



Staff Report

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Report To:	Planning and Development Committee	
Date of Meeting:	October 4, 2021	Report Number: PDS-045-21
Submitted By:	Ryan Windle, Director of Planning and Development Services	
Reviewed By:	Andrew C. Allison, CAO	By-law Number:
File Number:	PLN 39	Resolution#:
Report Subject:	Clarington's Green Development Program	

Recommendations:

1. That Report PDS-045-21 and any communications be received; and
2. That all interested parties listed in Report PDS-045-21 and any delegations be advised of Council's decision.

Report Overview

Municipalities across Ontario are implementing Green Development Standards (GDS) as a tool to reduce greenhouse gas (GHG) emissions, promote local economic development and build community infrastructure that is more resilient to future climate and healthier for residents.

This report includes: an overview of GDS; a summary of the benefits experienced by municipalities in Ontario who have implemented GDS; an overview of the Whitby Green Standard; background on the development and implementation of Clarington's Green Development Program, which serves as Clarington GDS and; an overview of next steps for implementation of Clarington's Green Development Program to achieve the benefits demonstrated by GDS.

1. Background

- 1.1 On June 7, 2021, through Resolution #PD-188-21, Council directed staff to investigate and report back on the potential for implementing the Whitby Green Standard within Clarington's existing green initiatives, including options for more environmentally friendly roofing.
- 1.2 Climate change is significantly impacting cities across the world, including those in Canada. Municipalities are witnessing rising temperatures, increased severe weather events, threats to agriculture, and impacts to health.
- 1.3 In August 2021, the Intergovernmental Panel on Climate Change issued its 6th report on the state of the climate. The report warns that "global warming of 1.5°C and 2°C will be exceeded during the 21st century unless deep reductions in carbon dioxide (CO₂) and other greenhouse gas (GHG) emissions occur". An increase of more than 2°C will have catastrophic impacts on the natural environment, human health and wellbeing, agriculture and the economy.
- 1.4 The main sources of GHG emissions in most municipalities are buildings and transportation. These sources of GHG emissions can be reduced through standards that require high-performing new buildings, maintain and expand green spaces, and enable residents to easily access low or zero carbon transportation options such as electric vehicles, cycling and telecommuting.
- 1.5 Municipalities across Ontario are employing Green Development Standards (GDS) as a tool to reduce GHG emissions, build community infrastructure that is more resilient to future climate change, healthier for residents, and promotes local economic development.

2. Green Development Standards

- 2.1 GDS are policy measures developed by municipalities to encourage developers and builders to create thoughtful and innovative developments using sustainable design, which considers the principles of economic, social, and ecological sustainability.
- 2.2 GDS are comprehensive principles to guide development at a level of planning and design that focuses on the community as a whole.
- 2.3 GDS provide direction in shaping and structuring community design to minimize GHG emissions, preserve the natural environment, reduce infrastructure demands, and create connected communities.
- 2.4 A full suite of standards included in a GDS addresses Official Plan goals by managing growth and urbanization. In doing so, the built form of homes and public spaces reduce demands on infrastructure and reflect high environmental performance while creating healthy, complete, and sustainable communities.
- 2.5 Formalizing and implementing GDS can provide a basis for a municipality to review development applications, with a focus on new development.
- 2.6 A comprehensive program for implementing GDS must be designed to guide applicants through the program requirements and assist the municipalities in evaluating documents and technical reports provided in support of development applications, such as Planning Rationale Reports and/or Urban Design Briefs, that describe the sustainability aspects of proposed developments and how sustainable development policies of the Official Plan will be achieved.

Benefits of Green Development Standards

- 2.7 According to [research compiled by the Clean Air Partnership](#), which reviewed GDS from Toronto, Vaughan, Richmond Hill, Brampton and Halton Hills, GDS function as a tool to help municipalities achieve their priorities and goals to improve the economy and health of communities.
- 2.8 Whitby's GDS replicates the Toronto Green Standard. Therefore, the focus of this summary is on benefits of the Toronto Green Standard and GDSs more generally.
- 2.9 In 2008, [a cost-benefit study of the Toronto Green Standard](#) found that the marginal premium invested in green development can significantly improve environmental, social and economic outcomes, not only in Toronto, but the entire Greater Golden Horseshoe Region.
- 2.10 GDS provide a range of benefits that impact community members over multiple generations by reducing GHGs that are causing climate change, and creating healthy, complete, and sustainable communities that offer residents a high-quality of life. Some of the key benefits of GDS include:

- Use municipal infrastructure more efficiently - The burden on municipal infrastructure can be reduced with developments that conserve energy and water, manage stormwater runoff, and maintain green spaces.
- Reduce GHG emissions from new buildings and transportation - Buildings and transportation are large contributors to community GHG emissions in Ontario municipalities. GDS can reduce these emissions by implementing standards for energy efficiency and supporting community design that prioritizes low-carbon transportation.
- Support local economic opportunities - Green development requires innovative skills and products that can expand the green economy locally and regionally.
- Improve health and wellness for residents - Neighbourhoods with a compact, walkable form and integrated greenspace can improve physical and mental health.
- Enhance the local building stock - High quality buildings offer a more comfortable living environment, are quieter, and are less susceptible to mould as a result of air leaks.
- Increase resilience - Buildings that include resilience measures improve occupant comfort and are more resilient to extreme weather events.
- Create diverse communities - GDS can shape communities to meet the needs of seniors and an aging population, improve safety for vulnerable transportation users, and provide opportunities for economic development where employment space does not currently exist.
- Cost savings: Green buildings have lower operating costs compared to traditional buildings.

3. Legislative and Policy Framework

The Planning Act

- 3.1 The *Planning Act* provides municipalities with authority to mandate sustainable urban design through site plan approvals.
- 3.2 The *Planning Act* provides a framework and legislative authority for municipalities to engage in land-use planning by creating Official Plans, Zoning By-laws, and Community Improvement Plans. Municipalities, in carrying out their responsibilities under the *Planning Act*, must have regard to matters of provincial interest.
- 3.3 These interests give a clear indication of the kinds of issues municipalities should consider when creating policies and plans. These interests, coupled with the powers provided to municipalities in the Act, support them in implementing GDS.
- 3.4 Section 2 of the *Planning Act* sets out these interests, which include:

- The conservation of natural resources;
- The supply, efficient use and conservation of energy and water;
- The minimization of waste;
- The orderly development of safe and healthy communities; and
- The promotion of development that is designed to be sustainable, to support public transit and to be oriented to pedestrians

The Municipal Act

- 3.5 The *Municipal Act, 2001* is the primary piece of legislation applicable to municipalities and sets out the roles and responsibilities of municipal governments in Ontario. The Act is a legislative framework for municipalities that recognizes municipalities as responsible local governments with a broad range of powers.
- 3.6 Recent changes added the ability for municipalities to pass a by-law respecting the economic, social and environmental well-being of the municipality which includes actions to address climate change. Section 97.1 addresses standards for the construction of buildings, whereby a municipality may pass a by-law respecting the protection or conservation of the environment that requires buildings to be constructed in accordance with provisions of the Building Code under the *Building Code Act, 1992*.
- 3.7 Municipalities may provide for or participate in long-term energy planning for energy use in the municipality.
- 3.8 Municipalities also have the power to require the construction of green roofs or alternative roof surfaces that achieve similar levels of performance to green roofs.
- 3.9 Only Toronto has passed a bylaw mandating green roofs in certain new low slope commercial applications, as green and similar inverted roofing systems are considerably more expensive to construct, maintain and repair, and require more structural support than conventional roofing systems.

The Ontario Building Code

- 3.10 The *Building Code Act, 1992* is the legislative framework governing the construction, renovation and change-of-use of a building in Ontario. The Ontario Building Code (OBC) is a regulation under the *Building Code Act, 1992* which establishes technical requirements and minimum standards for building construction.
- 3.11 The OBC standards are adjusted to match industry adoption and best practices in energy and water conservation. As such, any public or private guidelines that are based on, or reference, energy efficiency measures prescribed by the OBC should be seen as living documents and should be reviewed on a regular basis to ensure that changes to the OBC are considered.
- 3.12 As noted above, recent changes to the *Planning Act* and *Municipal Act, 2001* demonstrate that municipalities have authority beyond the OBC when it comes to

shaping their communities. These pieces of legislation enable municipalities to address a range of environmental and health priorities at a community design level.

The Growth Plan for the Greater Golden Horseshoe

- 3.13 The Growth Plan for the Greater Golden Horseshoe, 2019 (Growth Plan) provides strategic direction for growth management across Ontario, particularly how and where to grow. The Growth Plan was adopted by the Province out of a desire to create communities that support economic prosperity, protect the environment, and achieve a high quality of life.
- 3.14 The Growth Plan advances policies related to human health and active living, equitable housing opportunities, sense of place, access to parks and open space, sustainable stormwater management, urban agriculture, active transportation, waste management, and low-carbon communities.
- 3.15 The Growth Plan supports maximizing the use of efficient infrastructure. The *Planning Act* provides a framework and legislative authority for municipalities to engage in land-use planning. The Growth Plan highlights Major Transit Station Areas (MTSAs), which are areas around major transit stops that are to be planned to accommodate higher intensity mixed-uses. Clarington currently has MTSAs proposed in Bowmanville and Courtice which would benefit from the inclusion of GDS in their design.

4. Green Development Standards in Ontario Municipalities

- 4.1 In Ontario, local governments are the approval authority for new construction under the *Planning Act*, where they implement section 41 of this legislation in their review and approvals of applications.
- 4.2 With this authority and their Official Plans, municipalities have significant influence on the quality and environmental performance of development. Many municipalities are developing and implementing GDS for this purpose.
- 4.3 In Ontario, many municipalities are using a “menu” approach that gives developers the option to pick from a list of measures and choose which they would like to implement. This approach is non-prescriptive, and often includes performance-based measures, such as Ener-guide ratings, rather than prescriptive measures that specify types of products or materials.
- 4.4 Of the municipalities in Ontario with GDS fully implemented, the Toronto Green Standard currently represents the most ambitious approach to requiring builders to consider the energy performance of their buildings. It is aligned with the direction most industry, sustainable professionals, and governments globally are heading — towards net zero emissions buildings.
- 4.5 The municipalities of Vaughan, Brampton and Richmond Hill have taken a regional approach to GDS that reduces complexity for developers who work across their

jurisdictions. By working together, they were able to share resources, reduce administrative complexity, and present a coordinated approach to engaging with their stakeholders.

- 4.6 Table 1 presents an overview of three longer standing GDS programs implemented in Ontario in addition to the program recently launched by Whitby. See **Attachment 1** for more detailed information about how GDS have been implemented in Toronto, Vaughan, Brampton, Richmond Hill, Halton Hills and Whitby.

Table 1 Overview of the GDS Programs Currently in Place in Select Ontario Municipalities

	Toronto	Vaughan/Brampton/ Richmond Hill	Halton Hills	Whitby
Metrics Apply To	All new development subject to the City's Site Plan Control Bylaw	Brampton and Vaughan metrics apply to Draft Plan of Subdivision, Site Plan, and Block Plan Richmond Hill metrics apply to Draft Plan of Subdivision and Site Plan	Low Rise Residential, Low Rise Non-Residential, Mid to High Rise Residential	All new development including Draft Plan of Subdivision and Site Plan
Requirements	Tier 1 of 4 tiers is mandatory. Tiers 2-4 are voluntary	Minimum number of points must be achieved (these thresholds are approved by council)	Minimum number of points must be achieved	Tier 1 of 4 tiers is mandatory. Tiers 2-4 are voluntary
Pathway Towards Net Zero	Council approved absolute performance targets to achieve zero carbon emissions by 2030	None currently	None currently	Council approved absolute performance targets to achieve zero carbon emissions by 2050
Financial Incentive	Development Charge Refund Program for applications that	No	No	Planning to develop incentives to promote for

	Toronto	Vaughan/Brampton/ Richmond Hill	Halton Hills	Whitby
	meet Tier 2 or higher level of voluntary performance standards			applications that meet Tier 2 or higher level of voluntary performance standards

5. Whitby Green Standard

- 5.1 The Whitby Green Standard (WGS) was created to develop a more sustainable community and support Whitby's goal to reduce GHG emissions. It has been designed to make an appreciable difference in the quality of new development and the vibrancy of new communities.
- 5.2 Implementation of the WGS is intended to be applied towards all new development applications within the Town of Whitby. The standard was developed over 18 months, working closely with staff from multiple departments as well as the development community through multiple engagement opportunities.
- 5.3 The WGS is similar to the Toronto Green Standard; however, it incorporates specific design criteria to suit the needs of the Whitby development landscape. It identifies two tools - one for plan of subdivision applications and one for site plan applications.
- 5.4 The WGS highlights both required and voluntary measures of sustainability design, setting a standard for all new development while also highlighting advanced opportunities through these two application processes.
- 5.5 The implementation of the WGS is developed to help streamline and increase transparency within the current development application process by bringing all sustainability requirements from a cross-sector of departments into one streamlined planning tool.
- 5.6 The WGS includes Site Plan and Plan of Subdivision Checklists organized into four tiers of sustainability elements. Tier 1 represents existing Town standards, with the addition of slightly advanced energy requirements, bringing all energy requirements to the same level as the existing Brooklin Secondary Plan. Tier 1 is intended as a required standard for all new development. The addition of energy efficiency requirements in Tier 1 allows the community to work towards reducing GHG emissions by encouraging more sustainable design.
- 5.7 Tiers 2 - 4 are voluntary and offer advanced sustainability criteria and serve as a road map as to how the Town would like to see sustainable development considered in future

years, with advanced sustainable features aligning with the Town's sustainability and climate change goals.

- 5.8 To aid the uptake of the voluntary standards (Tiers 2 - 4), it is intended that an incentive program will be developed after the initial program implementation for Tier 1. This time provides an opportunity to work with the development community to better understand the intent of the WGS so that any incentive program can be tailored to the needs of Whitby development.
- 5.9 Supporting documents to aid the implementation of the WGS include a detailed Reference Guide, a program brochure and a Training Guide.
- 5.10 Through the project's public consultation process, 152 respondents provided feedback. From that feedback, trees, energy efficiency, water efficiency, green space and storm water management were identified as being the most important features in a new home and a new community and the public survey indicated that 76% support the proposed WGS, whereas 16% are unsure and 8% do not support the standard.
- 5.11 The WGS is intended to be updated every four years through the advancement of the tiers. Monitoring and progress reporting of the standard would be captured through the key performance indicators used to measure the Town's progression towards sustainability.

6. Clarington's Green Development Program

- 6.1 In line with other municipalities in Ontario, Clarington has taken steps, to meet the needs of a quickly growing population in a sustainable manner. In January 2012 Council passed a resolution and allocated funding to support the establishment of a framework to promote the development of environmentally responsible, compact and complete new neighbourhoods throughout the community.
- 6.2 With additional Provincial and Federal funding support secured, Priority Green Clarington officially launched in 2013. Priority Green Clarington aimed to set a new standard for residential development that prioritized sustainability, promoted innovation, and continued to improve the community's quality of life.
- 6.3 To achieve this vision, the Municipality undertook a collaborative process to encourage "green" development from the initial stage of designing a neighbourhood, through to infrastructure installation and building construction. This included:
- Identification of best practices in residential green development, incentives and standards being used in Ontario and beyond;
 - Review of Municipal planning policies to identify opportunities to strengthen sustainable development practices in Clarington;
 - Establishment of criteria for what defines a "green" development in Clarington;

- Examination of how prioritization could be used to fast track “green” development applications;
 - Identification and preliminary evaluation of other potential incentive options to voluntarily encourage “green” development;
 - Review of the development approvals process to identify an implementation approach; and
 - On-going engagement and consultation with stakeholders and the broader community.
- 6.4 The process involved a comprehensive communication and engagement strategy. The vision of Priority Green Clarington was broadly supported by the community. From the perspective of builders and developers, a program needed to be flexible, easy to understand, aligned with other municipal requirements, and be voluntary and include incentives.
- 6.5 Consultation with key stakeholders examined the concept of program harmonization across municipalities. It was recognized that there may be significant benefits to basing Clarington’s program on work that had already been implemented in other communities. This provides consistency across jurisdictions to give designers and developers continuity in the format of the standards used in various municipalities, allows sharing of information and lessons learned between municipalities, and provides opportunities for streamlining enhancements and refinements to the standards.
- 6.6 At the time, a practitioners group involving representatives from municipalities within the Greater Golden Horseshoe were encouraging alignment with the program model recently set out by Richmond Hill, Brampton, and Vaughan.
- 6.7 The Municipality facilitated workshops involving land development and building industry representatives, and staff and agencies involved in the development review process to examine the model adopted by Brampton, Richmond Hill and Vaughan and seek input to determine if those criteria may be appropriate for use in the Clarington context.
- 6.8 On December 14, 2015, Council endorsed [Report PDS-060-15](#), the Priority Green Clarington: Green Development Framework and Implementation Plan (Framework), providing a road map for the detailed design and implementation of a Green Development Program for future residential development in Clarington (Resolution #C-334-15). It includes Secondary Plan, Draft Plan of Subdivision and Site Plan checklists organized into three tiers, mirroring the approach set out by Richmond Hill, Brampton and Vaughan
- 6.9 Ultimately, the green development framework recommended for Clarington achieved the objective of municipal program consistency, while reflecting local circumstances, attributes, priorities and policies.

- 6.10 Several actions have been completed or are underway that support implementation of the Framework, including the following:
- Official Plan Amendment 107 adopted by Council in 2016 included strengthened policies that enable the establishment and implementation of a Green Development Program for Clarington.
 - Implementation of the Framework components relating to Secondary Plans is being addressed with the multiple Secondary Plan updates and new Secondary Plans currently being developed by the Municipality.
 - The project performance evaluation framework set out in the Courtice Main Street Secondary Plan draws on the Framework criteria.
 - The inclusion of the performance evaluation framework as the basis for the grants and incentives in the Courtice Community Improvement Plan adopted by Council in 2017.
 - Land development applications are required to demonstrate how the development contributes to the sustainability principles of the Official Plan and prepare Sustainability Plans as part of a complete application.
 - A draft program guidebook is also under development.
- 6.11 Staff recognized the need to integrate Clarington's Green Development Program into ongoing municipal operations to achieve the benefits of GDS highlighted above.
- 6.12 The Clarington Corporate Climate Action Plan (CCCAP), which was approved by council in March 2021, identifies three priority actions to integrate Clarington's Green Development Program into ongoing municipal operations including:
- CCCAP Action 1.26 - Update the Priority Green Clarington Green Development Framework criteria checklists to include considerations for climate change mitigation and adaptation;
 - CCCAP Action 1.27 - Update Clarington's Planning and Development Design Standards and Guidelines to align with the Clarington Priority Green Development Framework to support moving toward net zero communities and;
 - CCCAP Action 1.28 - Complete the implementation of Clarington's Green Development Standards, including the development of a program guidebook, application instructions, and terms of reference for sustainability reporting.
- 6.13 Staff are currently developing action specific workplans to implement CCCAP Actions 1.26, 1.27 and 1.28 in 2022.
- 6.14 Metrics are also being developed for the actions that relate to Clarington's Green Development Program as a means of tracking and measuring municipalities effectiveness in implementing sustainability initiatives.

7. Next Steps

- 7.1 As outlined in this report, Clarington is among the municipalities in Ontario leading the development of standards to meet the needs of a quickly growing population in a sustainable manner.
- 7.2 Redeveloping Clarington's Green Development Program to align with Whitby and Toronto would divert significant resources and time that has been invested to establish the Municipality's current Green Development Program.
- 7.3 Although Clarington's Green Development Program was approved by Council in 2015, the features of the Program are still considered up to date; aligned with Brampton, Richmond Hill, Vaughan and Halton Hills; and uniquely suited to Clarington.
- 7.4 Staff recognize the need to streamline the implementation of Clarington's Green Development program within the current development application process to achieve the full benefits that the Green Development Program has to offer.
- 7.5 For the Municipality to complete implementation of Clarington's Green Development Program, staff will take the following actions as set out in the CCCAP:
 - Request additional resources as part of the 2022 budget, as it will require resources to update the Municipality's processes and policies for receiving and reviewing development applications to include GDS and associated requirements;
 - Consult with development sector representatives on the integration of Clarington of Clarington's Green Development Program into standard municipal development application processes.
 - As per action 1.27 of the CCCAP, update Clarington's Planning and Development Design Standards and Guidelines to align with the Clarington Priority Green Development Framework to support moving toward net zero communities;
 - Update the Municipality's processes and policies for receiving and reviewing development applications to include the GDS and the new associated requirements; clearly identifying the department(s) and position(s) responsible for reviewing each GDS submission;
 - As per action 1.26 of the CCCAP, update the Priority Green Clarington Green Development Framework criteria checklists to include considerations for climate change mitigation and adaptation;
 - Integrate a GDS checklist tool into the development application process to guide applicants to achieve the GDS and guide staff reviewing the GDS component of development application submissions.

- As per action 1.28 of the CCCAP, complete the implementation of Clarington's Green Development Standards, including the development of a program guidebook, application instructions, and terms of reference for sustainability reporting.
- Update all public-facing development application documents and forms to reflect the GDS new requirements, including the website and brochures.
- Develop and implement a communications plan to educate staff on updated GDS development application components and review process.
- Develop and implement a public-facing communications plan to educate stakeholders of the updated GDS components of the GDS development application processes.
- Finalise a strategy to track and monitor the uptake and effectiveness of implementing specific standards, best practices and lessons learned.

8. Concurrence

Not Applicable.

9. Conclusion

- 9.1 Clarington has taken significant steps to ensure the Municipality is growing in a sustainable manner. By completing the integration of Clarington's Green Development Program into the Municipality's development application processes, Clarington will be in the best position to take advantage of the long term economic, environmental and social benefits that have been experienced by other municipalities through the implementation of GDS. By using the development approval process as a mechanism to promote the reduction of energy consumption and GHG emissions in the building sector, the Municipality will be doing its part to conserve resources, respond to climate change and protect the wellbeing of residents.

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Attachments:

Attachment 1 - Review of Green Development Standards in Ontario

Interested Parties:

The Durham Region Homebuilders' Association

BILD – Durham Chapter