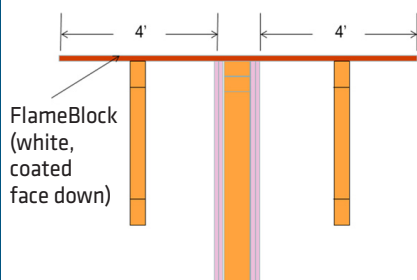


Application: Multifamily roof decks – fire wall continuity

Description:

- Where the shared, or “common” wall separating occupancies meets a roof deck, code* requires either
 - a) extension of the firewall 30” beyond the roof vertically (parapet construction)
 - b) Use of Class A flame spread rated sheathing for 4’ on each side of the wall where it intersects the roof deck
 - c) Type X gypsum wallboard installed underneath roof deck 4’ on each side of fire wall.



LP Certification/Listing: ICC-ESR #1365

Common Applications:

- FRT plywood
- Type X Gypsum wall board

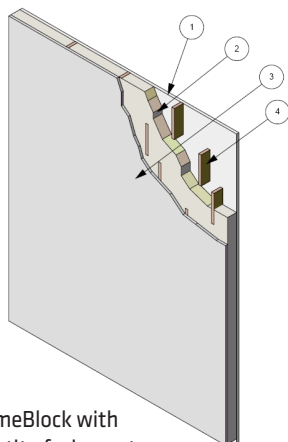
LP FlameBlock Sheathing Applications:

- LP FlameBlock sheathing is a direct substitution with Pyrotite facing down

Application: 1-hour rated exterior fire wall – zero lot line applications

Description:

- 2009 IRC requires walls built within 5’ of a property line or within 5’ of another building on the same property to have a 1 hour fire resistance rating with fire exposure from the exterior of the building (NOTE: Code* requirements vary)
- An addendum to the assembly allows for the use of common claddings, including SmartSide, fiber cement, and T1-11 panels.
- Assembly is listed with Intertek, not UL (See below)
- This assembly is load restricted. An engineering evaluation will be required to insure that various compressive, axial, and shear strength requirements are met



1. FlameBlock with Pyrotite facing out
2. Mineral wool insulation
3. 5/8 Type X gypsum
4. 2 x 6 wood stud

LP Certification/Listing: Intertek Labs - BT 60-01

Common Applications:

- 5/8-inch exterior gypsum (such as GP Densglass) installed behind the exterior cladding
- Three-coat stucco
- Fiber cement board cladding installed over 5/8 Type X gypsum wallboard

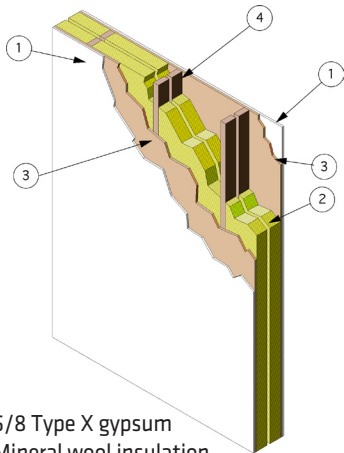
LP FlameBlock Sheathing Applications:

- LP FlameBlock should be installed with Pyrotite facing the exterior cladding.

Application: 2-hour interior party wall – common wall in townhome construction

Description:

- Double-stud party wall dividing units within a single building
- Structural/shear-rated wall



1. 5/8 Type X gypsum
2. Mineral wool insulation
3. LP FlameBlock with Pyrotite facing living space
4. 2-2 x 4 wood studs

LP Certification/Listing: Underwriters Labs U350

Common Applications:

- Two layers of 1” thick x 24” wide “Shaft wall liner” fire-rated gypsum with metal “H-studs”, installed between the two stud walls
- Typically, one side is built, then shaftliner is installed, then other wall is “tilted up” into position

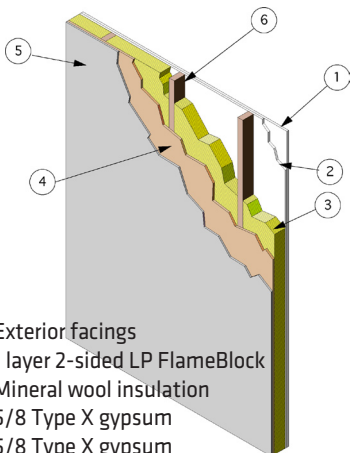
LP FlameBlock Sheathing Applications:

- LP wall assembly for this application requires 2 – 2x4 wood studs at least 1” apart, 1 layer of 15/32 LP® FlameBlock® sheathing & 1 layer of 5/8 Type X gypsum with mineral wool insulation in both stud cavities and Pyrotite® facing the living space (See assembly for details)

Application: 2-hour rated exterior wall – Type IIIA Construction

Description:

- Designed to be used in commercial or multifamily residential buildings of 3-6 stories (Type IIIA)
- Type IIIA construction is required to have non-combustible exterior walls (no wood) that have been rated, under load, to last at least 2-hours in a fire with exposure on the inside wall surface
- FRT wood framing is allowed as an exception within the IBC Code*
- Structural/shear-rated wall with interior fire exposure rating
- LP wall assembly for this application has been allowed by building code officials*



1. Exterior facings
2. 1 layer 2-sided LP FlameBlock
3. Mineral wool insulation
4. 5/8 Type X gypsum
5. 5/8 Type X gypsum
6. 2 x 4 wood stud

LP Certification/Listing: Underwriters Labs U349

Common Applications:

- Two layers of 5/8-inch, fire-rated gypsum on the interior with steel framing or FRT wood framing, FRT plywood exterior sheathing, and 5/8-inch exterior, fire-rated gypsum (such as GP DensGlass) (See U371)

LP FlameBlock® Sheathing Applications:

- LP wall assembly requires 2x4 wood studs, 1 layer of 2-sided 15/32 LP FlameBlock sheathing & 2 layers of 5/8 Type X gypsum with mineral wool insulation on the interior side of the wall

Application: Type I and II roof decks – strip malls and small commercial

Description:

- FRT is typically used as the roof deck, usually over foam insulation, as the walkable surface underneath rubber membranes
- EPDM and TPO single-ply membranes glued directly to the FRT plywood
- ICC-ES Report #1365 requires that the LP FlameBlock sheathing be treated “both-sides” to be considered equivalent to FRT in this application



LP Certification/Listing: Underwriters Labs TGFU R21591

Common Application:

- FRT Plywood

LP FlameBlock Sheathing Application:

- 2-sided LP FlameBlock sheathing

Application: Open soffit exposures

Description:

- FlameBlock has been approved by California’s Office of the State Fire Marshall’s (OSFM) and will soon be added to their Approved Products list. Product is currently on the list as a soffit and limited ignition material under the Blazeguard name
- In an open soffit application, California code* allows LP FlameBlock sheathing to be used as the roof deck material over the roof rafter “tails”, Pyrotite facing down
- The warranty period for this application is currently 2 years. We are conducting testing to support extension of the warranty



LP Certification/Listing: California OSFM
Approved Product List

Common Application

- Approved, ignition-resistant materials, such as fiber cement, installed as the “ceiling” of the open eaves

LP FlameBlock Sheathing Application:

- LP FlameBlock sheathing with Pyrotite facing down

Application: WUI Zone exterior wall

Description:

- In high risk fire zones in California, exterior walls that are not otherwise required to be 1-hour rated must meet requirements for fire resistance
- LP FlameBlock sheathing has been evaluated to be used with the following architectural claddings:
 1. LP SmartSide Lap and Panel Siding
 2. 1/2" Cedar or Redwood
- Other claddings may be substituted with local building inspector approval



LP Certification/Listing: California OSFM Approved Product List and Cal WUI protocol 12-7A-1

Common Practice:

- Fiber cement board claddings

LP FlameBlock Sheathing Application:

- LP FlameBlock sheathing with Pyrotite facing out

Application: Wood framed, low-slope commercial roof decks (Type V)

Description:

- In some places, commercial roof decks (like warehouse space) are constructed with wood frames
- If the roof deck is wood framed, FRT plywood is allowed as the roof deck
- LP FlameBlock sheathing may be used as a substitute for FRT plywood in these applications
- Please ask for assistance if you have this type of application



LP Certification/Listing: UNDERWRITERS LABS TGFU R21591

Common Practice:

- FRT Plywood

LP FlameBlock Sheathing Application:

- Depending on the building design type and location, one or two-sided LP FlameBlock sheathing may be required and Pyrotite treated single side may be required to face up or down

Application: Covered and “boxed-in” soffit

Description:

- Western US building design often prefers to leave the soffit area open, but to cover the roof deck exposed between the rafter tails with a decorative wood material
- Or builders may prefer to “box-in” the underside of the rafter tails by attaching a decorative cladding to the underside of the rafters
- In either of these cases, if the exposed, decorative material (the soffit “ceiling”) is not on the OSFM’s list of approved products for this application, the entire design must meet the performance requirements of a test specifically designed for this application: California SFM Standard 12-7A-3
- LP® FlameBlock® sheathing has passed the requirements for SFM Standard 12-7A-3 utilizing 5/8” cedar as a decorative cladding. The fire test was constructed to present a “worst case” scenario and therefore cover any commercially available cedar or redwood cladding



LP Certification/Listing: LP 12-7a-3 Test Report from Western Fire Center

Common Application:

- Approved, ignition-resistant materials, such as fiber cement, as the soffit ceiling, sometimes with fire-rated gypsum behind it

LP FlameBlock Sheathing Application:

- LP FlameBlock sheathing with Pyrotite facing down