

CITY OF HAMILTON GRIDS 2 / MCR –
PLANNING FOR GROWTH TO 2051:
FINAL GROWTH EVALUATION FRAMEWORK AND
PHASING CRITERIA

PREPARED BY DILLON CONSULTING LIMITED



PART 1: CONTEXT

Deciding how and where to grow is an important step of the planning process which will help to shape the future of the City of Hamilton for the next 30 years. A Place to Grow: Growth Plan for the Greater Golden Horseshoe (P2G) is a Provincial planning policy document that provides guidance and requirements for municipalities in planning for long term growth. P2G includes population and employment growth forecasts to 2051 for which the City is required to plan. P2G also requires completion of a land needs assessment which takes into account market demand for housing. The land needs assessment is a tool that allows the City to understand the land need implications for different growth options, including intensification targets (how much growth will happen in the built up area) and greenfield density targets (how many people per hectare will new greenfield development have). It is the land needs assessment and a Council-approved growth option that will determine whether or not a settlement (urban) area boundary expansion is necessary. If an expansion is required, P2G provides guidance and requirements on the approach to determining where settlement area boundary expansions can occur. In addition to the mechanics of population, employment and land needs, P2G also lays out a comprehensive set of planning policies to guide and shape various aspects of growth planning. The following document presents a framework informed by the City's policies and P2G (and other relevant provincial policies) to assist the City in making some key decisions around growth management, including:

- **How to grow?** Providing guidance based on P2G for how to select a preferred growth option for the City. The City is contemplating two alternatives at the City-scale: an 'Ambitious Density' Growth Option (1,330 ha expansion for new Designated Greenfield Lands) and a second alternative, called the 'No Urban Boundary Expansion' Growth Option. The growth options have different intensification targets, greenfield densities and housing mixes. They would also require different long term urban structure plans/policies to manage growth pressures.
- **Where to grow?** Depending on the Preferred 'How to Grow' Option, if an urban boundary expansion is required, determining where the City can feasibly expand its urban boundary by evaluating Candidate Expansion Areas.
- **When to grow?** Once the feasible Candidate Expansion Areas are determined, evaluating phasing scenarios to decide when these areas should be planned for development.

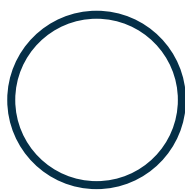
The following document is organized into four main parts. This first part provides a brief introduction on the background and purpose for the document. The subsequent parts are organized into the following:

- Part 2: "How Should Hamilton Grow?" - Evaluation Approach for Growth Options (Step 1),
- Part 3: Evaluation Approach for Expansion Options, Whitebelt Lands (Step 2), and
- Part 4: Evaluation Approach for Phasing, Whitebelt Lands (Step 3).

PART 2: 'HOW SHOULD HAMILTON GROW?' - EVALUATION APPROACH FOR GROWTH OPTIONS – STEP ONE

To assist Council in making a decision on the question of 'How to Grow', the following presents a framework on the evaluation approach for comparing two 'How to Grow' growth options: 'No Urban Boundary Expansion' and 'Ambitious Density'. This framework is informed by specific policies in P2G which provide municipalities directions on how to plan for growth. In particular, the policies of section 2.2.1 Managing Growth are of relevance and are used as the basis for the framework. The framework also reflects the Council-approved themes of the GRIDS 2 / MCR 10 Directions to Guide Development. To assess each option, the analysis will draw upon a number of information sources to test how well each option aligns with the Council approved themes and Provincial policy.

The evaluation results will show the line-by-line findings for each theme and the associated considerations.. Based on the balance of considerations, each 'How to Grow' growth option will receive a theme-level assessment according to the following categories which are used for illustrative purposes only:



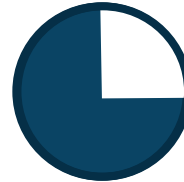
No aspect of the consideration is being addressed or considered



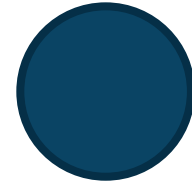
One or a couple aspects of the consideration are addressed or considered



Approximately half of the considerations are addressed or considered



The majority of the considerations are addressed or considered



All aspects of the consideration are reasonably addressed or considered

A recommendation and planning rationale as to which growth option should be used as the basis for long term planning will be made based on an interpretation of how well each growth option achieves the themes.

"HOW SHOULD HAMILTON GROW?" EVALUATION CRITERIA THEMES



1. Growth Allocation



2. Climate Change



3. Natural Hazards



4. Municipal Finance



5. Infrastructure & Public Service Facilities



6. Transportation Systems



7. Complete Communities





8. Agricultural System








9. Natural Heritage and Water Resources






10. Conformity with Provincial Methodology

THEME	CONSIDERATIONS	GROWTH OPTION 1: NO URBAN BOUNDARY EXPANSION	GROWTH OPTION 2: AMBITIOUS DENSITY (1,340 HA EXPANSION)	DATA SOURCES
Growth Allocation 	Does the growth option direct the vast majority of growth to the settlement area?			<ul style="list-style-type: none"> Anticipated growth allocations based on identified intensification rates and density targets
	Does the growth option focus growth in: <ul style="list-style-type: none"> a) Delineated built-up areas b) Strategic growth areas c) Locations with existing or planned transit, with a priority on higher order transit where it exists or is planned d) Areas with existing or planned public services facilities 			
Climate Change 	Does the growth scenario contribute to the City's goal of carbon neutrality by 2050 by providing opportunities for reductions in greenhouse gas emissions?			<ul style="list-style-type: none"> GHG Emissions Analysis Input from City staff and stakeholders
	Does the growth option present any significant opportunities or risks associated with climate change?			

THEME	CONSIDERATIONS	GROWTH OPTION 1: NO URBAN BOUNDARY EXPANSION	GROWTH OPTION 2: AMBITIOUS DENSITY (1,340 HA EXPANSION)	DATA SOURCES
Natural Hazards 	Does the growth option direct development away from hazardous lands?			<ul style="list-style-type: none"> Input from City staff and Conservation Authorities
Municipal Finance 	Are there any significant municipal financial risks associated with the growth option?			<ul style="list-style-type: none"> Fiscal Impact Assessment Input from City staff
Infrastructure & Public Service Facilities 	Does the growth option result in significant impacts to the City's existing or planned infrastructure and public service facilities?			<ul style="list-style-type: none"> Assessment of infrastructure and public service facility requirements
Transportation System 	Does the growth option result in significant impacts to the City's existing or planned transportation infrastructure?			<ul style="list-style-type: none"> Transportation network review Input from City staff
	Does the growth option provide an urban form that will expand convenient access to a range of transportation options including active transportation, to promote complete communities?			

THEME	CONSIDERATIONS	GROWTH OPTION 1: NO URBAN BOUNDARY EXPANSION	GROWTH OPTION 2: AMBITIOUS DENSITY (1,340 HA EXPANSION)	DATA SOURCES
<p>Complete Communities</p> 	Does the growth option prioritize development of areas that would be connected to the planned BLAST network or existing transit?			
	Does the growth option provide a diverse mix of land uses in a compact built form, with a range of housing options to accommodate people at all stages of life and to accommodate the needs of all household sizes and incomes?			<ul style="list-style-type: none"> • Proposed housing mix • Anticipated growth allocations based on identified intensification rates and density targets • Input from City staff
	Does the growth option improve social equity and overall quality of life, including human health, for people of all ages, abilities and incomes?			
	Does the growth option expand convenient access to an appropriate supply of open spaces, parks, trails and recreation facilities?			

THEME	CONSIDERATIONS	GROWTH OPTION 1: NO URBAN BOUNDARY EXPANSION	GROWTH OPTION 2: AMBITIOUS DENSITY (1,340 HA EXPANSION)	DATA SOURCES
Agricultural System 	Does the growth option prioritize development of areas that are non-prime agricultural?			<ul style="list-style-type: none"> Agricultural Impact Assessment, include the Agricultural & Rural Affairs Advisory Committee and the Canadian Land Inventory
	Does the growth option avoid, minimize and mitigate impacts on the Agricultural System, including Prime Agricultural Lands classifications 1, 2 and 3?			
	Does the growth option promote healthy, local and affordable food options, including urban agriculture?			
Natural Heritage and Water Resources 	Does the growth option avoid and protect Natural Heritage Systems as identified by the City and the Growth Plan?			<ul style="list-style-type: none"> Input from City staff, Conservation Authorities and the Hamilton Watershed Action Plan Team Available mapping (UHOP / RHOP) and information /studies
	Does the growth option demonstrate an avoidance and / or mitigation of potential negative impacts on watershed conditions and the water resource system including quality and quantity of water?			

THEME	CONSIDERATIONS	GROWTH OPTION 1: NO URBAN BOUNDARY EXPANSION	GROWTH OPTION 2: AMBITIOUS DENSITY (1,340 HA EXPANSION)	DATA SOURCES
Conformity with Provincial Methodology 	Has the growth option been assessed in accordance with the Provincial Land Needs Assessment Methodology to determine the quantity of land required to accommodate growth to the planning horizon?			<ul style="list-style-type: none"> Input from City staff, consultant, and the Province



PART 3: EVALUATION APPROACH FOR EXPANSION OPTIONS, WHITEBELT LANDS – STEP TWO

In the event that it has been determined that planned growth cannot be accommodated within the existing urban area, then an urban boundary expansion may be considered. The following section outlines the framework for assessing an urban boundary expansion.

An urban boundary expansion means that whitebelt lands may be added to the urban area, if appropriate and feasible. **Figure 1** shows community area and employment area whitebelt lands. Urban boundary expansions require justification to satisfy a number of Provincial and local policy tests. The land needs assessment for GRIDS 2 / MCR

Whitebelt lands are lands located within Rural Hamilton but not part of the Greenbelt and outside the existing City of Hamilton urban boundary.

Candidate Expansion Areas are Whitebelt lands located outside of the existing City of Hamilton urban boundary that may be able to accommodate the City of Hamilton's future population and employment growth should there be a need for an urban expansion. .

provides the overall justification for additional greenfield lands from a land needs perspective. If Council supports the 'Ambitious Density' scenario, approximately 1,340 ha of lands will need to be added to the urban area to support future Community Area growth. To assist the City with determining 'where' urban expansion growth should occur, there is a requirement to assess the feasibility of potential Candidate Expansion Areas to determine which lands are suitable for new urban designation. The Province and the City outline very specific feasibility criteria to be assessed for an urban boundary expansion.

Specifically, Policy 2.2.8.3 of the Growth Plan outlines the policy tests for assessing the feasibility of lands for urban boundary expansion. The City's Urban Hamilton Official Plan and the GRIDS 2 / MCR 10 Directions to Guide Development complement and support the policies outlined in 2.2.8.3 of the Growth Plan.

The overall approach for assessing Candidate Expansion Areas is a two-step process:

1. Evaluation to determine which whitebelt lands are feasible for expansion based on provincial and local criteria (Part 3 of this framework); and,
2. Phasing analysis, including more detailed technical analysis and modelling to determine which areas are most suitable for expansion and the associated timing for development (Part 4 of this framework).



This version of the expansion evaluation framework has been developed based on feedback from the public, stakeholders, and the GRIDS 2 / MCR Technical Working Group.

This part of the document presents the approach to item 1 identified above, the evaluation of whitebelt lands. The evaluation criteria outlined in this document will be used to assess the four Candidate Expansion Areas in Hamilton's whitebelt area. For ease of understanding, the urban boundary expansion evaluation criteria are organized around ten major themes (following page). While the themes have been identified as distinct items for simplicity, it is important to note that they are complementary and sometimes overlap. For example, prioritizing public transit as part of the consideration of the transportation system also supports climate change mitigation.

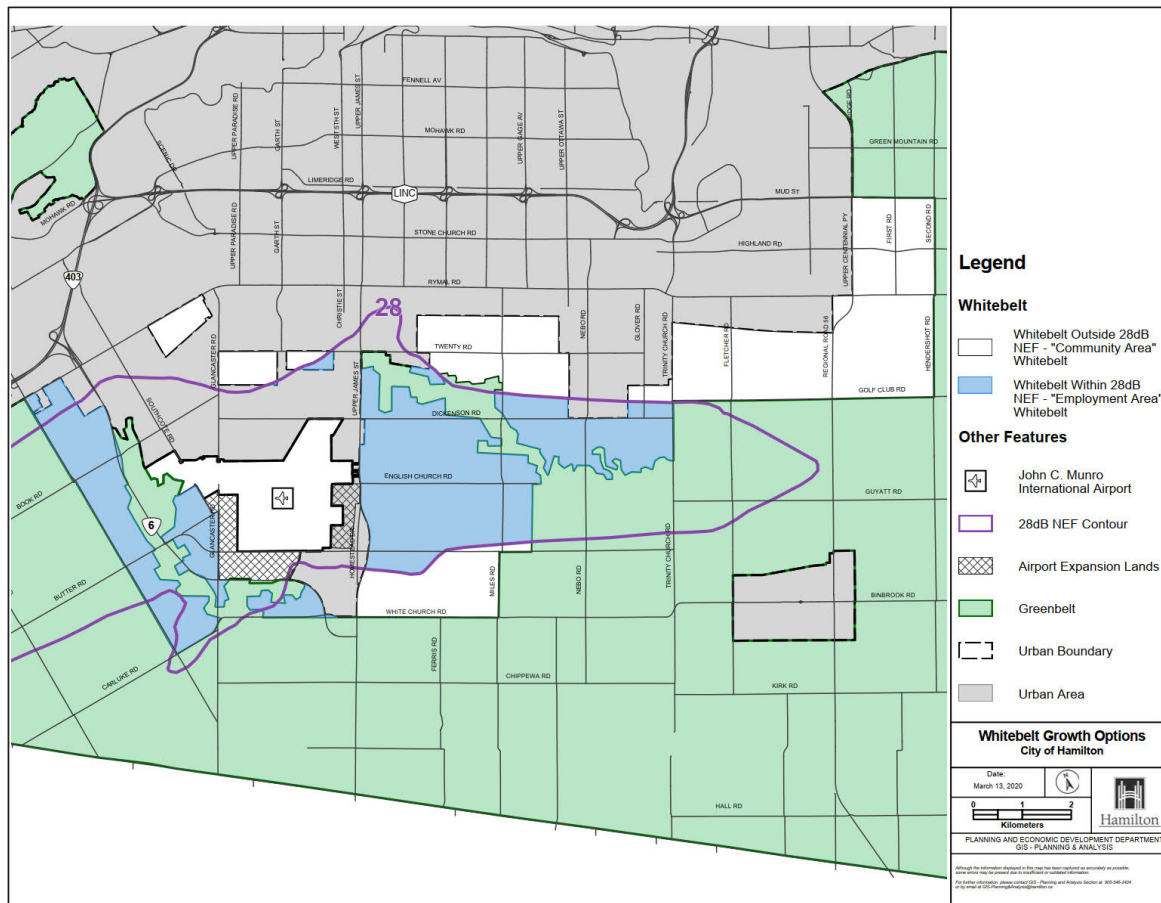


FIGURE 1: WHITEBELT LANDS IN HAMILTON

WHITEBELT EVALUATION CRITERIA THEMES



1. Climate Change



2. Natural Hazards



3. Municipal Finance



4. Servicing Infrastructure



5. Transportation Systems



6. Natural Heritage and Water Resources



7. Complete Communities



8. Agricultural System

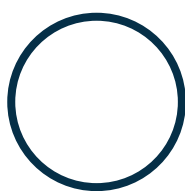


9. Natural Resources

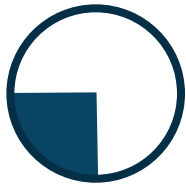


10. Cultural Heritage

Each of the evaluation criteria themes includes multiple key considerations. The considerations are connected to the policy tests outlined in the Growth Plan, Urban Hamilton Official Plan and the GRIDS-2 10 Directions to Guide Development. To assess each consideration, the analysis will draw upon a number of information sources to test the feasibility of each Candidate Expansion Area. The evaluation results will be documented in a detailed Technical Appendix, showing the line-by-line findings for each theme and the associated considerations. A theme-level summary will also be provided to help communicate how well each Candidate Expansion Area addresses the key considerations. Based on the balance of considerations, each Candidate Expansion Area will receive a theme-level assessment according to the following categories which are used for illustrative purposes only:



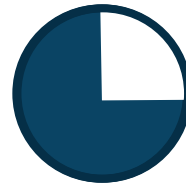
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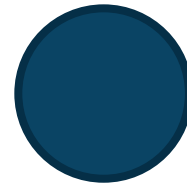
One or a couple aspects of the consideration are addressed or considered



Approximately half of the considerations are addressed or considered



The majority of the considerations are addressed or considered



All aspects of the consideration are reasonably addressed or considered

The overall recommendation as to whether a given Candidate Expansion Area is feasible for expansion will be based on the comprehensive application of all of the criteria and the most appropriate areas will advance to a more detailed Phasing Analysis in Part 4. The policies of P2G require that the City consider the Plan's policies in their entirety, accordingly there is no specific weighting that can be applied in the framework, rather the results will be used to assess whether a Candidate Expansion Area is considered feasible for a boundary expansion under P2G. Depending on the policy guidance in P2G, a

How will we formulate an opinion on which Candidate Expansion Areas are feasible for expansion?

The information gathered and considered will not use a specific weighting for the different themes, rather the assessment in this part of the process will be informed by an interpretation of the provincial policy framework in P2G and associated provincial and local plans. Accordingly, this will require an interpretation of the objective facts and a balancing of a range of policy considerations, which will be used as the basis for formulating a planning recommendation. The results of the evaluation along with the supporting rationale for which areas should proceed to the Phasing analysis will be supported by and documented in a planning report.

Candidate Expansion Area may not be carried forward to the detailed phasing analysis in an instance where the evaluation shows that the area addresses none or very few of the considerations.

It is also important to note that from a policy alignment perspective, there are foundational considerations which must be addressed in a fulsome manner in order for a growth option to proceed to the next steps, including a phasing analysis. For example, Growth Plan Policy 2.2.8.3(a) states that there is to be “sufficient capacity in existing or planned infrastructure and public service facilities” to accommodate the expansion which includes (but is not limited to) consideration of sewage and water systems, transit and transportation corridors and facilities, police and fire protection, and recreational, health and educational facilities. Similarly, Growth Plan Policy 2.2.8.3(b) requires that the “infrastructure and public service facilities needed would be financially viable over the full life cycle of these assets”. In this example, the interpretation of provincial policy would be that a Candidate Expansion Area which has access to existing or nearby infrastructure and public service facilities to support growth and that future planning (such as a secondary plan, development charges review, fiscal impact assessment, etc.) would be required to identify specific needs to service the area. These considerations differ from others, such as agriculture, where the Provincial direction is to avoid prime agricultural lands where possible and to minimize and mitigate the impact on the agricultural system where prime agricultural lands cannot be avoided. Accordingly, based on the interpretation of Provincial Growth Plan policies, if any one of the Candidate Expansion Areas addresses none of the considerations for Infrastructure Services, Transportation Systems or Municipal Finance, then the Candidate Expansion Area would likely not be feasible for expansion. However, from the perspective of agriculture, it’s possible that a Candidate Expansion Area could result in a loss of prime agricultural lands (if there are no alternative locations on lower priority lands), but still be brought forward within the Provincial planning framework for further analysis and consideration for a boundary expansion.



Climate Change

Climate change has the potential to have a range of impacts on the City including on infrastructure, the natural environment, and on existing and future residents and their communities. This demands consideration of climate change in the context of long range planning, recognizing both the risks and opportunities for climate change mitigation and climate change adaptation.

What are the key considerations?

Reduced GHGs and Sustainable Transportation

- Does the Candidate Expansion Area have the ability to promote a community form that reduces reliance on private automobiles helping to reduce transportation GHG's?

Energy Efficient Community Design

- Does the Candidate Expansion Area provide opportunities for energy efficient community

What information will we use?

- Level of connectivity of Candidate Expansion Area to existing or planned transit and active transportation network
- Review of City's planned urban structure

- Input from City staff
- Best practices for energy efficient community design including United

What are the key considerations?

What information will we use?

design, including alternative energy systems such as (but not limited to) district energy?	Nations' District Energy Cities: Unlocking the Potential of Energy Efficiency and Renewable Energy
Infrastructure Resiliency <ul style="list-style-type: none"> Is there sufficient capacity in existing stormwater management systems to manage potential changes in weather patterns and increased climate variability? Can the area be planned for stormwater management that provides resilience and consider climate change adaptability, such as Low Impact Development where appropriate? Can the area be planned to use stormwater management Best Management Practices? 	<ul style="list-style-type: none"> Capacity in existing stormwater management system based on population and employment forecast Available subwatershed studies Input from City staff on potential stormwater management constraints and opportunities and ability to implement best management practices and input from the Hamilton Watershed Action Plan Team
Prioritizing Tree Canopy Protection/Enhancement <ul style="list-style-type: none"> Does the Candidate Expansion Area support the maintenance and enhancement of the existing tree canopy? 	<ul style="list-style-type: none"> Assessment of existing tree canopy and potential for maintenance and enhancement should a boundary expansion occur Based on input from City with reference to available mapping and data
Avoid Natural Hazardous Lands <ul style="list-style-type: none"> Does the Candidate Expansion Area contain any natural hazards? 	<ul style="list-style-type: none"> Please refer to Natural Hazards Theme



Natural Hazards

Natural hazards, such as erosion and flooding hazards, have the potential to have a range of impacts on the City including on infrastructure, the natural environment as well as health and safety of residents and their communities. The Provincial policy framework generally prohibits development in natural hazard lands. Depending on the size and known risks related to hazardous lands, a particular expansion area may or may not be suitable for expansion.

What are the key considerations?	What information will we use?
Avoid Natural Hazardous Lands <ul style="list-style-type: none">• Does the Candidate Expansion Area contain any natural hazards?• Does the Candidate Expansion Area contain a significant amount of hazardous lands that would make the area unfeasible for future development?	<ul style="list-style-type: none">• Assessment of identified hazardous lands including but not limited to flood plains, slope stability, meander belt and erosion allowances, karst and other Conservation Authority regulated areas• Based on input from City and Conservation Authority staff with reference to available mapping and data



Municipal Finance

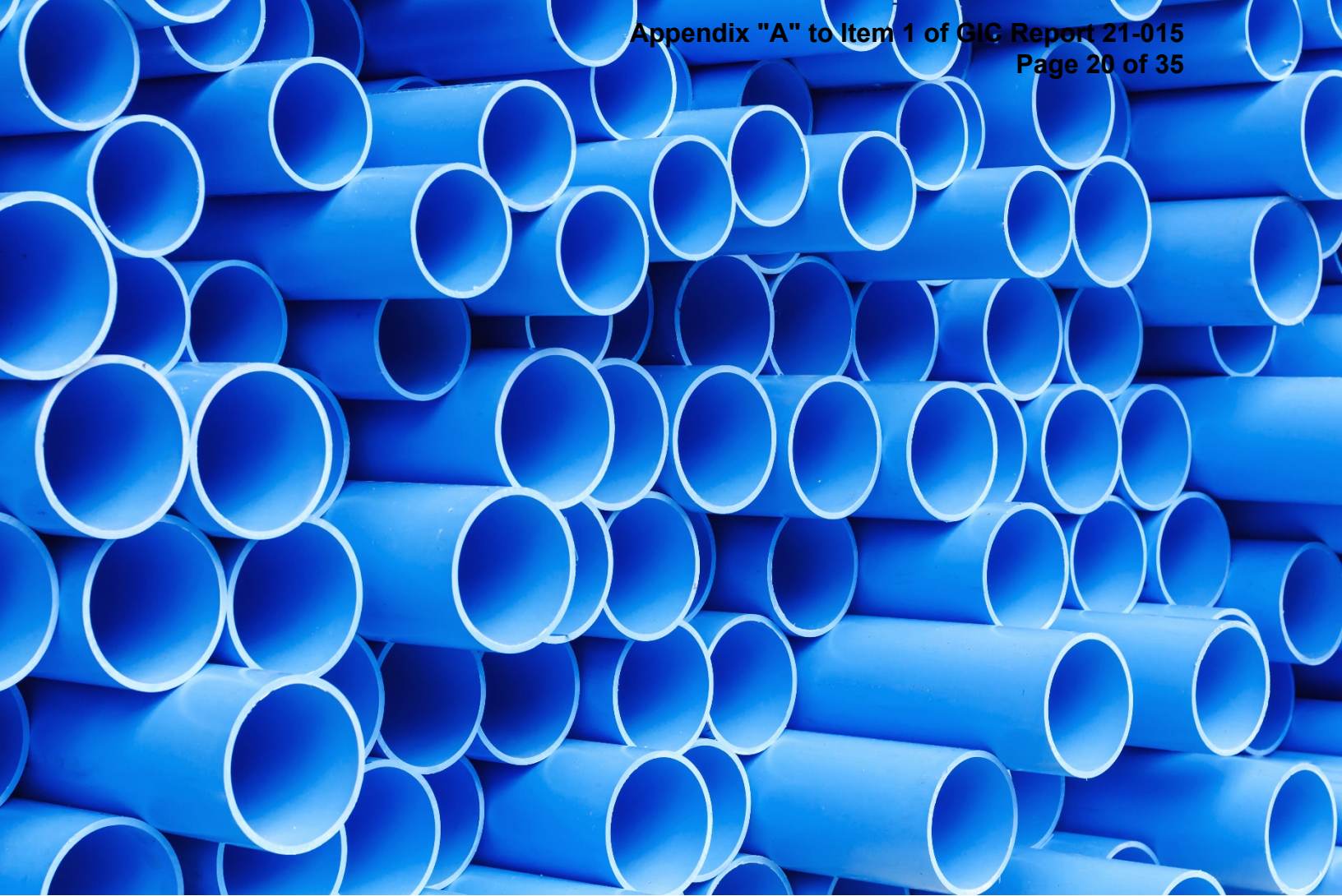
Municipal Finance involves managing existing and future financial impacts on the City, to ensure that the costs associated with growth are financially viable over the long term.

What are the key considerations?

- Does the Candidate Expansion Area have an unreasonable or unanticipated financial impact on the City?
- Would the municipal infrastructure (water, wastewater and transportation) and public service facilities needed be financially viable over the full life cycle of the assets?

What information will we use?

- High level assessment of potential financial impacts for Candidate Expansion Areas
- Based on input from City staff with reference to the Financial Impact Assessment
- Relative assessment of new infrastructure costs



Servicing Infrastructure

Servicing Infrastructure includes the physical structures that form the foundation for development and generally include water and wastewater systems, stormwater management systems and waste management systems. Transportation systems are addressed in the following section.

What are the key considerations?

Water Infrastructure

- Is there sufficient capacity in existing or planned water distribution and treatment systems?
- Are significant extensions / expansions beyond planned/budgeted trunk

What information will we use?

- High level assessment of new infrastructure requirements
- Assessment of capacity in existing and planned water/wastewater systems (where available/applicable)

What are the key considerations?

What information will we use?

infrastructure required in order to service this area?	<ul style="list-style-type: none"> Based on input from City staff and with reference to Water/Wastewater Master Plan
Wastewater Infrastructure <ul style="list-style-type: none"> Is there sufficient capacity in existing or planned wastewater collection and treatment systems? Are significant extensions / expansions beyond planned/budgeted trunk infrastructure required in order to service this area? 	<ul style="list-style-type: none"> High level assessment of new infrastructure requirements Assessment of capacity in existing and planned water/wastewater systems (where available/applicable) Based on input from City staff and with reference to Water/Wastewater Master Plan
Stormwater Management <ul style="list-style-type: none"> Is there sufficient capacity in existing or planned stormwater management systems based on current stormwater management criteria? 	<ul style="list-style-type: none"> Assessment of capacity in existing and stormwater management systems Assessment of capacity of any planned stormwater management systems (most areas do not have any planned systems, as this would be required as part of more detailed secondary planning) Assessment of new infrastructure requirements and costs (where available/applicable) Based on input from City staff and with reference to existing master plans and related documents and input from the Hamilton Watershed Action Plan Team
Integrated Waste Management Planning <ul style="list-style-type: none"> Is there sufficient capacity in existing waste management facilities? Is there sufficient capacity in planned waste management facilities? 	<ul style="list-style-type: none"> Assessment of capacity in existing and planned waste management facilities (where available/applicable) Based on input from City waste management staff and with reference to the Solid Waste Management Master Plan



Transportation System

Transportation Systems support the movement of residents and goods within the city as well as establishing a connection to the wider regional transportation network. Transportation Systems are comprised of facilities, corridors and rights-of-way and include roads, transit stops and stations, sidewalks, cycle lanes, bus lanes, HOV lanes, rail facilities, park and ride lots and a host of other transportation facilities.

What are the key considerations?

Prioritizing Public Transit

- Is the Candidate Expansion Area adjacent to an existing City transit route or stops?
- Can the Candidate Expansion Area be connected to a planned City transit route or stop in a way that is financially viable?

What information will we use?

- Assessment of the location of existing HSR transit routes/stops and planned or funded transit (BLAST) within 800 metres of Candidate Expansion Areas
- Based on reference to applicable UHOP, RHOP, and master plan mapping

What are the key considerations?	What information will we use?
<ul style="list-style-type: none"> Does the Candidate Expansion Area have potential to support the City's planned rapid transit BLAST network? 	<ul style="list-style-type: none"> Based on reference to the urban structure plan, transportation master plan and projected future density/population of Candidate Expansion Area
<p>Comprehensive Active Transportation Network</p> <ul style="list-style-type: none"> Is the Candidate Expansion Area adjacent to an existing or planned pedestrian or cycling network? Can the Candidate Expansion Area be connected to existing or planned pedestrian or cycling networks? 	<ul style="list-style-type: none"> Proximity to existing or planned pedestrian or cycling network Based on reference to applicable UHOP, RHOP, and master plan mapping Secondary sources such as the Ministry of Transportation Ontario's Transit Supportive Guidelines and potential for transit supportive densities
<p>Connected Street Network</p> <ul style="list-style-type: none"> Is there sufficient capacity in the existing and planned street network to accommodate the proposed increase in population and/or employment? Can a potential street network be added within the Candidate Expansion Area as a logical extension of the existing street network? Does it connect the Candidate Expansion Area to surrounding areas and key destinations? 	<ul style="list-style-type: none"> Review of existing and planned (where available/applicable) street network Assessment of potential street connectivity and block size Based on input from City staff and with reference to the existing street network and applicable UHOP, RHOP, and master plan mapping



Natural Heritage and Water Resources

A Natural Heritage System includes natural heritage features and areas, such as wetlands, woodlands, and wildlife habitat and the linkages that provide connectivity to support various natural processes. Water Resources are a system of features, such as groundwater features and surface water features, as well hydrologic functions which sustain healthy aquatic and terrestrial ecosystems and human water consumption.

What are the key considerations?

Protect Water Resource System

- Does the Candidate Expansion Area demonstrate an avoidance and/or mitigation of potential negative impacts on watershed

What information will we use?

- Assessment of indicators of hydrologic function

What are the key considerations?	What information will we use?
<p>conditions and the water resource system including quality and quantity of water?</p>	<ul style="list-style-type: none"> Based on input from City and Conservation Authority staff
<p>Avoid Key Hydrological Areas</p> <ul style="list-style-type: none"> Does the Candidate Expansion Area avoid key hydrologic areas including significant ground water recharge areas, vulnerable aquifers, surface water contribution areas, and intake protection zones? 	<ul style="list-style-type: none"> Assessment of Impacts to key hydrological areas Based on input from City and Conservation Authority staff with reference to available mapping and data
<p>Connected and Protected Natural Heritage System</p> <ul style="list-style-type: none"> Does the Candidate Expansion Area avoid and protect Natural Heritage Systems as identified by the City and the Growth Plan? 	<ul style="list-style-type: none"> Assessment of the location of Natural Heritage System Based on input from City and Conservation Authority staff with reference to available mapping and data
<p>Mitigate Impact on Natural Heritage</p> <ul style="list-style-type: none"> Does the Candidate Expansion Area maintain, restore, or enhance the functions and features of the area including diversity and connectivity of natural features, the long-term ecological function and biodiversity of natural heritage systems? 	<ul style="list-style-type: none"> Assessment of existing natural heritage features such as significant woodlots, wetlands, natural heritage corridors/linkages, and species at risk wildlife habitat. Based on input from City and Conservation Authority staff with reference to available mapping and data



Complete Communities

Complete Communities are places within a community that offer and support opportunities for people of all ages and abilities to conveniently access most of the necessities of daily living, including an appropriate mix of jobs, local stores, services, a full range of housing, transportation options and public service facilities.

What are the key considerations?

What information will we use?

Complete Community

- Can the Candidate Expansion Area function as a complete community including an appropriate mix of jobs, stores, services, housing, transportation options, and public service facilities for all ages and abilities?

- Assessment of the Candidate Expansion Area's ability to be designed as a complete community, based on relative size and location

Proximity to Existing Community Services and Amenities

- Could the Candidate Expansion Area contribute to the surrounding community's completeness?
- Is the Candidate Expansion Area contiguous to the existing settlement area boundary?

- Consideration of Candidate Expansion Area's ability to contribute to completeness based on potential for new community facilities, amenities and park space
- Assessment of proximity to existing parks, public facilities, amenities, etc
- Potential need for additional community facilities based on relative size of the expansion area
- Assessment of proximity of Candidate Expansion Area to existing settlement area and any development constraints which may impact/limit connectivity opportunities

Diverse Range of Housing and Affordable Housing

- Can the Candidate Expansion Area provide a diverse range and mix of housing options for all income levels and social needs, including affordable housing?

- Assessment of Candidate Expansion Area's ability to physically accommodate a mix of housing options and affordable housing



Agricultural System

The agricultural system is the land base used for the purposes of growing food and the raising of livestock, providing a source of food and employment to a community, as well as the agri-food network. The agricultural land base includes prime agricultural areas, specialty crop lands, and rural lands, and the agri-food network refers to the elements that support the viability of the sector, such as farm buildings, farm markets, distributors, processing facilities and transportation networks.

What are the key considerations?

Avoid Prime Agricultural Land / Mitigate Impact on Agricultural System

- Does the Candidate Expansion Area avoid prime agricultural areas? If not, are there reasonable alternatives that avoid prime agricultural areas?
- Does the Candidate Expansion Area provide an opportunity to mitigate or minimize impacts on **Canada Land Inventory classifications 1, 2 or 3**?
- Does the Candidate Expansion Area avoid/minimize fragmentation of agricultural lands and are contiguous agricultural lands retained?

Minimize Agri-food Network, Agricultural Operations, and Agricultural Systems Impacts

- Does the Candidate Expansion Area avoid or minimize and mitigate any adverse impacts on the agri-food network, including agricultural operations, to support local food security?
- Does the Candidate Expansion Area include lands that are actively being farmed, which may have an impact on local food security?

Minimize Impact on Existing Agricultural Assets

- Does the Candidate Expansion Area contain existing agricultural operational assets such as barns or processing facilities?

What information will we use?

- Assessment of prime agricultural areas and soil classes
- Based on input from City staff with reference to an Agricultural Impact Assessment and available mapping and data

- Assessment of agricultural operations and farm markets within and in proximity to the Candidate Expansion Area Based on input from City staff with reference to the Agricultural Impact Assessment and OMAFRA's guideline.

- Qualitative assessment of location of existing agricultural assets
- Based on information provided by the City and available through OMAFRA

What are the key considerations?

Compatibility with Existing Livestock Operations

- Is the Candidate Expansion Area in compliance with the minimum distance separation formulae?

What information will we use?

- Assessment of the distance between the Candidate Expansion Area and existing agricultural operations
- Based on the Minimum Distance Separation (MDS) Formula with reference to OMAFRA's guideline



Natural Resources

Natural resources are to be managed wisely and include mineral aggregate and petroleum resources.

What are the key considerations?

Aggregate Resources and Petroleum Resources

- Does the Candidate Expansion Area include any known mineral aggregate resource areas or petroleum resources?
- Are there any active mineral aggregate operations within or adjacent to the Candidate Expansion Area?
- Does the Candidate Expansion Area contain any active or abandoned gas and petroleum wells?

What information will we use?

- Assessment of aggregate resource areas and petroleum resource areas
- Assessment of active mineral aggregate operations
- Assessment of active or abandoned gas and petroleum wells



Cultural Heritage

Cultural heritage resources and archaeological resources that have been determined to have cultural heritage value or interest are to be conserved in order to foster a sense of place and benefit communities.

What are the key considerations?

Cultural Heritage Resources

- Does the Candidate Expansion Area contain significant cultural heritage resources including designated heritage properties and can they be conserved?

Archeological Resources

- Does the Candidate Expansion Area contain significant archaeological resources and can they be conserved?

What information will we use?

- Assessment of existing cultural heritage resources
- Consideration of Policy Framework
- Based on input from City staff with reference to RHOP and UHOP mapping

- Assessment of potential archaeological resources
- Consideration of Policy Framework
- Based on input from City staff with reference to RHOP and UHOP mapping
- Consultation with Indigenous communities



PART 4: EVALUATION APPROACH FOR PHASING, WHITEBELT LANDS – STEP THREE

Phasing is about timing of development and determining the appropriate order of development over time. While the Province does not outline specific phasing criteria, both the Growth Plan and the Provincial Policy Statement provide policy direction on efficient development patterns and use of infrastructure in addition to requiring integrated planning to implement the Growth Plan. If Council supports the 'Ambitious Density' growth option, the City will require a portion of its whitebelt lands to accommodate forecast community growth to 2051. Not all of the lands will be required for development immediately. The use of phasing criteria will allow the City to identify the timing of development for new greenfield areas. It is anticipated that a portion of the expansion lands will be required for development prior to 2031, additional lands between 2031 and 2041, and the remaining lands between 2041 and 2051.

Once the candidate area urban boundary expansion feasibility assessment is complete, all feasible expansion areas will be subject to a phasing analysis based on the criteria outlined in the following pages. To assist with the analysis, the City will identify a variety of alternative phasing scenarios. Each scenario will be evaluated and subject to detailed technical analysis to understand the growth implications.

The supporting technical analysis to be completed for the phasing scenarios will include:

- Agricultural Impact Study;
- Financial Impact Assessment;
- Transportation Assessment;
- Water infrastructure Assessment;
- Waste infrastructure Assessment;
- Stormwater Assessment; and,
- Greenhouse Gas Emissions Impact Assessment.

Additional technical analysis related to land use planning and market demand will also be considered. Where detailed technical studies have been completed and are available for specific areas, these materials will also be considered.




Each phasing scenario will be assessed against the criteria and ranked accordingly. The approach to ranking will be of the following:


- **Most Preferred:** In instances where there is a discernible positive difference between phasing scenarios, a particular scenario may be ranked as Most Preferred under a particular criteria.
- **Somewhat Preferred/Somewhat Less Preferred:** For scenarios which are slightly more or less preferred compared to the others.
- **Least Preferred:** In instances where there is a discernible negative difference between the phasing scenarios, a particular scenario may be ranked as Least Preferred.
- **No Meaningful Difference:** Finally, in recognition that there may be relatively small or minor differences when comparing the scenarios against a particular criteria, the assessment of No Meaningful Difference between the scenarios will be used.



As noted elsewhere, no specific weighting is proposed for phasing criteria, since the Province requires the City to apply the policies of P2G in their entirety when making a decision.

How will we decide on a preferred phasing scenario?

The information gathered and considered will be used complete an analysis of the phasing scenarios. The assessment will be a comparative analysis, with the goal of drawing out the relative strength and challenges for the Candidate Expansion Areas. The phasing scenario evaluation will draw upon technical modelling which will be used to identify a preferred phasing scenario. The results of the evaluation will be documented in a summary table, and where applicable supported by detailed technical memos for specific technical areas (e.g. Agricultural Impact Study). In addition to the summary table, the overall recommendations for phasing will be documented planning report.

THEME	PHASING CRITERIA	SCENARIO 1	SCENARIO 2	SCENARIO 3	SCENARIO 4
Climate Change 	Does the phasing scenario present any significant opportunities associated with climate change?				
	Does the phasing scenario present any significant risks associated with climate change?				
	Does the phasing scenario result in negative GHG emissions impacts?				
Municipal Finance 	What are the cost estimates associated with the phasing scenario?				
	Are there any significant municipal financial risks associated with the scenario?				
	What is the impact on municipal debt load/capacity?				
Servicing Infrastructure 	Does the phasing scenario allow for efficient servicing based on existing or planned water infrastructure?				
	Does the phasing scenario allow for efficient servicing based on existing or planned wastewater infrastructure?				

THEME	PHASING CRITERIA	SCENARIO 1	SCENARIO 2	SCENARIO 3	SCENARIO 4
Transportation System 	Does the phasing scenario allow for efficient stormwater management based on existing or planned stormwater master plans/Subwatershed studies?				
	Are there options which optimize the timing and delivery of servicing infrastructure to reduce the City's financial exposure?				
	Does the phasing scenario prioritize development of areas that would be connected to the planned BLAST network or existing transit?				
	Does the phasing scenario align well with existing and planned road network and existing and planned active transportation network?				
	What are the impacts of the phasing scenario on the capacity of the road network?				
	Are there options which optimize the timing and delivery of transportation infrastructure to reduce the City's financial exposure?				

THEME	PHASING CRITERIA	SCENARIO 1	SCENARIO 2	SCENARIO 3	SCENARIO 4
Complete Communities 	Does the phasing scenario support the creation of a complete community?				
	Does the phasing scenario contribute to a logical expansion of the existing urban area?				
	To what extent are the lands within the phasing scenario ready for development?				
Agricultural System 	Does the phasing scenario prioritize development of areas that are non-prime agricultural?				
	Does the phasing scenario minimize impacts on adjacent agricultural uses?				
	Does the phasing scenario support local food security through food production, processing and distribution?				
	Does the phasing scenario minimize land fragmentation?				