



Permatex® Zip Grip® TE 2400

Description: A high-viscosity, rubber-toughened instant adhesive with exceptional flexibility and extended temperature resistance

Intended Use:

- Product features:**
- Bonds dissimilar substrates
 - Exceptional thermal shock performance
 - Temperature-resistant to 280°F
 - Permanent
 - Toughened Ethyl High Viscosity [Clear]
 - High impact resistance
 - Fills large gaps
 - Enhanced toughness to peel and shock loads
 - Humidity and water resistant

Limitations: Not recommended for use on glass due to substrate weakness

Typical Physical Properties: *Technical data should be considered representative or typical only and should not be used for specification purposes.*

Cured 7 days @ 75° F

| | |
|---|------------------------------|
| Adhesive Tensile Shear | 3,700 psi |
| Coefficient of Thermal Expansion | .00012 in./in./°F |
| Dielectric Constant | 5.4 @ 1KHz |
| Dielectric Strength | 295 volts/mil @ 1KHz |
| Flashpoint | 185°F |
| Impact Resistance | 8 ft.lb./in.(2) |
| Melting Point | 329°F |
| Peel Strength | 10 pli |
| Refractive Index | 1.49 |
| Service Temperature Range | -65°F to 280°F |
| Solubility | Nitromethane, Acetone |
| Volume Resistivity | 5.3E-14 ohm/cm |

TESTS CONDUCTED

- Adhesive Tensile Shear ASTM D 1002
- Dielectric Constant ASTM D 150
- Volume Resistivity , ohm/cm ASTM D 149
- Coef. of Thermal Expansion ASTM D 696
- Dielectric Strength, volts/mil ASTM D 149

Uncured

| | |
|-------------------------------|---|
| Base | Ethyl cyanoacrylate |
| Color | Colorless liquid |
| Cure Speed | 40-70 sec.(Steel); 25-50sec. (Plastics); 25-50sec. |
| Full Cure | 24 hrs. |
| Gap Filling | 0.009" |
| Military Specification | Mil-A-46050C Type II, Class 3 |
| Shelf Life | 1 year |
| Specific Gravity | 1.06 g/cc |
| Viscosity | 2,400 cps |

Surface Preparation: Clean surface by solvent-wiping any deposits of heavy grease, oil, dirt, or other contaminants. Surface can also be cleaned with industrial cleaning equipment such as vapor phase degreasers or hot aqueous baths.

---- CLEANING METHODS ----

STEEL:
 Vapor degrease or cold-solvent clean (Sand blasting or other preparation is not typically required).

ALUMINUM:
 Abrade with Scotch-Brite™ abrasive pads or steel wool, then clean with solvent.

RUBBER:
 Wipe clean with isopropyl alcohol or solvent.



PLASTICS:

Lightly abrade shiny, smooth surfaces, then solvent-wipe with suitable solvent such as 1,1,1-trichloroethane, acetone, or VM&P naphtha. Non-shiny surfaces need only be solvent-wiped.

Mixing Instructions:

Mixing is not applicable to this product.

Application Instructions:

1. Apply adhesive directly from bottle [approx .006 gms per sq. in is sufficient]
2. Press surfaces together
3. Hold tightly for a few seconds

ADDITIONAL PRODUCT INFORMATION

- Cyanoacrylates fixture in a few seconds on most smooth, close fitting substrates
- They cure best at room temperature [72°F]
- Heat does NOT accelerate the cure of cyanoacrylates
- The gap of the bond line will affect set speed. Smaller gaps tend to increase the speed.
- Activators can be applied to improve set speed but may also impair overall performance.

Storage:

Store in a cool, dry place.

Compliances:

CID A-A-3097, Type II, Class 3

Chemical Resistance:

Chemical resistance is calculated with a 7 day, room temp. cure (30 days immersion) @ 75 °F)

| | |
|-----------------------|-----------|
| 1,1,1-Trichloroethane | Excellent |
| Gasoline (Unleaded) | Excellent |
| Hydrochloric 10% | Poor |
| Motor Oil | Excellent |
| Sodium Hydroxide 10% | Poor |

Precautions:

Please refer to the appropriate material safety data sheet (MSDS) prior to using this product.

For technical assistance, please call 1-800-933-8266

FOR INDUSTRIAL USE ONLY

Warranty:

Devcon will replace any material found to be defective. Because the storage, handling and application of this material is beyond our control, we can accept no liability for the results obtained.

Disclaimer:

All information on this data sheet is based on laboratory testing and is not intended for design purposes. ITW Devcon makes no representations or warranties of any kind concerning this data.

Order Information:

72261 1 lb.
72250 1 oz.



Permatex® Zip Grip® GPE 3

Description: A low-viscosity, moisture-curing, general purpose instant adhesive for tight-fitting parts

Intended Use: Bonding rubber weatherstripping, fixturing rubber gaskets, splicing o-rings, repairing plastics and metals

Product features:
Fixtures in seconds
Permanent
Easy to apply
Highly resistant to aging and weathering

Limitations: Not recommended for use on glass due to substrate weakness

Typical Physical Properties: *Technical data should be considered representative or typical only and should not be used for specification purposes.*

Cured 7 days @ 75° F

Adhesive Tensile Shear 3,200
Coefficient of Thermal Expansion 0.00012 in./in./°F
Dielectric Constant 5.4 @ 1KHz
Dielectric Strength 11.6 KV/mm
Flashpoint 185°F
Melting Point >329°F
Peel Strength 2 pli
Refractive Index 1.49
Service Temperature Range -65° to 200°F
Solubility Nitromethane, Acetone
Volume Resistivity 5.3E-14 ohm/cm

TESTS CONDUCTED

Coef. of Thermal Expansion ASTM D 696
 Dielectric Strength, volts/mil ASTM D 149
 Adhesive Tensile Shear ASTM D 1002
 Dielectric Constant ASTM D 150
 Volume Resistivity , ohm/cm ASTM D 149

Uncured

Base Ethyl cyanoacrylate
Color Colorless liquid
Cure Speed 5-10 sec. (Steel); 3-5 sec. (Plastics): <2 sec. (
Full Cure 24 hrs
Gap Filling 0.003"
Military Specification Mil--A-46050C Type II Class 1
Shelf Life 1 year
Specific Gravity 1.06 g/cc
Viscosity 3 cps

Surface Preparation: Clean surface by solvent-wiping any deposits of heavy grease, oil, dirt, or other contaminants. Surface can also be cleaned with industrial cleaning equipment such as vapor phase degreasers or hot aqueous baths.

---- CLEANING METHODS ----

STEEL:
 Vapor degrease or cold-solvent clean (Sand blasting or other preparation is not typically required).

ALUMINUM:
 Abrade with Scotch-Brite™ abrasive pads or steel wool, then clean with solvent.

RUBBER:
 Wipe clean with isopropyl alcohol or solvent.

PLASTICS:
 Lightly abrade shiny, smooth surfaces, then solvent-wipe with suitable solvent such as 1,1,1-trichloroethane, acetone, or VM&P naphtha. Non-shiny surfaces need only be solvent-wiped.



**Mixing
Instructions:**

Mixing is not applicable to this product.

**Application
Instructions:**

1. Apply adhesive directly from bottle (approximately .006 grams per sq. in. is sufficient).
2. Press surfaces together
3. Hold tightly for a few seconds

ADDITIONAL PRODUCT INFORMATION

- Cyanoacrylates generally fixture in a few seconds on most smooth, close-fitting substrates.
- They cure best at room temperature [72°F]
- Heat does NOT accelerate the cure of Cyanoacrylates
- The gap of the bond line will affect set speed. Smaller gaps tend to increase the speed.
- Activators can be applied to improve set speed but may also impair overall performance

Storage:

Store in a cool, dry place.

Compliances:

CID A-A-3097, Type II Class 1

**Chemical
Resistance:**

Rating chemical resistance is not necessary for this product.

Precautions:

Please refer to the appropriate material safety data sheet (MSDS) prior to using this product.

For technical assistance, please call 1-800-933-8266

FOR INDUSTRIAL USE ONLY

Warranty:

Devcon will replace any material found to be defective. Because the storage, handling and application of this material is beyond our control, we can accept no liability for the results obtained.

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**Order
Information:**

70145 2 gm
70161 1 lb.
70144 14 gm