

Product Data Sheet

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Product category: R-stud 30 mil Drywall Stud 362RS125-30 50 Ksi G60 3-5/8" x 1-1/4" R-stud

Coating: G60 Color coding: White

Geometric Properties

Yield stress, Fy 50 Ksi

Gross Section Properties of Full Section, Strong Axis*

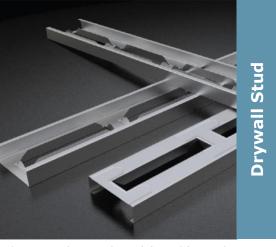
Cross sectional area (A) 0.23363 in^2 0.62994 in^4 Moment of inertia (lx) Radius of gyration (Rx, r1) 1.6557 in Moment of inertia (ly) 0.07426 in^4 Radius of gyration (Ry, r2) 0.5638 in Max bending moment Ix (Maxo) 8.0026 k-in Max bending moment Iy (Mayo) 2.1250 k-in Allowable shear force in web (Vax) 1.6004 k

Tension/Compression Properties*

Warping constant (Cw) 0.009792 in^6
Distance from shear center to neutral axis (Xo) -0.8888 in
Radii of gyration (ro) 1.7657 in
Torsional flexural constant (Beta) 6.9200e-5 in^4
Compression Pao (max) 4.4569 k
Tension Tao (Ta) 7.4642 k

Unbraced Length (Lu) Full / Non-braced

Fully Braced Strength (CFS) *CFS result



Web openings (not punch-outs) formed from web every 12 in. with Stamping at bridge every 12 in.

ASTM & Code Standards:

- ✓ ATI/Intertek CCRR 1073
- ✓ IBC 2012 Compliant
- ✓ AISI S-100 & S220-11
- ✓ ASTM E119, E72, E90
- ✓ ASTM AC86, C645, & C745
- ✓ UL 263
- ✓ US, Canadian, and International Patents Issued

Notes:

- Calculated properties are based on AISI S100-12, North American Specifications for Cold-Formed Steel Structure Members and ICC-ES AC46-2015, Acceptance Criteria for Cold-Formed Steel Framing Members.
- · Effective properties herein incorporate the increased strength from cold working of the steel while forming. We only use 50Ksi coils.
- Tabulated gross properties, including torsional properties, are based on the added cross section properties of the web openings. R-studs do not have punch-outs.
- Allowable moment includes cold work of forming.
- Allowable moment is taken as the lowest value based on local or distortional buckling. Distortional buckling strength is based on K-phi=0
- For deflection calculations, use the effective moment of inertia.
- Web openings are every 12 inches and are 9-13/16 inches long with flanges being 0.94 inches tall and corners of the web openings enhanced.

Sustainability: R-stud sources its steel coils from American Suppliers, such as US Steel and NUCOR's California Steel Industries for rolling in our manufacturing facilities. Our coils contain approximately 34.2% recycled steel. Approximately 19.8% is Post-consumer content, while Pre-consumer content is approximately 14.4%. R-studs are listed as "Red List Free" by the International Living Future Institute. **R-stud can provide a significant reduction of Embodied Carbon over comparable standard steel studs**. Steel is one of the most sustainable building materials in the world. It is recycled content, recyclable, durable, safe, zinc-coated, dimensionally stable and strong, as well as not susceptible to rot, termites, or mold.

Supporting Documentation

- 2016 AISI ASD, LRFD, and LSD
- 2012 AISI ASD, LRFD, and LSD
- 2010 AISI ASD, LRFD, and LSD
- 2007 AISI ASD, LRFD, and LSD
- 2004 AISI ASD, LRFD, and LSD
- 2001 AISI ASD, LRFD, and LSD
- 1999 AISI ASD and LRFD & 2002 ASCE ASD and LRFD (stainless steel)

Project Information

Name: Address: **Contractor Information**

Name: Contact: Phone: Fax: **Architect Information**

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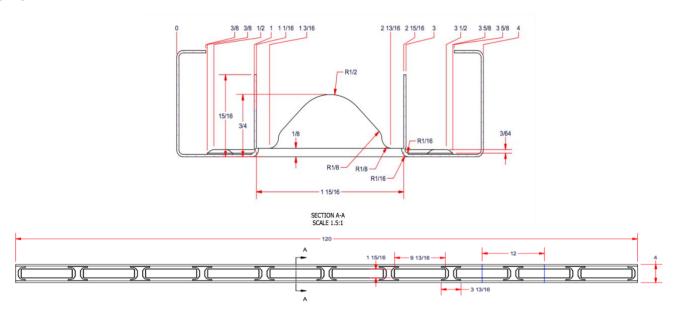
Limiting Wall Heights

Spacing (inches)	5 psf			7.5 psf			10 psf		
	L/120	L/240	L/360	L/120	L/240	L/360	L/120	L/240	L/360
16	22′-10″	17'-10"	15'-10"	19'-0"	15′-7″	13′-10″	18'-1"	14'-2"	12′-7″
24	19'-11"	15'-10"	13'-10"	17′-5″	13'-10"	12′-1″	15'-10"	12′-7″	11'-0"

Table Notes:

- Allowable composite limiting heights were determined from AC86-2012 testing by Intertek Testing / Architectural Testing, Inc.
- The composite limiting heights tables provided above are based on a single layer of Type X gypsum board from the following manufacturers, American, CertainTeed, Georgia Pacific, National, PABCO, and USG.
- The gypsum is to be applied full height in the vertical orientation to each stud flange and installed in accordance with ASTM C754-2004 using a
 minimum of No. 6 Type S Drywall spaced as listed below:
 - Screws spaced a minimum of 16 inches on-center to framing members spaced at 12 or 16 inches on-center.
 - Screws spaced a minimum of 12 inches on-center to framing members spaced at 24 inches on-center.
- No fasteners are required for attaching the stud to the track except as detailed in ASTM C754-2008.

Profile



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