PENNEMBLEM

Product Details

Be confident in your choice of industrial flame resistant protection. Custom Flame Resistant Emblems add valuable seconds for escape to protect workers who are exposed to sparks or flames. They are manufactured using the same techniques as custom embroidered emblems but with the added protection of 100% Dupont Nomex® flame resistant fibers and a fire resistant backing, combining safety with identification for high risk settings. FR emblems feature merrow borders and a tough PennBond® backing for heat seal or sew on application. These reusable embroidered emblems meet regulatory standards for safety apparel while standing up to industrial laundering for long-term performance. Use to enhance the personal protective equipment worn by workers in hazardous industries such as petrochemical and electrical.

Emblem Dimensions:

- **Minimum** emblem size is **1.0" x 1.75"** (2.5cm x 4.4cm).
- **Maximum** emblem size is **13.0" x 17.5"** (33.0cm x 44.5cm).

Design Lettering Dimensions:

3/16" is the minimum size lettering. Call your Customer Service Representative for other options: 800-793-7366. For designs requiring smaller lettering, these options might be a better fit: Pennweave woven emblems, PennFutex emblems, etc.

Fabric Colors and Thread Types:

Please see Nomex® Flame Resistant Thread and Fabric Color Charts.

http://pennemblem.com/services/color-charts

Custom Fabrics & Threads:

Custom fabrics and threads are not available for flame resistant emblems.

Backing Types:

FR Urethane • Industrial

Border / Edge Styles:

Merrowed border. Flame Resistant Emblems are manufactured <u>with merrowed borders</u>, a separately stitched over-lock edge. The ability to sew a merrowed border onto an emblem is directly related to the emblem shape. Odd, intricate shapes may not be suitable for merrow application.
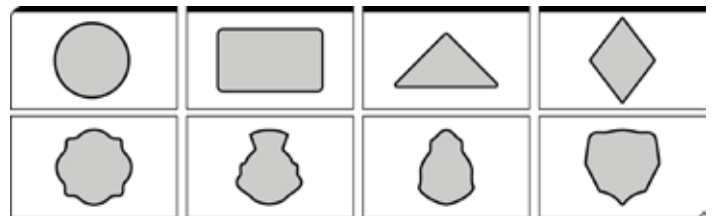

Merrow Border Limitations:

As noted above, Flame Resistant Emblems are manufactured with merrowed borders. The edges of the emblem are guided through a surging, over-lock sewing machine by hand, and a heavy stitching is applied.
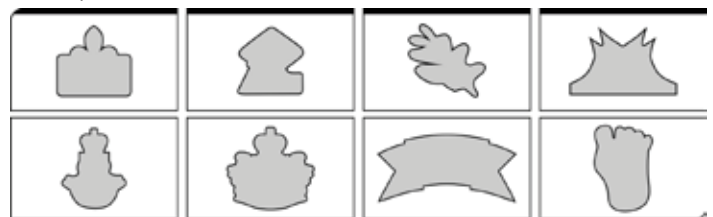
Shapes with edges that are completely open and "exterior" are more easily merrowed. However, odd, intricate shapes with edges that angle back towards the interior of the emblem, generally cannot be merrowed.

Merrow borders have a maximum width of 3/8"

Shapes that can be merrowed

Shapes that cannot be merrowed

Images are not to size.

PENNEMBLEM
always on brand

Application Methods:

Sew-on, heat seal or stick-on. The manner in which embroidered emblems can be attached to garments or other textile products relates directly to the type of backing used in the manufacturing process, the size of the emblems and the types of materials that the emblems will be attached to. Almost all emblems can be sewn on, and when it comes to heat seal application, smaller emblems are easier to work with. The chart below outlines the application options relative to backing types.

backing type	sew on application	hand application	hand iron application	heat seal application	heat seal settings			
					top (sponge)	bottom (teflon)	pressure	cycle time
Industrial	yes	no	no	yes	405°F (207°C)	405°F (207°C)	60-80 PSI * on gauge	12 to 14 seconds
FR Urethane	yes	no	no	yes	340°F (171°C)	340°F (171°C)	90-100 PSI * on gauge	12 to 14 seconds

* These recomended settings are based on manually operated or air operated heat seal machines with top and bottom heated platens.
Recommended: Pre-Press for 5 seconds to heat up and burn off the sizing or finish on the garment before applying and attempting to bond the emblem.

Picture of bottom heat setup

— Silicone Sponge Pad

— Teflon Cover

Pressure Settings Depending on Platen Size. Pressure Settings based on Texas Automation Heat Seal Machines with a 3" Cylinder.

2" x 4" 40-60 PSI on Gauge

3" x 5" 55-60 PSI on Gauge

4" x 6" 60-80 PSI on Gauge

3.5" x 5" 60-80 PSI on Gauge

Pressure Settings Depending on Platen Size. Pressure Settings based on Natmar Heat Seal Machines with a 4" Cylinder.

2" x 4" 40-60 PSI on Gauge

3" x 5" 55-60 PSI on Gauge

4" x 6" 60-80 PSI on Gauge

6" x 8" 75-95 PSI on Gauge

Heat Seal Notes & Tips:

➢ **Thicker fabrics** may require longer cycle times beyond the ranges.
➢ **Treated fabrics** finished with coatings, sizing or repellants may not allow for proper heat seal bonding.
➢ Items made with leather, suede, nylon, synthetics, nylon-shell, interlinings, rubberized coatings and reflective fabrics, such as jackets and luggage, may react poorly to heat seal temperatures depending on thickness, weave, texture and weight. It is recommended that these fabrics be tested first, with possible heat seal time and temperature adjustments. In many cases, it may be better to have emblems sewn on to these materials.

Ordering Guidelines

Artwork & Set-up Fees:
An emailed sketch card or scan of your finished emblem is included with the order for no additional cost.

Order Quantities:
Low minimum quantities.

Payment Methods:
We accept Visa, MasterCard, American Express, Discover, Wire/ACH and Checks. However, if you choose to pay with check, and you do not have payment terms with us, we cannot process your order until we receive your check. This may not be the best method if the order is deadline driven - please speak to one of our sales associates to discuss the period required to process the order. If you are pre-paying for an order, you will receive an additional freight charged to your credit card after the order has shipped. In addition, we can set you up with terms.

If you would like to be set up with payment terms you will need to fill out the Credit Application form by clicking here. Once the credit application is approved you will be able to place your order. You will receive your invoice when your order has shipped, and that invoice is due within 30 days.

Turnaround Time:
Most orders will ship in 10-12 business days. Rush pricing and delivery is also available on certain products for quicker delivery.
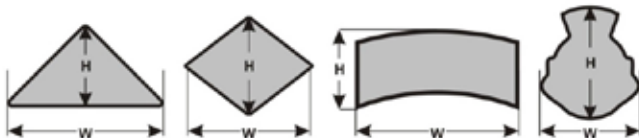
Change/Cancellation Policy:
Please speak to a customer service representative to change or cancel an order.

Ordering Guidelines:
Order specifics. During the design, artwork and ordering processes, there are specific details that we require in order to proceed with your request, such as:

Emblem Type • Design Colours • Fabric Colour • Border Colour • Dimensions • Backing Type • Quantity • Special Delivery Needs

Emblem sizes are calculated by adding the height (h) and the width (w), then dividing by two. Example 2" (h) + 4" (w) = 6 divided by 2 = 3.

Accepted Design / Artwork File Types:
The chart below lists the various graphic and design file types that Emblemtek will accept for artwork and production purposes. Certain file types are preferred as noted.

Graphic File Types:

- CorelDraw (.cdr) pref
- Adobe Illustrator (.ai) pref
- Encapsulated PostScript (.eps) pref
- Adobe Portable Document File (.pdf) pref
- Joint Photographic Experts Group (.jpg) pref
- Portable Network Graphics (.png) pref
- Adobe Photoshop (.psd)
- Corel Photo-Paint (.cpt)
- Targa Bitmap (.tga)
- Tagged Image File Format (.tiff)
- Windows Bitmap (.bmp)
- CompuServe Bitmap (.gif)

Embroidery File Types:

- Tajima Stitch File (.dst) pref
- Wilcom EMB File (.emb) pref
- Pulse Embroidery File (.pxf)
- Tajima TBF File (.tbf)
- Barudan Stitch File (.dsb)
- Melco Expanded File (.exp)

UNITED STATES   CANADA   MEXICO   UNITED KINGDOM   FRANCE   NETHERLANDS   BELGIUM   GERMANY   PORTUGAL

☎ 800-793-7366

🌐 pennemblem.com

💻 ssales@pennemblem.com

PENNEMBLEM
always on brand