

Minimum Requirements for Residential Building Plans & Plan Review Checklist 2018 NC Residential Code

Limited minimum review-Building only recommended guidelines

(Other trades such as electrical, mechanical & plumbing are not reviewed and does not include other agency or local ordinance requirements)

*Every project submitted for Plan Review must include a properly completed building permit application

RESIDENTIAL PLAN REVIEW PROJECT SCOPE*

All new One & Two Family dwellings and townhouses along with move-on residences and accessory dwelling units (ADU's)

Construction of an additional story or level to an existing residence

Any enclosed addition that increases the footprint of a residence (excludes decks, porches & screened in porches)

Renovations to a dwelling that significantly change structural loads or exceed \$50,000 in project cost

Detached accessory buildings more than one story in height (including garages with living space above)

Projects of unconventional building methods/materials outside the prescriptive NC Residential Code

*RTAP's or revisions to approved plans will be allowed in the field if change doesn't effect square footage or has a significant change in construction cost, permit data information.
Where possible plans should be approved with notes rather than requiring plan sheets to be redone

GENERAL PLAN REQUIREMENTS*

Indicate Square Footage: Heated, Unheated, and Decks

Drawings to scale (minimum 1/8")

Name of Designer, Engineer, or Architect with address and phone number

General site plan indicating lot lines and any special conditions (Fire separation distance, flood plain, known easements, Note: sealed site plan required for areas located in a flood hazard area per R322.2)

Minimum plan size: Minimum 11x17; small jobs 8.5" x 11" if legible

All climatic and geographic design criteria per R301.2 noted on plans

Plans must be legible and in English

*Jurisdiction should stamp plans "Approved" or "Approved as noted" and should indicate:
"Limited building review, permit holder responsible for meeting all technical requirements of the NCRBC"

FLOOR PLAN (Life Safety)	Code Section
Size, dimensions and name of rooms and hallways (to determine room usage & egress/rescue req.)	R304, R310, R311
Size and location of windows (Egress, Emergency Rescue & fall protection)	R310 & R311
Glazing requirements (light, ventilation & safety glazing req.)	R303 & R308
Size, Location, and Swing of interior and exterior doors (Egress & Emergency escape & Rescue, interior door swing only needed at stairways)	R310 & R311
Stair Requirements/layout (width, height, treads, risers, landings, projections, stair protection, etc...)	R311.7
Handrail locations & requirements	R311.7.8
Guard locations & requirements	R312
Garage separation & opening protection	R302.5 & R302.6, Table R302.6
Attached decks and screened in porches (show minimum location and size)	Appendix M
Any Engineering documentation required for non-conforming element, must indicate compliance with current version of the NCRBC (can show on appropriate structural sheets)	R301
Layout of Rooms Adjacent to Additions (Room Name, Size/Location of Doors/Windows for egress/light and ventilation requirements)	R303, R310, R311, R303.2
Rated wall/floor assembly details (When required furnish details on tested assembly)	R302.1, R302.2, R302.3
Through/Membrane penetration details (When required furnish details on tested method)	R302.4.1, R302.4.2

ELEVATIONS/WALL-FLOOR SECTIONS (General/Energy)	Code Section
Story height/Building height (grade or grade plane to mean roof height with wall/floor section details)	R301.3
Roof pitch	Chapter 9, Table R802.11
Projections within fire separation distance, Including townhouse eave projections	R302.2.6
Soffit/eave protection (10' from lot lines and townhouses soffit protection)	R302.1.1, R302.2.5
Exterior wall coverings including weather barriers requirements	R703
Roof covering type (note: valley flashing and underlayment to be used)	R905
Chimney Termination point/cricket details/flue size with opening calculations	R1001 & R1003
Flashing (Wall/roof intersections, crickets)	R703, R903, 905
Floor, Wall & Ceiling insulation	N1102.1
Indicate alternate energy compliance method if used	N1101.13
Interior wall covering	R702
Wall vapor retarder (climate zone 5)	R702.7, R702.7.1

FOOTER/FOUNDATION/SLAB PLAN (Structural)	Code Section
Wall footing size & reinforcement if required	R403, Table R403.1(1), Figure R403.1(1), R4503, R4503.1.2
Foundation wall size, type & projected unbalanced fill limitation when applicable	R404, R4504
Pier footing size	R403, Table R403.1(2) & Figure R403.1(1)
Pier location	Table R403.1(2)
Masonry pier type and solid cap (Note example: 8x16 CMU hollow with 6" solid cap block)	Table R403.1(2)
Concrete slab footings/slab layout (including interior bearing walls locations for monoslab or floating slab and fill limitations)	R403, Table R403.1(1) & Figure R403.1(1), Sect R506
Vapor barrier type & lap requirements noted (Crawl space and under slab)	R506.2.3, R408, R409
Masonry Fireplace Footings- size/projections/thickness	R1001.2
Foundation waterproofing/dampproofing & Drainage	R405 & R406
Anchor bolts (Note for type anchor/spacing/seismic req. for foundation walls-crawlspace or basements)	R403.1.6, R403.1.6.1, R4504.2, Table 4504.2.1
Crawl space access (location and size)	R408.8 & R409.1.2
Crawl space ventilation or closed crawl method (Method details or vent location/type with calculations)	R408 & R409
New footing to existing footing tie-in detail (For additions/continuous footing or discontinuous detail)	R403, Table R403.1(1), Figure R403.1(1), App Q, R301

FLOOR FRAMING PLAN (Structural)	Code Section
Girder Size # of Ply's/Span/Species/Grade/location on layout	R502.5 & R602.7
Floor Joist Size/Spacing o.c./Span/Species/Grade shown on floor layout including cantilevers	R502.3.3
Floor Truss/I-Joist layout (Can be a separate layout or shown on floor plans w/notes)	R502.11 & R502.8.2
Openings in floor (headers, trimmers, tail joists detail)	R502.10
Floor sheathing type and thickness	R503

WALL FRAMING PLAN (Structural)	Code Section
Stud Size/Spacing o.c./Species/Grade (Stud height indicated on elevations)	R602.3.5, R4504.2, Table 4504.2.1 (a) & (b)
Wall bracing method(s) used	R602.10, R4506.2, R4506.3-.6
Req'd total wall bracing length per braced wall line	R602.10
Dimensioned length & location of individual braced wall panel	R602.10
Wall Header Size # of Ply's/Span/Species/Grade	R602.7, Table R602.7(1),(2)&(3)
Jack & King studs/type and # on each side of an opening	Table R602.7(1),(2)&(3), Table R602.7.5
Wall sheathing and weather barrier used	R602, Table R703.3(1), Table R602.3(1)
Anchor bolts (plan note for type anchor/spacing/seismic req. for slabs and stem walls)	R403.1.6, R403.1.6.1
Point loads (Load path and blocking between levels)	R601.2, R301
Foundation cripple wall requirements	R602.9
Attic knee wall requirements	R802

ROOF FRAMING PLAN (Structural)	Code Section
Field framing roof layout (Sawn lumber, I-joists or roof trusses-specific truss detail sheets field handled)	R802.3, R802.10
Rafter Size/Spacing o.c./Species/Grade & cantilevers	R802.5, R802.7.1.1
Roof tie down method and continuous load path (High wind zone including post uplift req.)	R4508
Ceiling Joist Size/Spacing o.c./Species/Grade	R802.4
Openings in ceiling (headers, trimmers, & tail joist detail)	R802.9
Attic Access (locations and size)	R807
Purlin requirements	R802.5.1
Hip, valley rafters & Ridge boards (including downbracing requirements)	R802.3
Collar ties & rafter ties	R802.3.1
Brick on roof details (support of veneer over a lower roof line detail)	R703.8.2.1 & R703.8.2.2
Roof sheathing type and thickness (including FRT-fire retardant treated material where req.)	R803, R302, R802.1.5
Roof ventilation or unvented (Type of vent and calculation, location, and if class I or II vapor retarder used)	R806

This is a minimum plan review checklist, additional information may be added by the applicant or requested in the field to determine compliance (e.g. I-joists hole cutting chart/booklet). Permit holders remain responsible for meeting all codes requirements regardless if a review item or not. This minimum review checklist is intended to help prevent any major non-compliance issues from being built in the field which typically results in significant cost and delays on a project.