

chloroform has been decolorized, allow the mixture to stand for 5 minutes. If the chloroform develops a purple color, titrate further with the iodate solution. Each mL of 0.05 M potassium iodate is equivalent to 16.60 mg of KI.

Diisodecyl Phthalate [*Bis(isodecyl)phthalate*], $C_{28}H_{46}O_4$ —446.66 [26761-40-0]—Use a suitable grade.

Diisopropyl Ether (*Isopropyl Ether*), $[(CH_3)_2CH]_2O$ —102.17 [108-20-3]—Colorless, mobile liquid. Slightly soluble in water. Miscible with alcohol and with ether. [CAUTION: It is highly flammable. Do not use where it may be ignited. Do not evaporate to the point of near dryness, since it tends to form explosive peroxides.]

SPECIFIC GRAVITY: between 0.716 and 0.720.

DISTILLING RANGE, Method II (721): Not less than 95% distills between 65° and 70°.

PEROXIDES: To 10 mL, contained in a clean, glass-stoppered cylinder previously rinsed with a portion of the ether under examination, add 1 mL of freshly prepared potassium iodide solution (1 in 10). Shake, and allow to stand for 1 minute: no yellow color is observed in either layer (about 0.001% as H_2O_2).

RESIDUE ON EVAPORATION: [NOTE—If peroxide is present, do not carry out this procedure.] Evaporate 14 mL (10 g) from a tared shallow dish, and dry at 105° for 1 hour: the residue weighs not more than 1 mg (0.01%).

ACIDITY: Add 2 drops of bromothymol blue TS to 10 mL of water in a glass-stoppered, 50-mL flask, and titrate with 0.010 N sodium hydroxide until a blue color persists after vigorous shaking. Add 5 mL of diisopropyl ether, and titrate with 0.010 N sodium hydroxide: not more than 0.30 mL is required to restore the blue color (0.005% as CH_3COOH).

[NOTE—For spectrophotometric determinations, use diisopropyl ether that meets the following additional requirement:]

ABSORBANCE: Its absorbance at 255 nm, in a 10-mm quartz cell, does not exceed 0.2, water being used as the blank.

Diisopropylamine, $[(CH_3)_2CH]_2NH$ —101.19 [108-18-9]—Colorless liquid.

ASSAY: Not less than 98% of $C_6H_{15}N$ is found, a suitable gas chromatograph equipped with a flame-ionization detector being used. The following conditions have been found suitable: a 3.2-mm \times 1.83-m stainless steel column is packed with a cross-linked polystyrene support; the injection port temperature is maintained at 250° and the detector temperature at 310°; the column temperature is programmed to rise at 10° per minute from 50° to 220°. **REFRACTIVE INDEX (831):** between 1.3915 and 1.3935, at 20°.

Diisopropylethylamine (*N,N-Diisopropylethylamine*), $C_8H_{19}N$ —129.24 [7087-68-5]—Clear, colorless liquid. Soluble in glacial acetic acid.

ASSAY: Accurately weigh about 500 mg, dissolve in 50 mL of glacial acetic acid, mix, add crystal violet TS, and titrate with 0.1 N perchloric acid VS. Each mL of 0.1 N perchloric acid is equivalent to 12.92 mg of $C_8H_{19}N$. Not less than 98% is found.

REFRACTIVE INDEX (831): between 1.4125 and 1.4145 at 20°.

1,2-Dilinoleoyl-3-oleoyl-rac-glycerol, $C_{57}H_{100}O_6$ —881.4 [2190-21-8]—Use a suitable grade.

1,2-Dilinoleoyl-3-palmitoyl-rac-glycerol, $C_{55}H_{98}O_6$ —855.4 [2190-15-0]—Use a suitable grade.

Diluted Acetic Acid—See *Acetic Acid, Diluted*.

Diluted Alcohol—Use *Diluted Alcohol* (NF monograph).

Diluted Hydrochloric Acid—See *Hydrochloric Acid, Diluted*.

Diluted Nitric Acid—See *Nitric Acid, Diluted*.

Diluted Sulfuric Acid—See *Sulfuric Acid, Diluted*.

Dimethicone, viscosity 500 centistokes (*Poly(dimethylsiloxane)*, viscosity 500 centistokes), $[-Si(CH_3)_2O-]_n$ [63148-62-9]—Use a suitable grade.

2,5-Dimethoxybenzaldehyde, $C_9H_{10}O_3$ —166.17 [93-02-7]—Off-white crystals.

ASSAY: Inject an appropriate specimen into a suitable gas chromatograph (see *Chromatography* (621)) equipped with a flame-ionization detector, nitrogen being used as the carrier gas. The following conditions have been found suitable: a 0.3-mm \times 30-m capillary column coated with phase G1; the injection port temperature is maintained at 270°; the detector temperature is maintained at 300°; the column temperature is maintained at 150° and programmed to rise 10° per minute to 270°. The area of the main peak is not less than 97% of the total peak area.

MELTING RANGE (741): between 50° and 52°.

1,2-Dimethoxyethane, $C_4H_{10}O_2$ —90.12 [110-71-4]—Clear, colorless liquid. Miscible with water and with alcohol. Soluble in hydrocarbon solvents. May form peroxides on standing.

BOILING RANGE (Reagent test): Not less than 95% distills between 83° and 86°.

REFRACTIVE INDEX (831): between 1.379 and 1.381, at 20°.

ACIDITY: To 20 mL add bromophenol blue TS, and titrate with 0.020 N sodium hydroxide: not more than 2.0 mL is consumed (about 0.015% as CH_3COOH).

WATER DETERMINATION, Method I (921): not more than 0.2%.

Dimethoxymethane (*Formaldehyde Dimethyl Acetal, Methylal*), $C_3H_8O_2$ —76.10 [109-87-5]—Use a suitable grade.

(3,4-Dimethoxyphenyl)acetonitrile (*Homoveratronicrile*), $C_{10}H_{11}NO_2$ —177.20 [93-17-4]—Off-white fibers.

MELTING RANGE (741): between 65° and 67°.

Dimethyl Phthalate, $C_{10}H_{10}O_4$ —194.19 [131-11-3]—Viscous, colorless liquid.

ASSAY

Mobile phase: Prepare a filtered and degassed mixture of chromatographic *n*-heptane and *n*-propyl alcohol (HPLC grade) (97:3). Make adjustments if necessary (see *System Suitability* under *Chromatography* (621)).

Standard solution: Dissolve a suitable quantity of dimethyl phthalate in *Mobile phase* to obtain a solution having a known concentration of about 0.26 mg per mL.

Procedure: Inject about 20 μ L into a suitable liquid chromatograph (see *Chromatography* (621)) equipped with a 238-nm detector and a 4.6-mm \times 25-cm column that contains packing L10. The flow rate is about 1.0 mL per minute. The area of the dimethyl phthalate peak is not less than 99% of the total peak area.

REFRACTIVE INDEX (831): between 1.514 and 1.518 at 20°.

Dimethyl Sulfone (*Methyl Sulfone*), $(CH_3)_2SO_2$ —94.13 [67-71-0]—White crystals.

MELTING RANGE (741): between 109° and 111°.

Dimethyl Sulfoxide (*Methyl Sulfoxide*), $(CH_3)_2SO$ —78.13—Use ACS reagent grade methyl sulfoxide.

Dimethyl Sulfoxide, Spectrophotometric Grade [67-68-5]—Use methyl sulfoxide ACS spectrophotometric reagent grade.