



## **CONSTRUCTION PLANS SHALL CONSIST OF THE FOLLOWING**

SITE PLAN  
FOUNDATION PLAN  
FLOOR PLANS  
FRAMING PLANS  
CROSS SECTION OF THE STRUCTURE  
HVAC, ELECTRICAL AND PLUMBING PLANS  
ELEVATION DRAWINGS – indicate heights and finished grade

Plans shall be to scale and all dimensions must be noted.  
Three (3) sets of complete construction plans, signed and sealed by a PA registered design professional, shall be submitted unless otherwise instructed.

## **PLAN REQUIREMENTS**

### SITE PLAN

- Size and location of all new construction and all existing structures on the site
- Distances from lot lines
- Established street grades and proposed finish grades

### FOUNDATION PLAN

- Soil type on construction site
- Footing size – include any interior piers or any other piers
- Footer – depth below frost line: 42-inch minimum, exterior drains
- Foundation – type, wall thickness, rebar size and spacing, wall height, height of unbalanced fill, type of coating (damp-proofing, water-proofing)
- Foundation anchoring – sill plate: type and size, anchor bolts/straps, size and spacing, joist clips
- Columns/Posts – sizes and method of anchoring
- Crawl space – for access, indicate vented or conditioned; indicate method of venting or conditioning
- Concrete slab – thickness, vapor barrier

### FLOOR PLANS

- All design criteria shall be noted on the plans
- Rooms – indicate all sizes and label their use; indicate location of any fireplaces
- Windows and doors – indicate locations and sizes
- Kitchen & Bathroom and/or powder room fixture layout – to scale
- Safety glass locations – glass next to stairs, tubs/showers, doors, floors
- Fire ratings of walls and/or doors – garages and/or townhouse separations, exterior walls less than 5 feet from a property line.

# ***Residential Plan Submittal Guide***

- Sleeping room emergency escape compliance – type and size of window well, if applicable
- Stairs – width, landing size and location, step rise and step run, handrails, guards
- Stair lighting – over stairs or one at each landing
- Ramps – slope, landings, handrail, guards
- Smoke Alarm – type, power source, locations

#### FRAMING PLANS/CROSS SECTION

- Beams – types, sizes, spans, loading information; engineered beams require justification
- Floor sheathing – type and thickness
- Wall construction – stud size and spacing, sheathing type and size
- Headers – size and type of typical headers; engineered lumber requires justification
- Window sill heights – for any sill height less than 24 inches off the floor and 72 inches or more above the finished grade; the window may not open greater than 4 inches or provide fall protection
- Exterior wall coverings – size and type of all coverings; provide details for masonry installations
- Ceiling joists – size, type, spacing
- Bearing walls – all bearing walls shall be within 1 foot horizontally of the beam or bearing wall below the loads shall stack
- Roof pitches – indicate pitches of all roofs
- Roof rafters – size, type, spacing; if trusses are to be used, provide the Pennsylvania engineer sealed truss designs
- Hip and valley rafters – indicate size of all hip and valley rafters; all hip and valley rafters shall be posted down to a bearing wall or properly-sized beam where the hip or valley meets the ridge
- Rafter ties – rafter ties shall be 4 feet on center to tie the rafters together where the ceiling joists are not parallel to the rafters
- Structural ridge beam – where ceiling joists are deleted, a properly-sized ridge beam shall be designed
- Attic access – size and location of opening for all attic areas
- Roof sheathing – size, type, thickness
- Roof covering – felt paper, ice guard, type of roofing material
- Roof ventilation – method of ventilation to comply with 1/150 ratio
- Insulation/Energy – provide information on which energy path will be used, along with design, notes and/or calculations to support the path – 2009 International Residential Code, chapter 11; 2009 Pennsylvania Alternative Energy Provisions, [www.dli.state.pa.us](http://www.dli.state.pa.us); RES, check

#### MECHANICAL/PLUMBING/ELECTRICAL PLANS

- Heating/Air Conditioning – provide heating, ventilation and air conditioning information; indicate locations equipment, supply and return ducts and registers; provide design calculations including the type of fuel and efficiencies
- Gas piping – type of piping material, appliance loads, pipe sizing
- Plumbing – type of piping and sizing for the water supply and drainage system
- Electrical – indicate locations of all switches, receptacles, lighting outlets, appliances and service panel

PLEASE NOTE A RESIDENTIAL PLAN REVIEW TYPICALLY TAKES BETWEEN 5-15 WORKING DAYS DEPENDING UPON COMPLEXITY OF PLANS AND CURRENT WORKLOAD.

## ***Residential Plan Submittal Guide***