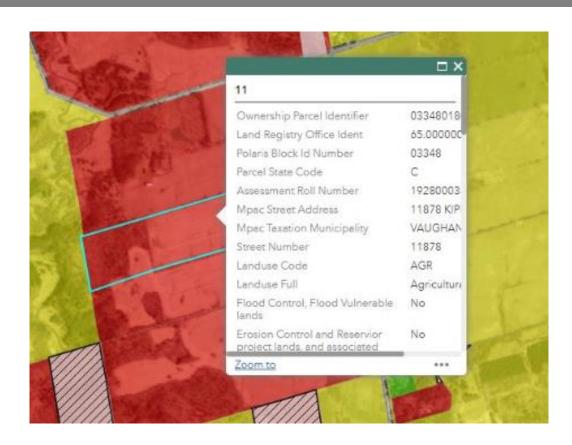
The commenting application uses the same template as the TRCA viewers, with an additional tool that allows users to add points to the map and then add information to a form that is linked to those points.

The number of ownership parcels is also not the full 1,010,000; only parcels with two or more Strategic Plan criteria present are visible. There also is a separate layer for land already in the public ownership (transparent grey) overlaying the parcels, and TRCA ownership is shown in black hatching. In this way you can see which parcels are already secure.

GSMP Commenting Application



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Each parcel has all the attributes available which led to it's ranking. Simply click on a parcel, and the pop-up displays this information.

The number at the top of the pop-up (11 in this instance) is the total number of original criteria out of 24 met.

Conclusion

The next step will be to create an acquisition strategy utilizing the GSMP application. The acquisition strategy will be guided by an analysis of the following:

- 1. Development Process Acquisitions
- Tax donation & Federal Ecological Gifts Program
 Maximizing TRCA value of existing assets
- 4. Joint acquisition with member municipalities and other levels of government
- 5. Open Market Acquisitions
- 6. Leverage TRCA's ability to server parcels
- 7. Leases, agreements, restrictive covenants and conservation easements 8. Provincial/Federal Grants
- 9. Provincial (Section 39) Fund

The GSMP is currently being used as preliminary screening tool for all potential planning acquisitions, as it quickly identifies all features and how attractive a particular parcel is for acquisition. The GSMP application will continue to be used as a tool in TRCA's Property Department and assist in the evolution of TRCA's acquisition strategy.