

# County of St. Clair Building & Zoning Department 10 Public Square Belleville, Illinois 62220

Anne Markezich, Director (618) 277-6600 Ext. 2530 Schedule Inspections (618) 277-6600 Ext. 2644 Hours 8:00 a.m. – 4:30 p.m.

## **BUILDING INFORMATION SHEET**

Application for a permit shall be made by the owner or lessee of the building or structure, or agent of either or by the registered design professional employed in connection with the proposed work.

Property must have an assigned address from the 9-1-1 Coordinating office prior to a building permit being issued. The 9-1-1 Coordinating office is located at 101 First St., Belleville, Illinois; phone number is (618) 277-7316.

Prior to applying for a building permit you must first generate an Energy Code Compliance Certificate using energycodes.gov/rescheck for residential or energycodes.gov/comcheck for commercial.

If this is an application for a residential structure (1) one set of plans drawn to scale to be submitted with Building Application (Application for Zoning Compliance).

If this is an application for a commercial/industrial structure, (1) one set of plans drawn to scale and specifications designed by the architect that is licensed and registered in the State of Illinois must accompany this application. The seal must appear on all sheets of the plans and specifications. You must also have a letter from the architect indicating that the plans are for construction as being submitted.

Plan review fee effective January, 1 2020. The Commercial fee will be \$100 and residential will be \$75.

48-hour review period of all permits.

#### **INSPECTIONS GUIDELINES**

- 1. Property shall be marked with address.
- 2. Building permit shall be posted.
- 3. Must call **24 hours** prior to needing any inspection. Please have your permit number; construction address and owners name prior to calling.
- 4. All required inspections are covered under building permit.
- 5. Upon failing an inspection a **\$75.00 re-inspection fee** must be paid prior to next inspection.

# **BUILDING CODE REGULATION**

St. Clair County has adopted the International Building Code 2012 with the following amendments for the unincorporated areas of the County.

**Building Code; Amendments.** The following provisions shall further apply and shall supersede any and all references listed within the adopted edition of the International Building Code – 2012 Edition.

- **A. Chapter 11 Accessibility Insert the following text.** When there is a conflict between this Chapter and the Illinois Accessibility Code the stricter of the two shall apply.
- **B. Establishment of flood hazard areas** amended to read as follows. To establish flood hazard areas, the governing body shall adopt a flood hazard map and supporting data. The flood hazard map shall include, at a minimum, areas of special flood hazard as identified by the Federal Emergency Management Agency in an engineering report entitled "The Flood Insurance Study for County of St. Clair," dated November 5, 2003, as amended or revised with the accompanying Flood Insurance Rate Map (FIRM) and Flood Boundary and Floodway Map (FBFM) and related supporting data along with any revisions thereto. The adopted flood hazard map and supporting data are hereby adopted by reference and declared to be part of this section.
- **C.** Section 1805 Footings and Foundation all references to wood footings and foundation are deleted. The use of wood footings and foundation is prohibited.
- **D.** Delete all and any reference to the ICC Electrical Code and insert the National Electric Code 2011 edition.
- **E.** Delete all and any reference to the International Plumbing Code and add the following: The County Building Official shall require that the provisions of the current "Illinois Plumbing Code Law", 225 Illinois Complied Statutes 320/1 et seq., as presently in force or as the same may be hereafter amended or modified and the same is hereby incorporated herein by reference and adopted as the standard for the purposes of this Chapter. Any conflicts concerning the provisions of these codes shall be determined by the strictest standard contained in the code provisions.
- **F.** Section 2902 Plumbing Systems delete this section in its entirety and replace with Article XII.
- **G.** Section 3410.2 **Applicability** amended to read the following. Structures existing prior to 1978, in which there is work involving additions, alterations or changes of occupancy shall be made to conform to the requirements of this section or the provisions of Sections 3403 through 3407. The provisions in Sections 3410.2.1 through 3410.2.5 shall apply to existing occupancies that will continue to be, or are proposed to be, in Groups A, B, E, F, M, R, S and U. These provisions shall not apply to buildings with occupancies in Group H or I.
- **H.** Adopt Appendix F Rodent proofing.
- **I.** Adopt Appendix F Flood-Resistant Construction.
- **J.** Adopt Appendix J Grading.

## **RESIDENTIAL CODE REGULATIONS**

St. Clair County has adopted the International Residential Code 2012 with the following amendments for the unincorporated areas of the County.

**Residential Code; Amendments.** The following provisions shall further apply and shall supersede any and all references listed within the adopted edition of the International Residential Code – 2012 Edition.

- **A.** Delete all and any reference to the ICC Electrical Code and insert the National Electric Code 2011 edition.
- **B.** Delete all and any reference to the International Plumbing Code and add the following: The County Building Official shall require that the revisions of the current "Illinois Plumbing Code Law", 225 Illinois Complied Statutes 320/1 et seq., as presently in force or as the same may be hereafter amended or

modified and the same is hereby incorporated herein by reference and adopted as the standard for the purposes of this Chapter. Any conflicts concerning the provisions of these codes shall be determined by the strictest standard contained in the code provisions.

- **C.** Delete all and any reference to wood footings and foundation are deleted. The use of wood footings and foundations is prohibited.
- **D.** Adopt Appendix G Swimming Pools, Spas and Hot Tubs
- **E.** Adopt Appendix H Patio Covers.

### **MECHANICAL CODE REGULATIONS**

St. Clair County has adopted the International Mechanical Code 2012 with the following amendments for the unincorporated areas of the County.

**Mechanical Code; Amendments.** The following provisions shall further apply and shall supersede any and all references listed within the adopted edition of the International Mechanical Code – 2012 Edition.

- A. Delete all and any reference to the ICC Electrical Code and insert the National Electric Code 2011 edition.
- **B.** Delete all and any reference to the International Plumbing Code and add the following: The County Building Official shall require that the provisions of the current "Illinois Plumbing Code Law", 225 Illinois Complied Statutes 320/1 et seq., as presently in force or as the same may be hereafter amended or modified and the same is hereby incorporated herein by reference and adopted as the standard for the purposes of this Chapter. Any conflicts concerning the provisions of these codes shall be determined by the strictest standard contained in the code provisions.

## **FUEL GAS CODE REGULATIONS**

St. Clair County has adopted the International Fuel Gas Code 2012 with the following amendments for the unincorporated areas of the County.

**Fuel Gas Code; Amendments.** The following provisions shall further apply and shall supersede any and all references listed within the adopted edition of the International Fuel Gas Code – 2012 Edition.

- **A.** Delete all and any reference to the ICC Electrical Code and insert the National Electric Code 2011 edition.
- **B.** Delete all and any reference to the International Plumbing Code and add the following: The County Building Official shall require that the provisions of the current "Illinois Plumbing Code Law", 225 Illinois Complied Statutes 320/1 et seq., as presently in force or as the same may be hereafter amended or modified and the same is hereby incorporated herein by reference and adopted as the standard for the purposes of this Chapter. Any conflicts concerning the provisions of these codes shall be determined by the strictest standard contained in the code provisions.

# **ENERGY CONSERVATION CODE REGULATIONS**

St. Clair County has adopted the Illinois Energy Conservation Code (IECC) 2018 with the following amendments for the unincorporated areas of the County.

**A.** <u>Certificate.</u> A permanent certificate shall be completed by the builder or registered design professional and posted on a wall in the space where the furnace is located, a utility room or an approved location inside the building. Where located on an electrical panel, the certificate shall not

cover or obstruct the visibility of the circuit directory label, service disconnect label or other required labels. The certificate shall list the predominant R-values of insulation installed in or on ceiling/roof, walls, foundation (slab, basement wall, crawl space wall and/or floor) and ducts outside conditioned spaces; U-factors for fenestration and the solar heat gain coefficient (SHGC) of fenestration, and the results from any required duct system and building envelope air leakage testing done on the building. Where there is more than one value for each component, the certificate shall list the value covering the largest area. The certificate shall list the types and efficiencies of heating, cooling and service water heating equipment. Where a gas-fired unvented room heater, electric furnace, or baseboard electric heater is installed in the residence, the certificate shall list "gas-fired unvented room heater," "electric furnace" or "baseboard electric heater," as appropriate. An efficiency shall not be listed for gas-fired unvented room heaters, electric furnaces or electric baseboard heaters. Compliance Certificate must list property address, name of individual completing certificate and the version of compliance software tool. NFRC labels must remain on windows for final inspection.

## B. Climate Zone. 4A

Location	Min. R-Value	Comment
Ceiling/Roof	R-38	R-30 allowed up to 500 sq ft or 20% of total ceiling area.
Walls	R-13	
Foundation Walls	R-10 / 13	R-10 = Continuous insulated sheathing on interior or exterior. R-13 = Cavity insulation at interior of basement wall.
Foundation Slab	R-10 (2ft)	Must be 2 ft below grade add R-5 for heat slab.
Crawl Space Wall and/or Floor	R-10 / 13	R-10 = Continuous insulated sheathing on interior or exterior. R-13 = Cavity insulation at interior wall.
Ducts Outside Conditioned Space	See below under HVAC	
Steel Frame Walls/Floor	Check with Code Official	

C. <u>U-Factors.</u> Windows 0.35 Max. Skylights 0.60 Max.

**Exception:** Fenestration (Windows).

- **D.** <u>Air Leakage.</u> Following shall be caulked, gasketed, weatherstripped or otherwise sealed with an air barrier material, suitable film or solid material.
  - **1.** All joints, seams and penetrations.
  - 2. Site-built windows, doors and skylights.
  - **3.** Openings between window and door assembled and their respective jambs and framing.
  - **4.** Utility penetrations.
  - **5.** Dropped ceilings or chases adjacent to the thermal envelope.
  - 6. Knee Walls.
  - **7.** Walls and ceilings separating a garage from conditioned spaces.
  - **8.** Behind tubs and showers on exterior walls.
  - **9.** Common walls between dwelling units.
  - **10.** Attic access openings.
  - **11.**Rim joist junction.
  - 12. Other sources of infiltration.

- **E.** <u>Air sealing and insulation.</u> Building envelope tightness and insulation installation shall be considered acceptable when tested air leakage is less than five (5) air changes per hour (ACH) when tested with a blower door at a pressure of 50 pascals (1 PSF). Testing shall occur after rough in and after installation of penetrations of the building envelope, including penetrations for utilities, plumbing, electrical, ventilation and combustion appliances.
- **F.** <u>Fireplaces.</u> New wood-burning fireplaces shall have gasketed doors and outdoor combustion air.
- **G.** <u>Programmable thermostat.</u> A programmable thermostat is required for each separate heating and cooling system.

## H. Ducts.

**1. Insulation (Prescriptive).** Supply ducts in attics shall be insulated to a minimum of R-8. All other ducts shall be insulated to a minimum of R-6.

**Exception:** Ducts or any portion thereof located completely inside the building thermal envelope requires no insulation.

- **2. Sealing (Mandatory).** All ducts, air handlers, filter boxes and building cavities used as ducts shall be sealed with mastic or silver tape. **NO DUCT TAPE**
- 3. NOTE Building Cavities cannot be used for return air (must be metal and sealed)
- **I.** <u>Pools (Mandatory).</u> Pools shall be provided with energy-conserving measures in accordance with the following.
  - **1. Pool heaters.** All pool heaters shall be equipped with a readily accessible on-off switch to allow shutting off the heater without adjusting the thermostat setting. Pool heaters fired by natural gas or LPG shall not have continuously burning pilot lights.
  - **2. Time switches.** Time switches that can automatically turn off and on heaters and pumps according to a preset schedule shall be installed on swimming pool heaters and pumps.
  - **3. Pool covers.** Heated pools shall be equipped with a vapor-retardant pool cover on or at the water surface. Pools heated to more than 90°F (32°C) shall have a pool cover with a minimum insulation value of R-12.

#### **ELECTRICAL CODE REGULATION**

St. Clair County has adopted the **2011 National Electrical Code** in its entirety for the unincorporated areas of the county and all communities that have contracted with the county to do their inspections, with the following 12 exceptions:

- **A.** <u>Disconnecting Means and Branch-Circuit Protective Equipment.</u> The minimum size service is 100 Amp. (Article 550-11 NEC 2011)
- **B.** <u>Ground Electrode Conductor.</u> Ground wire shall be copper wire in PVC conduit from meter socket to ground rod. (Article 250-64B NEC 2011)

- **C.** <u>Feeder or Service Neutral Load.</u> Entrance conductors and neutral must be of the same size and rating. (Article 220-61 NEC 2011)
- D. <u>Maximum Number Of Disconnects</u>. All dwelling units' service panels shall have a single main disconnect. On new construction, all service panels shall have three (3) spaces for future circuit. No one-half (½) size circuit breakers permitted on new construction. (Article 230-71 NEC 2011) Note: Also, workspace shall be maintained and center of main breaker no more than 6'6".
- **E.** <u>Ground Blocks</u>. All new services, service upgrade or service panel changes require ground blocks. (Article 250-94 NEC 2011)
- **F.** <u>Conductors Material.</u> Aluminum wire is permitted for dwelling units. Minimum size aluminum will be 100 AMP capacity. (Article 310-15(B) NEC 2011)
- **G.** <u>Conductors Minimum Ampacity and Size.</u> All power wire 110 volts or higher shall be 12 AWG and larger. (Article 210-24 NEC 2011)
- H. <u>Dwelling Unit Receptacles Outlet.</u> Maximum of four (4) receptacles per circuit in kitchen. Dining room receptacles shall be on a separate circuit from kitchen. All major appliances shall be on a dedicated circuit [dishwasher, disposal, microwave, refrigerator. etc.]. Heating and/or cooling unit blowers shall be on a dedicated circuit. (Article 210-52 NEC 2011) Note: All outlets shall be installed so cords hang down properly.
- **I.** <u>Non Metallic Sheathed "NM" (Romex).</u> Is permitted only in residential or dwelling not commercial buildings.
- **J.** <u>Smoke Detectors & Carbon Monozinde Detectors.</u> All dwellings shall have smoke detectors and carbon monoxide detectors; they shall be hard wired (110V) with battery backup and interconnected. Smoke detectors shall be located in every bedroom and halls outside of bedroom with in 15' of the bedroom door and each level of the home. Carbon monoxide detectors shall be within 15' of every bedroom door. Smoke detectors and carbon monoxide detectors in security systems will not be acceptable.
- K. <u>Recessed lighting</u>. Recessed luminaries installed in the building thermal envelope shall be sealed to limit air leakage between conditioned and unconditioned spaces. All recessed luminaries shall be IC-rated and labeled as meeting ASTM E 283
- **L.** <u>Lighting equipment</u>. A Minimum of 50 percent of the lamps in permanently installed lighting fixtures shall be high-efficiency lamps.

Before you begin work on a job, you are responsible for contracting the appropriate electric company. Each electric company's guidelines slightly vary and it is best to know what rules need to be followed before beginning a job.

St. Clair County is serviced by the following (7) Electric Utility Companies:

1.	Ameren Illinois	(800)	775-5000
2.	Clinton County Electric Cooperative	(618)	526-7282
3.	Egyptian Electric	(618)	684-2143
4.	Freeburg Power	(618)	539-5545
5.	Monroe County Electric	(618)	939-7171
6.	Southwestern Cooperative Electric	(618)	288-6166
<b>7.</b>	Tri-County Electric	(618)	244-5151

**Application for Appeal.** The owner of a building or structure or any other person may appeal a decision of the Electrical Inspector refusing to grant a modification to the provisions of standards and specifications applicable thereto. The Board of Appeals application for appeal may be made when it is claimed that; the true intent of the standards and specifications applicable thereto do not apply, or any equally good or better form of electrical installation can be used. (See Chapter 5 Article VI Division II – Electrical Board of Appeals)

# **ROUGH IN AND CIRCUITS**

- **1.** All work shall be done in a workman like manner.
- 2. All wiring shall be #12 AWG copper or larger excluding phone, sound, security and data etc.
- **3.** All wiring conductors shall be copper unless provided for in the code.
- 4. All dwellings shall have smoke detectors; they shall be hard wired with battery back-up and shall be interconnected. Locations are to be: each bedroom, halls outside of bedrooms, within 15 feet of bedrooms and each level of the home. These are mandatory even if an alarm system is installed. New technology style detectors shall be preapproved by the authority having jurisdiction.
- **5.** All dwelling shall have carbon monoxide detectors within 15 feet of the outside of all bedroom doors. They shall be interconnected to the smoke detectors and be both 110 volt and battery backup.
- **6.** All conduits installed shall use proper electrical fittings, plumbing fittings are not allowed.
- 7. Non metallic sheathed cable (Romex) is only allowed in residential or dwellings.
- **8.** All rough-in wiring shall be completed and made up, all wiring shall be spliced and tailed out with at least 6 inches of wire extending outside the box. All receptacles shall be tailed, feed thru on receptacles is allowed only on GFCI for down line protection.
- **9.** All wiring in a basement 8/3 or smaller shall be installed in a chase or in drilled holes in the joists. Holes shall be drilled as to not damage the integrity of the joists. Wire larger than 8/3 may run on the bottom of the joists, but not in the center of the room.
- **10.** Dryers, ranges and ovens shall be wired with three conductors and a ground, they shall use a four wire receptacle and not have the frame tied to neutral.
- **11.** Sump pumps, washers, refrigerators, freezers and any other appliance which require a dedicated circuit shall have a single outlet. GFCI receptacles are not required if this article is followed.
- **12.** All outlets in garages and accessory buildings that have floors at or below grade level, which are not intended as habitable rooms such as storage areas, work areas, unfinished areas of basements etc. shall be GFCI protected.
- **13.** GFCI are required in crawl spaces, wet bars, all kitchen countertops, bathrooms, garages, outdoor outlets, above ground pools and receptacles within 6 feet of a sink or standing water.
- **14.** All 120 volt, 15 and 20 amp circuits supplying outlets in bedrooms shall be Arc Fault Protected.
- **15.** It is recommended that grounds on receptacles be installed on top.
- **16.** All "disconnecting Means" shall be legibly marked to indicate its purpose.
- **17.** "Working Space" requirements at all electrical equipment including meters, electric panel, air conditioning equipment etc. is enforced.
- **18.** Illumination is required for all working spaces for service equipment, switch boards, panel boards that are installed indoors.
- **19.** The white conductor on NM Cable (Romex) shall be identified with a continuous black tape when used as an ungrounded conductor.
- **20.** Multiple branch circuits, where two or more branch circuits supply devices or equipment a means of simultaneously disconnecting power shall be provided.
- **21.** Balconies, decks and porches that are accessible from inside the dwelling shall have at least one receptacle with in the perimeter of the balcony, deck or porch.
- **22.** Raceway sealing, where a raceway enters a building or structure it shall be sealed with sealants that are identified for use with cable insulation. It shall be sealed in the conduit and around the exterior of the conduit.
- **23.** Grounding and bonding is required on metal pipes, metal equipment, support beams, and concrete encased electrodes stubbed up or turned out (rebar as grounds) in basements.
- **24.** New homes or houses being remodeled require a spare switched conductor for ceiling fans and support for the ceiling fan.

- **25.** Neutrals are required in "switch boxes" for the purpose of automatic room lighting.
- **26.** Ground Fault circuit interrupter protection shall be provided for cables installed in electrically heated floors of bathrooms, kitchens and hydro-massage bathtubs.
- **27.** All closet lights shall be covered (no bare bulbs are allowed) a minimum of 12 inches is required between fixture and stored material.
- **28.** On final inspection all plates, devices and electrical components shall be installed and operational. All fixtures are to be installed, have lamps and be working, all electric work is to be complete.
- **29.** All electric panels require circuit identification and a legible panel directory.

# **SERVICE**

- 1. Minimum Dwelling service is 100 amp.

  100 amp service require #3 copper or larger or #1 aluminum or copper clad aluminum or larger.

  200 amp services require 2/0 copper or larger or 4/0 aluminum or copper clad aluminum or larger.

  Services require #6 copper ground wire for 100 amp or #4 copper ground wire for 200 amp.
- **2.** Entrance conductors and neutrals must be the same size and rating.
- 3. Neutrals shall be identified with white tape or white insulation and unbroken from the weather head thru the meter to the panel. \*CONTACT UTILITY FOR METER CAN TYPE\* Ameren Approved Meter Cans do not require unbroken neutrals.
- 4. All service entrance conductors shall be installed in conduit from the meter to the panel. When using PVC conduit it shall have a ground wire in it. There shall be no splices in these conductors.
- **5.** The ground wire from the meter to the ground rod shall be in PVC conduit from meter can into earth.
- **6.** All PVC conduit shall have the proper size ground wire in it.
- **7.** All service panels must have a single main disconnect. On new construction, panels will have at least three spaces for future circuits.
- **8.** Panel boxes shall be mounted with a maximum height of 6 feet 6 inches to the center of the main breaker.
- **9.** Panel boxes are not permitted to be mounted in closets or bathrooms.
- **10.** Panel boxes require work clearance of 36 inches wide, 3 feet deep and floor to ceiling height unobstructed area. There shall be nothing in this area, including below grade sump pump.
- **11.** Meters shall be 5 feet 6 inches to the center of the meter above final grade.
- **12.** Weather heads shall be a minimum height of 13 feet above ground.
- **13.** Conduit ditches shall remain open until the inspection.
- **14.** Service conductors shall extend 24" to 30" out of the weatherhead and be marked within 12" of the weatherhead.
- **15.** Service conductors are required to be a minimum of ten feet over yards, decks and patios, 12 feet over driveways and 18 feet over roadways.

## ILLINOIS ACCESSIBILITY CODE REGULATIONS

St. Clair County has adopted the Illinois Accessibility Code 1997 in its entirety for the unincorporated areas of the County.

# **ILLINOIS PLUMBING CODE REGULATIONS**

St. Clair County has adopted the Illinois Plumbing Code current year in its entirety for the unincorporated areas of the County.

Any individuals who installs, alters, extends, repairs and/or maintain plumbing systems shall be an Illinois License Plumber.

**Exception:** The owner of single family residence being constructed for his/her own occupancy, must occupy for a period of not less than 6 months after the completion of construction of the residence.

## **BUILDING**

The following section cover some of the most commonly asked questions and mistakes seen by inspectors.

## **FOOTINGS**

Required footing inspections for pole buildings, piers, trenches, thickened slabs, supporting a structure bearing walls, porch, roofs, sunrooms etc.

- 1. 32" minimum depth.
- 2. Continuous including jumps.
- 3. One story minimum 16" x 8".
- 4. Two story brick 20" x 10".
- 5. 2 # 4 bars horizontal continuous 15" minimum lap.
- 6. Dowel pins #4 at 40".
- 7. Subgrade not frozen.
- 8. No water in trench.
- 9. Minimum 2500 P.S.I. concrete.

# **FOUNDATIONS**

\*No Inspection Required - Spot checks Only

- 1. 8" thick 8' high 7' backfill (#6 @ 40" o.c. or equal to vertical).
- 2. 8" thick 9' high 8' backfill (#6 @ 24" o.c. or equal to vertical).
- 3. 10" thick 8' high 7' backfill (#6 @ 56" o.c. or equal to vertical).
- 4. 10" thick 9' high 8' backfill (#4 @ 16" o.c. or equal to vertical).
- 5. 2 # 4 (horizontal) bars in top and bottom (12") of wall.
- 6. 10" wall where 4" brick ledge (leaves minimum 6" wall).
- 7. Drainage Waterproofing.
- 8. Egress window or swinging door to outside required for all basements. Window sill height maximum 44" off floor.
- 9. Crawlspace vents within 3' of corners.

#### **ANCHOR BOLTS**

- 1. ½" galvanized anchor bolts embedded 7" into masonry or concrete every 6' minimum 4' if over (2) two stories.
- 2. Two bolts per plate section and one bolt within 12" from each end.
- 3. Plate washers (galvanized) 3"x3"x1¼" required when braced walls sit directly on foundation.

## **FRAMING**

- 1. Framing 8" above grade including basement walkouts.
- 2. Treated wood against concrete.
- 3. 1/4" x 3" x 3" galvanized washer plates on braced walls directly on foundation.
- 4. Attic access 22" x 30".
- 5. Floor and roof trusses braced per manufacturer.

- 6. Trusses tied down.
- 7. Additional studs under girders.
- 8. Point loads supported.
- 9. Fire blocking.
- 10. Dryer vents maximum 25' deduct 5' for each 90° elbow no screws. ALL METAL
- 11. Bathrooms exhaust clear to outside (not soffit).
- 12. Columns anchors to floor and beam.
- 13. Stair clearance 6'-8' vertical from front edge step, width 3' riser maximum 7 ¾", tread minimum 10" nose to nose.
- 14. Sleeping room egress window.
- 15. Garage floor slopes to door or drain.
- 16. No duct opening into garage.
- 17. Water heater 18" above floor.

## **WALL BRACING**

- 1. No 1x4 or metal strap diagonal bracing.
- 2. Braced wall length limit 25' includes garage walls (3 car garage requires braced offset wall), unless within 4' of braced wall line of building.
- 3. One 900 square foot maximum room of residence allowed 35' wall length.
- 4. Corner bracing for garage door and portal openings require corner bracing with a 4:1 ratio (height to width) (8' to 2') for light frame roof only for living area above check with code official.
- 5. Corner bracing other walls full 48" wide structural sheathing panel at each end and at least every 25' o.c. but not less than 20% of wall for (1) one story and 45% of 1<sup>st</sup> of 2<sup>nd</sup> story.
- 6. For 2<sup>nd</sup> story with brick veneer corners must have tie downs from top to foundation.
- 7. Corner panels nail edges every 6" minimum.

# **FIREPLACES – MEETING CODE**

- 1. Fire-stopped joist and rafter space.
- 2. Fire-stopped at every floor, ceiling or roofline around chimney area.
- 3. Chimney must be 2" from combustibles.
- 4. Chimney-less fireplaces no vents 3' of windows that open.
- 5. Masonry chimneys must have reinforcing bars installed.

## **FIRE AND GARAGE SEPARATION**

- 1. Duplex separation walls 2 hours fire rating double wall 5% both sides or equivalent.
- 2. Between garage and living area ½" drywall and garage ceiling.
- 3. Fire retardant disappearing stair in garage ceiling.
- 4. All penetrations at floor and ceiling levels fire blocked at wires, pipes, ducts, drop ceilings, soffits, shafts, under tubs, etc. (flash return ducts at floor).
- 5. Open web floor trusses fire block every 1000 square feet.
- 6. Drywall walls and ceiling under accessible stairs.
- 7. All electrical, plumbing, and mechanical located in wall cavities will be draft stopped at floor level and top of wall.
  - a. Draft stop will be fire rated foam.

#### **SAFETY GLASS**

**Hazardous locations.** The following shall be considered specific hazardous locations for the purposes of glazing:

- 1. Glazing in swinging doors except jalousies.
- 2. Glazing in fixed and sliding panels of sliding door assemblies and panels in sliding and bi fold closet door assemblies.
- 3. Glazing in storm doors.
- 4. Glazing in all unframed swinging doors.
- 5. Glazing in doors and enclosures for hot tubs, whirlpools, saunas, steam rooms, bathtubs and showers. Glazing in any part of a building wall enclosing these compartments where the bottom exposed edge of the glazing is less than 60 inches (1524 mm) measured vertically above any standing or walking surface.
- 6. Glazing, in an individual fixed or operable panel adjacent to a door where the nearest vertical edge is within a 24-inch (610mm) arc of the door in a closed position and whose bottom edge is less than 60 inches (1524 mm) above the floor or walking surface.
- 7. Glazing in an individual fixed or operable panel, other than those locations described in Items 5 and 6 above, that meets all of the following conditions:
  - a. Exposed area of an individual pane greater than 9 square feet (0.836 m2).
  - b. Bottom edge less than 18 inches (457 mm) above the floor.
  - c. Top edge greater than 36 inches (914 mm) above the floor.
  - d. One or more walking surfaces within 36 inches (914 mm) horizontally of the glazing.
- 8. All glazing in railings regardless of an area or height above a walking surface. Included are structural baluster panels and nonstructural in-fill panels.
- 9. Glazing in walls and fences enclosing indoor and outdoor swimming pools, hot tubs and spas where the bottom edge of the glazing is less than 60 inches (1524 mm) above a walking surface and within 60 inches (1524mm) horizontally of the waters edge. This shall apply to single glazing and all panes in multiple glazing.
- 10. Glazing adjacent to stairways, landings and ramps within 36 inches (914 mm) horizontally of a walking surface when the exposed surface of the glass is less than 60 inches (1524 mm) above the plane of the adjacent walking surface.
- 11. Glazing adjacent to stairways within 60 inches (1524 mm) horizontally of the bottom tread of a stairway in any direction when the exposed surface of the glass is less than 60 inches (1524 mm) above the nose of the tread.

# EGRESS WINDOW (SLEEPING ROOM/BASEMENT)

- 1. Sill not more than 44" above floor.
- 2. Minimum of 5.7 square feet (basement) clear opening.
- 3. Minimum of 5.0 square feet (grade level).
- 4. Minimum height clears opening 24".
- 5. Minimum width 20" clearing opening.

## **STAIRWAYS**

**Width.** Stairways shall not be less than 36 inches (914 mm) in clear width at all points above the permitted handrail height and below the required headroom height. Handrails shall not project more than 4.5 inches (114mm) on either side of the stairway and the minimum clear width of the stairway at and below the handrail height, including treads and landings, shall not be less than 31.5 inches (787 mm) where a handrail is installed on one side and 27 inches (698 mm) where handrails are provided on both sides. (R311.5.1)

**Exception:** The width of spiral stairways shall be in accordance with Section R311.5.8.

**Headroom.** The minimum headroom in all parts of the stairway shall not be less than 6 feet 8 inches (2036 mm) measured vertically from the sloped plane adjoining the tread nosing or from the floor surface of the landing or platform. (R311.5.2)

# STAIR TREADS AND RISERS (DECKS INCLUDED)

**Riser height.** The maximum riser height shall be 7 3/4 inches (196 mm). The riser shall be measured vertically between leading edges of the adjacent treads. The greatest riser height within any flight of stairs shall not exceed the smallest by more than 3/8 inch (9.5 mm). (R311.5.3.1)

**Tread depth.** The minimum tread depth shall be 10 inches (254 mm). The tread depth shall be measured horizontally between the vertical planes of the foremost projection of adjacent treads and at a right angle to the treads leading edge. The greatest tread depth within any flight of stairs shall not exceed the smallest by more than 3/8 inch (9.5 mm). Winder treads shall have a minimum tread depth of 10 inches (254 mm) measured as above at a point 12 inches (305mm) from the side where the treads are narrower. Winder treads shall have a minimum tread depth of 6 inches (152 mm) at any point. Within any flight of stairs, the greatest winder tread depth at the 12 inch (305 mm) walk line shall not exceed the smallest by more than 3/8 inch (9.5 mm). (R311.5.3.2)

**Profile.** The radius of curvature at the leading edge of the tread shall be no greater than 9/16 inch (14.3 mm). A nosing not less than 3/4 inch (19 mm) but not more than 1 1/4 inch (32 mm) shall be provided on stairways with solid risers. The greatest nosing projection shall not exceed the smallest nosing projection by more than 3/8 inch (9.5mm) between two stories, including the nosing at the level of floors and landings. Beveling of nosing shall not exceed 1/2 inch (12.7 mm). Risers shall be vertical or sloped from the underside of the leading edge of the tread above at an angle not more than 30 (0.51 rad) degrees from the vertical. Open risers are permitted, provided that the opening between treads does not permit the passage of a 4-inch diameter (102 mm) sphere. (R311.5.3.3)

# **Exceptions:**

- 1. A nosing is not required where the tread depth is a minimum of 11 inches (279 mm).
- 2. The opening between adjacent treads is not limited on stairs with a total rise of 30 inches (762 mm) or less.

**Handrails.** Handrails shall be provided on at least one side of each continuous run of treads or flight with four or more risers. (R311.5.6)

**Height.** Handrail height, measured vertically from the sloped plane adjoining the tread nosing, or finish surface of ramp slope, shall be not less than 34 inches (864 mm) and not more than 38 inches (965 mm). (R311.5.6.1)

**Continuity.** Handrails for stairways shall be continuous for the full length of the flight, from a point directly above the top riser of the flight to a point directly above lowest riser of the flight. Handrail ends shall be returned to wall or shall terminate in newel posts or safety terminals. Handrails adjacent to a wall shall have a space of not less than 11/2 inch (38mm) between the wall and the handrails. (R311.5.6.2)

# **Exceptions:**

- 1. Handrails shall be permitted to be interrupted by a newel post at the turn.
- 2. The use of a volute, turnout, starting easing or starting newel shall be allowed over the lowest tread.

**Handrail grip size.** Handrails with a circular cross section shall have an outside diameter of at least 1 ¼ inches (32 mm) and not greater than 2 inches (51 mm). If the handrail is not circular it shall have a perimeter dimension

of at least 4 inches (102 mm) and not greater than 6  $\frac{1}{4}$  inches (160 mm) with a maximum cross section of dimension of 2  $\frac{1}{4}$  inches (57 mm). (R311.5.6.3)

**Guards required.** Porches, balconies or raised floor surfaces located more than 30 inches (762 mm) above the floor or grade below shall have guards not less than 36 inches (914 mm) in height. Open sides of stairs with a total rise of more than 30 inches (762 mm) above the floor or grade below shall have guards not less than 34 inches (864 mm) in height measured vertically from the nosing of the treads. (R312.1)

Porches and decks which are enclosed with insect screening shall be provided with guards where the walking surface is located more than 30 inches (762 mm) above the floor or grade below.

**Guard opening limitations.** Required guards on open sides of stairways, raised floor areas, balconies and porches shall have intermediate rails or ornamental closures which do not allow passage of a sphere 4 inches (102mm) or more in diameter. (R312.2)

# **Exceptions:**

- 1. The triangular openings formed by the riser, tread and bottom rail of a guard at the open side of a stairway are permitted to be of such a size that a sphere 6 inches (152 mm) cannot pass through.
- 2. Openings for required guards on the sides of stair treads shall not allow a sphere 4% inches (107mm) to pass through.

# BUILDER'S STATEMENT OF UNDERSTANDING, ACCEPTANCE AND AGREEMENT

St. Clair County Building & Zoning Department

# **READ CAREFULLY AND SIGN**

- I understand, accept and agree that any permit issued for any building, electrical, plumbing or mechanical work, does not grant the privilege to erect any structure or to use any property for a purpose or in a manner prohibited by the adopted codes, ordinances or regulations of the County of St. Clair.
- 2. I understand, accept and agree that the responsibility for assuring that the plans for any purposed construction are in compliance with the provisions of adopted codes shall rest solely with me as the applicant.
- 3. I understand, accept and agree that the County Building & Zoning Office does not consider subdivision covenant restrictions when reviewing plans.
- 4. I understand, accept and agree that the County Building & Zoning Office does not consider American Disability Act requirement when reviewing plans.
- 5. I understand, accept and agree that all required setbacks for any building or structure are to be measured from property lines, the location of which be identified by stakes in the "SR", "MR", and "RR-1" zone district, and the measurements from curbs or similar landmarks can produce errors which may halt construction and require that any part of any structure built in error, be removed.
- 6. I understand, accept and agree that property corners will be properly staked in the "SR", "MR", and "RR-1" zone district and that said stakes will remain in place and undisturbed until after the footing/foundation inspection.
- 7. I understand, accept and agree that all fees for all permits must be paid prior to the issuance of any permit in accordance with Chapter 7, Article I Division IX.
- 8. I understand, accept and agree that permits for private sewage disposal system and private wells must be obtained from the St. Clair County Health Department.
- 9. I understand, accept and agree that law requires inspection of all work and that failure to request and secure such inspection is a violation of the County code.
- 10. I understand, accept and agree that as the applicant for a permit, I am solely responsible for notifying the Code Administrator when work has progressed to a point requiring inspection and for preventing any further work until such inspection has been made and the work determined to be in compliance with applicable codes.
- 11. I understand, accept and agree that any request for inspection must be made by calling the St. Clair County Building & Zoning Office between the hours of 8:00 a.m. and 4:30 p.m., Monday through Friday, at least 24 hours prior to time when the inspection is needed. The County attempts to complete each inspection within 48 hours of its request, but offers no guarantee to do so.

12. I understand, accept and agree that inspections are required at the following stages:				
	<b>FOOTING INSPECTION</b> -Upon completion of the footing and foundation excavation, but prior to pouring any concrete			
	FOUNDATION/SLAB INSULATION INSPECTION -Prior to pouring any concrete			
	UNDERGROUND PLUMBING INSPECTION -Upon completion of underground plumbing, but prior to covering			
	ROUGH-IN PLUMBING INSPECTION -Upon completion of rough-in plumbing but prior to insulation or covering			
	<b>ROUGH-IN ELECTRICAL INSPECTION</b> □-Upon completion of rough-in electric, but prior to insulation or covering  □-Pools under pool grounding  □-Pools conduits and grounding loop around pool under sidewalks or walkways			
	ELECTRICAL SERVICE INSPECTION -Upon completion of permanent service			
	FRAMING INSPECTION -Prior to insulation and the covering of structural members			
	INSULATION INSPECTION -Prior the covering of structural members			
	FINAL ELECTRICAL INSPECTION  □-Following completion but prior to occupancy □-Pools completion of all electrical work and equipment prior to use of pool			
	FINAL PLUMBING INSPECTION -Following completion but prior to occupancy			
	FINAL BUILDING INSPECTION -Following completion but prior to occupancy			
Δ	ABSOLUTELY CAN NOT OCCUPY RESIDENCE UNTIL ALL FINAL INSPECTIONS HAVE BEEN			

# ABSOLUTELY CAN NOT OCCUPY RESIDENCE UNTIL ALL FINAL INSPECTIONS HAVE BEEN COMPLETED AND OCCUPANCY PERMIT HAS BEEN ISSUED

PRIVATE SEWAGE DISPOSAL - CONTACT ST. CLAIR COUNTY HEALTH DEPARTMENT

PUBLIC SEWERS - CONTACT APPROPRIATE TOWNSHIP FOR APPLICABLE PERMITS

- 13.I understand, accept and agree that should any work performed under a permit issued by St. Clair County fail inspection, I am subject to a re-inspection fee, as established by law.
- 14.I understand, accept and agree that no Final Certificate of Zoning Compliance shall be issued until all inspection have been made and passed.
- 15. I understand, accept and agree that prior to occupying the building or structure I will obtain the

necessary Occupancy permit from the St. Clair County Building & Zoning Department.

- 16.I understand, accept and agree that every temporary electrical service must have G.F.I protection.
- 17. I understand, accept and agree that the Illinois Roofing industry Licensing Act (225 ILCS 335)

"It is hereby declared to be the public policy of this State that, in order to safeguard the life, health, property and public welfare of its citizens, the business of roofing construction, reconstruction, alteration, maintenance and repair is a matter affecting public interest, and any person desiring to obtain to obtain a license to engage in the business as herein defined shall be required to establish his or her qualifications to be licensed as herein provided. And that is St. Clair County should issue a permit to me it does so with the understanding that I will comply with the requirements of said Act.

Nothing in this Act shall be constructed to require a person who performs roofing or waterproofing work to his or her own property, or for no consideration, to be licensed as a roofing contractor. (225 ILCS 335/11(3))

- 18.I Understand accept and agree that all trash, debris and scrap materials must be placed into appropriate containers and disposed of properly. Burning of any kind is prohibited.
- 19. I understand, accept and agree that if any permitted work is not completed within six (6) months from the date a permit is issued, that permit shall become null and void.

I CERTIFY BY MY SIGNATURE BELOW, THAT I HAVE READ, UNDERSTAND, AND ACCEPT EACH OF THE PROVISIONS ABOVE, AND WILL ABIDE BY THEM AND BY THE CODES, ORDINANCES, REGULATIONS AND STATUES OF THE COUNTY OF ST. CLAIR AND THE STATE OF ILLINOIS.

OWNER/APPLICANT SIGNATURE	DATE
PLEASE LIST YOUR CONTRACTORS	
BUILDING CONTRACTOR	PHONE
ADDRESS	
	PHONE
ADDRESS	
PLUMBING CONTRACTOR	PHONE
ADDRESS	
LICENSE NUMBER	
ROOFING CONTRACTOR	PHONE
ADDRESS	
LICENSE NUMBER	