

# Tool Control Material Specifications

From VICTORY FOAM, INC.

VFI

## TOP FOAM LAYER

**Category:** Cross-linked polyethylene  
**Thickness:** 1/2" - 4"  
**Colors:** Black, Blue, Red, Yellow, Grey (custom colors on request)  
**Density:** 2, 3 or 4 lb.

### Technical Characteristics

	lb/ft <sup>3</sup>	lb/ft <sup>3</sup>	lb/ft <sup>3</sup>
<u>Nominal Density (PCF):</u>	2	3	4
<u>Tensile Strength (PSI):</u>	43	70	135
<u>Elongation (% to break):</u>	120	150	190
<u>Tear Resistance (lb/in.):</u>	11	17	36
<u>Compression Strength (PSI - 25% deflection):</u>	6	12	19
<u>Compression Set (% of original thickness):</u>	24	18	13
<u>Thermal Stability (% of change @ 158°F for 24hrs):</u>	<.5	<.6	<.6
<u>Working Temp. Range:</u>	-70°F to 175°F		
<u>Water Absorption (lb/ft<sup>2</sup>/°F):</u>	<.06	<.05	<.04
<u>Melting Point:</u>	219°F to 280°F		
<u>Auto Ignition Point:</u>	>650°F		

### Chemical Resistance Characteristics

Tested in accordance with ASTM D543-2000

### Material Safety Data Sheet

MSDS available upon request

### Machining Capability

Foam can be router cut, water jet cut, or die cut and maintain the physical properties required to adequately meet varying retention requirements of different customers.

## HARD BACK LAYER

**Category:** Polyethylene 75 - 99%, proprietary additives 1 - 25%  
**Thickness:** 1/8" +/- 1/32"  
**Colors:** Red, Yellow (custom colors on request)  
**Density:** 60 lbs/ft<sup>3</sup>

### Material Safety Data Sheets

MSDS available upon request

## BONDING METHOD

The bonding of top layer material to backer material, and the bonding of top layer material to like materials in order to attain added thickness, must be performed in a manner that ensures complete and consistent adhesion and be guaranteed against delamination for a period of no less than 3 years from date of purchase.

If glued, MSDS sheets must be provided upon request.

## GENERAL SPECIFICATIONS

- All materials are manufactured in the USA.
- Finished foam products are manufactured in ISO 9001 certified facilities.
- As applicable for the purpose described, all materials meet Mil Specs. AA-59315 and AA-59316.
- Top layer of foam and machining capability are such that incorporating pocket badges, chits or other key control elements can be effectively accomplished.
- Warranty guarantees products to be free of defects in parts and workmanship for a period of no less than 3 years.