The UL Standards

what are they and how to use them

WHAT ARE UL STANDARDS

UL Standards *describe the testing on products, on systems, and on services done by UL (formerly Underwriters Laboratories). Each test is identified with a UL number. The testing measures the products' performance, environmental health and safety, and sustainability.*

UL standards are regularly maintained to keep them current, including adding standards for new testing and updating existing standards as necessary.

For more information on UL standards, visit https://ulstandards.ul.com/about/understanding-standards\.

We use UL numbers as reference when our assemblies are identical or similar to the assemblies tested by UL. By using a UL number as a reference we are certifying that the assembly included in our Drawings is the same or is very similar to the assembly described by UL.

When referencing a UL tested assembly (by number) in our drawings, the following needs to be considered:

- That our assembly **is the same or less stringent than the assembly referenced by the UL number**. For example, if our assembly requires 1-hour testing for fire, we can reference an assembly UL tested for 1-hour or for 2-hours. More examples:
  - The UL tested assembly has one layer of 1/2 gypsum board on each side, and ours has one layer of 5/8 gypsum board on each side.
  - The UL tested assembly has 2 1/2" studs and ours has 3-5/8" studs.
- That the **UL number we are referencing is current** (Google it).

If you cannot find out if UL or any other approved testing agency has done testing in an assembly identical or similar to the one in your design, then:

- Call the assembly manufacturer's technical representative (Hilti or Tremco, for example) to find out if an assembly similar to the one in your drawings is included in their UL or another agency tested assemblies.
- If they don't have a tested assembly similar to yours, ask the representative if they can give you an Engineering Judgement that will work for your assembly.

The listings of the tested assemblies are published by the testing agencies and by the manufacturers. The listings published by the testing agencies **show all the products** that have used their testing services The manufacturer's listings **only show the manufacturer's products**.

NEVER, NEVER, *indicate or assign a UL number to an assembly unless the UL number is current and is used by the manufacturer.*

UL is a global safety certification company.

UL Listings Example; The image to the right is a portion of the page published by UL which shows non-bearing walls passing 1, 2, 3, and 4hr testing for fire rating. Link to the full page: http://productspec.ul.com/document.php?id=BXUV.U419. Notice that **all the tested products and their manufacturers are included in the UL description**.

For non-proprietary information on UL systems go here: https://ulstandards.ul.com/access-standards/.

To find out more on UL standards go here: https://ulstandards.ul.com/about/understanding-standards/.

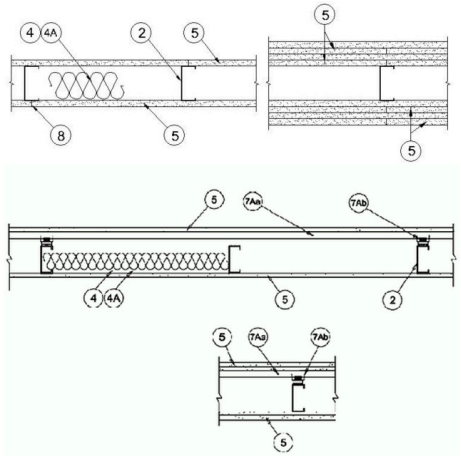
Listing published by UL

Design No. U419

September 13, 2019

Nonbearing Wall Ratings — 1, 2, 3 or 4 Hr (See Items 4 & 5 through 5K)

*** Indicates such products shall bear the UL or cUL Certification Mark for jurisdictions employing the UL or cUL Certification (such as Canada), respectively.**



1. **Floor and Ceiling Runners —** (Not Shown) — For use with Item 2 — Channel shaped, fabricated from min 25 MSG corrosion-protected steel, min depth to accommodate stud size, with min 1-1/4 in. long legs, attached to floor and ceiling with fasteners 24 in. OC max.

1A. **Framing Members* — Floor and Ceiling Runner —** Not Shown — In lieu of Item 1 — For use with Item 2B, proprietary channel shaped runners, 3-5/8 in. deep attached to floor and ceiling with fasteners 24 in. OC max.
CALIFORNIA EXPANDED METAL PRODUCTS CO — Viper25™ Track

CRACO MFG INC — SmartTrack25™

MARINO/WARE, DIV OF WARE INDUSTRIES INC — Viper25™ Track

FUSION BUILDING PRODUCTS — Viper25™ Track

IMPERIAL MANUFACTURING GROUP INC — Viper25™ Track

Manufacturer's Listings Example: The page at the right is published by USG. Notice that **only USG products are included**. The five partition types shown have the same UL Design Number - **U419.** This tells us that they were tested in exactly the same manner and all passed the test.

This example is taken from the USG's rated assemblies listings: http://www.usg.com/content/dam/

***Note**: We have to be extremely careful when using these references since they address the **safety** of the occupants of the buildings that we design.*

Listing published by USG

2 Hour Fire-Rated Construction		
wt. 11 3⅝"	• 1/2" Sheetrock panels each side, Firecode C Core – 1-5/8" 25 gauge steel studs 24" o.c. – face layer joints finished • optional veneer plaster	**UL Des U419** or **U412**
wt. 11 4⅛"	• 5/8" Sheetrock Firecode Core gypsum panels, or Fiberock panels – 1-5/8" 25 gauge steel studs 24" o.c. – face layer joints finished • optional veneer plaster	**UL Des U419** or **U411**
wt. 11 5"	• 5/8" Sheetrock Firecode Core gypsum panels, or Fiberock panels – 2-1/2" 25 gauge steel studs 24" o.c. – joints finished	**UL Des U419**
wt. 7 5"	• 3/4" Sheetrock Ultracode Core gypsum panels – 3-1/2" 25 gauge steel studs 24" o.c. – 3" Thermafiber SAFB – joints finished	**UL Des U419** or **U491**
wt. 7 5⅞"	• 1/2" Sheetrock Firecode C Core gypsum panels – 3-5/8" 20 gauge studs 24" o.c. – 3" Thermafiber SAFB – RC-1 channel or equivalent one side spaced 24" o.c. – single-layer gypsum panels screw-attached to studs – double layer screw-attached to channel – face layer joints finished • optional veneer plaster	**UL Des U419** or **U453**