

METHOD STATEMENT



Determinand:

Soil Preparation for all Soils Methods

Matrix:

Sample Type: clays, loams, sandy soils from agricultural sources and compost

Not Suitable for soils from industrial brown field sites, contaminated land, construction or mining activities

Principle of Method:

Prior to analysis, soils must be prepared in order to produce a homogenous material that is suitable for the analytical procedures to be undertaken.

2.2 For RLMR, RLCR, RLGR and RRER samples this involves "air drying" of the sample at 30°C, removal of stones, twigs, roots and other non-soil materials and finally grinding to a particle size suited to the analytical method. This is usually 2mm. For RRKR samples this involves weighing the total dry sample before grinding, removal of stones, glass, metal, plastic and other contaminants, weighing the removed material and finally grinding to a particle size suited to the analytical method. This is usually 2mm.

The drying of soils can be undertaken in any oven or drying area capable of maintaining a temperature between 25°C and 30°C

Sampling and Sample Preparation:

Samples are normally taken in soil pots.

Samples should be dried as soon as possible after receipt. If this is not possible samples are stored at 2 - 8°C.

For stability information refer to the specific analytical methods.

Interferences

Provided care is taken, no interferences will be added to the soil or analytes removed from the soil during the preparation process.

Performance of Method:

Range of Application:

Reporting Limit: 0.1g

Stones, glass, metal and plastic should be reported as a percentage of the total dry weight result to 3 significant figures.

Reporting Limit: $0.1g / (\text{Total dry weight} / \% \text{dry solids} * 100) * 100$

Limit of Detection, Recoveries of Compounds, Bias and Uncertainty of measurement:

N/A

References:

Fritsch "pulverisette 14" Operating Manual Edition 01/2005