

STN P	Organické a organicko-minerálne hnojivá Stanovenie obsahu špecifických prvkov pomocou ICP-AES po extrakcii vodou	STN P CEN/TS 17774
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Organic and organo-mineral fertilizers - Determination of the content of specific elements by ICP-AES after extraction by water

Táto norma obsahuje anglickú verziu európskej normy.
This standard includes the English version of the European Standard.

Táto norma bola oznámená vo Vestníku ÚNMS SR č. 07/22

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English Version

**Organic and organo-mineral fertilizers - Determination of
the content of specific elements by ICP-AES after
extraction by water**

Engrais organiques et organo-minéraux -
Détermination de la teneur en éléments spécifiques par
ICP-AES après extraction à l'eau

Organische und organisch-mineralische Düngemittel -
Bestimmung des Gehalts spezifischer Elemente mittels
ICP-AES nach Extraktion mit Wasser

This Technical Specification (CEN/TS) was approved by CEN on 13 March 2022 for provisional application.

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EUROPEAN COMMITTEE FOR STANDARDIZATION
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European foreword

This document (CEN/TS 17774:2022) has been prepared by Technical Committee CEN/TC 260 "Fertilizers and liming materials", the secretariat of which is held by DIN

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CEN/TS 17774:2022 (E)**Introduction**

This document is part of a modular approach and concerns the analytical measurement step. "Modular" means that a test standard concerns a specific step in assessing a property and not the whole chain of measurements. Inductively coupled plasma atomic emission spectrometry (ICP-AES) is nowadays widely used and a well-established method in many laboratories.

1 Scope

This document specifies a method for the determination of boron (B), cobalt (Co), copper (Cu), iron (Fe), manganese (Mn), molybdenum (Mo) and zinc (Zn) in organic fertilizers and organo-mineral fertilizers extracts using inductively coupled plasma-atomic emission spectrometry (ICP-AES).

NOTE Alternatively, inductively coupled plasma mass spectrometry (ICP-MS) can be used for the measurement if the user proves that the method gives the same results.

This method is applicable to water extracts prepared according to CEN/TS 17766. The method can be used for the determination of other elements, provided the user has verified the applicability.

2 Normative references

The following documents are referred to in the text in such a way that some or all of their content constitutes requirements of this document. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

CEN/TS 17766, *Organic and organo-mineral fertilizers — Extraction by water for subsequent determination of elements*

EN 12944-1, *Fertilizers and liming materials — Vocabulary — Part 1: General terms*

EN 12944-2, *Fertilizers and liming materials — Vocabulary — Part 2: Terms relating to fertilizers*

EN ISO 3696:1995, *Water for analytical laboratory use — Specification and test methods (ISO 3696:1987)*

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