

Chem-Set[™] CT300 Cyanoacrylate Adhesive

Medium Viscosity, Surface Insensitive

Chem-Set CT300 is a clear toughened ethyl cyanoacrylate adhesive. It is medium in viscosity combined with excellent shock and impact resistance. It is specifically formulated for bonding wide range of substrates including metals, wood, plastics, leather, rubbers, ceramics, cardboard, etc.

APPLICATIONS:

- Ideal for wide variety of manufacturing and assembly of industrial parts.
- Ideal where alignment of parts is required.

BONDING TIMES:

Plastics	10-15 seconds	Rubbers	< 10 seconds
Steel	20-30 seconds	Leather	15-20 seconds
Aluminum	12-18 seconds	Ceramics	20-30 seconds

PHYSICAL PROPERTIES

Liquid

Composition	Toughened Ethyl Cyanoacrylate
Appearance	Colorless liquid
Viscosity@ 25 °C, cps	200-500
Brookfield LVF, Spindle 1-60 rpm	

Cured Adhesive

Gap Filling	0.55 mm
Tensile Shear Strength	18-28 n/mm ²
Service Temperature Range	-60 to +80 °C
Full Cure	24 hours
Melting Point Temperature	160 to 170 °C

Shear Strength ASTM D 1002/DIN 53283

Grit Blasted Steel	> 20 N/mm ²	Etched Aluminum	> 18 N/mm ²
Rubbers	> 22 N/mm ²	Wood	> 25 N/mm ²
Polycarbonate	> 12 N/mm ²	ABS	> 10 N/mm ²

Physical Properties:

Coefficient of thermal conductivity, ASTM C177, W.m ⁻¹ k ⁻¹	0.1
Glass Transition Temperature, ASTM E228,	120 °C
Coefficient of thermal expansion, ASTM D696, K ⁻¹	75 x 10 ⁻⁶

Electrical Properties:

Dielectric strength, ASTM D149, kV/mm	25
Volume resistivity, ASTM D257, Ohm.cm	1 x 10 ¹⁶
Dielectric constant, 25 °C, ASTM D150	2.3

APPLICATION INSTRUCTIONS:

- ✓ All surfaces must be clean, dry, dust and grease free. Best result will be achieved with surfaces that have been lightly abraded immediately prior to bonding.
- ✓ If using accelerator apply to one component surface only. Apply thin film of adhesive to the other surface and bring the pieces together immediately. Hold for few seconds without disturbing the joints.
- ✓ When bonding “O” rings, cut a fresh surface onto each end of the rubber to gain the best possible strength.

PRECAUTIONS: This product and the auxiliary materials normally combined with it are capable of producing adverse health effects ranging from minor skin irritation to serious systemic effects. None of these materials should be used, stored, or transported until the handling precautions and recommendations as stated in the Safety Data Sheets (SDS) for this and all other products being used are understood by all persons who will work with the product.

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