SCHEDULE 2

METHODS OF ANALYSIS

PART I

General

- (a) (a) When two or more methods are prescribed in this part of this Schedule determine a component of a fertiliser the choice of the method shall, exceeds where otherwise indicated, be left to the agricultural analyst concerned; the method used must however be indicated in the certificate of analysis.
- (b) Any reference to water in this Schedule means purified water as defined in the European Pharmacopoeia.

Reagents and Apparatus

- (a) (a) All reagents used shall be of analytical quality.
- (b) For the determination of any form of nitrogen, water must be free of a nitrogenous compounds and carbon dioxide.
- (c) Solutions for which no solvents are prescribed must be aqueous.
- (d) Only special instruments or apparatus requiring special standards a mentioned in the descriptions of the methods of analysis.

Methods of Analysis

3

- 1. Preparation of the sample for analysis
- 2. Determination of ammoniacal nitrogen
 - (a) Determination of nitrate and ammoniacal nitrogen-Ulsch method
 - (b) determination of nitrate and ammoniacal nitrogen-Arnd method
 - (c) Determination of nitrate and ammoniacal nitrogen-Devarda method
 - (a) Determination of nitrogen in calcium cyanamide-in the absence of nitrate
 - (b) Determination of nitrogen in calcium cyanamide-in the presence of nitrate
- 5. Determination of total nitrogen in urea
- 6. Determination of cyanamide nitrogen
- 7. Determination of biuret in urea
 - (a) Determination of different forms of nitrogen-in the presence of cyanamide nitrogen
 - (b) Determination of different forms of nitrogen-in the absence of cyanamide nitrogen
 - (a) Extraction of total phosphorus-by mineral acids
 - (b) Extraction of phosphorus-by 2% formic acid
 - (c) Extraction of phosphorus-by 2% citric acid
 - (d) Extraction of phosphorus-by neutral ammonium citrate
 - (e) Extraction of phosphorus-by alkaline ammonium citrate (Petermann's method) at 65°C

1

- (f) Extraction of phosphorus-by alkaline ammonium citrate (Petermann's method) at ambient temperature
- (g) Extraction of phosphorus-by alkaline ammonium citrate (Joulie's method)
- (h) Extraction of phosphorus-by water
- 10. Determination of extracted phosphorus
- 11. Determination of water-soluble potassium
 - (a) (a) Determination of water-soluble magnesium-atomic absorption spectro-photometric method
 - (b) Determination of water-soluble magnesium-EDTA method
 - (a) Determination of total magnesium-atomic absorption spectrophoto-metric method
 - (b) Determination of total magnesium-EDTA method
- 14. Determination of chlorides, in the absence of organic matter
 - (a) Determination of fineness of grinding—dry method
 - (b) Determination of fineness of grinding-for soft natural phosphates
- 16. Methods of analysis and test procedures for ammonium nitrate fertiliser containing more than 28% nitrogen by weight
 - A. Methods for the application of thermal cycles
 - B. Determination of oil retention
 - C. Determination of the combustible ingredients
 - D. Determination of the pH value
 - E. Determination of particle size
 - F. Determination of the chloride content (as chloride ion)
 - G. Determination of copper