

Permit Application Requirements

1. General Requirements:

- 1) All construction documents (CDs) shall accurately reflect the specific materials used.
- 2) CDs must be dimensioned and drawn to scale, legible and shall have the same orientation. "Reversed" or "opposite hand" plans are permitted provided that all the plans within the CDs are consistently oriented.
- 3) Mechanical, Electrical, Plumbing (MEP) and Cabinetry plans are not required, however MEP Permits may be required.

2. Minimum Required Construction Documents:

- 1) A plot plan/site grading plan
- 2) A soils report when required by the [Henrico County Soils Policy](#)
- 3) Foundation Plan details (If including a basement, see [Residential Basement Wall Design](#)) identifying footing size, depth and reinforcing, foundation wall construction, size, anchors and reinforcing
 - a. For [conditioned crawl space](#), provide detail showing the perimeter wall insulation and method of conditioning. If foam plastic insulation is to be used, provide the thickness, brand name, manufacturer, and an evaluation report.
- 4) Floor plans for each level, including habitable basements and attics served by a fixed stair; all rooms must be designated (i.e. bedroom, family room, etc.)
- 5) Elevations of each side of the building; include building height
- 6) Framing Plans for each level; identify size, orientation and support of all structural members (joist, beams, headers and jacks, column size/plies, and location of point loads in excess of 4000 lbs., etc.)
 - a. Provide lumber species, grade, size and spacing (e.g. SYP #2 2x8@ 16"o.c.)
 - b. For engineered products provide calculations, manufacturer, size, series, spacing, number of plies, and framing layouts, as applicable (e.g. W12x22, 2-18" LVL by Georgia Pacific, 9 1/2" TJI 210 @ 19.2"o.c., connection detail for 4ply LVL's)
- 7) Roof plan and Roof Framing Plan
 - a. For stick-built roofs, provide size of ridge board (or structural ridge beam for roof pitches 3:12 or less or where lower rafter ends are not restrained) and support columns, rafter and ceiling joist size, grade, species and spacing (e.g. 2x8 SP #2 rafters @ 16" o.c; 2x10 SP #2 ceiling joist @ 16" o.c.)
 - b. For roof trusses, provide engineered truss designs, sealed and signed, and truss layout plan
 - c. For [conditioned attic](#), provide detail showing the insulation and method of conditioning. If foam plastic insulation is to be used provide the thickness, brand name, manufacturer, and an evaluation report.
- 8) Building sections and wall sections for each unique framing condition
 - a. Provide stud size, grade species and spacing, wall height for each level, insulation R-values, type of sheathing and exterior wall covering, and roof covering material
- 9) Braced wall plan and calculations
 - a. Provide braced wall line locations, bracing method(s) used, braced wall panel locations and lengths and location of hold-down devices, if applicable

10) Deck framing plan

- a. Provide lumber size, grade, species and spacing
 - b. Overall dimensions including cantilevers
 - c. Size and location of footings and posts (connection of post at base and top required for expansive soils)
- 11) Retaining walls with up to 4ft of unbalanced backfill. Retaining walls greater than 4ft of unbalanced backfill require an engineered design
- a. Provide location of retaining wall(s) on foundation plan and site plan
 - b. Provide a detail of the foundation wall, footing, reinforcing (if required) and backfill height

3. Construction Documents requiring the signature and seal of a Registered Design Professional (RDP) Engineer or Architect:

In accordance with the Virginia Uniform Statewide Building Code, a building official may require adequate technical detail to be submitted to determine the code compliance of an RDP's submittal. Where an RDP seals plans for a specific structural element, or for the entire house, or submits a letter indicating that the plans have been reviewed for structural adequacy, engineering calculations are not required to be submitted unless requested by the Building Official.

The following plans require the signature and seal of a Registered Design Professional:

- 1) Retaining walls not laterally supported at the top and that retain in excess of 4ft of unbalanced fill
- 2) Basement walls without both stone fill and drain tile
- 3) Tall bearing walls exceeding 12ft in height and 8 ft in width
- 4) Brick veneer lintels that do not comply with the Virginia Residential Code
- 5) Complex roofs
- 6) Braced wall systems not complying with the current code
- 7) Footings when required by a soils report
- 8) Intermodal freight containers, moving or storage containers when converting to habitable space
- 9) Revisions to CDs that were sealed by an RDP shall be resealed by the original RDP