

## PRODUCT DESCRIPTION

Introducing IPS 500MAX, a versatile two-component, one to one by volume spray-applied polyurethane foam insulation. IPS 500MAX is engineered as a MAX-yield, low-density solution suitable for a wide temperature range and adaptable to various climate conditions. This is our highest yielding .48pcf formulation to date, while still delivering an environmentally conscious insulation product containing no ozone-depleting blowing agents and relies 100% on water. It is specifically designed to excel in thermal performance and provides effective control of air infiltration as an air-barrier assembly. IPS 500MAX consistently delivers high-quality performance, reducing downtime and enhancing on-site efficiency, creating an innovative insulation solution for all your needs.

## PROCESSING INSTRUCTIONS

<b>Mixing</b>	IPS 500MAX should be mixed for 20-30 minutes with a air or electric, collapsable blade mixer. Ensure that the product is not circulated until mixing is complete. Mixing should stop 15 minutes prior to application.
<b>Heating &amp; Recirculating</b>	Recirculate as necessary to attain chemical temperatures between 70°F and 95°F for both the A-Side and B-Side drums. This is essential to align the viscosities of the A-Side and B-Side, preventing off-ratio foam and enhancing yield. While recirculating, adjust the primary heater for the A-Side and the B-Side to 130°F -140°F. Utilize a laser thermometer or inlet temperature gauge to measure the drum temperature, ensuring that the A-Side drum never exceeds the temperature of the B-Side drum.
<b>Spray Technique</b>	While spraying, it is crucial to position the spray gun at a 90-degree angle to the substrate. Maintain a consistent distance of 16-18 inches throughout the application process. For wall cavities, adopt a side-to-side spraying technique, covering the area from the bottom of the bay to the top, ensuring thorough wetting of the studs along the way. When spraying a flat wall, adhere to the recommended gun angle and distance, avoiding the application of spray over a width exceeding 2 feet. This approach helps ensure optimal and controlled coverage for effective results.
<b>Contamination</b>	Take care to avoid resin contamination. Do not mix different resin products. Ensure thorough cleaning of mixers and transfer pumps, eliminating any debris, especially from different resin types. Prevent the mixture of closed-cell resin into open-cell resin for product integrity.
<b>Foam Protection</b>	Shield the finished product from direct sunlight to avoid UV degradation.
<b>Storage</b>	Low temperatures can adversely affect the performance of chemicals by causing issues such as poor mixing, pump cavitation, or other process-related challenges due to increased viscosity. To optimize chemical performance, it is recommended to store them at temperatures between 50°F and 80°F for a period of 24 hours before use, ensuring that the storage temperature does not exceed 90°F. In cold conditions, refrain from placing drums on concrete or metal floors. Avoid direct exposure to sunlight during storage. Maintain the integrity of the chemicals by tightly sealing drums when not in use.

## PROCESSING PARAMETERS

Dynamic Fluid Pressure	1,000 - 1,500psi
Mixing Ratio	1:1
Hose Heat	130 - 140°F
Preheat Temperature	"A" & "B" Component 130 - 140°F
Drum Temperature in Use	65 - 90°F
Recommended Mixing Chambers	02

## APPLICATION PARAMETERS

Storage Temperature	50 - 80°F
Suggested Ambient Ranges	15 - 120°F
Ambient Temperature	>5°F above dew point
Moisture Content of Substrate	<19%
Max Lift per Pass	12"

## RECOMMENDED PROCESSING EQUIPMENT:

Follow the spray equipment manufacturers safe operation guidelines. The processing equipment should have the capacity to deliver the polymeric isocyanate (PMDI) and polyol blend in a 1:1 volume ratio at suitable temperatures and spray pressures. Variations exist among individual spray units, necessitating precise calibration of primary heater and hose temperatures for each distinct polyurethane foam system. Adjust processing pressures and refine application techniques to achieve an optimal spray pattern tailored to the characteristics of the substrate and structure in question. Prior to engaging with this product, it is imperative to thoroughly review and acquaint yourself with the provided information, including the Safety Data Sheet (SDS), outlining the associated risks, appropriate usage guidelines, and safe handling procedures. All contractors and applicators are required to utilize suitable Personal Protective Equipment (PPE), such as respiratory, skin, and eye protection, when dealing with and processing spray foam systems.

## YIELD:

Foam application temperatures and pressures are subject to considerable variation due to factors like temperature, humidity, elevation, substrate, and equipment. While applying IPS foam, it's crucial for the applicator to continuously monitor the sprayed foam's characteristics and make necessary adjustments to processing temperatures and pressures to maintain the desired cell structure, adhesion, cohesion, and overall foam quality. The applicator bears the sole responsibility for ensuring that IPS foam is processed and applied within specified parameters. The Equipment Settings chart offers initial optimum settings, but real operating ranges will fluctuate with changes in ambient air conditions, humidity, moisture, and substrate temperatures. Extreme conditions can significantly impact foam yield, adhesion, and cured physical properties, necessitating adjustments by the applicator as conditions change.



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