Sustainability Performance Metrics

Measuring Sustainability Performance of New Development in Brampton, Richmond Hill and Vaughan

Canada Green Building Council Event
Green Homes Summit
January 28, 2016
Black Creek Pioneer Village
Emerging Planning Trends

Bill 51 (PCLSLAA)

Environmental Commissioner of Ontario:

The Planning Act now requires municipalities to have regard to the promotion of development that is designed to be sustainable, to support public transit and to be oriented to pedestrians. This is important if Ontario communities are to move toward sustainability.
municipal collaboration

• Provide municipal staff with tools to guide and quantify the sustainability performance of new developments.

• Provide the development industry with a consistent set of sustainability guidelines and metrics across 3 municipalities.

• Value-added elements of the project include:
  • Municipal collaboration;
  • Metric testing in staff workshops;
  • Excel tool for scoring applications (consultant addition);
  • Alignment with objectives of health agencies.

Leveraged $$
Project Development:

What Aspects of Sustainability can be affected at the local level?
Built Environment
Built Environment
Built Environment: Mixed Use Communities
Mobility
Mobility
Green Infrastructure: Sewers and Pipes
Green Infrastructure
“Phase 1” – Sustainability Guidelines

- Sustainable Community Development Guidelines (SCDGs) prepared for Brampton

- SCDGs set out the qualitative preferences for the physical design of the built environment which set the framework for the Phase 2 work

**Built Environment**
1. Compact Development
2. Community Form
3. Mix and Diversity of Land Uses
4. Housing Mix and Diversity
5. Walkability
6. Public Health
7. Cultural Heritage
8. Economy

**Natural Environment and Open Space**
1. Natural Heritage System
2. Parks
3. Stormwater Management Facilities
4. Urban Agriculture
5. Urban Forest

**Mobility**
1. Street Network and Block Design
2. Transit Supportive
3. Active Transportation
4. Streetscape Elements/Pedestrian Supportive Design

**Green Infrastructure and Building**
1. Energy Conservation
2. Water Use and Management
3. Material Resources and Solid Waste
4. Air Quality
5. Lighting
6. Green Buildings/Green Sites
7. Stewardship and Education
Drafting Metrics – Example of Iteration

PARKS PLANNING / NATURAL HERITAGE
Natural Heritage Enhancement

FIRST DRAFT (July 2012)
Community Open Space (community center, organized sports, multiple play fields, etc.) located within a 10-20 minute walking distance

DRAFT METRIC FOR WORKSHOP #1 (OCT. 2012)
Natural green space within 10 minute walk to 75% of DU and Jobs

Workshop Input:
Most groups didn’t like this requirement. Suggested changing it to a visual connection to green space rather than a proximity.

Technical Input: little control over the presence or natural features on an application, but there is control on the amount access provided to these features.

FINAL APPROVED METRIC (FALL 2013)
Visual and physical connection are provided to 25% to 50% of the natural heritage system and parks
- Public access blocks
- Single loaded roads
## 1. Static Tool

### Block Plan (B) & Draft Plan (D) Metrics

<table>
<thead>
<tr>
<th>Category</th>
<th>Indicator</th>
<th>Applies To</th>
<th>Metric #</th>
<th>Metric</th>
<th>Mandatory Target</th>
</tr>
</thead>
</table>
| Compact Development| B&D       | B          | 1        | Persons & Jobs per hectare  
Note: Each municipality defines density ranges by land use types within the Official Plan and the Secondary Plans | Places to Grow - 50 (min) ppl+jobs/ha or as further defined in the municipal Official Plan  
York Region - 70 (min) ppl+jobs/ha or as further defined in the municipal Official Plan and/or approved Secondary Plan |
|                   |           |            | 2        | Location Efficiency  
Height and/or density conforms to the minimum or maximum targets established in the applicable Municipal Official Plan | Achieve a 50% increase in density along existing or planned mid block collectors, planned for transit (1 POINT) |
| Built Environment | B&D       | B          | 3        | Proximity to Basic Amenities | 50% of DU and jobs are within a 800m walking distance of at least 3 existing or planned Basic Amenities (Amenities listed below)  
Basic amenities include:  
1. Grocery store/farmers market, place to buy fresh produce  
2. Community/Recreation Centre  
3. Pharmacy  
4. Library  
(UPTO 6 POINTS) |
2. Dynamic Excel-based (Scoring) Tool

- Excel Spreadsheet – easy to update and conform to changing targets
- Differentiates plan types and users
- Tool is divided into the 4 core themes and quantifies and scores sustainability performance
- Measures compliance against mandatory requirements
- Identifies Minimum and Aspirational Thresholds
- Provides opportunity to identify scenarios for plan improvements
3. Guidebook Tool

- Tool for applicants and municipal staff
- A step-by-step guide on how to measure each metric
- Identifies the studies where the metric performance can be verified by reviews
Implementation:

Integrating Sustainability Metrics into the Planning Process
Development Review Process
Integrating Sustainability Metrics

INQUIRY
(via counter, phone, website)

PRE-APPLICATION MEETING

COMPLETE APPLICATION SUBMISSION

CIRCULATION/COMMENT PERIOD

PUBLIC HEARING REPORT

CW REPORT / COUNCIL DECISION

Direct to Sustainability Metrics

Completed Sustainability Scoring Tool is reviewed by Planning, Urban Design and Engineering Depts.

Confirm Metrics Score in Final Report

Identify Sustainability Metrics as a submission requirement in Pre-Application Checklist

Completed Sustainability Scoring Tool forms part of a Complete Application

Advise applicant of additional Metrics that can be achieved

Outline additional Metrics that could be achieved in Report

Enter Final Score into Monitoring Tool

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DEVELOPER TESTING (JAN. 2014)

Application Score:
- "BOWDEN-WOOD" IN NORTH LESLIE Greenfield Draft Plan: 31 points
- "GUIZETTI II" ON YONGE ST. Mixed-Use Site Plan: 88 points
- "CORSICA" DAVID DUNLAP OBSERVATORY Intensification Draft Plan: 30 points

General Feedback

Initial
- Incredibly negative at first
- Considered it another “box to check”

Closing remarks
- Easy to follow
- Helpful supplemental material
- Considered it an “interesting process”

Very Positive
- Easy to follow / navigate
- Metrics aligned with what Guizetti is already delivering
- Interested in incentives / acknowledgement for market differentiation

Positive
- Easy to follow / well organized
- Limited by type of development and market acceptance
- Appreciated scoring benefit
- Identified opportunities for improvement
# RH’s “Threshold Scores”

(Approved by Richmond Hill Council, Feb. 24, 2014)

<table>
<thead>
<tr>
<th>Performance Achieved</th>
<th>Threshold</th>
</tr>
</thead>
<tbody>
<tr>
<td>RH Minimum</td>
<td>12-20 points (Draft Plan)</td>
</tr>
<tr>
<td>(OP/BY-Law Requirements)</td>
<td>16-31 points (Site Plan)</td>
</tr>
<tr>
<td><strong>Good</strong></td>
<td>21-35 points (Draft Plan)</td>
</tr>
<tr>
<td><em>(Required to “Play Ball” in RH)</em></td>
<td>32-45 points (Site Plan)</td>
</tr>
<tr>
<td><strong>Very Good</strong></td>
<td>36-55 points (Draft Plan)</td>
</tr>
<tr>
<td></td>
<td>46-65 points (Site Plan)</td>
</tr>
<tr>
<td><strong>Excellent</strong></td>
<td>+56 points (Draft Plan)</td>
</tr>
<tr>
<td></td>
<td>+66 points (Site Plan)</td>
</tr>
</tbody>
</table>
Provide Brochure to applicants:
• At counter/ over phone
• At pre-submission meetings
Lessons Learned and Looking Ahead
Implementing Sustainability Metrics: Lessons Learned

1. **Find your Champions/Success Stories**
   - Involve a diverse array of staff early in the process
   - Involve the Development Industry early, understand their interests
   - Build external momentum by involving other external agencies (Region, CAs, non-profits like CAC)

2. **Build on an Existing Process**
   - Weave Sustainability Metrics into an existing planning process
   - Get your internal house in order

3. **Building of Metrics through internal workshops**
   - Involve Design Team throughout the process
   - Understand your current practices, the good, bad and ugly
   - Train, train, and train some more…
Implementing Sustainability Metrics: Lessons Learned

4. Set Quantifiable, Measurable Metrics
   • Ensure your “Menu” of Sustainability Metrics are things a municipality can reasonably obtain using Planning Act tools

5. Allow for Flexibility
   • Establish a Rating System (“Threshold Scores”) to clarify the amount of Metrics you’re looking for
   • Allow applicants to pick and choose from the “Menu” of Metrics versus prescribing

6. Test Real Applications with the Development Industry
   • Build trust and credibility for the System
   • Give people a reason to become comfortable with the System
Looking forward: Regionalizing Green Development Standards

The Partnership is offering Municipalities:

- OPPI Award winning Products
- Sustainability Tools including:
  - Scoring/Assessment Tools
  - Static Metric Tables
  - Guidebook and Instruction Manuals
- York and Peel BILD Chapter tested Metrics
- Benchmarked Metrics and Targets that are tailored to the GTA planning context
Looking forward: Regionalizing Green Development Standards

…the Partnership also offer Municipalities:

• Flexibility in developing municipal-specific Threshold Scores and Point Allocations
• Consistency across partner municipalities
• Efficient and effective method to achieve incremental improvements to sustainability of new development
• Assistance with Communicating with Council and Staff
Thank you!