

## TECHNICAL DATA SHEET (TDS)

<b>Product Name</b>	<b>BILBERRY SEED OIL</b>
<b>Botanical Name</b>	Vaccinium myrtillus
<b>Product Code</b>	PCO4125
<b>CAS #</b>	84082-34-8
<b>EINECS #</b>	281-983-5
<b>INCI Name</b>	Vaccinium Myrtillus (Bilberry) Seed Oil

<b>Part Used</b>	Seeds
<b>Extraction Method</b>	Cold Pressed
<b>Quality</b>	100% Pure and Natural

<u>PROPERTIES</u>	<u>SPECIFICATIONS</u>
<b>Appearance</b>	Pale yellow to golden colored liquid
<b>Odour</b>	Characteristic mild odour
<b>Refractive Index</b>	1.450 - 1.480 @ 20°C
<b>Specific Gravity (g/mL)</b>	0.900 - 0.930 @ 20°C
<b>Saponification Value (mgKOH/g)</b>	170 - 205
<b>Peroxide Value (meq O<sub>2</sub>/kg)</b>	Less than 10.0
<b>Iodine Value (g I<sub>2</sub>/100g)</b>	150 - 190
<b>Acid Value (mgKOH/g)</b>	Less than 2.0
<b>Solubility</b>	Soluble in cosmetic esters and fixed oils; Insoluble in water

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**FATTY ACID COMPOSITION:**

<u>FATTY ACID</u>	<u>C-CHAIN</u>	<u>SPECIFICATIONS (%)</u>
Palmitic Acid	C16:0	1.00 – 5.00
Palmitoleic Acid	C16:1 (n-7)	Maximum 1.0
Stearic Acid	C18:0	1.00 – 3.00
Oleic Acid	C18:1 (n-9)	15.00 – 30.00
Linoleic Acid	C18:2 (n-6)	30.00 – 42.00
Alpha-Linolenic Acid	C18:3 (n-3)	30.00 – 44.00

<u>MICROBIAL ANALYSIS</u>	<u>SPECIFICATIONS</u>	<u>STANDARDS</u>
Aerobic Mesophilic Bacterial Count	< 100 CFU/g	ISO 21149
Yeast and Mould	< 10 CFU/g	ISO 16212
Candida albicans	ABSENT / 1g	ISO 18416
Escherichia coli	ABSENT / 1g	ISO 21150
Pseudomonas aeruginosa	ABSENT / 1g	ISO 22717
Staphylococcus aureus	ABSENT / 1g	ISO 22718

<u>HEAVY METAL TESTS</u>	<u>SPECIFICATIONS</u>	<u>STANDARDS</u>
Lead: Pb (mg/kg or ppm)	< 10 ppm	na
Arsenic: As (mg/kg or ppm)	< 2 ppm	na
Mercury: Hg (mg/kg or ppm)	< 1 ppm	na

**STABILITY AND STORAGE:**

Keep in tightly closed container in a cool and dry place, protected from sunlight. When stored for more than 24 months, quality should be checked before use.

**As it is electronically generated document, hence no signature required.**

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