

# Technical data sheet

## ALBODRY Castor Oil PU Quality

### Characteristic:

ALBODRY Castor Oil PU-Quality, is a water-reduced, nondrying, refined oil won from the seeds of "Ricinus communis L." which is different to other vegetable oils due to its special molecular structure.

### Specification:

			<b>According to:</b>
Acid value	mg KOH/g	max. 2	ISO 660
Iodine colour value		max. 4	DIN 6271
Gardner colour value		max. 4	ISO 4630
Water content	%	max. 0.05	ISO 8534
Iodine value acc. to Wijs	g Iod/100g	82 - 89	ISO 12966
Hydroxyl value	mg KOH/g	min. 160	ISO 12966

### Further typical data\*:

			<b>According to:</b>
Saponification value	mg KOH/g	175 - 187	ISO 12966
Density at 20°C	g/cm <sup>3</sup>	0.952 - 0.965	ISO 2811-3
Viscosity acc. to Höppler	dPas	9.5 - 11.0	ISO 12058-1
Refractive index		1.4783 - 1.4800	ISO 6320

### Solubility

miscible in any ratio with ethanol (95%)

### Applications:

Because of the low water content (max. 500 ppm) the dried quality especially is suitable to be used as polyol component - pure or as mixture with synthetic polyols - in polyurethane systems. Applications fields are for example PU-casting systems, foams, adhesives, sealants and coatings. In coatings it is especially suitable for transparent systems as in most cases no molecular sieve needs to be added. In addition to the above mentioned applications, ALBODRY Castor Oil PU-Quality is used in industry paints based on ricinene-alkyds and in the plastics, fibre, textile and leatherauxiliaries industry.

# Technical data sheet

## ALBODRY Castor Oil PU Quality

### Properties:

Castor oil has a unique structure. The triglyceride has up to 85 - 90 % of the so called ricinoleic acid (12-hydroxy-oleic acid), which is responsible for the chemical, physical and physiological properties. Castor oil is non-drying; in contrast to other vegetable and animal oils or fats, it is soluble in alcohol and has a viscosity which is 20 times as high. Chemical reactions with the ester groups, the double bondings and the hydroxyl groups allow a wide range of possibilities to produce various derivatives from castor oil.

### Storage:

The storage life can be guaranteed for minimum 12 months in tightly locked containers and at a temperature of + 10 °C up to + 30 °C.

A turbidity of the oil due to coldness is reversible and can be removed by heating up to more than 40 °C.

### Safety:

For further information on product safety please refer to the current safety data sheet.

### Notice:

\* General information - the values can not be considered as part of the product specification.