

**PRODUCT NAME:** RE:CHEMISTRY CLEAN300

**CAS Reg. No.:** 5413-49-0

**INCI NAME:** Ethyl PG-Acetal Levulinate

**DESCRIPTION:**

- Pure Ketal Ester-based Solvent.
- 72% Biogenic Carbon according to ASTM D6866-20.
- Ultimately biodegradable.
- Non-flammable, Non-combustible and Low volatile (LVP-VOC).
- Classified as Non-irritant, Non-corrosive, Non-sensitizing and Non-toxic.
- Miscible in conventional organic solvents and water.
- Ethyl PG-Acetal Levulinate is a GRAS (Generally Recognized As Safe) rated substance by FEMA and listed as Solvent in the Safer Chemical Ingredients List of US EPA Safer Choice.

**PERFORMANCE:**

- Sustainable replacement for many commonly used solvents.
- Strong polymer solvency able to dissolve a broad range of polymeric binders making it a powerful component for resin clean-up and removal operations.
- Outstanding performance as a degreasing agent, bringing strong solvency across a broad range of organic residues.

**APPLICATIONS:**

- CASE
- Home care and Industrial cleaning

**PHYSICO-CHEMICAL PROPERTIES:**

PROPERTY	UNIT	RESULT
APPEARANCE	-	Clear liquid
AUTOIGNITION TEMPERATURE	°C	353
BOILING POINT	°C	225.2
COLOUR	-	Colourless to pale yellow
DENSITY (23.9 °C)	g/ml	1.03
EVAPORATION RATE (n-BUTYL ACETATE = 1) <sup>1</sup>	-	< 0.01
FLASH POINT	°C	> 93.3
HSP (25 °C)	-	-
DISPERSION (δD)	(J/cm <sup>3</sup> ) <sup>1/2</sup>	15.17
POLAR (δP)	(J/cm <sup>3</sup> ) <sup>1/2</sup>	4.68
HYDROGEN BONDING (δH)	(J/cm <sup>3</sup> ) <sup>1/2</sup>	6.80

PROPERTY	UNIT	RESULT
MELTING POINT / FREEZING POINT	°C	< -60
MIR VALUE <sup>2</sup>	g O <sub>3</sub> /g VOC	1.28
MOLECULAR	-	-
FORMULA	-	C <sub>10</sub> H <sub>18</sub> O <sub>4</sub>
WEIGHT	g/mol	202.25
PARTITION COEFFICIENT / LOG P (20 °C)	-	1.38
SOLUBILITY IN WATER (20 °C)	g/l	31.22
SURFACE TENSION (72 °F, 22.2 °C)	dyn/cm	31.03
VAPOUR PRESSURE <sup>3</sup>	-	-
20 °C	kPa	0.0039
25 °C	kPa	0.0060
VISCOSITY (DYNAMIC) (24 °C)	mPa·s	3.52

<sup>1</sup> According to ASTM D3539.

<sup>2</sup> MIR = Maximum Incremental Reactivity (calculated).

<sup>3</sup> Calculated.

**SHELF LIFE AND STORAGE:** The Product has a shelf life of 730 days from the date of manufacture when stored in the original unopened containers in normal conditions.

#### COMPATIBILITY:

MATERIAL	COMPATIBILITY	MATERIAL	COMPATIBILITY
ABS		NITRILE RUBBER	
ACRYLIC		NYLON	
ADMIRALTY BRASS (CDA443)		POLYETHYLENE TEREPHTALATE	
ALUMINIUM (AI2024 - T3)		POLYPROPYLENE	
ALUMINIUM (AI5083)		POLYVINYLCHLORIDE (PVC)	
ALUMINIUM (AI7075 - T6)		PVA	
BUTYL RUBBER		PVDF	
CHLORINATED PVC		SAN GRADE 1	
CLAD ALUMINIUM (AI2024 - T3)		SAN GRADE 2	
CLAD ALUMINIUM (AI7075 - T6)		SAN GRADE 3	
COPPER (CDA110)		SBR	
EPDM	ND	SILICONE	ND
GALVANIZED MILD STEEL (C1010)		STAINLESS STEEL (304L)	
GALVANIZED STEEL (G90)		STAINLESS STEEL (316L)	
HIGH DENSITY POLYETHYLENE		TEFLON	ND
LDPE		TYGON	ND
NEOPRENE		VITON	ND

Low (red / orange) to medium (yellow) and high compatibility (light / dark green).

ND = No Data.