



Whitby Green Standard (WGS) Version 2 Checklist

Priority (PR) Performance Measures

Number	Development Feature	Tier 1 Criteria	Tier 2 Criteria	Tier 3 Criteria
PR 1	Building Energy Performance (Residential Buildings Four Storeys or More)	Achieve National Energy Code of Canada for Buildings (NECB) Tier 2 (25% energy savings from OBC) for the development.	Achieve NECB Tier 3 (50% energy savings from OBC) for the development.	Achieve NECB Tier 4 (60% energy savings from OBC) for the development.
PR 2	Building Energy Performance (Low Rise Residential Buildings)	Achieve National Building Code (NBC) Tier 3 or certify to ENERGY STAR®.	Achieve NBC Tier 4 (25% improvement from OBC).	Achieve NBC Tier 5 (60% improvement from OBC).
PR 3	Building Emissions Performance	Achieve NECB/NBC 2025 Level D (25% improvement) Operational GHG Emissions.	Achieve NECB/NBC 2025 Level C (50% improvement) Operational GHG Emissions.	Achieve NECB/NBC 2025 Level B (75% improvement) Operational GHG Emissions.
PR 4	Building Commissioning (Mid to High-Rise Residential & All Non-Residential Development)		Commit to developing a commissioning plan for all buildings following a published standard on commissioning (ASHRAE Guideline 0-2019 and ASHRAE Guideline 1.1-2007 for HVAC&R systems (or equivalent)), related to energy, water, indoor environmental quality, and building envelope.	
PR 5	District Energy/Geothermal Systems	Explore options such as geothermal systems or waste water heat recovery. Where district energy options are available, explore options to connect.		



Whitby Green Standard (WGS) Version 2 Checklist

PR 6	Electric Vehicle Charging Stations		<p>Include an energized outlet capable of supporting Level 2 charging adjacent to 20% of parking spaces. Outlets should be spaced out to allow circuit sharing between multiple parking spaces.</p> <p>For single family homes or row houses provide one energized outlet per residence.</p> <p>In the event the local utility does not have adequate power supply in the area to support the required outlets, a letter from the utility stating this must be provided. The applicant must provide a revised number of energized outlets that is feasible based on grid constraints.</p>	



Whitby Green Standard (WGS) Version 2 Checklist

Site Specific (SS) Performance Measures

Number	Development Feature	Tier 1 Criteria	Tier 2 Criteria	Tier 3 Criteria
SS 1	Accessibility		<p>At least 18% of suites within a multi-unit residential building must be designed with basic accessibility features such as a barrier-free path of travel and doorway into the:</p> <ul style="list-style-type: none"> • kitchen • bedroom • living room • full bathroom 	<p>At least 20% of suites within a multi-unit residential building must be designed with basic accessibility features such as a barrier-free path of travel and doorway into the:</p> <ul style="list-style-type: none"> • kitchen • bedroom • living room • full bathroom
SS 2	<p>Building Resilience</p> <p>For residential buildings four storey or more and non-residential buildings</p>	<p>Provide a refuge area with heating, cooling, lighting, potable water, and power available and 72 hours of back-up power to the refuge area and essential building systems.</p>	<p>Using resources such as Whitby's Climate Emergency Response Plan and Climate Insights mapping tool, provide a summary of how the development address key aspects of building resilience.</p>	
SS 3	Tree Canopy and Soil Volume		<p>A 30% tree canopy for the site area, excluding the building footprint, must be achieved within 15 years of development.</p> <p>Each separate, new, or retained tree planting area must have access to a minimum soil volume of 30 m³ of uncompacted soil or employ soil cell technologies.</p>	
SS 4	<p>Heat Island Effect:</p> <p>For residential buildings four storeys or more and non-residential buildings</p>	<p>Comply with one of the following strategies:</p> <p>Option 1 - Roof: 50% of the available roof area of all new buildings within the project have a minimum solar reflectance index value of 82 (for low-sloped roofs <2.12) or 39 (for steep-sloped roofs >2.12).</p> <p>Option 2 - Non-roof: Provide any combination of the following strategies for 50% of the site hardscape (including roads, sidewalks, courtyards and parking lots):</p> <ol style="list-style-type: none"> 1. Shade (within 5 years of occupancy) 2. Paving materials with a Solar Reflectance Index (SRI) of at least 29 3. Open grid pavement system 		



Whitby Green Standard (WGS) Version 2 Checklist

SS 5	<p>Bird and Bat Friendly Glazing:</p> <p>For residential buildings four storeys or more and non-residential buildings</p>	<p>Treat all glass balcony railings within the first 12 m of the building above grade.</p> <p>Fly-through conditions: Treat glazing at all heights resulting in fly-through conditions with visual markers at a spacing of no greater than 50 mm x 50 mm. Fly through conditions that require treatment include:</p> <ul style="list-style-type: none"> • Glass corners • Parallel glass • Building integrated or free-standing vertical glass • At-grade glass guardrails • Glass Parapets. 	<p>Use a combination of the following strategies to treat a minimum of 95% of all exterior glazing within the greater of the first 12 m of the building above grade or the height of the mature tree canopy (including all balcony railings, clear glass corners, parallel glass and glazing surrounding interior courtyards and other glass surfaces):</p> <ul style="list-style-type: none"> • Low reflectance, opaque materials. • Visual markers applied to glass with a maximum spacing of 100 mm x 100 mm. • Building-integrated structures to mute reflections on glass surfaces. 	
SS 6	Renewable Energy	Run a protected pathway to the roof to facilitate a future installation of renewable energy equipment.	Size out renewable energy systems for the roof and install appropriately sized conduit to facilitate a future installation of renewable energy equipment.	



Whitby Green Standard (WGS) Version 2 Checklist

Value Add (VA) Performance Measures

Number	Development Feature	Tier 1 Criteria	Tier 2 Criteria	Tier 3 Criteria
VA 1	Ecological Integrity, Restoration of Biodiversity and Pollinator Habitat	<p>Option 1 - (High Rise Residential and Non Residential) - Provide a minimum of 30% of Available Roof Space as biodiverse green roof to support pollinator species.</p> <p>or</p> <p>Option 2 - Plant 50% (ground area) native plant species, including trees, shrubs and herbaceous plants preferably drought-tolerant and pollinator-friendly outside of the buffer area and within the development limit. Remaining non-native species must be non-invasive.</p>	<p>Option 1 - (High Rise Residential and Non Residential) - Provide a minimum of 50% of Available Roof Space as biodiverse green roof to support pollinator species.</p> <p>or</p> <p>Option 2 - Plant 75% (ground area) native plant species, including trees, shrubs and herbaceous plants preferably drought-tolerant and pollinator-friendly outside of the buffer area and within the development limit. Remaining non-native species must be non-invasive.</p>	Using at least 75% plant species native to southeast Ontario, restore predevelopment native ecological communities, water bodies, or wetlands on the project site in an area equal to or greater than 20% of the development footprint.
VA 2	Stormwater Management Quality (Private Lots/Units)	Provide an enhanced level of protection for water quality through the long-term average removal of 80% of Total Suspended Solids (TSS) on an annual loading basis from all runoff leaving the site.		
VA 3	Water Balance		Commit to conducting continuous monitoring for two years after construction to evaluate the success of the mitigation methods (LIDs) to be implemented to maintain water balance within the Site. A monitoring report shall be provided to CLOCA and the Town that outlines the corrective measures to be taken should the LIDs not be functioning as designed. The report shall include reference to party deemed responsible for ongoing monitoring.	Commit to conducting continuous monitoring for five years after construction to evaluate the success of the mitigation methods (LIDs) to be implemented to maintain water balance within the Site. A monitoring report shall be provided to CLOCA and the Town that outlines the corrective measures to be taken should the LIDs not be functioning as designed. The report shall include reference to party deemed responsible for ongoing monitoring.



Whitby Green Standard (WGS) Version 2 Checklist

VA 4	Stormwater Management Quantity	Employ Best Management Practices that replicate natural site hydrology processes, retain (i.e. infiltrate, evapotranspire, or collect and reuse) on-site the runoff from the developed site. Reduce the runoff from local rainfall events by an additional 5%, on top of erosion and water balance targets established through applicable Watershed/EA/Stormwater Studies and Geotech/Hydro Reports for this Development, using low-impact development (LID) and green infrastructure (GI) practices.	Employ Best Management Practices that replicate natural site hydrology processes, retain (i.e. infiltrate, evapotranspire, or collect and reuse) on-site the runoff from the developed site. Reduce the runoff from local rainfall events by an additional 10%, on top of erosion and water balance targets established through applicable Watershed/EA/Stormwater Studies and Geotech/Hydro Reports for this Development, using LID and GI practices.	Employ Best Management Practices that replicate natural site hydrology processes, retain (i.e. infiltrate, evapotranspire, or collect and reuse) on-site the runoff from the developed site. Reduce the runoff from local rainfall events by an additional 15%, on top of erosion and water balance targets established through applicable Watershed/EA/Stormwater Studies and Geotech/Hydro Reports for this Development, using LID and GI practices.
VA 5	Potable Water - Irrigation for Lots/Units	Where soft landscaping exists, follow the Outdoor Water Use Reduction credit in LEED Building Design and Construction v4 and achieve a 60% reduction in irrigation use. Low rise residential projects may install rain barrels in lieu of demonstrating a reduction using the LEED methodology.	Where soft landscaping exists, follow the Outdoor Water Use Reduction credit in LEED Building Design and Construction v4 and achieve an 80% reduction in irrigation use. Low rise residential projects may install rain barrels in lieu of demonstrating a reduction using the LEED methodology.	Where soft landscaping exists, follow the Outdoor Water Use Reduction credit in LEED Building Design and Construction v4 and achieve a 100% reduction in irrigation use. Low rise residential projects may install rain barrels in lieu of demonstrating a reduction using the LEED methodology.
VA 6	Salt Management		Provide well-planned, designated snow storage area(s) to ensure meltwater drains as intended in the site design.	
VA 7	Waste Collection and Storage For residential buildings four storeys or more and non-residential buildings	Provide dedicated areas accessible to waste haulers and building occupants for the collection and storage of recyclable and compostable materials for the entire building. Collection and storage areas may be in separate locations. For residential developments, provide a cabinet space in all kitchen suites for the segregated collection of recyclables and garbage. For developments with municipal compost programs, collection space for organics should also be provided.		



Whitby Green Standard (WGS) Version 2 Checklist

VA 8	Construction Waste Reduction	<p>Prepare a construction waste management plan that includes:</p> <ul style="list-style-type: none"> • A summary of the main types of waste that are expected to be generated on-site. • A description of the waste sorting plans. • A list of the recycling facilities those will be taken to for diversion. <p>A corporate waste management plan may be substituted as long as it provides a list of suitable or regional recycling facilities for each type of waste.</p> <p>Provide a commitment that during construction a monthly report will be submitted to sustainability by the Developer for validation.</p>		
VA 9	Embodied Carbon		<p>Report embodied carbon of applicable bulk materials based on product specific Environmental Product Declaration (EPD):</p> <ul style="list-style-type: none"> • concrete • steel • masonry • wallboard • glass • thermal insulation, and • wood <p>Where product specific EPD's are not available, find industry average. OR Commit to a member of project team receiving training on embodied carbon.</p>	<p>Conduct a life-cycle assessment of project for lifecycle phases A1-A3.</p> <p>Low rise residential projects are to use either the BEAM or MCE2 Material Carbon Emissions Estimator methodology, and tools. Achieve an embodied carbon intensity of 250 kg CO₂e/m² (unchanged from Tier 2).</p> <p>Other projects are to use the CAGBC ZCB-Design v4 methodology and achieve an embodied carbon intensity of 250 kg CO₂e/m².</p>
VA 10	<p>Functional Entry to the Urban Mobility Network</p> <p>For residential buildings four storeys or more</p>	<p>All new buildings have pedestrian and cyclist connectivity to the active transportation network including sidewalk, multi use pathways, or trails.</p>		



Whitby Green Standard (WGS) Version 2 Checklist

VA 11	Bike Storage: Short Term	<p>All new buildings provide the following short-term bike storage rates:</p> <ul style="list-style-type: none"> • Non-residential: 2.5% of peak visitors • Multi-unit residential: 2.5% of peak visitors • Retail: 2 spaces for every 465 sqm • Mixed-use: Weighted average as per above requirements <p>Storage should be covered and secure, within line of sight of main entrance.</p>	<p>All new buildings provide the following short term bike storage rates:</p> <ol style="list-style-type: none"> 1. Non-residential: 5% of peak visitors 2. Multi-unit residential: 5% of peak visitors 3. Retail: 2 spaces for every 465 sqm 4. Mixed-use: Weighted average as per above requirements <p>Storage should be covered and secure, within the line of sight of main entrance.</p>	<p>All new buildings provide the following short term bike storage rates:</p> <ol style="list-style-type: none"> 1. Non-residential: 7.5% of peak visitors 2. Multi-unit residential: 7.5% of peak visitors 3. Retail: 2 spaces for every 465 sqm 4. Mixed-use: Weighted average as per above requirements <p>Storage should be covered and secure, within the line of sight of main entrance.</p>
VA 12	Bike Storage: Long Term		<p>Provide the following long term bike storage rates:</p> <ol style="list-style-type: none"> 1. Non-residential: 7.5% of peak visitors 2. Multi-unit residential: 30% of all regular building occupants 3. Retail: 7.5% of regular building occupants 4. Mixed-use: Weighted average as per above requirements <p>For non-residential provide at least one on-site shower with changing facility for the first 100 regular building occupants and one additional shower for every 150 regular building occupants thereafter.</p>	<p>Provide the following long term bike storage rates:</p> <ol style="list-style-type: none"> 1. Non-residential: 10% of peak visitors 2. Multi-unit residential: 30% of all regular building occupants 3. Retail: 10% of regular building occupants 4. Mixed-use: Weighted average as per above requirements <p>For non-residential provide at least one on-site shower with changing facility for the first 100 regular building occupants and one additional shower for every 150 regular building occupants thereafter.</p>
VA 13	Local Food Production	<p>Include one of the following in the project:</p> <ul style="list-style-type: none"> • Food growing space • Urban agriculture • Community gardens • Community kitchen • Food education program • CSA pick up • Tie-up with local grocery • Planter boxes provided to residents 		



Whitby Green Standard (WGS) Version 2 Checklist

VA 14	Access to Private Parks/Amenity/Landscaped Open Space	At least 75% of privately owned commercial or residential buildings with a floor area of 10,000 m ² or more must include a publicly accessible space of at least 186 m ² . This space should be open to the public at all times, except when closed for regular security reasons (like overnight) or during special events.		
VA 15	Water Metering For residential buildings four storeys or more and non-residential buildings	Install permanent water meters that measure the total potable water use for the building and associated grounds. Meter readings can be manual or automated.		
VA 16	Recycled/ Reclaimed Materials	At least 20% of base asphalt for the development is comprised of recycled materials.		
VA 17	Weather Protection For residential buildings four storeys or more and non-residential buildings	Provide covered outdoor waiting areas for pedestrian comfort and protection from the sun or inclement weather.		
VA 18	Parking Footprint For residential buildings four storeys or more and non-residential buildings	Locate all new off-street surface parking lots at the side or rear, leaving building frontages facing the circulation network free of surface parking lots (alleys may be exempted).		
VA 19	Renewable Energy	Design on-site renewable energy systems to supply a minimum of 5% of the building's total energy load from solar PV, solar thermal or wind, or 20% from geo-exchange.		
VA 20	Solar Readiness For residential buildings four storeys or more and non-residential buildings.	Design and orient 75% or more of the project's total building floor area (excluding existing buildings) such that one axis of each qualifying building is at least 1.5 times longer than the other, and the longer axis is within 15 degrees of geographical east-west.		
VA 21	Submetering For residential buildings four storeys or more and non-residential buildings.	Install energy sub-meters, including electrical, thermal, or gas, for each heating and cooling appliance in all residential units or for each tenant in multi-tenant commercial buildings.		
VA 22	Air Tightness Testing For residential buildings four storeys or more and non-residential buildings.	Submit an authorized contract confirming developer's commitment to performing air tightness testing.		