



Delaware County

CODE COMPLIANCE

A department of the Environmental Services Division

Building Regulations Floodplain Regulations Zoning Regulations

Plans Plans should show the existing walls and location of all existing elements such as stairs, appliances, sump, and electric panel. Indicate on the drawings location of all steel columns, and beams (beam locations are usually denoted by a dashed line), and show height of bottom of beam above the proposed finished floor.

Draw in the new walls and doors. New walls should be highlighted in some way to differentiate them from the existing walls. Provide room designation for all spaces (den, game room, bedroom, family room, etc.).

Provide wall sections indicating how the new walls are to be constructed (see attached sample) near the existing exterior concrete or block foundation wall. Provide a section indicating finished ceiling height and finished height below soffits and beams (see attached sample)

Code	Code Description	Section
Ceiling Height	All habitable spaces shall have ceiling heights of 7'-0" for at least 50% of their area and in no case shall the height of any furred ceiling be less than 6' 4" feet.	R305.1
Smoke Detectors	Smoke detectors shall be installed in all sleeping rooms, area outside, adjacent and within 15 ft. of each sleeping room. They shall also be located on each story including basement and cellars and all detectors shall be interconnected. <i>Alterations, repairs and additions in existing dwellings,</i> the entire dwelling shall be equipped with smoke detectors as required for new dwellings. The new detectors shall be hardwired but do not need to be interconnected unless the area above or adjacent is easily accessible. <i>Power Source:</i> Required smoke detectors primary power shall be from the building wiring and when the primary power is interrupted, shall receive power from a battery. Wiring shall be permanent and without a disconnecting switch. <i>Cathedral or Sloped Ceilings:</i> Rooms with sloped ceilings that must have smoke detectors installed, the location of the smoke detector shall be within 3 ft horizontally from the ceilings highest point.	R313.1 R313.1.1 R313.2 NFPA 72
Habitable Rooms.	All habitable rooms shall be provided with aggregate glazing area of not less than 8 percent of the floor area of such rooms to provide natural light. One-half of the required glazing shall be operable to provide natural ventilation.	R303.1

Commentary # 1: Since these new habitable rooms are located in the basement, and you are unable to comply with the requirement for natural lighting, you must provide a means of permanent artificial lighting. The lighting as shown on your plan will not be adequate since code requires that you provide 6 foot-candles of light measured 30 inches above the finished floor. Refer to the manufacturer's specs. for the lighting to be installed, as to what the maximum spacing between fixtures will be to achieve the 6 foot-candles over the entire habitable spaces.

Commentary # 2: The glazed area to provide ventilation may be omitted when a whole house

	mechanical ventilation system is installed capable of supplying outdoor ventilation air of 15 cfm per occupant. Provide Calculations.	
Underside of Stairs.	When the basement stairs are enclosed and the underside is accessible for storage, then the top and bottom of the stair stringer shall be fire stopped and the underside shall be completely drywalled.	R311.2.2
Wall Section	Refer to the attachment which shows options for finished below grade spaces.	
Fireblocking	Shall be provided to cut off all concealed draft openings (vert. and horiz.) and to form an effective fire barrier between stories. The top plate of the walls adjacent to the foundation walls shall extend and fit tight against the sill plate of the foundation wall or 16 inches of approved insulation shall be installed from the top plate down.	R602.8
Required Heating	Every dwelling unit shall be provided with heating facilities capable of maintaining a room temperature of 68 degrees F. at a point 3 feet above the floor at the design temperature in all habitable rooms.	R303.8
Heating and Cooling		
Equipment Sizing.	Heating and cooling equipment shall be sized according to ACCA Manual J. A.) Manual J's or other approved alternate methods (<i>which can be obtained from most HVAC contractors</i>), are required for finish basements to verify that the existing system is adequate to condition the new habitable spaces. B.) <u>Manual J-calculations are not required if all perimeter walls of finish space, are insulated full height with min. R-11 insulation.</u>	M1401.3
Combustion Air	The space in which fuel burning appliances will be housed, requires 50 cubic ft. (volume) per each 1000 Btu/h. This would include both the furnace and the water heater if fuel burning, (<i>refer to the attachment for alternatives</i>).	M1701.1.1
Appliance Access.	A 30 inch working space shall be provided in front of the control side to service an appliance.	M1305.1
Appliance Clearance	Appliances shall have clearances from combustibles materials in accordance with <i>Figure 1306.1 and Table 1306.2</i> .	M1306
Receptacle Outlet Distribution.	Electrical outlets shall be distributed per Section 210-52, <i>2005 National Electrical Code Handbook</i> .	NEC

**PLAN REQUIREMENTS FOR
FOR ONE, TWO AND THREE FAMILY DWELLINGS
FINISH BASEMENTS**

One, Two, and three family residential construction documents will show floor plans, and appropriate cross sections, fully dimensioned as required by the building official. All distances, heights, dimensions, thickness and sizes of walls, supporting members, structural parts and openings, shall be accurately figured and drawings made accurate and complete and shall show the following information:

- A. A cover sheet with index of drawings
- B. All room designations
- C. All structural members, size, span, and bearing (if applicable)
- D. Light and ventilation schedule
- E. Electrical and HVAC drawings
- F. Engineering for all structure not addressed by 2006 RCO
- G. Model Energy Code (2003 IECC)

Our plan review staff uses a plan review checklist to review your plans. All of the information on the checklist will be required to be addressed on your plans if it is applicable to your building. A copy of the checklist is included with your application packet. If the plans do not contain all the information

required, they may be returned for completion. Clean copies of drawings will be required at time of submittal and if alterations are required, corrections or alterations must be made to separate drawings and clean copies submitted.