

**PRODUCT DESCRIPTION**

UNILEC PC90 is pure Phosphatidyl Choline (90%) with minimum 98% phospholipids content, it is brown waxy solid derived from oil extraction of Soya seeds degumming.

**PRODUCT APPLICATION**

UNILEC PC90 is natural product and used for pharmaceutical and nutraceutical applications. Emulsifier for enteric & parental formulations ( emulsions & Fat infusion). Raw material for liposome, micro emulsions and micelles.

**PRODUCT PHYSICAL & CHEMICAL ANALYSIS**

Parameter	Specification	Method of Analysis
Acetone Insoluble %	Min. 98%	AOCS Ja 4-46
Appearance	Yellow to Brown Waxy Solid	Visual
Odour	Natural flavour and odour	Organoleptic
Moisture %	Max 1 %	AOCS Ja 2b-37
Acid Value	Max 5 mgKOH/g	AOCS Ja 6-55
Peroxide Value	Max 10 meq O <sub>2</sub> /Kg	AOCS Ja 8-87
Toluene Insoluble	Max 0.3 %	AOCS Ja 3-87
Hexane Insoluble	Max 0.3 %	AOCS Ja 3-87
Heavy Metals ( Lead/Arsenic)	Max 10ppm	IS 5055

**PHOSPHOLIPID ANALYSIS**

Parameter	Specification	Method of Analysis
Phosphatidyl Choline (PC)	Min 90 %	31 PNMR Spectroscopy
Lyso Phosphatidyl Choline	Max 5 %	31 PNMR Spectroscopy
Phosphorous	Max 5 %	31 PNMR Spectroscopy

**PRODUCT MICROBIOLOGICAL ANALYSIS**

Parameter	Specification	Method of Analysis
Total Plate Counts	Max 100 cfu/g	ISO 4833
Bacterial Endotoxins	Max 6EU/g	ISO 21528-1
Coliforms	Absent/g	ISO 5887
Yeast & Moulds	10 cfu/g	ISO 5403:1999
Salmonellae	Absent/ 25g	ISO 6579

**REGULATIONS**

UNILEC PC90 conforms to EU regulations 1829/2003 and 1830/2003 free from GMO-declaration and conforms Commission Regulation (EU) No 231/2012 of 9 March 2012( E322) & Codex Alimentarius Lecithin (322(i) .

**SHELF LIFE**

UNILEC PC90 has minimum 18 months from the date of manufacture if retained in original packing at a temperature below 0° C and humidity (RH) below 60% in a clean infestation free place.

Storage at -20° C without exposure to light is recommended for improved shelf life.

Reclose container immediately after opening the packaging, store at -20° C and use within one week.

**PACKAGING**

1 Kg, 5 Kg, 20 Kg in laminated , sealed Aluminium bags with inert Gas.

*These values are typical, seasonal deviations may occur.*

*All recommendations as well as formulations made herein are based on data believed to be reliable.*