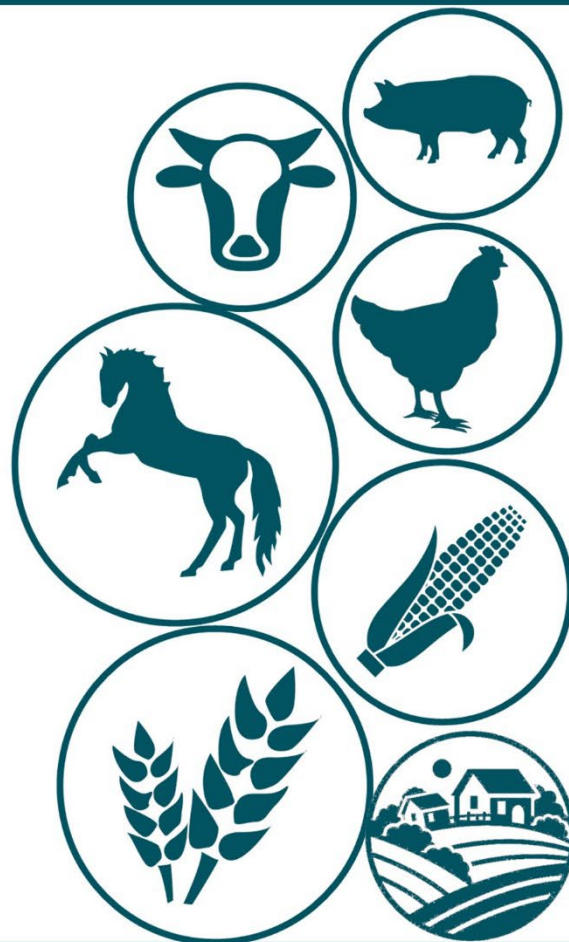




# THE UNITED COUNTIES OF LEEDS and GRENVILLE

AGRICULTURAL AREA REVIEW - DRAFT LAND EVALUATION  
AND AREA REVIEW (LEAR) REPORT FOR CONSULTATION



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## Purpose of the Report

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The purpose of this report is to describe the methodology used for the Land Evaluation and Area Review (LEAR) study for the United Counties of Leeds and Grenville (the Counties) under the project title of Agricultural Area Review (AAR). The results of the LEAR are intended to help guide the Counties in designating prime agricultural areas through an Official Plan Amendment. The project is in response to a provincial Official Plan directive to complete a LEAR or modified LEAR process to identify and assess prime agricultural lands as defined in provincial policy, in the United Counties of Leeds and Grenville.

This report has been written to support the finalization of the draft LEAR mapping through consultation with stakeholders. The intent is to ensure stakeholders are well informed about the technical process used to generate the draft LEAR map before the consultation to ground truth the map begins. This consultation may result in refinements to the prime agricultural lands identified through the technical process, based on local area knowledge and experience. To ensure consistency with the established LEAR methodology it is important for the stakeholders to understand the methodology. Further refinements will take place to remove isolated lands and make “rounding” adjustments to better reflect property boundaries where possible.

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## Project Background

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On July 29, 2022, the Counties released a Request for Proposals for the preparation of the United Counties of Leeds and Grenville Agricultural Area Review, based on a modified Land Evaluation and Area Review (LEAR) approach. In 2015, the Counties adopted its first Official Plan, approved by the Ministry of Municipal Affairs and Housing in 2016. Due to a compressed timeline for the Official Plan preparation, it was not possible to review the status of the lands included in the Agricultural Area designation. As a result, the Agricultural Area designation consists primarily of the agricultural areas as designated in the local municipal Official Plans that were in place in 2015. At that time, it was known/suspected that the agricultural land

mapping was not comprehensive and that some agricultural areas were missing. Many of these local official plans and their mapping were developed under previous provincial policies and varying definitions of prime agricultural lands.

The Ministry of Municipal Affairs and Housing recognized this issue by modifying the Counties Official Plan to add policy 3.2.3 (a), which states: “The Counties, in consultation with the local municipalities and the Province, will undertake a comprehensive Land Evaluation and Area Review (LEAR) or equivalent study to assist in identifying and designating prime agricultural areas in the Counties prior to the next review of this Plan under Section 26 of the Planning Act.”

A LEAR methodology tailored to the Counties, to identify any additional candidate Agricultural Area lands and to confirm the existing Agricultural Area boundaries, has been developed to address this provincial requirement.

For the purpose of this study, the 2018 Agricultural System Mapping Method Technical Document from the Ontario Ministry of Agriculture, Food and Rural Affairs (OMAFRA) has been used as the LEAR methodology and adjusted to the specific needs of the Counties, as appropriate and as detailed in this report. Extensive consultation with Counties staff, OMAFRA staff, local municipal staff and Councils, the Agricultural Advisory Group (formed for this project) and specific outreach to the agricultural community through meetings with the Leeds Federations of Agriculture and the Grenville Federation of Agriculture have further informed this draft LEAR mapping product.

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## Study Area

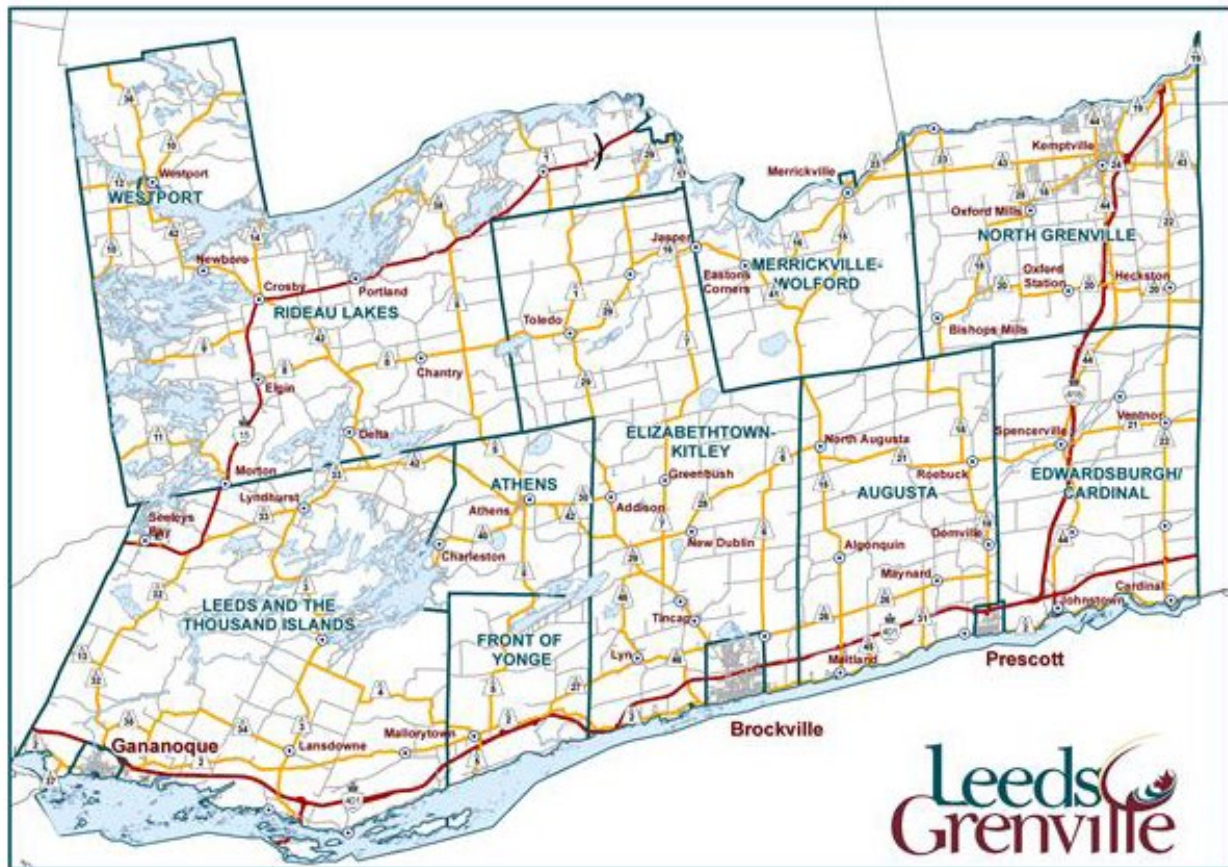
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The study is being undertaken for the full geographic boundaries of the United Counties of Leeds and Grenville. The Counties is comprised of 10 local area municipalities as shown on **Figure 1**.

Not all of the geographic lands in the United Counties of Leeds & Grenville are suitable for inclusion in the agricultural system. The following areas were excluded from the agricultural land base:

- Settlement Areas
- Lands designated for Non-Agricultural Uses
- Large Water Bodies
- Ontario Provincial Parks
- National Parks

Figure 1: County Map



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## Land Evaluation and Area Review (LEAR) Process

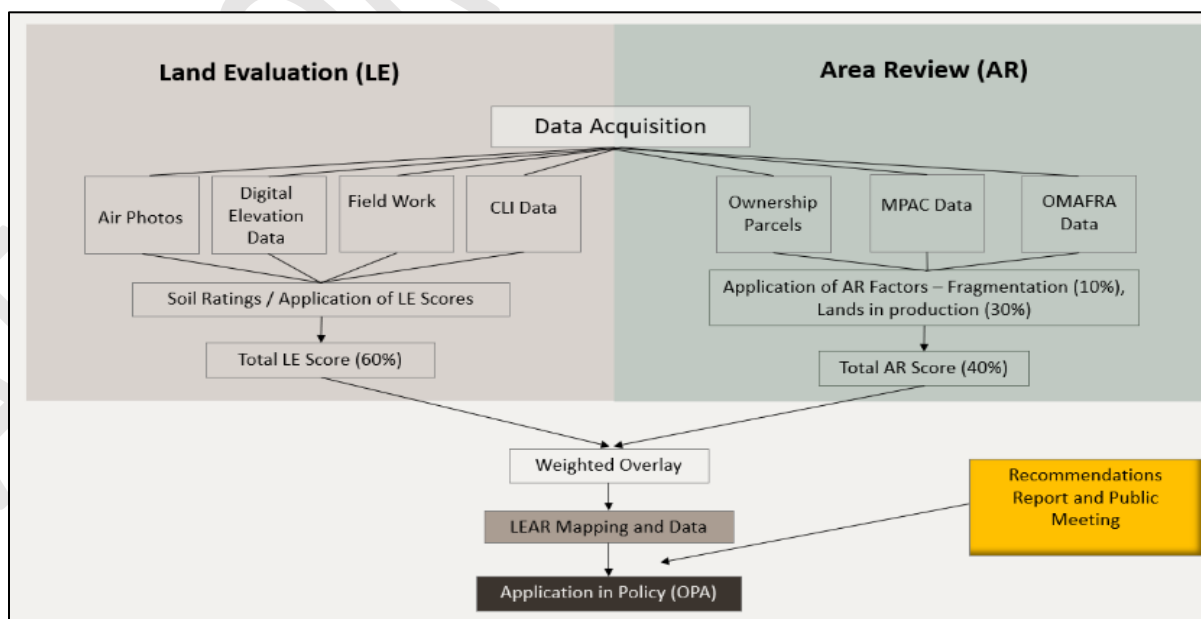
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The Provincial Policy Statement (PPS) requires municipalities to protect prime agricultural areas. The PPS defines prime agricultural areas as areas where prime agricultural lands, being Class 1 to 3 lands according to the Canada Land Inventory for Agriculture predominate, or an area identified through an alternative evaluation system approved by the Province. That system is referred to as a Land Evaluation and Area Review (LEAR) study.

The LEAR system was developed by the Province and the methodology requires factors to be selected and weighted to reflect local circumstances. The LEAR system is comprised of Land Evaluation (LE) factors and Area Review (AR) Factors. The LE factors apply to physical components such as soil quality, while the AR factors apply to socio-economic considerations such as fragmentation and recognition of surrounding lands in agricultural production. The inclusion of socio-economic factors allows for more than just the soil capability to be evaluated, as would be done if the prime agricultural areas were simply defined as areas where class 1 to 3 lands predominate.

**Figure 2** below illustrates the key study process steps for conducting a LEAR.

**Figure 2: LEAR Process Steps**





## Selecting an Evaluation Unit Size

The establishment of the Evaluation Unit is an important consideration, as it forms the basis for the data collection and is the geographic unit in which LEAR scores are applied.

In the OMAFRA 2018 Agricultural System Mapping Method, “the method of using a grid of consistently sized evaluation units” was selected as the best option because the grid method is both rigorous and adaptable to a wide variety of geographic contexts and survey patterns. The grid method increased the ability of scores to reflect complex landscape features”<sup>1</sup>.

The use of parcel fabrics would be ideal as the information available is quite detailed. However, this approach is costly, could present privacy issues and detracts from looking more broadly at agricultural land use. As a result, 100-acre polygons are more appropriately used, and have been used in this study as the standard unit of evaluation. **Figure 3** illustrates the identification of the evaluation units as well as the evaluation areas established by imposing a 750-metre boundary around the evaluation unit. The purpose of establishing evaluation areas that is further explained in the sections regarding Area Review (AR) factors in this report.

A Geographic Information System (GIS) program was used to overlay 100-acre polygons over the entirety of the geographic area of Leeds and Grenville. Sections of the grid were removed for areas excluded from the study as noted previously. The evaluation unit grid minus the excluded areas was defined as the area within which the LEAR was completed.

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<sup>1</sup> Agricultural System Mapping Method, Ontario Ministry of Agriculture, Food and Rural Affairs – Technical Document – January 2018 Pg. 7

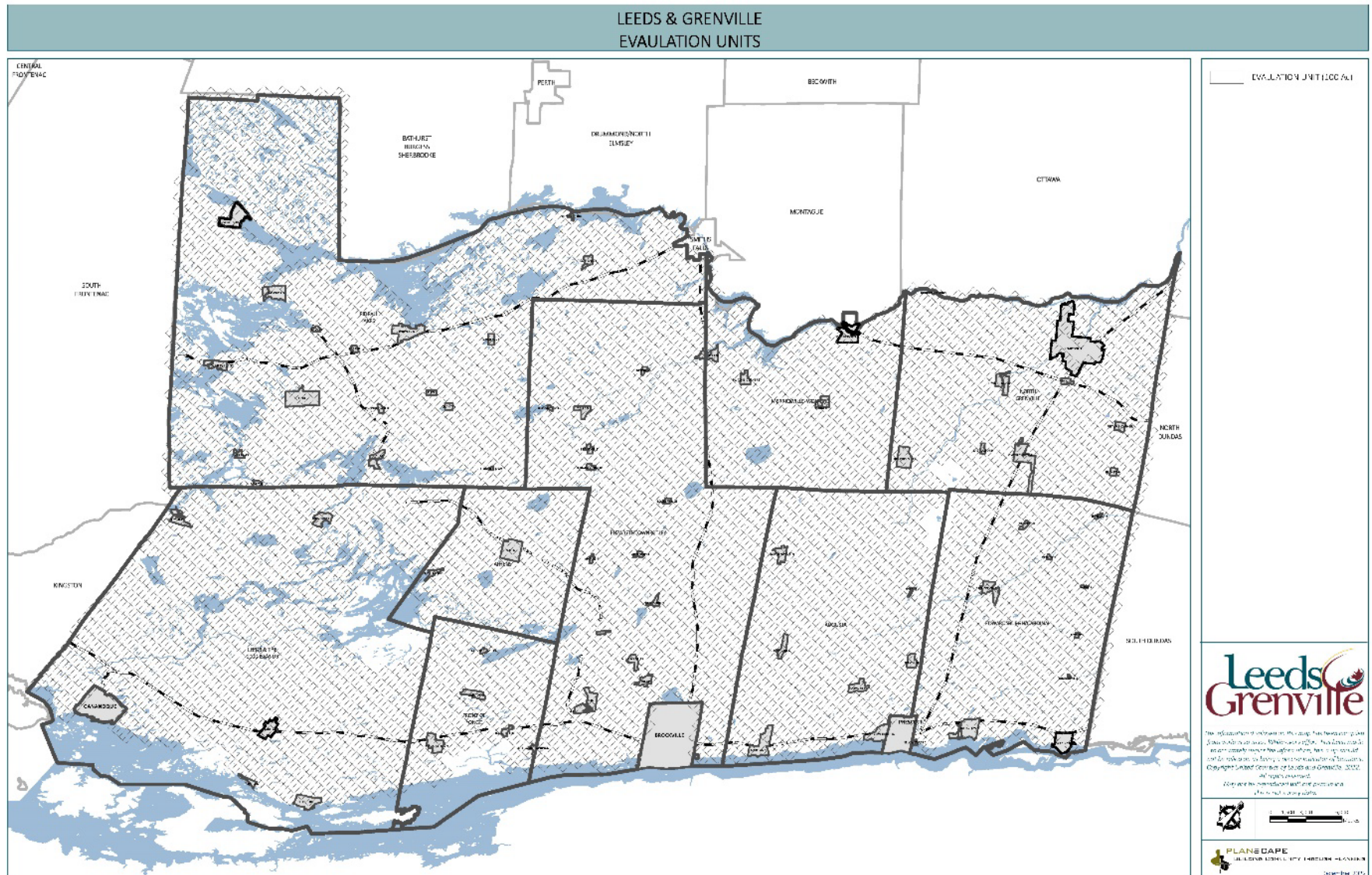
**Figure 3: Illustration of an Evaluation Unit**



Each evaluation unit is 405m x 1,000m (405,000 m<sup>2</sup>), which equals 40.46 Hectares (100 Acres). These evaluation units form a grid across the County of Leeds & Grenville.

**Figure 4** illustrates the application of the 100-acre grid on the boundaries of the United Counties of Leeds & Grenville study area.

Figure 4: Counties of Leeds and Grenville Evaluation Unit Map





## Calculating the Land Evaluation (LE) Component

The Land Evaluation (LE) component measures the significance of an area's use for agriculture by assessing the soil conditions across the Counties of Leeds Grenville. Soil ratings were determined within the standard sized evaluation unit of 100 acres.

The Canada Land Inventory (CLI) system “is the recognized system in Ontario for classifying areas with mineral soils according to their inherent capability for growing common field crops”<sup>2</sup>. The system does not classify soils for horticultural or other specialty crops.

The Canada Land Inventory (CLI) has two main components 1) the capability class, and 2) the capability subclass. The capability class indicates the general capability of the soil for growing common field crops. There are seven capability classes identified, and thirteen subclasses. The seven capability classes as defined under the CLI are listed in Table 1 below:

**Table 1: OMAFRA Defined Capability Classes**

| Class              | Description / Characteristics  |
|--------------------|--|
| Classes 1, 2 and 3 | Capable of sustained use for growing common field crops; all or most crops can be grown.         |
| Class 4            | Marginal for sustained use for common field crops; choice of crops that can be grown is limited. |
| Class 5            | Capable of use only for permanent pasture and hay.   |
| Class 6            | Capable of use only for unimproved pasture.  |
| Class 7            | No capability for agriculture.   |

The Soil Resource Group (SRG) utilized the most recent soil database from the Ontario GeoHub Soil Survey Complex Digital Information in identifying agricultural soil capability classes as the

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<sup>2</sup> [Use of Soil and Canada Land Inventory \(CLI\) Information for Agricultural Land Use Planning in Ontario \(gov.on.ca\)](https://www.gov.on.ca)



basis for the LE analysis.<sup>3</sup> It should be noted that “The soil complex database contains other descriptive information including slope class, Canada Land Inventory (CLI) ranking, stoniness, drainage class, texture, etc. The CLI Components of the data layer is generally intended to be used as a tool for broad land use planning decision making and not necessarily for field-level management”.<sup>4</sup>

## Land Evaluation Calculation

The assessment of the LE was based on a GIS intersection of the evaluation unit grid and the OMAFRA soils database. Soil attribute information within each evaluation unit was used to calculate a LE score value using the following steps:

1. GIS analysis was used to calculate the respective area of each soil polygon within each Evaluation Unit (EU),
2. The area of each soil series in a complex soil polygon was calculated within the EU,
3. Percent occurrence of each soil series within each EU was calculated,
4. A point value was assigned to each CLI class by following the direction of the OMAFRA Agricultural System Mapping Method, Technical Document, January 2018 (Table 2),
5. The relative percent occurrence of each soil series was multiplied by the respective point value for each CLI class,
6. The calculated weighted values for each soil series in each EU were added to provide a total LE score out of 100 for each EU, and
7. The score out of 100 is the LE value for each EU.

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<sup>3</sup> [Soil Survey Complex](#) | [Soil Survey Complex](#) | [Ontario GeoHub \(gov.on.ca\)](#)

<sup>4</sup> [Soil Survey Complex](#) | [Soil Survey Complex](#) | [Ontario GeoHub \(gov.on.ca\)](#)

**Table 2: OMAFRA assigned LE point value for each CLI land classification**

| CLI Class | LE Point Value |
|-----------|----------------|
| Class 1   | 1.0            |
| Class 2   | 0.9            |
| Class 3   | 0.8            |
| Class 4   | 0.6            |
| Class 5   | 0.5            |
| Class 6   | 0.4            |
| Class 7   | 0.0            |

It is noted that the OMAFRA Agricultural System Mapping Method, Technical Document, January 2018, has in certain circumstances, assigned a 0.9 LE point value to organic soils, as organic soils have great potential to support the production of high value specialty crops under the right conditions. The LE assessment in Leeds Grenville that was employed in this study used an LE point value of 0 for organic soils in recognition of comments heard during consultation. These soils are often described as “muck” soils with low drainage potential and often shallow depth to bedrock and do not represent a specialized agricultural opportunity in the study area.

## Establishing the Area Review (AR) Factors of the LEAR

The Land Evaluation (LE) component involved evaluating the soil resources for agriculture. In contrast, Area Review (AR) looks at other non-soil related conditions and practices that may have influence on agriculture. The LE component is typically given a higher weighting factor in the LEAR methodology than the AR component as soil resources tend to be the most important factor in identifying prime agricultural areas and are typically a “fixed” resource. Selecting and weighting the factors to use in the calculation of a LEAR requires that the context and key characteristics of an area be considered.

Two factors were identified for the Counties of Leeds and Grenville that represent characteristics that impact the viability of agricultural lands. These factors were identified in recognition of the comparatively small farm parcel sizes (in comparison to the typically larger sizes in other parts of the province where the LEAR methodology was developed) and the importance of farm infrastructure that improves agricultural land viability. The first factor is fragmentation, to reflect the importance of lands that are being actively farmed regardless of their land classification, and the second factor is “agricultural lands in production”. The “agricultural lands in production” is especially important in the Counties given the relatively small amount of Class 1 lands identified. This factor accounts for the local improvements made that allow for viable agriculture despite the land Class.

### 1. Fragmentation

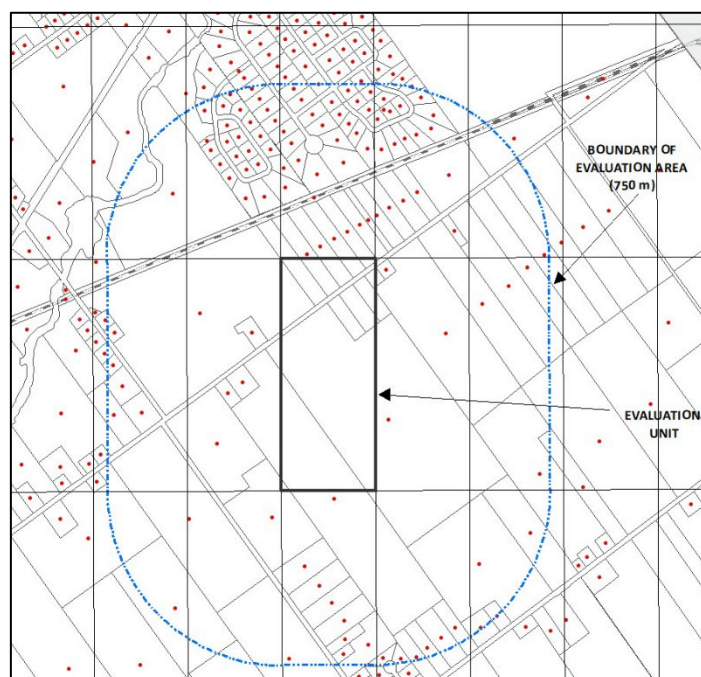
Fragmentation describes the extent that land in each Evaluation Unit has been divided into smaller units. The greater the number of parcels within an Evaluation Unit, the lower the AR score. Smaller parcels are generally indicative of non-agricultural uses, such as residential development, which can limit the use of any remaining larger parcels of land from many forms of agriculture. The LEAR methodology counts the number of discrete parcels within each Evaluation Unit to provide a measure of fragmentation.

“Fragmentation accounts for parcel size differences, while looking at the larger landscape for more holistic area evaluation. Assessing fragmentation at a landscape scale avoids the problem

of overly discounting small parcels which are otherwise surrounded by a more intact agricultural landscape. This method also avoids making assumptions about the agricultural viability of any individual parcel based on its size”<sup>5</sup>.

Fragmentation was assessed by counting the number of parcels within the evaluation unit.

**Figure 5: Schematic Illustration of Fragmentation**



Fragmentation scoring was assessed by counting the number of parcel centroids within the evaluation area surrounding each evaluation unit. Each centroid was located at the centre of each parcel. The scores were then converted to percentiles and multiplied by the weight factor of 10 to contribute to the final score. The weight of 10 points was assigned as per OMAFRA’s Guidelines, as to provide a small but adequate weight to help determine if

the evaluation unit qualifies as high, medium or low impact on agricultural lands.

## 2. Lands in Production (within 750 metres)

The definition of *prime agricultural areas* includes areas where there is a local concentration of farms which exhibit characteristics of ongoing agriculture. The area of land that is actually in

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<sup>5</sup> Agricultural System Mapping Method, Ontario Ministry of Agriculture, Food and Rural Affairs–2018 Pg 8

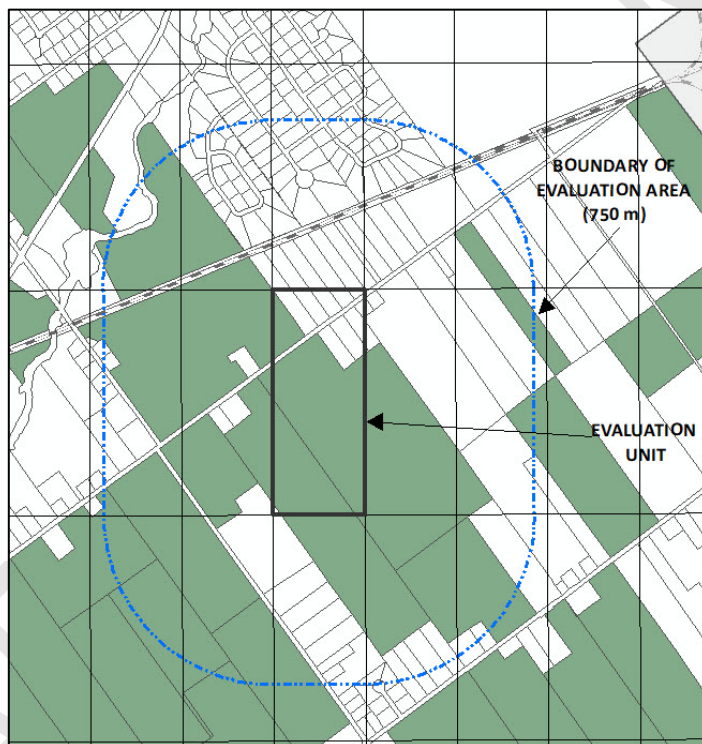


agricultural production is an excellent indicator of agricultural potential. Stakeholders have emphasized that lands in agricultural production should be prioritized by the province. For this reason, “lands in production” was given a relatively high weighting of 30 points. For the purposes of this study, lands in production are based on MPAC Property Code classifications as the most efficient means of identification.

Lands in agricultural production score is based on the percentage of area in agriculture within 750m surrounding an evaluation unit, calculated by the following equation:

$$\frac{\text{Area in Agricultural Production}}{\text{Evaluation Area (387.43 Ha)}} * 100 = \% \text{ Area in Agriculture}$$

**Figure 6: Schematic Illustration of Lands in Production**



The area in agricultural production is calculated by tallying the amount of land in production within the evaluation area. The percentage of the area in agriculture was then multiplied by the weight factor of 30 to contribute to the final score.

**Table 3** below lists the lands by type that are included as an agricultural use and therefore counted as lands in production for the LEAR.

**Table 3: Lands in Production by MPAC Property Codes**

| <b>PROPERTY CODE</b> | <b>PROPERTY DESCRIPTION</b>   |
|----------------------|---|
| 134                  | Land designated and zoned for open space  |
| 140                  | Common Land   |
| 200                  | Farm property without any buildings/structures  |
| 201                  | Farm with residence – with or without secondary structures; no farm outbuildings                |
| 210                  | Farm without residence – with secondary structures; with farm outbuildings                      |
| 211                  | Farm with residence – with or without secondary structures; with farm outbuildings              |
| 220                  | Farm without residence – with commercial/industrial operation                                   |
| 221                  | Farm with residence – with commercial/industrial operation                                      |
| 222                  | Farm with winery  |
| 223                  | Grain/Seed and feed operation   |
| 228                  | Farm with gravel pit  |
| 230                  | Intensive farm operation – without residence  |
| 231                  | Intensive farm operation – with residence   |
| 234                  | Large scale poultry operation   |
| 235                  | Government – agriculture research facility, predominately farm property                         |
| 240-5                | Managed forest property   |
| 260                  | Vacant residential/commercial/industrial land owned by a non-farmer with a portion being farmed |
| 261                  | Land owned by a non-farmer improved with a non-farm residence with a portion being farmed       |
| 262                  | Land owned by a farmer improved with a non-farm residence with a portion being farmed           |
| 521                  | Distillery/brewery  |
| 527                  | Abattoir/slaughterhouse/rendering plants  |
| 528                  | Food processing plant   |

### **Area Review (AR) Factors Procedure**

The Area Review portion of the study was completed using the LEAR methodology based on OMAFRA's Agricultural System Mapping Method and input from consultation. The steps taken are outlined below:

1. Review all applicable research including previous LEAR studies.
2. Select appropriate Area Review factors.
3. Acquire spatial data for the Area Review including lot / concessions, MPAC parcel fabric for fragmentation, and percentage of lands in production, and the creation of 100-acre grid based on the boundary of the United Counties of Leeds & Grenville.
4. Fragmentation – perform count of ownership parcels within each Evaluation Unit manually.
5. Percentage of Land in Production – query farm property codes to find parcels that are in production. OMAFRA provided the equation used to calculate the percentage area.
6. Calculate scores for each Area Review Factor.
7. Create Area Review mapping layers.

### Weighting the Factors of a LEAR

According to the Province's Land Evaluation and Area Review (LEAR) Methodology, 2018, "scores from the LE and AR components are weighted and combined to provide an overall LEAR score for each evaluation unit in the Study Area. The highest scoring evaluation units represent areas with the greatest agricultural potential"<sup>6</sup>. The typical weighting is 60% LE and 40% AR and was determined to be an appropriate weighting for this study. Further, the 40% AR weighting was divided into a 10% weight for fragmentation and a 30% weight for lands in agricultural production as per the province's recommendation in the 2018 LEAR methodology document.

In summary, the weightings selected for the United Counties of Leeds & Grenville are:

1. Soils (Canada Land Inventory Soil Capability for Agriculture) (LE Factor) – 60%

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<sup>6</sup> [Land Evaluation and Area Review \(gov.on.ca\)](https://www.gov.on.ca)

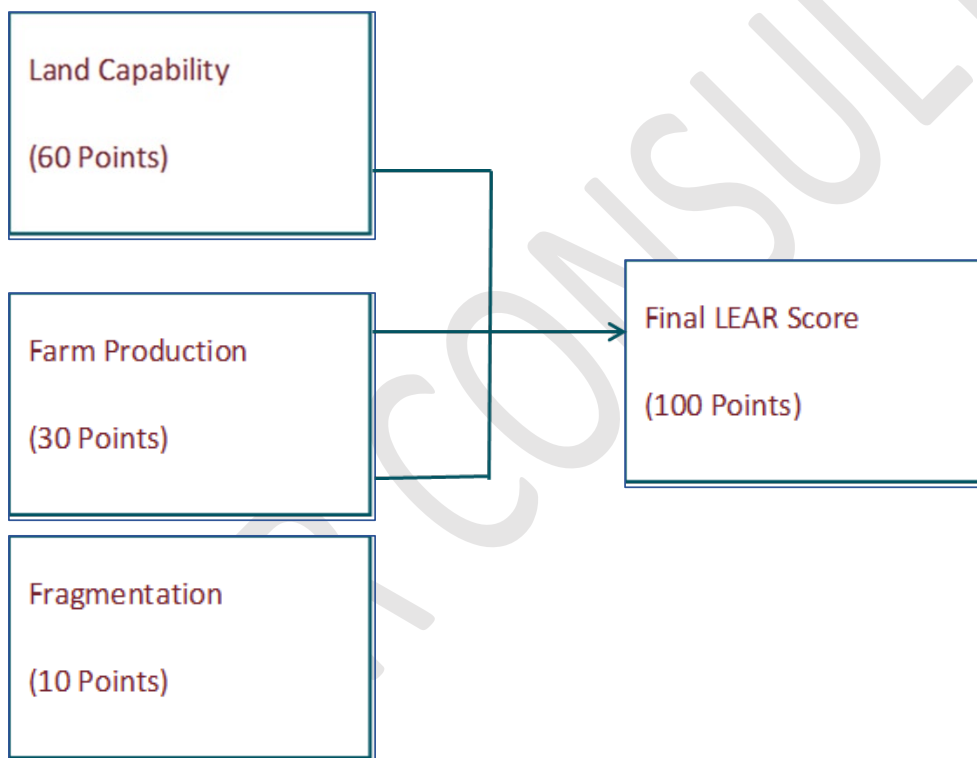
2. Fragmentation (AR Factor) – 10%
3. Percentage of Land in Agricultural Production (AR Factor) – 30%

### Land Evaluation (LE) and Area Review (AR) Mapping

All derived layers of the LEAR were integrated together by Planscape in a GIS environment.

The weighted factors were as follows:

**Figure 7: Weighted Scoring for Integrated Mapping**





## Selecting the Threshold Score Through Scenario Comparison

Once all factors were scored individually (and mapped for clarity), a threshold was determined that represents the lands being recommended to form the prime agricultural lands within the County. OMAFRA's 2018 guide to conducting a LEAR recommends testing the thresholds of a score of 60 and a score of 70. After testing the two scenarios, a threshold score of 60 was selected - meaning all lands that scored 60 or higher (when the LE and two AR factors were scored) is identified as prime agricultural land as defined under the LEAR process. These lands form the basis for consultation in the next phase of this study to capture local stakeholder input.

Using the threshold of 60 results in mapping of an area that is relatively consistent with the currently designated prime agricultural areas without adding or losing excessive amounts of land. It is an adjustment to the current designation based on updated and consistently applied criteria. Whereas applying the 70 threshold would result in significant removal of land from the existing designated prime agricultural lands in the Official Plan. In returning to the original purpose of the study to "refine and confirm" the existing agricultural designations in the Counties, the study team is confident that the 60-score threshold provides the appropriate level of inclusion.

**Figure 8** provides a comparison of the 60 and 70 score thresholds. Lands included as prime agricultural lands based on a scoring threshold of 60 are shown in the darker brown and orange colours, the lands scoring over the 70 threshold are shown in orange only. The darker brown lands representing scores of 60 to 70 represent approximately 80,000 ha of land.

**Figures 9 and 10** show the layers of AR and LE criteria that combined, result in the creation of the draft LEAR map that is shown on **Figure 11**. Maps showing a breakdown of AR and LE layers and the final LEAR map for each local area municipality provided in **Figures 12 through 20**.



Figure 8: Scenario Threshold Score Comparison Map

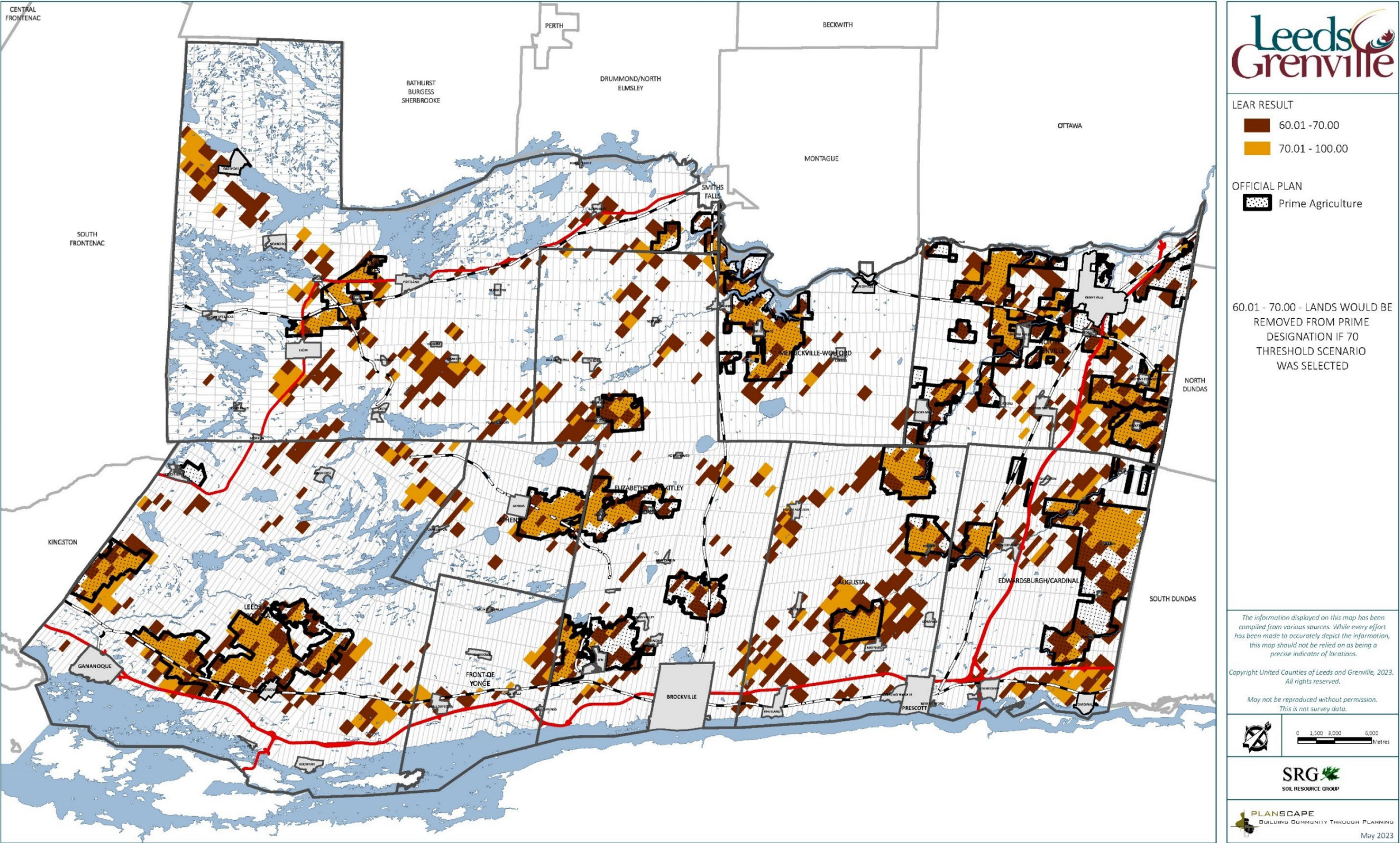




Figure 9: LE Score County Map

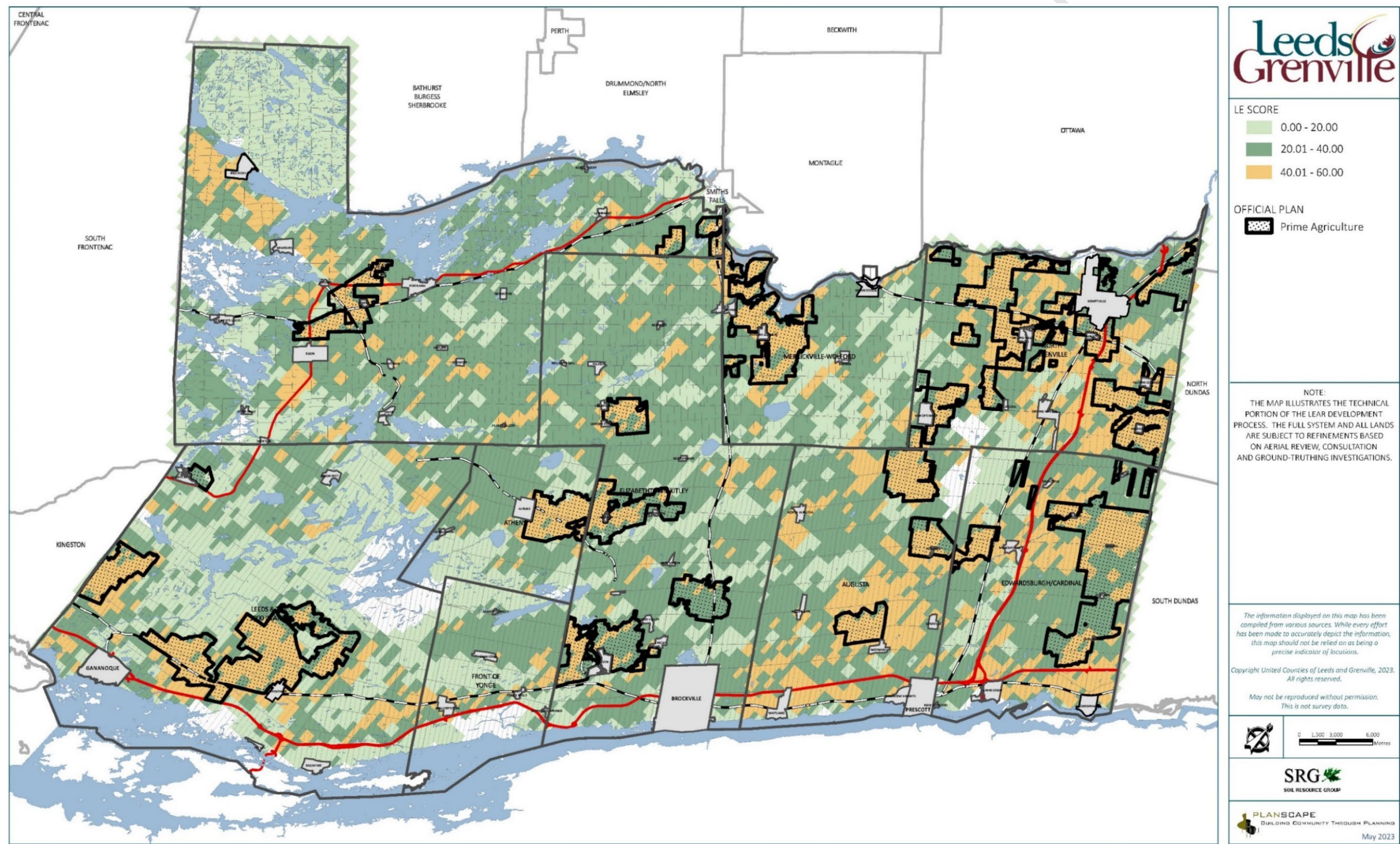




Figure 10: Area Review (AR) Factors Map (Fragmentation and Lands in Agricultural Production)

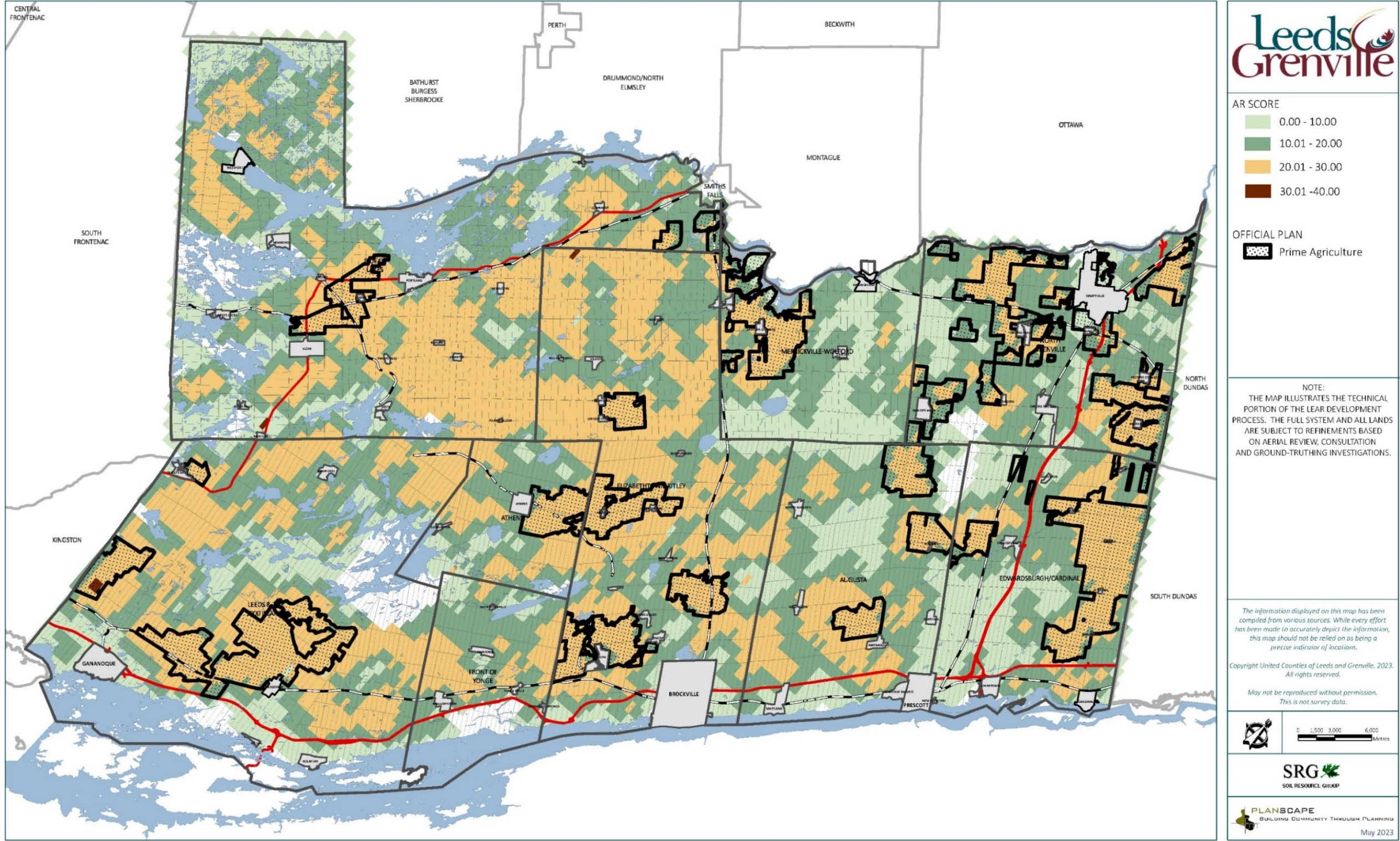
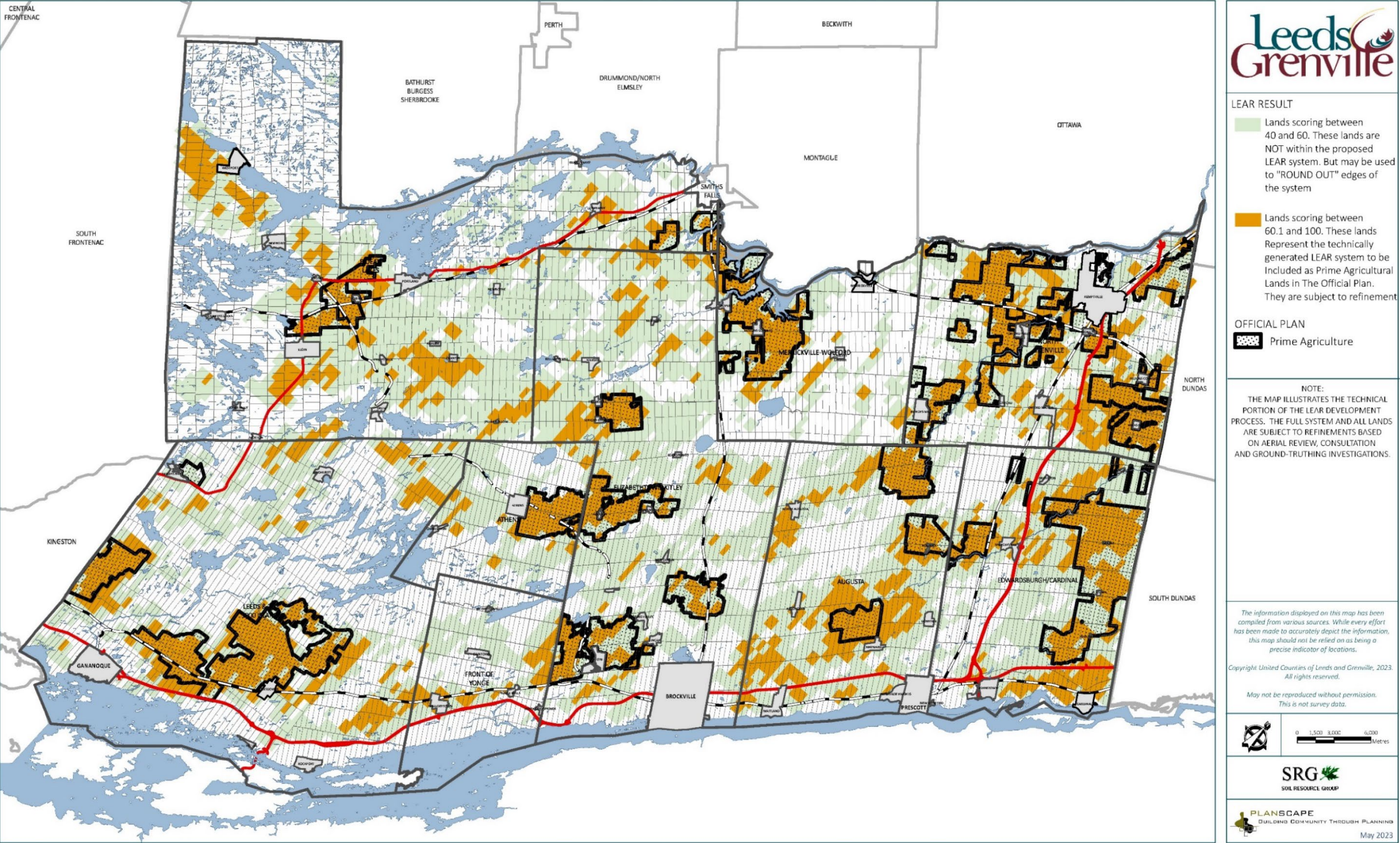




Figure 11: Draft County LEAR Map





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## Confirming the Draft LEAR Map

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The draft LEAR map is based on the technical protocol of mapping the LE and AR factor scores and eliminating any lands that fell below the 60 score threshold. The next step to create an accurate and functional agricultural system for inclusion in the Counties Official Plan is to ground truth this map through consultation with Counties staff, all stakeholders and the agricultural community. The Federations of Agriculture of both Leeds and Grenville have been engaged throughout the study and will be relied upon (in addition to all other local stakeholders) to provide additional insight, corrections or information that may necessitate and adjustment to the provided draft LEAR map.

Following the conclusion of these conversations, presentations and workshops, a final LEAR map will be provided to the Counties.

### What we have Heard to Date

From November 2022 through January 2023, the project was introduced to stakeholders through public meetings and advisory committee meetings. These meetings involved a review of the project, the purpose and participation timelines. Maps and presentations were provided to participants and initial feedback was sought. A follow-up request to area municipalities was sent out to obtain information on known farming operations to ensure these active lands were appropriately captured.

The Figures provided in the previous sections of this report are based on the technical LEAR analysis as described. Input captured to date and additional feedback will be applied in the next phase of the study as the map is refined.

The project team acknowledges the input received to date. Information on how that information has been or will be used or verified for inclusion in any required adjustments to the technically produced LEAR is summarized in **Table 4**.

**Table 4: Summary of Input Received prior to the Technical LEAR**

| Comment Received  | Response / Action to Be Taken  |
|---|--|
| <p>Suggestions for the AR part of the LEAR exercise, specific to areas recommended to be excluded from Prime Ag designation:</p> <ul style="list-style-type: none"> <li>• Class 4 soils if there is no connection/ are not directly adjacent to Classes 1-3 soils (i.e. does not represent a bridge). There are multiple examples shown on the proposed mapping.</li> <li>• Areas within 300m of a waterbody</li> <li>• Wetlands and adjacent lands – PSWs and LSWs</li> <li>• ANSIs</li> <li>• Settlement Areas, as well as areas being reviewed for expansion</li> <li>• Organic Soils</li> <li>• Small pockets, areas under 100 acres excluded</li> <li>• Existing commercial/industrial lands. To determine which conflict a review of zoning layers in each municipality should occur</li> </ul> | <ul style="list-style-type: none"> <li>• These will be identified in the LEAR and if they do not score more than 60, they will be eliminated unless they serve to connect Class 1 to 3 lands.</li> <li>• 300m has been determined to be too large of a buffer from waterbodies. Typically, a 30m buffer is used. Appropriate buffer width will be carried forward for further discussion.</li> <li>• The Natural Heritage System (PSWs, LSWs and ANSIs) will be discussed moving forward to determine if it will be a designation applied to the agricultural system or a feature-specific decision made as part of the system itself.</li> <li>• Approved expansion of settlement area boundaries will be removed, but potential future settlement areas boundary expansions not yet designated have not been addressed in the LEAR.</li> <li>• Organic soils have been given a score of 0. In comparison Class 1 lands are given a score of 10 so the value assigned to these lands may exclude them from the system.</li> <li>• Non-connected pockets will be excluded.</li> <li>• To be undertaken where needed. In Augusta and Edwardsburgh-Cardinal (Johnstown), industrial buffers will be investigated.</li> </ul> |
| <p>A marked-up map of North Grenville with areas of interest has been provided.</p> <p>1. The area around Burritts Rapids</p>   | <p>This map will be compared to the technical LEAR to help inform discrepancies that need to be rationalized.</p> <p>1. Noted.</p>   |

| Comment Received  | Response / Action to Be Taken   |
|---|---|
| <ul style="list-style-type: none"> <li>a. Historically more of this area had been farmed, but there are parts of it that are very rocky and have limited capability.</li> <li>2. The area south of Monkman Road               <ul style="list-style-type: none"> <li>a. Historically, this land was owned by developers and pressure may have been applied to not have an agricultural designation on the lands. There is apparently good land in this vicinity.</li> </ul> </li> <li>3. Snowdon Road Farm               <ul style="list-style-type: none"> <li>a. Always been farmed – especially on the Merrickville-Wolford side.</li> </ul> </li> <li>4. The area south of Abbott Road and North of the train tracks               <ul style="list-style-type: none"> <li>a. Not too much knowledge of the area.</li> </ul> </li> <li>5. The area around Kennedy Road               <ul style="list-style-type: none"> <li>a. Believed that this area was historically not Ag because of the conflict with Aggregates, however majority of land has potential or has been farmed at one point or another.</li> </ul> </li> <li>6. The area around Latourell Road               <ul style="list-style-type: none"> <li>a. Believed that this area was historically not Ag because of the conflict with Aggregates, however majority of land has potential or has been farmed at one point or another.</li> </ul> </li> <li>7. The area south of Beach Road and North of McGovern Road.               <ul style="list-style-type: none"> <li>a. Unknown why this land not historically included. Knowledge of several farms within the area, especially on the east side of Rock Road.</li> </ul> </li> <li>8. The area north and south of County Road 20, east of Oxford Station.               <ul style="list-style-type: none"> <li>a. Unknown why this land not historically included. Knowledge of several farms on both the east and west sides of the 416.</li> </ul> </li> <li>9. The area north and south of McFarlane Rd.               <ul style="list-style-type: none"> <li>a. Especially northwest – recently cleared and actively used.</li> </ul> </li> <li>10. The area north of Beulah Road and West of Limerick Road.               <ul style="list-style-type: none"> <li>a. Especially northwest – recently cleared and tiled.</li> </ul> </li> </ul> | <ul style="list-style-type: none"> <li>2. Noted. Lands with good soil capability or that are farmed score high in the LEAR process and are mapped as such.</li> <li>3. To be reviewed.</li> <li>4. To be reviewed and discussed with the Leeds Federation of Agriculture.</li> <li>5. Noted. Aggregates will be discussed to decide if they are reflected in a mapping overlay or a designation.</li> <li>6. Noted. Aggregates will be discussed to decide if they are reflected in a mapping overlay or a designation.</li> <li>7. To be reviewed and discussed with the Leeds Federation of Agriculture.</li> <li>8. To be reviewed and discussed with the Leeds Federation of Agriculture.</li> <li>9. To be site inspected, discussed with the Leeds Federation of Agriculture and reconsidered.</li> <li>10. To be site inspected, discussed with the Leeds Federation of Agriculture and reconsidered.</li> </ul> |

| Comment Received  | Response / Action to Be Taken   |
|---|---|
| A marked-up map of Edwardsburgh / Cardinal with actively farmed land was provided.  | Most of the highlighted lands (provided on the marked up map) qualify as prime agricultural lands. The lands south of Highway 401 will be investigated for employment land designations and site inspected where necessary. |
| A marked-up map of Augusta with actively farmed land was provided.  | This map will be assessed compared to the technical LEAR and discrepancies site inspected where appropriate.  |
| A marked-up map of Front of Yonge with actively farmed land was provided.   | Most of the highlighted lands (provided in the marked up map) qualify as prime agricultural lands. The lands south of Highway 401 will be investigated for employment land designations and site inspected where necessary. |
| A marked-up map of Athens with actively farmed land was provided.   | Most of the highlighted lands (provided in the marked up map) qualify as prime agricultural lands. Fringe areas will be discussed with the Grenville Federation of Agriculture and site inspected where necessary.          |
| Request from member of the public in Athens to remove from prime agricultural lands and designate as rural.   | A review will be conducted to determine if the lands are appropriate to be included as prime agricultural lands. Property owner / agent will be followed-up with directly.  |
| Comments received from a member of the public on the importance of the bioeconomy.  | A follow-up conversation will be sought to understand the intersection of forestry and agriculture, especially for the production of food crops.  |
| Request from a member of the public in Augusta to remove the prime designation on the lands to facilitate the creation of a building lot in future. | A review was conducted and determined that the lands are appropriate to be included as prime agricultural lands. Property owner will be followed up with directly.  |

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## Project Next Steps

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The next steps for this Agricultural Area Review project are to:

- consult with interested and impacted stakeholders on the draft LEAR;
- revise the draft LEAR to reflect the current physical conditions and farm activity through aerial photography reviews, stakeholder comments and ground-truthing site visits as required;
- remove build up area lands (rural subdivisions) scoring higher than 60 that are not within the settlement area boundaries as appropriate; and
- remove isolated blocks of land scoring higher than 60.

To support the upcoming consultation period, a list of consultation questions are provided below as **Table 5**. The list of questions is a starting point for the thinking and review process. We encourage all interested stakeholders to participate in the process. In person and virtual meetings will be held along with individual property owner interviews and consultations to ensure all interested and impacted stakeholders have the opportunity to discuss their comments, concerns and suggestions with the project team.

Stakeholders are encouraged to visit: [Agriculture Area Review - Leeds & Grenville \(leedsgrenville.com\)](https://leedsgrenville.com) to review project information, subscribe to the page for updates, and access contact information for the Counties Planning team facilitating this project. Your input is welcomed and very much appreciated.



**Table 5: Confirming the LEAR Map Consultation Questions**

| Consultation Question   | Stakeholder Response                         |
|---|--|
| 1. Are you a member of the agricultural community?  | Yes / No<br>If yes, please briefly describe: |
| 2. Have your lands been identified as candidates to possibly be included in the prime agricultural designation (i.e. scored higher than 60 on the provided maps, noted in orange)?  | Yes / No<br>Address (if yes):                |
| 3. Do you feel that your lands should or should not be? Please elaborate.   |  |
| 4. Are there areas that you feel should be included in the Prime Agricultural areas in the LEAR map? If yes, please provide us with the area and why you feel that is the case.     |  |
| 5. Are there areas that you feel should NOT be included in the Prime Agricultural areas in the LEAR map? If yes, please provide us with the area and why you feel that is the case. |  |
| 6. Do you have any other comments, advice or information that you feel the project team should consider in the final refinement of the LEAR map?                                    |  |



Figure 12: Municipality of North Grenville LEAR Map

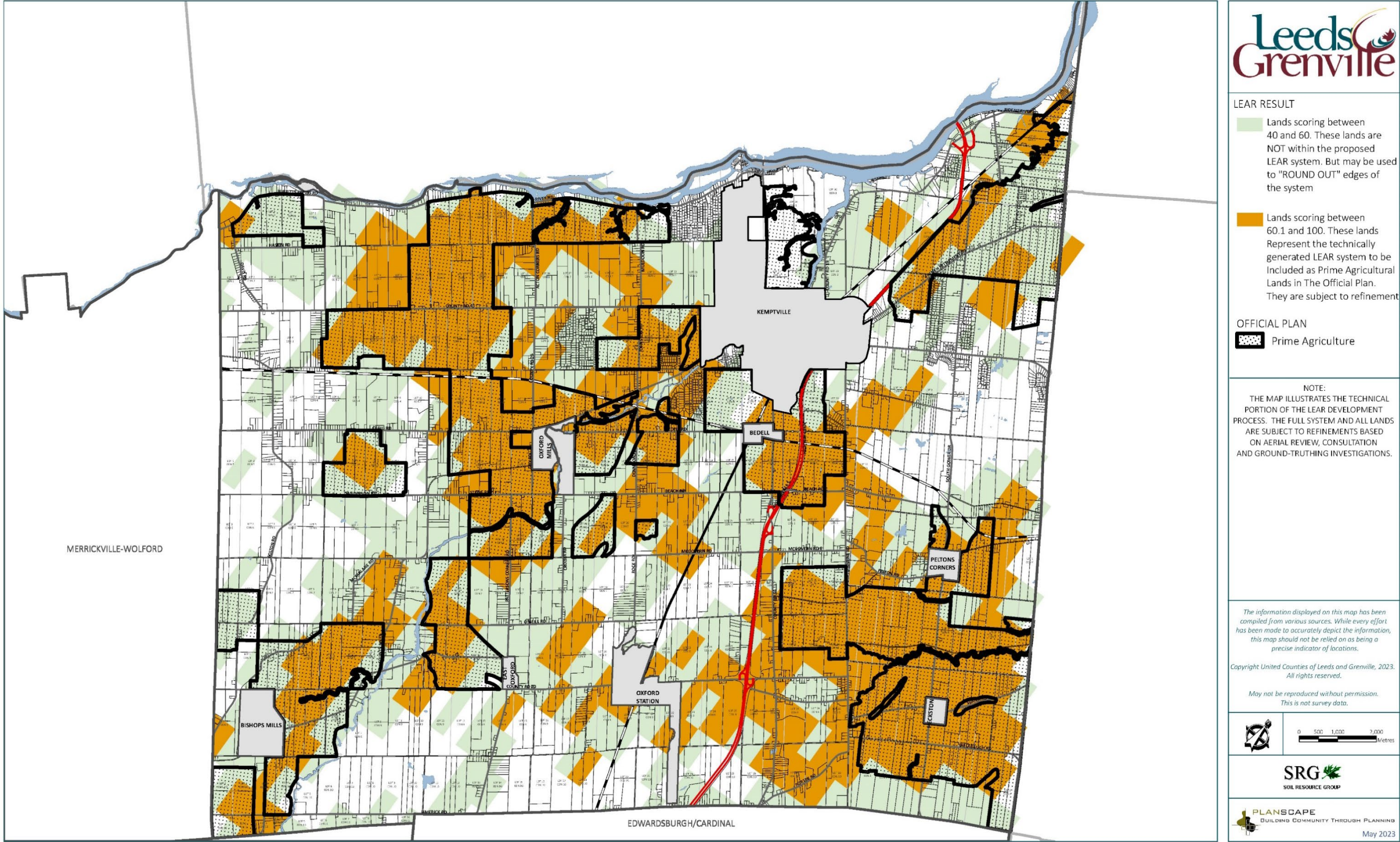
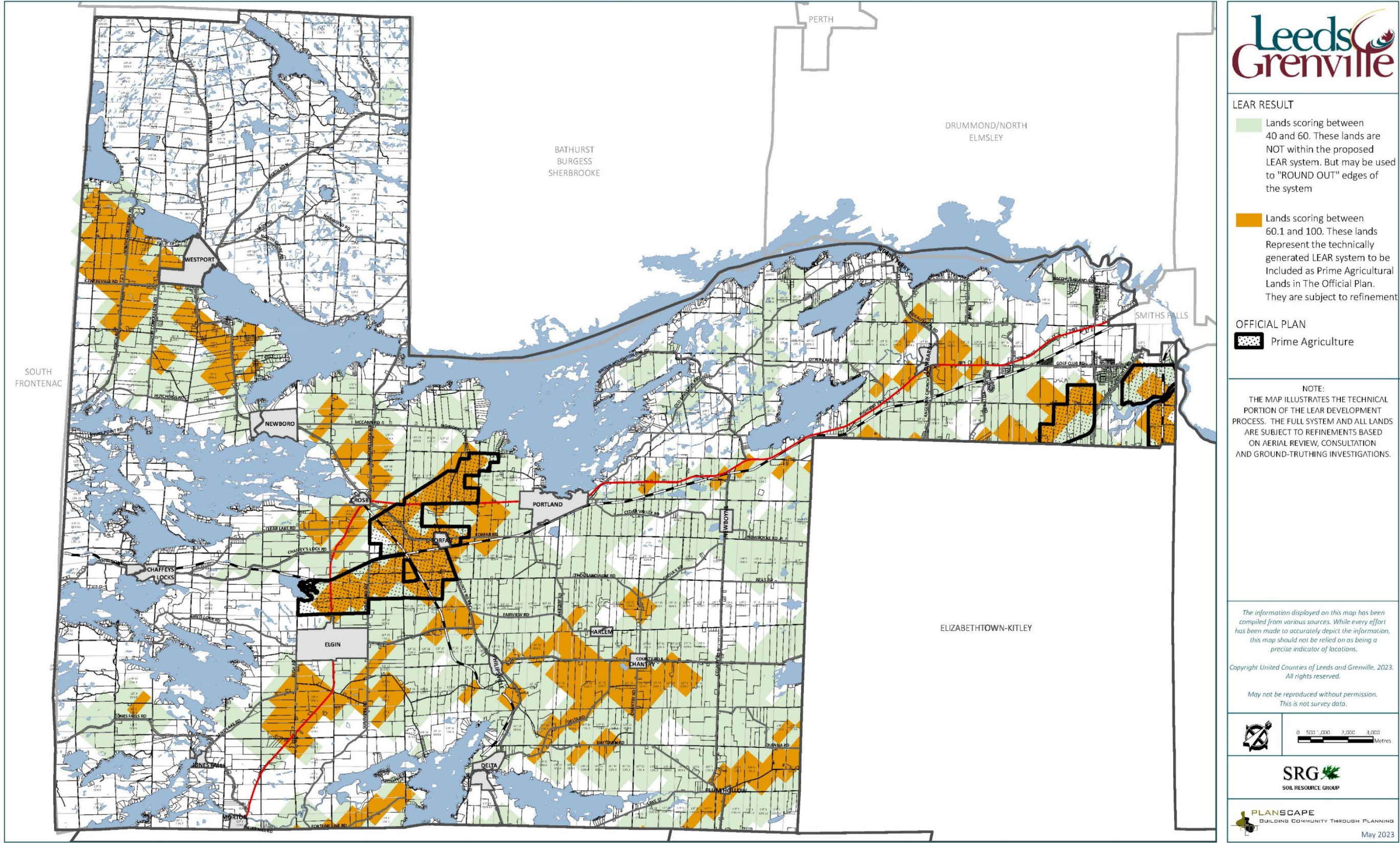




Figure 13: Township of Rideau Lakes LEAR Map





**Figure 14: Township of Elizabethtown-Kitley LEAR Map**

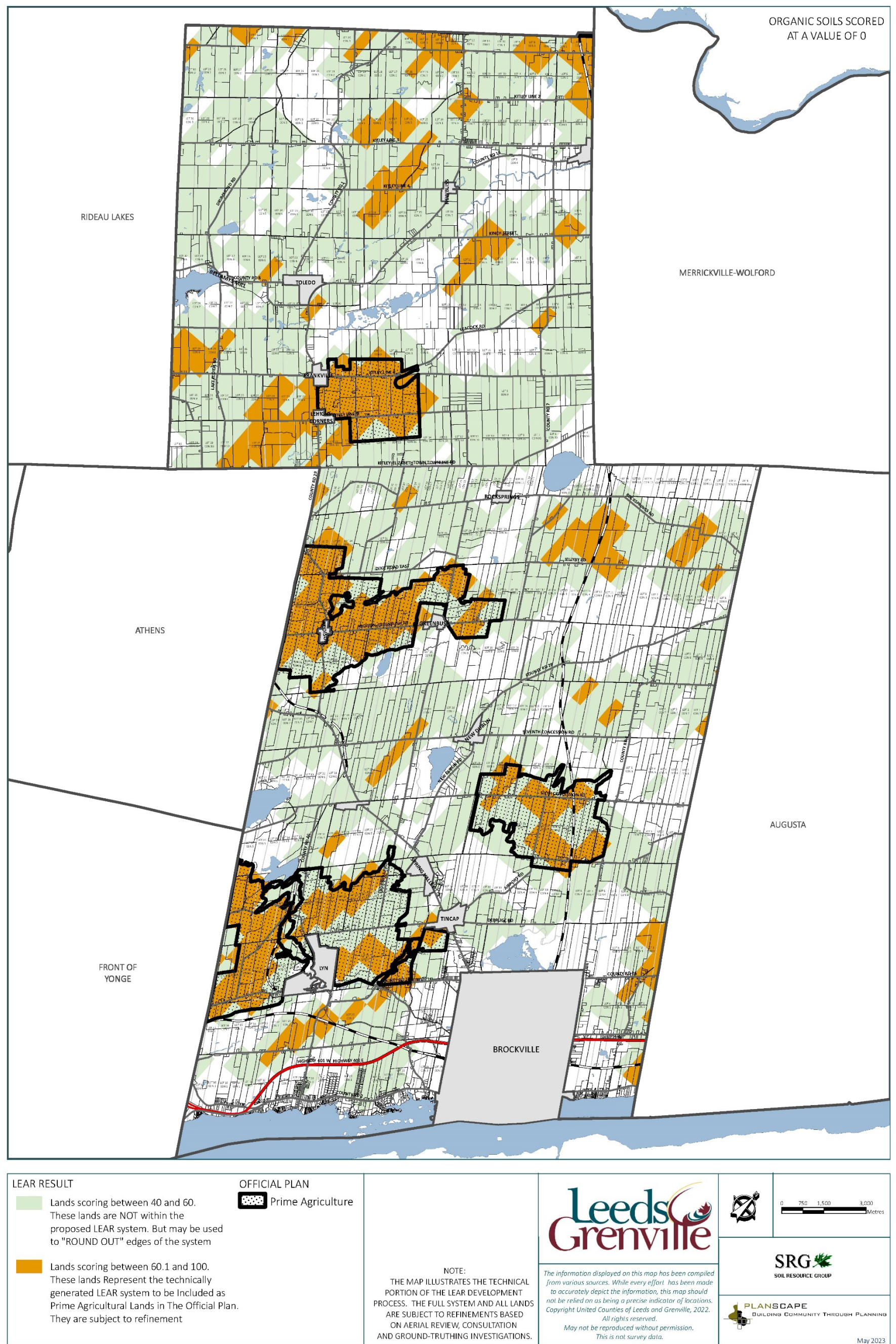




Figure 15: Township of Leeds and the Thousand Islands LEAR Map

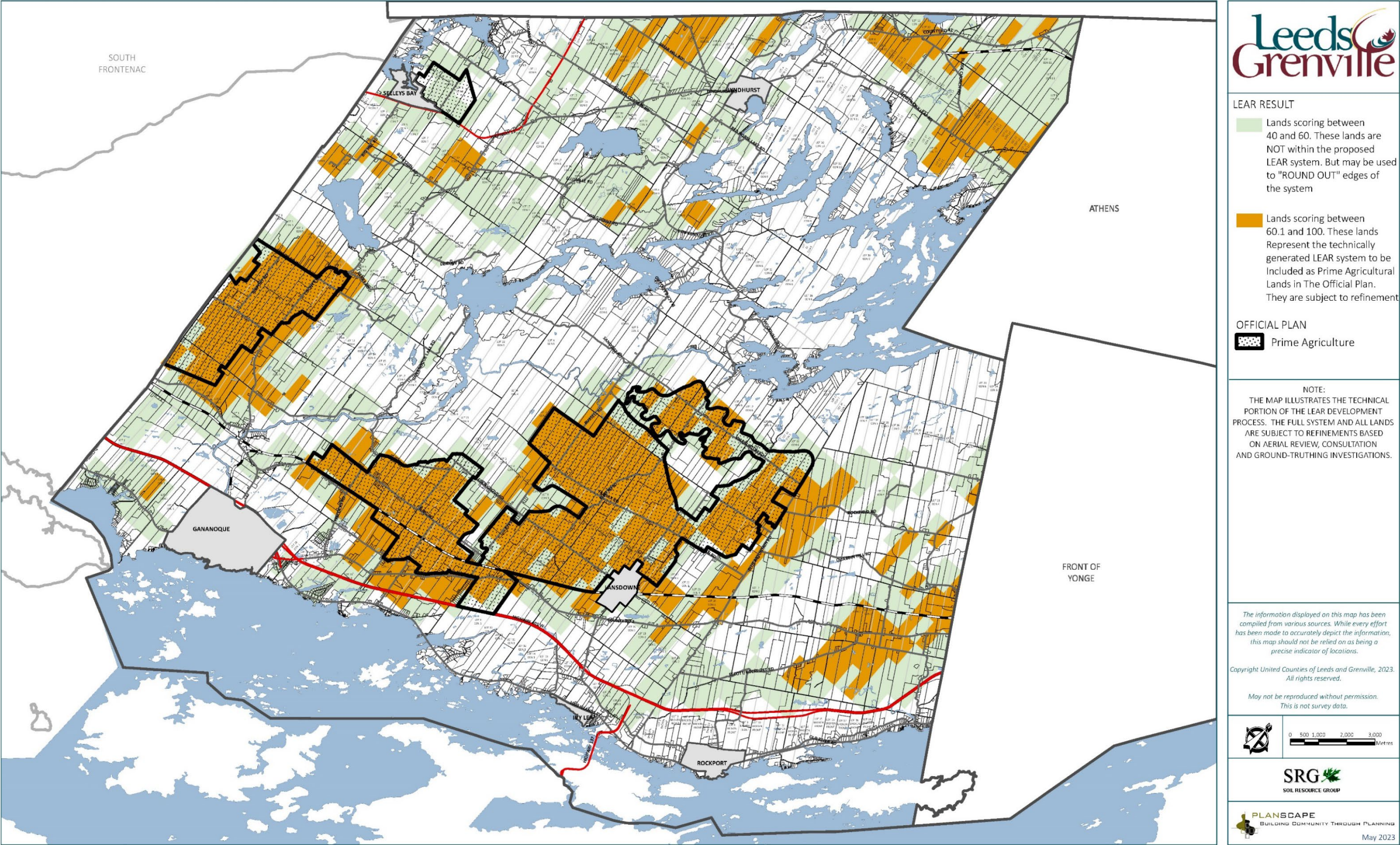




Figure 16: Township of Augusta LEAR Map

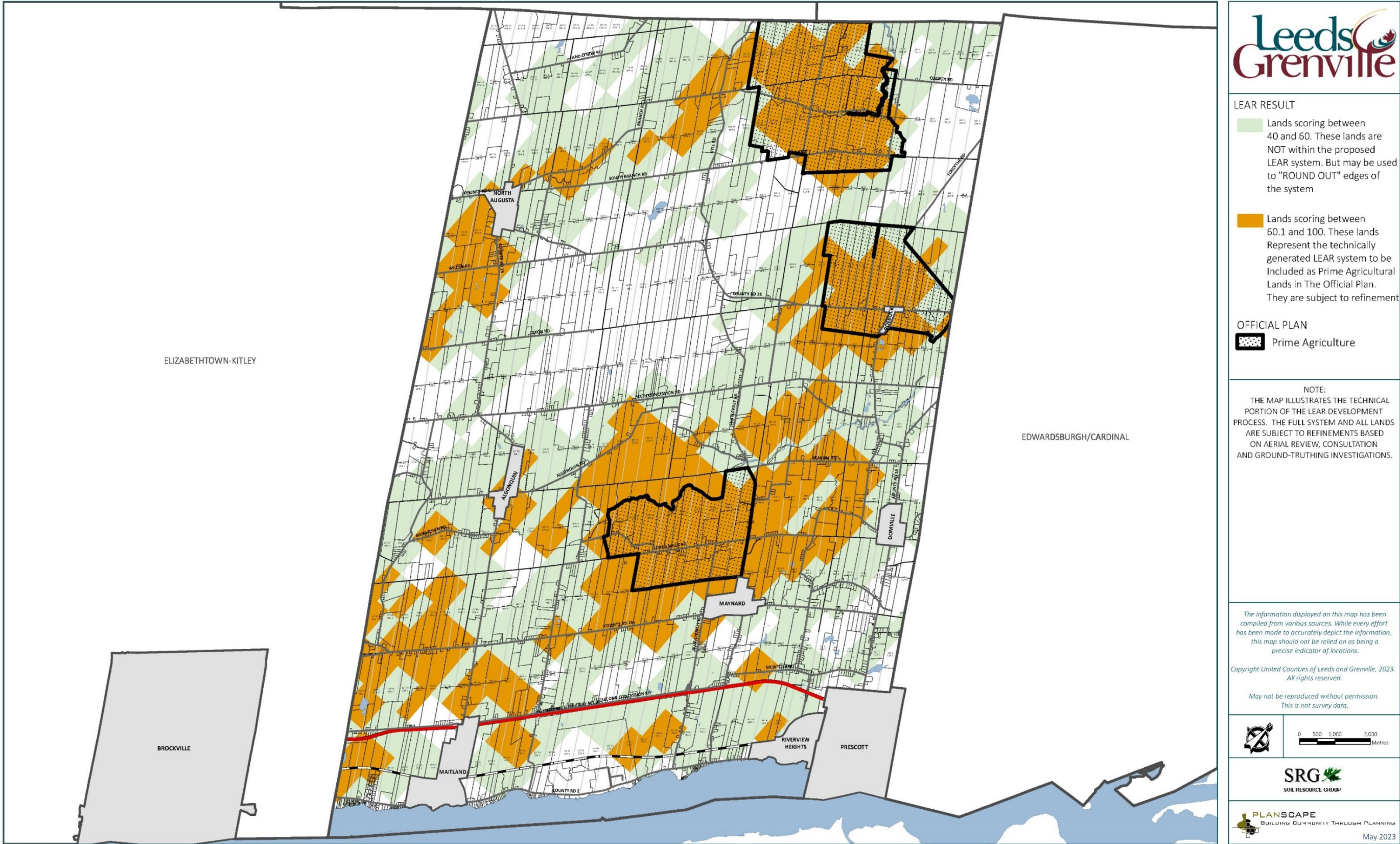




Figure 17: Township of Edwardsburgh/Cardinal LEAR Map

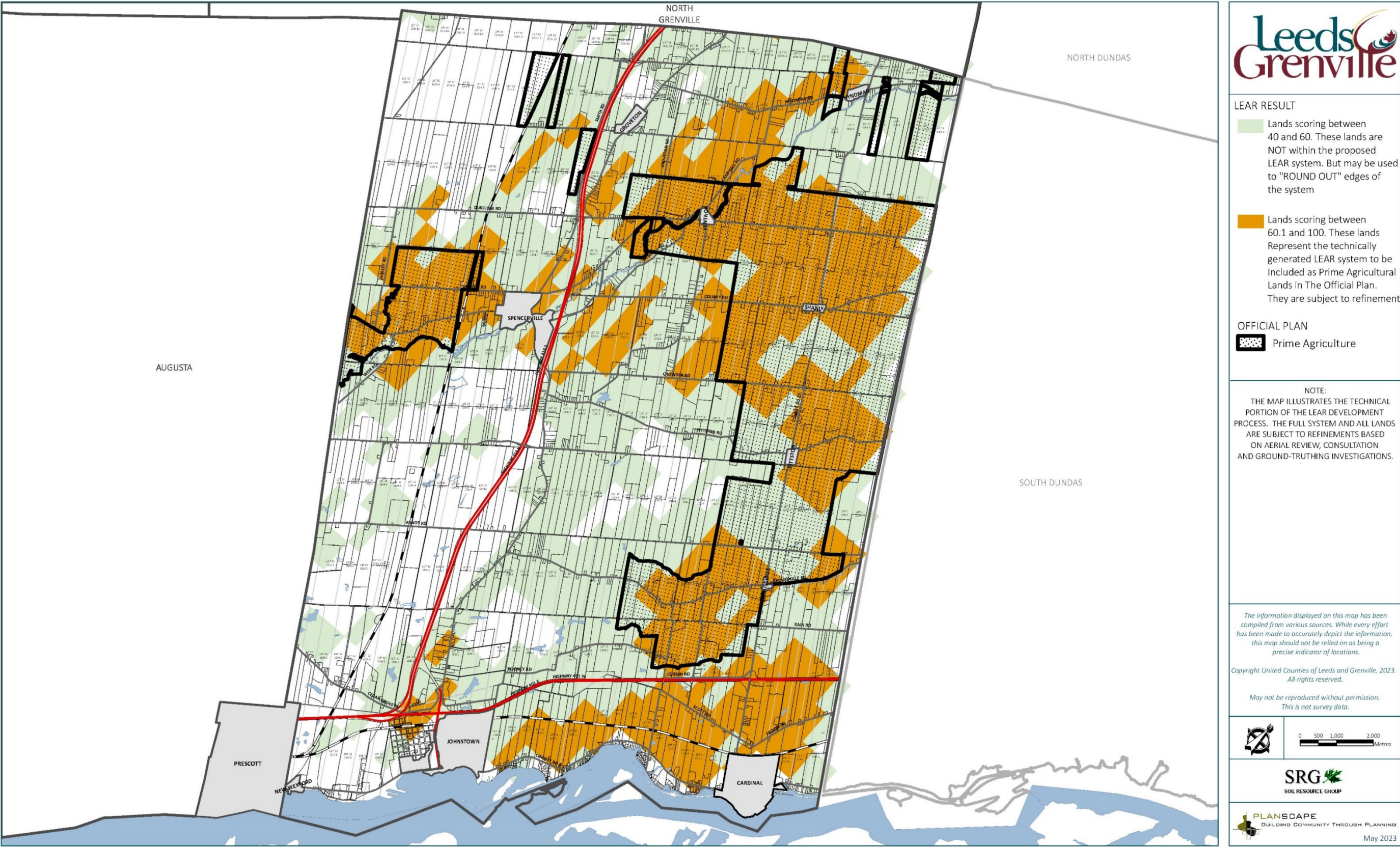




Figure 18: Village of Merrickville–Wolford LEAR Map

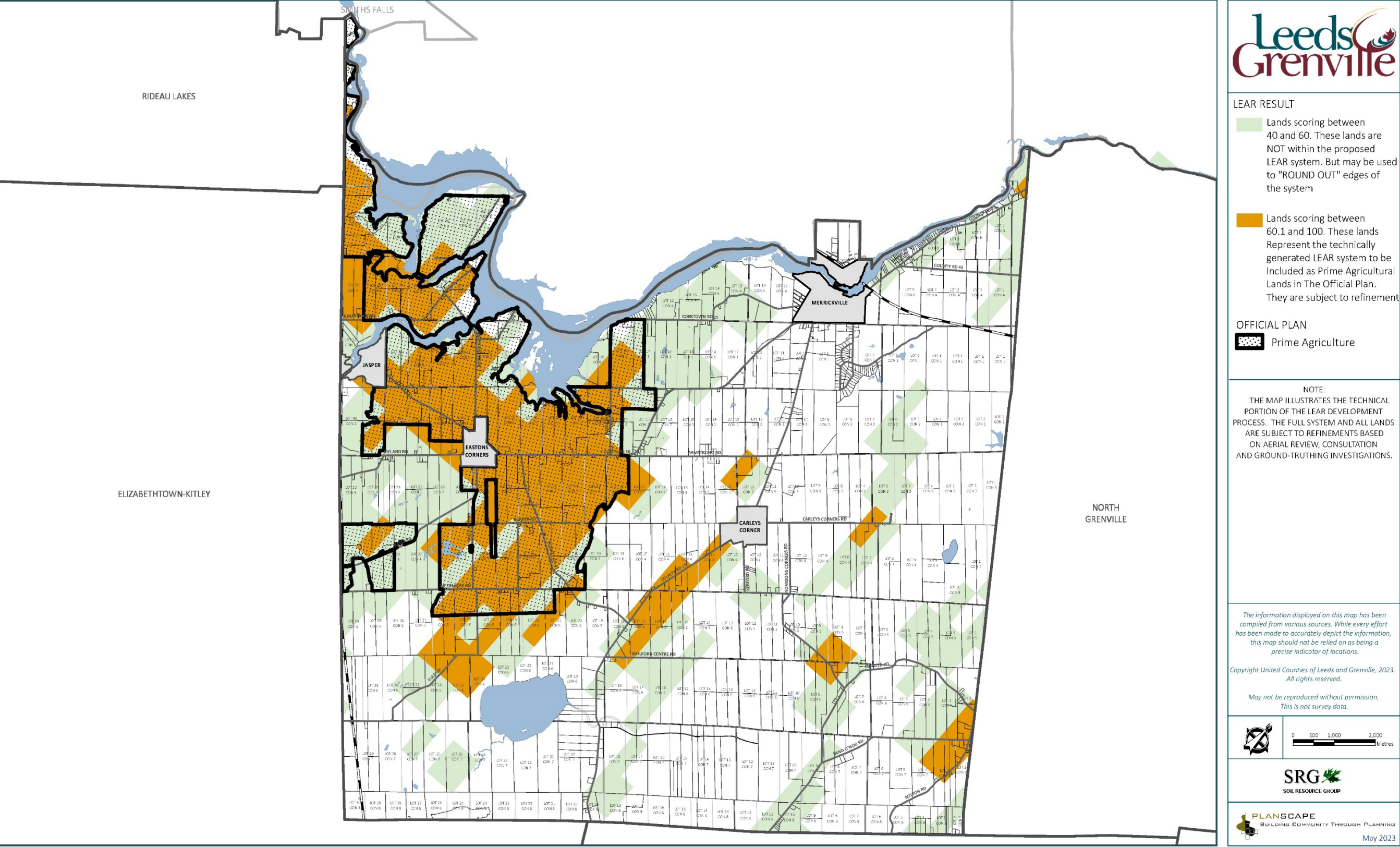




Figure 19: Township of Athens LEAR Map

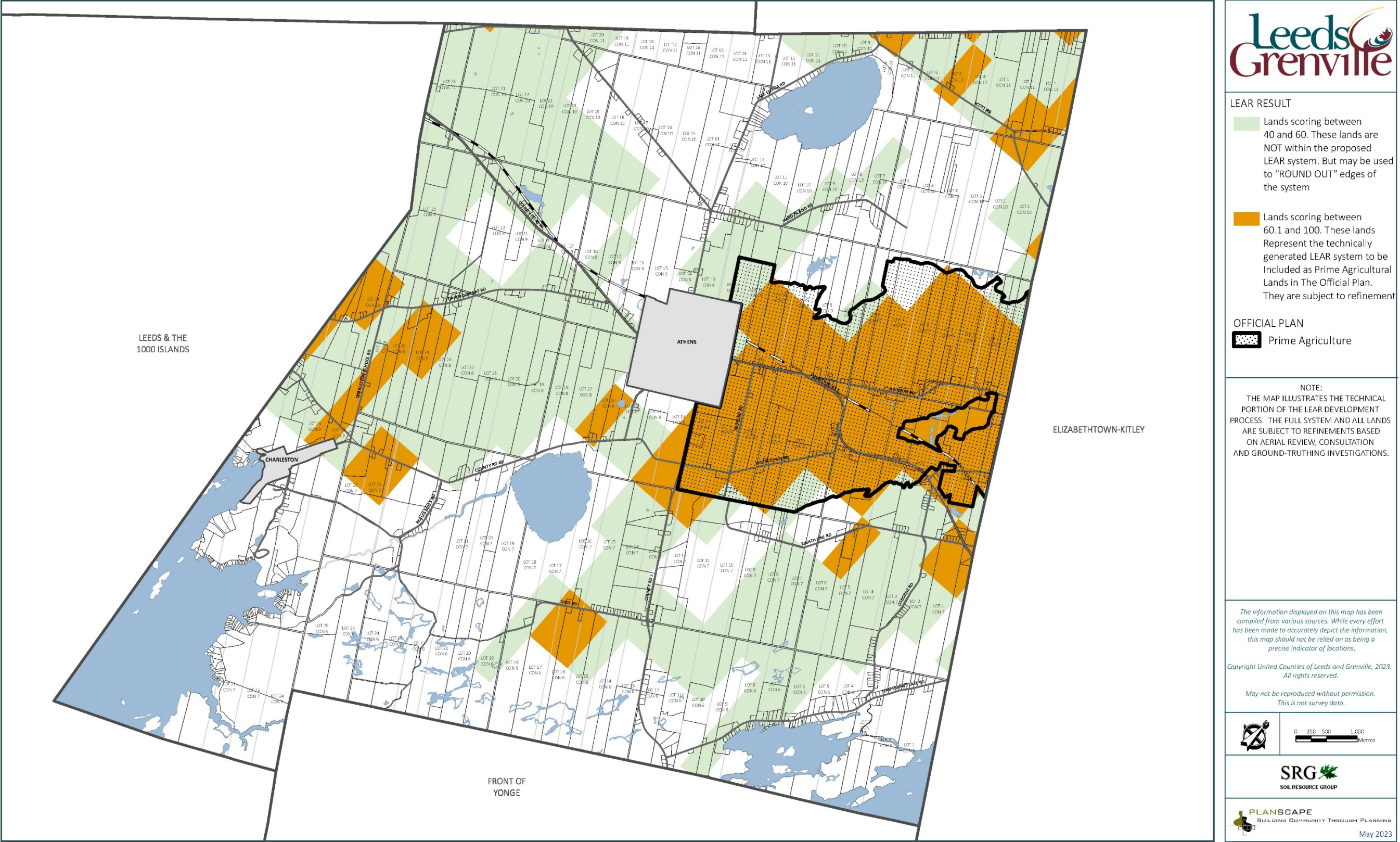
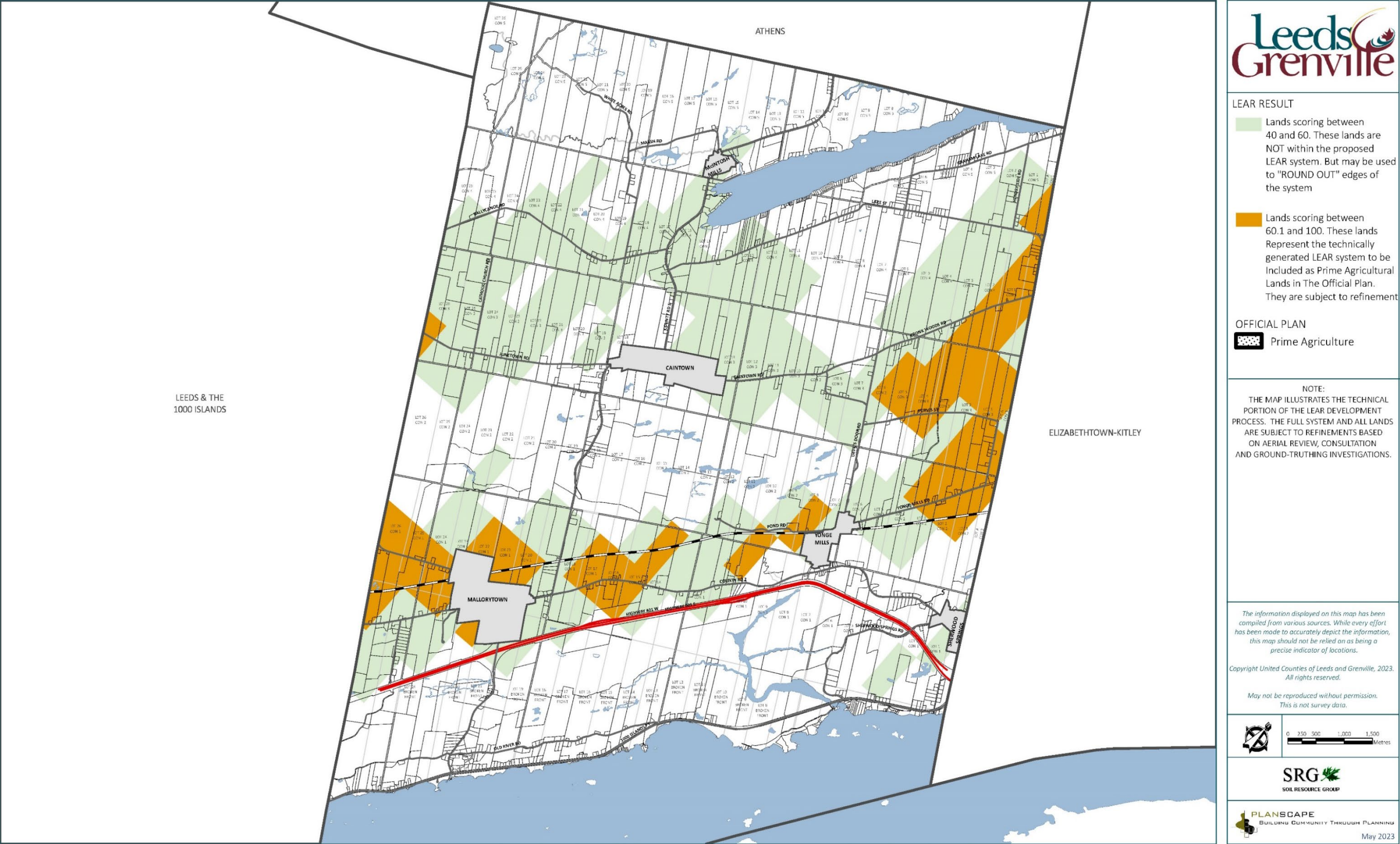




Figure 20: Township of Front of Yonge LEAR Map





## Appendix A: LEAR Data Sources

A number of data sources are used to compile all of the elements required to calculate the LEAR.

### Municipal Property Assessment Corporation (MPAC) Data

The Municipal Property Assessment Corporation is an independent, not-for-profit corporation funded by all Ontario Municipalities. The role of MPAC is to assess and classify all properties in Ontario for taxation purposes. This is done by continually collecting and updating detailed information for over five million properties in Ontario based on most recent use.

In the United Counties of Leeds & Grenville, MPAC data was utilized to provide information for the AR factors. For Fragmentation, MPAC parcel fabric was used to determine the level of fragmentation within each evaluation unit. For Lands in Production, MPAC data was queried using specific farm property codes determined by MPAC. These codes contain information regarding the type of farming occurring on that parcel of land. Unfortunately, due to crops that frequently change, MPAC data was used only as a base line.

### Source of Soil Data

Soil data for the study area was provided in GIS shapefile format as obtained through the Land Information Ontario (LIO) online warehouse. The soils data is the latest iteration of the Ontario Ministry of Agriculture, Food, and Rural Affairs (OMAFRA) soils database based on the original county soil survey reports of the study area:

**Soil Survey of Grenville County, Report No. 12 of the Ontario Soil Survey** (Richards N.R., B.C. Matthews, and F.F. Morwick, 1949)

(<https://sis.agr.gc.ca/cansis/publications/surveys/on/on12/index.html>), and **Soils of Leeds County,**

**Report No. 41 of the Ontario Soil Survey** (Gillespie, J.E., R.E. Wicklund and M.H. Miller, 1968)

([https://sis.agr.gc.ca/cansis/publications/surveys/on/on41/on41\\_report.pdf](https://sis.agr.gc.ca/cansis/publications/surveys/on/on41/on41_report.pdf)) to determine if the digital soils data has been modified from the original soil survey data.