



## **ADDITIONS**

### Permit Application Checklist

- 1. Completed Application Form**
- 2. Schedule 1 (Designer Information)**
- 3. Development Review Forms**
- 4. Site Plan**
- 5. Lot Grading Exemption Form or Grading Plan**
- 6. Building Plans (Electronic Submissions Preferred)**
  - Floor Plans (foundation, 1st floor, 2nd floor)
  - Exterior Elevations (front, side, rear)
  - Cross Section
  - Type of Foundation (piers, pole, full or slab of grade)
  - Building Area and Spatial Separation Calculations
- 7. Engineered Truss Plans and Engineered Floor Plans (if applicable)**
- 8. Heat Loss Calculations and Duct Design**
- 9. Soil Gas Control Form**
- 10. Energy Efficiency Design Summary**
- 11. Conservation Authority Approval (Catfish Creek or Kettle Creek where applicable)**

\*\* If Septic System is present, a report from a qualified Septic Installer is required to ensure the system is capable of handling the increased loading of the system





## SUBMISSION REQUIREMENTS

When submitting for a building permit the following items are required:

- **Application to Construct or Demolish with Schedule 1 (Designer Information)**
- **Development Review Form** completed with all other authorities having jurisdiction approval
- **A Set of Building Plans** to scale, legible and include:
  - **Site Plan** - lot lines and dimensions, new and existing building sizes and locations, building setbacks, street names, municipal address and north arrow. (Plans submitted for development approval may also be re-submitted for building permit)
  - **Foundation Plan** showing; scale, dimensions, size type and location of all walls and partitions, width locations and lintel sizes for all openings, material specifications or notes.
  - **Floor Plans** showing; scale, dimensions, use of rooms and spaces, size type and location of all walls and partitions, width locations and lintel sizes for all openings, material specifications or notes, location and direction of stairs, references to details.
  - **Elevations** showing; scale, vertical dimensions, grade level, exterior finishes, overhang dimension, roof shape slope and finish, references to details.
  - **Sections and Details** showing; scale, details of footings foundation, walls, floors and roof, distance from grade to floors, roof and underside of footing, material specifications or notes.
  - **All drawings** to be done by a qualified designer with a valid BCIN (Except for exemptions as outlined under sections 2.17.4.1.(3) (4) and 2.17.5.1.(2) of the OBC)
  - **Engineered Truss Drawing** (with Engineers stamp) required prior to framing inspection. To avoid any problems it is recommended the stamped truss drawing be submitted with the permit application.
- **General Review Commitment Certificate** completed by engineer/architect for aspects of the building designed outside of part 9 of the OBC.

Incomplete applications will be rejected prior to review and will need to be resubmitted for issuance of permit.

As of August 22, 2016, By-Law 2029, being a by-law respecting the implementation of the Building Code Act, S.O. 1992, c.23. and cited as the "Building Permit By-Law":

**9.11 Building Permit Security Deposit:** With respect to the issuance of a building permit, a refundable security deposit will be paid to the Municipality to assure total completion of work authorized by the permit. The amount will be based on five (5) percent of the permit value to a maximum of \$1,000.00. The deposit will be held without interest until completion certificate is issued. The deposit will be returned in full, less any additional required inspection fees. If an extension for completion of the permitted work is not requested in writing and granted, then the deposit will be forfeited at the end of one year after the date of issuance of the permit. The fee contemplated by this section shall be forfeited in full if the building for which the permit was issued has been occupied prior to the issuance of a completion certificate.

# Application for a Permit to Construct or Demolish

This form is authorized under subsection 8(1.1) of the *Building Code Act, 1992*

| For use by Principal Authority  |                                  |                                |             |                           |
|---|----------------------------------|--------------------------------|-------------|---------------------------|
| Application number:   |                                  | Permit number (if different):  |             |                           |
| Date received:  |                                  | Roll number:                   |             |                           |
| Application submitted to: _____<br>(Name of municipality, upper-tier municipality, board of health or conservation authority) |                                  |                                |             |                           |
| A. Project information  |                                  |                                |             |                           |
| Building number, street name  |                                  |                                | Unit number | Lot/con.                  |
| Municipality  | Postal code                      | Plan number/other description  |             |                           |
| Project value est. \$   |                                  | Area of work (m <sup>2</sup> ) |             |                           |
| B. Purpose of application   |                                  |                                |             |                           |
| New construction  | Addition to an existing building | Alteration/repair              | Demolition  | Conditional Permit        |
| Proposed use of building  |                                  | Current use of building        |             |                           |
| Description of proposed work  |                                  |                                |             |                           |
| C. Applicant  |                                  |                                |             |                           |
|   |                                  | Applicant is:                  | Owner or    | Authorized agent of owner |
| Last name   | First name                       | Corporation or partnership     |             |                           |
| Street address  |                                  |                                | Unit number | Lot/con.                  |
| Municipality  | Postal code                      | Province                       | E-mail      |                           |
| Telephone number  | Fax                              |                                | Cell number |                           |
| D. Owner (if different from applicant)  |                                  |                                |             |                           |
| Last name   | First name                       | Corporation or partnership     |             |                           |
| Street address  |                                  |                                | Unit number | Lot/con.                  |
| Municipality  | Postal code                      | Province                       | E-mail      |                           |
| Telephone number  | Fax                              |                                | Cell number |                           |

| <b>E. Builder (optional)</b>  |  |                        |  |             |
|---|--|------------------------|--|-------------|
| Last name   |  | First name             | Corporation or partnership (if applicable) |             |
| Street address  |  |                        | Unit number                                | Lot/con.    |
| Municipality  |  | Postal code            | Province                                   | E-mail      |
| Telephone number  |  | Fax                    |  | Cell number |
| <b>F. Tarion Warranty Corporation (Ontario New Home Warranty Program)</b>   |  |                        |  |             |
| i. Is proposed construction for a new home as defined in the <i>Ontario New Home Warranties Plan Act</i> ? If no, go to section G.  |  |                        | Yes  | No          |
| ii. Is registration required under the <i>Ontario New Home Warranties Plan Act</i> ?  |  |                        | Yes  | No          |
| iii. If yes to (ii) provide registration number(s): _____   |  |                        |  |             |
| <b>G. Required Schedules</b>  |  |                        |  |             |
| i) Attach Schedule 1 for each individual who reviews and takes responsibility for design activities.  |  |                        |  |             |
| ii) Attach Schedule 2 where application is to construct on-site, install or repair a sewage system.   |  |                        |  |             |
| <b>H. Completeness and compliance with applicable law</b>   |  |                        |  |             |
| i) This application meets all the requirements of clauses 1.3.1.3 (5) (a) to (d) of Division C of the Building Code (the application is made in the correct form and by the owner or authorized agent, all applicable fields have been completed on the application and required schedules, and all required schedules are submitted).<br>Payment has been made of all fees that are required, under the applicable by-law, resolution or regulation made under clause 7(1)(c) of the <i>Building Code Act, 1992</i> , to be paid when the application is made. |  |                        | Yes  | No          |
| ii) This application is accompanied by the plans and specifications prescribed by the applicable by-law, resolution or regulation made under clause 7(1)(b) of the <i>Building Code Act, 1992</i> .   |  |                        | Yes  | No          |
| iii) This application is accompanied by the information and documents prescribed by the applicable by-law, resolution or regulation made under clause 7(1)(b) of the <i>Building Code Act, 1992</i> which enable the chief building official to determine whether the proposed building, construction or demolition will contravene any applicable law.   |  |                        | Yes  | No          |
| iv) The proposed building, construction or demolition will not contravene any applicable law.   |  |                        | Yes  | No          |
| <b>I. Declaration of applicant</b>  |  |                        |  |             |
| I _____ declare that:   |  |                        |  |             |
| (print name)  |  |                        |  |             |
| 1. The information contained in this application, attached schedules, attached plans and specifications, and other attached documentation is true to the best of my knowledge.  |  |                        |  |             |
| 2. If the owner is a corporation or partnership, I have the authority to bind the corporation or partnership.   |  |                        |  |             |
| _____   |  | _____                  |  |             |
| Date  |  | Signature of applicant |  |             |

Personal information contained in this form and schedules is collected under the authority of subsection 8(1.1) of the *Building Code Act, 1992*, and will be used in the administration and enforcement of the *Building Code Act, 1992*. Questions about the collection of personal information may be addressed to: a) the Chief Building Official of the municipality or upper-tier municipality to which this application is being made, or, b) the inspector having the powers and duties of a chief building official in relation to sewage systems or plumbing for an upper-tier municipality, board of health or conservation authority to whom this application is made, or, c) Director, Building and Development Branch, Ministry of Municipal Affairs and Housing 777 Bay St., 2nd Floor. Toronto, M5G 2E5 (416) 585-6666.

## Schedule 1: Designer Information

Use one form for each individual who reviews and takes responsibility for design activities with respect to the project.

| <b>A. Project Information</b>   |                               |                                |             |
|---|-------------------------------|--------------------------------|-------------|
| Building number, street name  |                               | Unit no.                       | Lot/con.    |
| Municipality  | Postal code                   | Plan number/ other description |             |
| <b>B. Individual who reviews and takes responsibility for design activities</b>   |                               |                                |             |
| Name  |                               | Firm                           |             |
| Street address  |                               | Unit no.                       | Lot/con.    |
| Municipality  | Postal code                   | Province                       | E-mail      |
| Telephone number  | Fax number                    |                                | Cell number |
| <b>C. Design activities undertaken by individual identified in Section B. [Building Code Table 3.5.2.1. of Division C]</b>  |                               |                                |             |
| House   | HVAC – House                  | Building Structural            |             |
| Small Buildings   | Building Services             | Plumbing – House               |             |
| Large Buildings   | Detection, Lighting and Power | Plumbing – All Buildings       |             |
| Complex Buildings   | Fire Protection               | On-site Sewage Systems         |             |
| Description of designer's work  |                               |                                |             |
| <b>D. Declaration of Designer</b>   |                               |                                |             |
| <p>I _____ declare that (choose one as appropriate):</p> <p style="text-align: center;">(print name)</p> <p>I review and take responsibility for the design work on behalf of a firm registered under subsection 3.2.4. of Division C, of the Building Code. I am qualified, and the firm is registered, in the appropriate classes/categories.</p> <p>Individual BCIN: _____</p> <p>Firm BCIN: _____</p> <p>I review and take responsibility for the design and am qualified in the appropriate category as an "other designer" under subsection 3.2.5. of Division C, of the Building Code.</p> <p>Individual BCIN: _____</p> <p>Basis for exemption from registration: _____</p> <p>The design work is exempt from the registration and qualification requirements of the Building Code.</p> <p>Basis for exemption from registration and qualification: _____</p> <p>I certify that:</p> <ol style="list-style-type: none"> <li>1. The information contained in this schedule is true to the best of my knowledge.</li> <li>2. I have submitted this application with the knowledge and consent of the firm.</li> </ol> <p style="text-align: center;">_____</p> <p style="display: flex; justify-content: space-between;"> <span>Date</span> <span>Signature of Designer</span> </p> |                               |                                |             |

**NOTE:**

1. For the purposes of this form, "individual" means the "person" referred to in Clause 3.2.4.7(1) (c) of Division C, Article 3.2.5.1. of Division C, and all other persons who are exempt from qualification under Subsections 3.2.4. and 3.2.5. of Division C.
2. Schedule 1 is not required to be completed by a holder of a license, temporary license, or a certificate of practice, issued by the Ontario Association of Architects. Schedule 1 is also not required to be completed by a holder of a license to practise, a limited license to practise, or a certificate of authorization, issued by the Association of Professional Engineers of Ontario.



## DEVELOPMENT REVIEW FORM

The Building Code Act requires compliance to other applicable law and items identified under the Municipal Building By-law prior to issuance of a building permit.

In order to determine compliance, the Municipality of Central Elgin has developed the attached "Development Review Form (DRF)" as a general guideline for residential and small construction projects. Failure to complete this form and submission of all required approvals as noted on the DRF will leave the municipal staff unable to determine compliance to other applicable law and, therefore, a building permit **will not** be reviewed or issued.

Building permit application time frames as set out in the Building Code Act will not commence until such time as the DRF is complete and all approvals have been received.

Drawings are required to be to scale, legible and include:

- **Zoning Compliance**

Site plan showing lot lines and dimensions, new and existing building sizes and locations, building height, building set backs, street names, municipal address and north arrow, reference to legal survey or note stating survey stakes located and confirmed on site.

- **Lot Grading**

Site plan showing lot lines and dimensions, new and existing building sizes and locations, building setbacks, location or paved surfaces, street names, municipal address and north arrow, location of septic field, reference to legal survey or note stating survey stakes located and confirmed on site, (geodetic elevations) and drainage arrows. Lot grading plans must bear the signature and deal of a Professional Engineer, Landscape Architect, or Ontario Land Surveyor.

- **Access Permit**

Site plan showing lot lines and dimensions driveway location and width.

- **Service Permit**

Site plan showing lot lines and dimensions, building setbacks, street names, municipal address and north arrow, location or service lines, location of driveways and sidewalks.

- **Proximity to Overhead Power Lines**

Site plan identifying and confirming by the Local Utility Company the proximity to overhead power lines.

Sections outlined below deal with applicable law as outlined in section 1.1.3.3. of the O.B.C, and the Municipal Building By-law as per section 7 of the BCA. Prior to the acceptance of a building permit application, all sections must be fully completed and approved by the appropriate authorities. Time frames for issuance of permits under the BCA, due not commence until all items below are completed and submitted with a complete building permit application to the municipality. This form is only a guideline for residential and small development in our area, additional reviews and approvals may be required.

**Full Address of Project**

|                 |             |             |          |
|-----------------|-------------|-------------|----------|
| Building Number | Street Name | Unit Number | Lot/Con. |
|-----------------|-------------|-------------|----------|

**A) Zoning Compliance**

To obtain property zoning, you **must** contact the Municipality of Central Elgin's Planning Office at 519.633.2560

|   |           |                              |                             |
|---|-----------|------------------------------|-----------------------------|
| Property Zoning   |           |                              |                             |
| Building Size   |           |                              |                             |
| Width   | Length    | Height                       | Area                        |
| Setbacks Provided   |           |                              |                             |
| Side Yard   | Side Yard | Front Yard                   | Rear Yard                   |
| Is this application conditional to Site Plan Control or Zoning Amendment?<br>If yes, attach copies of approvals |           | <input type="checkbox"/> Yes | <input type="checkbox"/> No |

**B) Lot Grading Approval**

|  |                              |                             |
|--|------------------------------|-----------------------------|
| Does the proposed development include a roofed structure greater than 10 m <sup>2</sup> (108 ft <sup>2</sup> )?<br>If yes, one of the following is required. | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| Have you provided a Lot Grading Plan or Lot Grading Exemption Form for approval?   | <input type="checkbox"/> Yes | <input type="checkbox"/> No |

**C) Overhead Power Lines**

|   |                              |                             |
|---|------------------------------|-----------------------------|
| Does the development deal with a historical designated building?<br>If yes, please provide a letter of approval from the Municipal Council. | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
|---|------------------------------|-----------------------------|

**D) Conservation Authority**

|  |                              |                             |
|--|------------------------------|-----------------------------|
| Is the proposed development in a flood, erosion or dynamic beaches controlled area?<br><ul style="list-style-type: none"> <li>• Kettle Creek Conservation Authority</li> <li>• Catfish Creek Conservation Authority</li> </ul> | <input type="checkbox"/> Yes | <input type="checkbox"/> No |
| Does the proposed construction require Conservation Authority review?<br>If yes, please provide a copy or permit issued.   | <input type="checkbox"/> Yes | <input type="checkbox"/> No |

## E) Agricultural

### Minimum Distance Separation

#### Non-livestock related construction

Are there any structures capable of housing livestock within 500m (1650ft) of this proposed structure?

Yes  No

#### Livestock related construction

Are there any residential structures within 500m (1650ft) of this proposed structure?

Yes  No

If yes, to either of the above please provide Minimum Distance Separation Calculation form.

#### Nutrient Management Act

Is this a new operation creating > 5 N.U. 's

Yes  No

If yes, please provide a copy of Nutrient Management Plan.

Is this a new operation creating > 150 N.U.'s?

Yes  No

Is this a expanding operation creating > 300 N.U.'s?

Yes  No

If yes, to either of the above, please provide a copy of the Provincial approval.

## F) Septic Permit

Does the development require installation of a new septic system?

Yes  No

Does the development require alterations of an existing septic system?

Yes  No

Does the development increase the number of bedrooms?

Yes  No

Does the development increase the number of plumbing fixtures?

Yes  No

## G) Access Permit

Does the development require new access onto a County road?

Yes  No

Does the development require access approval for MTO?

Yes  No

If yes, please provide a letter of approval

Does the development require new access onto a Municipal road?

Yes  No

If yes, please provide plans for approval by the Director of Development Services

## H) Service Connection

Does the development require connection to municipal services?

Yes  No

If yes, please provide plans for approval by the Directory of Development Services

## I) Declaration of Applicant

I, \_\_\_\_\_ certify that:

1. The information contained in this application, attached plans and specifications, and other attached documentation is true to the best of my knowledge.
2. As the Owner/Contractor, I take responsibility to ensure compliance to all federal, provincial and municipal legislation and or regulations prior to, during, and after construction. I will not hold The Municipality of Central Elgin or its employees liable for any actions by myself resulting in non-issuance of a permit, revoking of a permit, civil action, and/or possible fine.
3. I have the authority to bind the Corporation or Partnership (if applicable)

Dated \_\_\_\_\_ Signature \_\_\_\_\_

Personal information contained in this form and schedules is collected under the authority of section 7 subsections 8(s) of the Building Code Act, and will be used in the administration and enforcement of the Building Code Act, 1992. Questions about the collection of personal information may be addressed to: a)Chief Building Official of the Municipality to which this application is being made.





## LOT GRADING EXEMPTION FORM

Property Owner Name \_\_\_\_\_ Permit \_\_\_\_\_

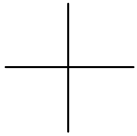
Address \_\_\_\_\_

Phone \_\_\_\_\_ Email \_\_\_\_\_

Description of Work \_\_\_\_\_

### SKETCH/PLAN (Indicate Location of Proposed Work)

Municipal Drain On Property? Y N Name: \_\_\_\_\_



Indicate North

On the approval of this exemption you are hereby advised that you will be responsible for any flooding or drainage disputes which may arise as a result of this construction

|  |      |
|--|------|
| Signature of Applicant                       | Date |
| Comments                                     |      |
| Signature of Senior Engineering Technologist | Date |

# Energy Efficiency Design Summary: Prescriptive Method

(Building Code Part 9, Residential)

This form is used by a designer to demonstrate that the energy efficiency design of a house complies with the building code using the prescriptive method described in Subsection 3.1.1. of SB-12. This form is applicable where the ratio of gross area of windows/sidelights/skylights/glazing in doors and sliding glass doors to the gross area of peripheral walls is not more than 22%.

| For use by Principal Authority |                            |
|--------------------------------|----------------------------|
| Application No:                | Model/Certification Number |

## A. Project Information

|                              |             |                                      |
|------------------------------|-------------|--------------------------------------|
| Building number, street name | Unit number | Lot/Con                              |
| Municipality                 | Postal code | Reg. Plan number / other description |

## B. Prescriptive Compliance [indicate the building code compliance package being employed in this house design]

*SB-12 Prescriptive (input design package):* Package: \_\_\_\_\_ Table: \_\_\_\_\_

## C. Project Design Conditions

| Climatic Zone (SB-1):  | Heating Equipment Efficiency   | Space Heating Fuel Source  |
|--|--|--|
| <input type="checkbox"/> Zone 1 (< 5000 degree days)             | <input type="checkbox"/> ≥ 92% AFUE  | <input type="checkbox"/> Gas <input type="checkbox"/> Propane <input type="checkbox"/> Solid Fuel  |
| <input type="checkbox"/> Zone 2 (≥ 5000 degree days)             | <input type="checkbox"/> ≥ 84% < 92% AFUE  | <input type="checkbox"/> Oil <input type="checkbox"/> Electric <input type="checkbox"/> Earth Energy   |
| Ratio of Windows, Skylights & Glass (W, S & G) to Wall Area      |  | Other Building Characteristics   |
| Area of walls = _____ m <sup>2</sup> or _____ ft <sup>2</sup>    | W, S & G % = _____   | <input type="checkbox"/> Log/Post&Beam <input type="checkbox"/> ICF Above Grade <input type="checkbox"/> ICF Basement<br><input type="checkbox"/> Slab-on-ground <input type="checkbox"/> Walkout Basement<br><input type="checkbox"/> Air Conditioning <input type="checkbox"/> Combo Unit<br><input type="checkbox"/> Air Sourced Heat Pump (ASHP)<br><input type="checkbox"/> Ground Sourced Heat Pump (GSHP) |
| Area of W, S & G = _____ m <sup>2</sup> or _____ ft <sup>2</sup> | Utilize window averaging: <input type="checkbox"/> Yes <input type="checkbox"/> No |  |

## D. Building Specifications [provide values and ratings of the energy efficiency components proposed]

| Energy Efficiency Substitutions   |  |           |   |                    |
|---|--|-----------|---|--------------------|
| <input type="checkbox"/> ICF (3.1.1.2.(5) & (6) / 3.1.1.3.(5) & (6))  |  |           |   |                    |
| <input type="checkbox"/> Combined space heating and domestic water heating systems (3.1.1.2.(7) / 3.1.1.3.(7))              |  |           |   |                    |
| <input type="checkbox"/> Airtightness substitution(s)<br><br>Airtightness test required<br>(Refer to Design Guide Attached) | <input type="checkbox"/> Table 3.1.1.4.B Required: _____ Permitted Substitution: _____ |           |   |                    |
|   | <input type="checkbox"/> Table 3.1.1.4.C Required: _____ Permitted Substitution: _____ |           |   |                    |
|   | Required: _____ Permitted Substitution: _____  |           |   |                    |
| Building Component  | Minimum RSI / R values or Maximum U-Value <sup>(1)</sup>                               |           | Building Component  | Efficiency Ratings |
| Thermal Insulation  | Nominal  | Effective | Windows & Doors Provide U-Value <sup>(1)</sup> or ER rating |                    |
| Ceiling with Attic Space  |  |           | Windows/Sliding Glass Doors                                 |                    |
| Ceiling without Attic Space   |  |           | Skylights/Glazed Roofs                                      |                    |
| Exposed Floor   |  |           | Mechanicals   |                    |
| Walls Above Grade   |  |           | Heating Equip.(AFUE)  |                    |
| Basement Walls  |  |           | HRV Efficiency (SRE% at 0° C)                               |                    |
| Slab (all >600mm below grade)   |  |           | DHW Heater (EF)   |                    |
| Slab (edge only ≤600mm below grade)   |  |           | DWHR (CSA B55.1 (min. 42% efficiency))                      | # Showers _____    |
| Slab (all ≤600mm below grade, or heated)  |  |           | Combined Heating System                                     |                    |

(1) U value to be provided in either W/(m<sup>2</sup>•K) or Btu/(h•ft<sup>2</sup>•F) but not both.

## E. Designer(s) [name(s) & BCIN(s), if applicable, of person(s) providing information herein to substantiate that design meets the building code]

| Qualified Designer Declaration of designer to have reviewed and take responsibility for the design work. |      |           |
|--|------|-----------|
| Name   | BCIN | Signature |
|  |      |           |

# Guide to the Prescriptive Energy Efficiency Design Summary Form

This form must accurately reflect the information contained on the drawings and specifications being submitted. Refer to Supplementary Standard SB-12 for details about building code compliance requirements. Further information about energy efficiency requirements for new buildings is available from the provincial building code website or the municipal building department.

The building code permits a house designer to use one of four energy efficiency compliance options:

1. Comply with the SB-12 Prescriptive design tables (this form is for this option (Option 1)),
2. Use the SB-12 Performance compliance method, and model the design against the prescriptive standards,
3. Design to Energy Star, or
4. Design to R2000 standards.

## COMPLETING THE FORM

### B. Compliance Options

Indicate the compliance option being used.

- SB-12 Prescriptive requires that the building conforms to a package of thermal insulation, window and mechanical system efficiency requirements set out in Subsection 3.1.1. of SB-12. Energy efficiency design modeling and testing of the building is not required under this option. Certain substitutions are permitted. In which case, the applicable airtightness targets in Table 3.1.1.4.A must be met.

### C. Project Design Conditions

*Climatic Zone:* The number of degree days for Ontario cities is contained in Supplementary Standard SB-1 *Windows, Skylights and Glass Doors:* If the ratio of the total gross area of windows, sidelights, skylights, glazing in doors and sliding glass doors to the total gross area of walls is more than 17%, higher efficiency glazing is required. If the ratio is more than 22%, the SB-12 Prescriptive option may not be used. The total area is the sum of all the structural rough openings. Some exceptions apply. Refer to 3.1.1.1. of SB-12 for further details.

*Fuel Source and Heating Equipment Efficiency:* The fuel source and efficiency of the proposed heating equipment must be specified in order to determine which SB-12 Prescriptive compliance package table applies.

*Other Building Conditions:* These construction conditions affect SB-12 Prescriptive compliance requirements.

### D. Building Specifications

*Thermal Insulation:* Indicate the RSI or R-value being proposed where they apply to the house design. Under the SB-12 Prescriptive option, alternative ICF wall insulation is permitted in certain conditions where other design elements meet higher standards. Refer to SB-12 for further details. Where effective insulation values are being used, the Authority Having Jurisdiction may require supporting documentation.

## BUILDING CODE REQUIREMENTS FOR AIRTIGHTNESS IN NEW HOUSES

All houses must comply with increased air barrier requirements in the building code. Notice of air barrier completion must be provided and an inspection conducted prior to it being covered.

The air leakage rates in Table 3.1.1.4.A are not requirements. This provision is a voluntary provision for when credits for airtightness are claimed. Credit for air tightness allows the designer to substitute the requirements of compliance packages as set out in Table 3.1.1.4.B or 3.1.1.4.C. Neither the air leakage test nor compliance with airtightness targets given in Table 3.1.1.4.A are required, unless credit for airtightness is claimed. Table 3.1.1.4.A provides airtightness targets in three different metrics; ACH, NLA, NLR. Any one of them can be used. OBC Reference Default Air Leakage Rates (Table 3.1.1.4.A)

| Building Type     | Airtightness Targets |                                      |  |                         |                            |
|-------------------|----------------------|--------------------------------------|--|-------------------------|----------------------------|
|                   | ACH @ 50 Pa          | NLA @ 10 Pa                          |  | NLR @ 50 Pa             |                            |
| Detached dwelling | 2.5                  | 1.26 cm <sup>2</sup> /m <sup>2</sup> | 1.81 in <sup>2</sup> /100ft <sup>2</sup> | 0.93 L/s/m <sup>2</sup> | 0.18 cfm50/ft <sup>2</sup> |
| Attached dwelling | 3.0                  | 2.12 cm <sup>2</sup> /m <sup>2</sup> | 3.06 in <sup>2</sup> /100ft <sup>2</sup> | 1.32 L/s/m <sup>2</sup> | 0.26 cfm50/ft <sup>2</sup> |

The building code requires that a blower door test be conducted to verify the air tightness of the house during construction if the SB-12 Prescriptive option with airtightness credit being applied. Results of the airtightness test may need to be submitted to the Authority Having Jurisdiction. Airtightness of less than 2.5 ACH @ 50 Pa (or NLA or NLR equivalent) in the case of detached houses, or 3.0 ACH @ 50 Pa (or NLA or NLR equivalent) in the case of attached houses is necessary to meet the required energy efficiency standard.

### E. House Designer

The building code requires designers providing information about whether a building complies with the building code to have a BCIN. Exemptions apply to architects, engineers and owners designing their own house.



THE MUNICIPALITY OF CENTRAL ELGIN

SOIL GAS CONTROL / FLOOR SLAB AIR BARRIER

Applicant: \_\_\_\_\_ Date: \_\_\_\_\_

Address: \_\_\_\_\_ Permit Number: \_\_\_\_\_

|                                    |   |
|------------------------------------|---|
| Required: <input type="checkbox"/> | <ul style="list-style-type: none"><li>• Provide minimum 100mm (4") of granular fill below the basement floor slab</li><li>• Rough-in 100mm (4") soil gas pipe as per Ontario Building Code article 9.13.4.3</li><li>• Provide soil gas barrier/air barrier on exterior foundation walls and below the basement floor slab as per Supplementary Standard SB-9 and OBC articles 9.13.4.3 &amp; 9.25.3.3.</li><li>• <u>Voluntary</u> Radon Gas testing</li></ul> |
|------------------------------------|---|