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Code Review

33 Atlantic Street – Two Family Renovation

6/7/13

Prepared by,
Evan Carroll, AIA
Bild Architecture



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City Ordinance Review:

Zone: R6

14-139:

Min Lot Size: 4500sf (you have 3502)

Exception: 14-433

Min area per unit: 1000sf

Min Street Frontage: 40ft

Min Yard Dimensions:

Front: at least the average of the neighboring setbacks

Rear: 20ft

Side: 10ft (1-3 stories)

Max Lot Coverage: 50%

Min lot width: 40ft

Max Height: 45ft (currently at approx. 27')

Open space ratio: 20%

Parking: Division 20

IRC Summary

- R301 (See Structural Evaluation)
- R302.1 Exterior walls >5' separation distance: Not fire-resistance rated
 Projections >5' separation distance: Not Fire-resistance rated
 Wall openings >5' separation distance: Unlimited
 Penetrations >5' separation distance: No protections required
- R302.3 Two-Family Dwellings
 1-hour fire-resistance rated ceilings and walls for separation.
- R302.7 ½" Gyp must protect stairs in enclosed spaces under stairs
- R302.11 Provide Fire Blocking:
 At ceiling and floor levels (including soffits and cove ceilings)
 Between stair stringers at top and bottom of run
 At ceiling and floor penetrations with materials complying with ASTM E 136
- R302.12 No draftstopping required as there are no usable spaces above ceiling
- R303.1 All habitable rooms must have glazing areas at 8% of floor area, or be artificially ventilated and lit
- R303.3 Bathrooms must have 3sf of glazing, or be artificially ventilated and lit
- R303.7 Required glazing shall open directly into yard.
- R304 One room shall be 120sf minimum
 All habitable rooms shall be 70sf minimum and shall not be less than 7' in any direction
 Only areas with sloped ceilings over 5' and flat ceilings over 7' shall contribute to the required areas.
- R305 Min ceiling height: 7'
- R308.4 Doors shall have safety glazing.
- R310.1 Max sill height: 44"
 R310.1.1 Min emergency opening area: 5.7sf
 R310.1.2 Min emergency opening height: 24"
 R310.1.3 Min emergency opening width: 20"
- R311.2 Egress Door 32" wide, 78" high
- R311.3 36" deep landings shall be provided on either side of egress door.
 R311.3.1 If door swings in, 7 ¾" step to outside allowed
- R311.6 Hallways 36" wide
- R311.7 Stairway 36" wide
 6'-8" headroom
 Winders: measured 12" from inside and 6" min depth anywhere
 Riser: 7 ¾"
 Tread: 10"
- R311.7.5 Landings 36" deep
 Landing not required at top of stair with door opening away from stair
- R311.7.7 Handrail shall be provided on one side of stair.
 Height: 34"-38"
 Grip Size: 1.25" - 2" (circular)
- R312.1 Guards where 30" drop



36" high

R313 NFPA 13R system will be installed.

R314 Smoke Alarms hardwired required

R315 CO detectors required

R612.2 Sills below 24" from finish floor must have 4" opening limiter.

IECC - Brief Summary

402.1.1 Insulation and Fenestration Minimums: (for new construction)

Fenestration U-Factor	0.35
Ceiling R-Value	49
Wood Frame Wall R-Value	20 or 13+5
Basement Wall R-Value	15/19



CODE REVIEW CHECKLIST

Footing Dimensions/Depth (Table R403.1 & R403.1(1), (Section R403.1 & R403.1.4.1)	N/A (EXISTING)
Foundation Drainage, Fabric, Damp Proofing (Section R405 & R406)	N/A (EXISTING)
Ventilation/Access (Section R408.1 & R408.3) Crawls Space ONLY	N/A (EXISTING)
Anchor Bolts/Straps, Spacing (Section R403.1.6)	N/A (EXISTING)
Lally Column Type (Section R407) Girder & Header Spans (Table R 502.5(2))	N/A (EXISTING)
Built-Up Wood Center Girder Dimension/Type	N/A (EXISTING)
Sill/Band Joist Type & Dimensions	N/A (EXISTING)
First Floor Joist Species Dimensions and Spacing (Table R502.3.1(1) & Table R502.3.1(2))	N/A (EXISTING)
Second Floor Joist Species Dimensions and Spacing (Table R502.3.1(1) & Table R502.3.1(2))	SEE FRAMING PLAN
Attic or Additional Floor Joist Species Dimensions and Spacing (Table R802.4(1) & R802.4(2))	SEE FRAMING PLAN
Pitch, Span, Spacing& Dimension (Table R802.5.1(1) - R 802.5.1(8)) Roof Rafter; Framing & Connections (Section R802.3 & R802.3.1)	N/A (EXISTING)
Sheathing; Floor, Wall and roof (Table R503.2.1.1(1))	5/8" CDX PLYWOOD FLOORS
Fastener Schedule (Table R602.3(1) & (2))	N/A SHELL TO REMAIN
Private Garage	N/A (EXISTING)



(Section R309) Living Space? (Above or beside) Fire Separation (Section R309.2) Opening Protection (Section R309.1)	
Emergency Escape and Rescue Openings (Section R310)	SEE WINDOW SCHEDULE
Roof Covering (Chapter 9)	N/A (EXISTING)
Safety Glazing (Section R308)	SEE DOOR SCHEDULE
Attic Access (Section R807)	N/A (NONE)
Chimney Clearances/Fire Blocking (Chap. 10)	N/A (CHIMNEYS REMOVED)
Header Schedule [Table 502.5(1) & (2)] Energy Efficiency IECC, 2009 R-Factors of Walls, Floors, Ceilings, Building Envelope, U-Factor Fenestration	SEE SECTION SEE BUILDING SECTION & WINDOW SCHEDULE
Ventilation of Space per ASRAE 62.2, 2007	N/A
Type of Heating System CONNECTED TO NEW BOILER	HOT WATER TERMINALS AS
Means of Egress (Sec R311 & R312) Basement SEE STAIR SECTION Number of Stairways (INTERIOR AND EXTERIOR) 1 NEW INTERIOR	1 EXISTING INTERIOR
Treads and Risers (Section R311.5.3) Width (Section R311.5.1) Headroom (Section R311.5.2) Guardrails and Handrails (Section R312 & R311.5.6 - R311.5.6.3)	SEE STAIR SECTION SEE STAIR SECTION SEE STAIR SECTION SEE STAIR SECTION
Carbon Monoxide Alarms (R315) Smoke Detectors (Section R314) Location and Type/Interconnected	SEE PLAN SEE PLAN
Dwelling Unit Separation (Section R317) and IBC - 2003 (Section 1207)	1 HOUR SEE PLANS
Deck Construction (Section R502.2.1)	N/A (NONE)