#### How are electrical and plumbing installed?

Electrical wires are pulled through precut chases inside the core of each panel. Electricians feed wires through the chases without compressing the insulation or drilling through each stud. With the new energy codes, the plumbing is required to be done in the interior walls.

"I am an electrical contractor and we are currently wiring a new building built with SIPs and I am amazed by them. I am just finishing up the drawings for a new home . . . And am convinced that SIPs are the product to use for it."



What about ventilation?

Mechanical ventilation is now required in all new homes.

# How do I properly size the HVAC equipment?

Extreme utilizes energy modeling to size the equipment properly. The high insulating properties of SIPs allow smaller HVAC equipment to be used. Proper HVAC sizing is crucial because an oversized system will fail to reach the steady operating rate the equipment is designed for - resulting in less energy efficiency and possibly more maintenance costs.

## How do panels get to the jobsite?



Extreme has two company-owned semis to deliver panels to iobsites. If needed, we also have a forklift to unload the panels at the site. For farther distances, outside freight is used.

## What sets Extreme SIPs apart?

Extreme has the most fully-automated laminating process in the industry. Following computer-generated drawings, the panels are precision cut by a CNC machine. Extreme SIPs are code listed under ICC and NTA, and are third party tested by UL. We pride ourselves in providing one of the most complete packages in the SIPs industry backed by company-trained contractor/builders.

We are a family-owned business and have been manufacturing SIPs since 1992.

#### How do SIPs help the Environment?

SIPs are conducive to green building because of their energy saving properties. The super tight envelope reduces the demand for energy and promotes a healthy indoor environment. Reduced demand for energy translates into decreased greenhouse gases emitted into the environment. The foam insulation is composed of 98% air with a non-CFC blowing agent that requires only a small amount of petroleum to produce, and does not threaten the earth's ozone layer.



"It was great to be working with an Extreme package. I knew with confidence that we were going to arrive with something well designed, well manufactured and well packed. I wasn't disappointed."







We pride ourselves on providing the highest quality panels together with the best customer service available.



#### What are SIPs?

SIPs are high-performance building panels for foundations, floors, walls, roofs. Each panel consists of expanded polystyrene (EPS) rigid foam insulation between two sheets of oriented strandboard (OSB). Foundation panels consist of treated plywood with expanded polystyrene and a glu-lam every 4'.

Extreme Panels R-Values @ 25° F	
SIP Thicknesses	R-value
4 1/2"	17
6 1/2"	26
8 1/4"	33
10 1/4"	42
12 1/4"	51
Panel sizes available from 4'x8' to 8'x24'	

# How do Extreme SIPs homes outperform others?

When compared to stud framing/fiberglass insulation, SIP homes are much more energy efficient, stronger, quieter, and more draft free.

"The new house is a lot warmer, less drafty, and not as 'noisy' as the old house. The panel walls deaden sound, as opposed to letting it in or bouncing it off. They hold heat better, and it takes a lot less energy to heat it."



## How do SIPs compare in cost?

New energy codes are increasing the cost of construction. Smaller heating and cooling units lower energy bills. When comparing everything, SIPs are cost effective.

## Do SIPs meet the new building codes?

Extreme SIPs not only meet but exceed U.S. Building Codes.



## Do I need a plan that's designed for SIPs?

Extreme can build off architect/designer's plans. Or we can work directly from a well thought-out plan. Design flexibility exceeds any stick frame method. Tall walls are easy with SIPs; also unique 2<sup>nd</sup> levels and open areas.

#### How do SIPs compare to spray foam insulation?

R-value is guaranteed for twenty years. Foam thickness in SIPs is uniform throughout. Framing factor is 30% typical in stick frame compared to 5% in SIPs at varying R-values (meaning the overage of thermal transfer from inside to outside is 25% less).

# Can you use Extreme SIPs for basements?

Extreme manufactures foundation panels consisting of 5/8" treated plywood with expanded polystyrene in the middle. Glu-lam splines are used in every foundation panel 4' on center for easy installation.

"We built the foundation of our home with Extreme Panels. The foundation panels go up fast and easy, they're ready to finish and well insulated. There's no musty smell like you have in concrete basements and it's very dry."



#### How is a SIPs home healthier?

Because there are no gaps in the insulation, resulting in minimal air infiltration, it's easier to regulate indoor air quality. By using controlled ventilation systems, SIP homes allow for all incoming air to be filtered for allergens and dehumidified, resulting in better indoor air quality.