

Hard paraffin (Paraffinum durum)

Chemical name. Paraffin wax; paraffin waxes and hydrocarbon waxes; CAS Reg. No. 8002-74-2.

Description. A colourless or white, slightly unctuous mass showing a crystalline structure; odourless.

Solubility. Practically insoluble in water and ethanol (~750 g/l) TS; freely soluble in ether R.

Category. Ointment base; viscosity-increasing agent.

Storage. Hard paraffin should be kept in a well-closed container.

Additional information. Congealing point, within 47-65 °C.

Requirements

Definition. Hard paraffin is a purified mixture of solid hydrocarbons obtained from petroleum.

Identity tests

A. Melt 2 g until a homogeneous mass is obtained and immediately add 2 mL of water and 0.2 mL of iodine (0.1 mol/l) VS. Heat; as soon as two liquid phases are obtained, shake and cool; the upper solid phase has a pinkish violet colour.

B. Heat a small quantity of Hard paraffin and ignite; a luminous flame is observed and a deposit of carbon is formed.

Sulfated ash. Not more than 1.0 mg/g.

Acidity or alkalinity. Boil 5 g with 10 mL of ethanol (~710 g/l) TS previously neutralized to litmus TS, cool, and add a few drops of litmus TS; the solution is neutral (violet).