

City of Carrollton  
Residential Energy Compliance Path  
Energy Code Requirements of the 2018 IRC (IECC) as amended  
*Submit with application for a building permit*

Project Address: \_\_\_\_\_

N1101.13 (R401.2) – Projects shall comply with one of the following:

**Option #1a – Prescriptive: Sections N1101.14 (R401) through N1104 (R404):**

- N1102 (R402) Building Thermal Envelope. *{Using table N1102.1.2 (R402.1.2) INSULATION AND FENESTRATION REQUIREMENTS BY COMPONENT}*
- N1103 (R403) Systems.
- N1104 (R404) Electrical Power and Lighting Systems (Mandatory).
- Plus all mandatory provisions

**Option #1b – Prescriptive-Using REScheck™ UA approach Only: Sections N1101.14 (R401) through N1104 (R404):**

- N1102 (R402) Building Thermal Envelope.
- N1103 (R403) Systems.
- N1104 (R404) Electrical Power and Lighting Systems (Mandatory).
- Plus all mandatory provisions

**Option #2 – Section N1105 (R405) Performance Approach**

Plus all mandatory provisions

**Option #3 – ENERGY STAR Certified Homes®**

**Option #4 – Section N1106 (R406) Energy Rating Index Compliance Alternative**

- Minimum envelope requirements  $\geq$  Table 402.1.1 or 402.1.3 – 2009 IECC
- Plus all mandatory provisions

**Option #5 – ESL 4ACH<sup>50</sup> Tradeoff Code Equivalency Compliance<sup>a</sup>**

Envelope Component	Option #1	Option #2
R402.4 Air Leakage	$\leq 4ACH^{50}$	$\leq 4ACH^{50}$
Wall Insulation Value	R13 + R3 <sup>b</sup>	R13 + R3 <sup>b</sup>
Fenestration U-factor/SHGC	$\leq 0.32/0.25$	$\leq 0.32/0.25$
Ceiling R-value	$\geq R49$	$\geq R49$
Duct Insulation	R8	R6
Radiant Barrier Required	No	Yes

<sup>a</sup> Except for the values listed in the table, all other mandatory code provisions are applicable.

<sup>b</sup> First value is cavity insulation, second is continuous insulation or insulated siding.

NOTE: Attach appropriate compliance option “compliance report”

I certify that I have reviewed the construction documents including, but not necessarily limited to, insulation materials and R-values; fenestration U-factors and SHGC values; area-weighted average U-factor and SHGC calculations; mechanical system design criteria; mechanical and service water heating system and equipment types, sizes and efficiencies; equipment and system controls; duct sealing, duct and piping insulation and location; and air sealing details; and that the project as designed satisfies the minimum requirements for the compliance approach selected above.

**Print Name:** \_\_\_\_\_ **Sign Name:** \_\_\_\_\_ **Date:** \_\_\_\_\_

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