



Edition: BP 2025 (Ph. Eur. 11.6 update)

Virgin Wheat-germ Oil



[General Notices](#)

(Ph. Eur. monograph 1480)

Ph Eur

DEFINITION

Fatty oil obtained from the germ of the grain of *Triticum aestivum* L. by cold expression or other suitable mechanical means.

PRODUCTION

The oil is prepared using materials and methods designed to ensure that the content of brassicasterol ([2.4.23](#)) in the sterol fraction of the oil is not greater than 0.3 per cent.

CHARACTERS

Appearance

Clear, light yellow or golden-yellow liquid.

Solubility

Practically insoluble in water and in ethanol (96 per cent), miscible with light petroleum (bp: 40-60 °C).

[Relative density](#)

About 0.925.

[Refractive index](#)

About 1.475.

IDENTIFICATION

First identification: B.

Second identification: A.

A. Identification of fatty oils by thin-layer chromatography ([2.3.2](#)).

Results The chromatogram obtained is similar to the corresponding chromatogram shown in Figure 2.3.2.-1.

TESTS

[Acid value \(2.5.1\)](#)

Maximum 20.0.

[Peroxide value \(2.5.5, Method A\)](#)

Maximum 15.0.

[Unsaponifiable matter \(2.5.7\)](#)

Maximum 5.0 per cent, determined on 5.0 g.

[Composition of fatty acids \(2.4.22, Method C\)](#)

Composition of the fatty-acid fraction of the oil:

- *palmitic acid*: 14.0 per cent to 19.0 per cent;
- *stearic acid*: maximum 2.0 per cent;
- *oleic acid*: 12.0 per cent to 23.0 per cent;
- *linoleic acid*: 52.0 per cent to 59.0 per cent;
- *linolenic acid*: 3.0 per cent to 10.0 per cent;
- *eicosenoic acid*: maximum 2.0 per cent.

[Water \(2.5.32\)](#)

Maximum 0.1 per cent, determined on 1.00 g.

STORAGE

In an airtight, well-filled container, protected from light.

Ph Eur