ICS 13.040.40 SLOVENSKÁ TECHNICKÁ NORMA Január 2017

| STN | **Zmena klímy. Stacionárne zdroje znečisťovania. Stanovenie emisií skleníkových plynov v energeticky náročných priemyselných sektoroch. Časť 5 : Výroba vápna.** | **STN EN 19694-5**<br><br>83 6010 |
|---|---|---|

Stationary source emissions - Determination of greenhouse gas (GHG) emissions in energy-intensive industries - Part 5: Lime industry

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. 12/16

Obsahuje: EN 19694-5:2016

**123933**

EUROPEAN STANDARD

NORME EUROPÉENNE

EUROPÄISCHE NORM

# EN 19694-5

July 2016

ICS 13.040.40

English Version

# Stationary source emissions - Determination of greenhouse gas (GHG) emissions in energy-intensive industries - Part 5: Lime industry

Émissions de sources fixes - Détermination des émissions de gaz à effet de serre (GES) dans les industries énergo-intensives - Partie 5: Industrie de la chaux

Emissionen aus stationären Quellen - Bestimmung von Treibhausgasen (THG) aus energieintensiven Industrien - Teil 5: Kalkindustrie

This European Standard was approved by CEN on 5 May 2016.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the CEN-CENELEC Management Centre or to any CEN member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CEN member into its own language and notified to the CEN-CENELEC Management Centre has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and United Kingdom.

EUROPEAN COMMITTEE FOR STANDARDIZATION
COMITÉ EUROPÉEN DE NORMALISATION
EUROPÄISCHES KOMITEE FÜR NORMUNG

**CEN-CENELEC Management Centre: Avenue Marnix 17, B-1000 Brussels**



Ref. No. EN 19694-5:2016 E

# Contents

Page

## European foreword

This document (EN 19694-5:2016) has been prepared by Technical Committee CEN/TC 264 “Air quality”, the secretariat of which is held by DIN.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by January 2017, and conflicting national standards shall be withdrawn at the latest by January 2017.

Attention is drawn to the possibility that some of the elements of this document may be the subject of patent rights. CEN [and/or CENELEC] shall not be held responsible for identifying any or all such patent rights.

This document has been prepared under a mandate M/478 given to CEN by the European Commission and the European Free Trade Association.

This part of EN 19694 deals with sector-specific aspects for the determination of greenhouse gas (GHG) emissions from lime manufacture.

This European Standard can be used to measure, report and compare the GHG emissions of a lime manufacturing plant. Data for individual plants, sites or works may be combined to measure, report and compare GHG emissions for an organization, corporation or group.

EN 19694, *Stationary source emissions – Determination of greenhouse gas (GHG) emissions in energy intensive industries* is a series of standards that consists of the following parts:

— *Part 1: General aspects*

— *Part 2: Iron and steel industry*

— *Part 3: Cement industry*

— *Part 4: Aluminium industry*

— *Part 5: Lime industry*

— *Part 6: Ferroalloy industry*

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Bulgaria, Croatia, Cyprus, Czech Republic, Denmark, Estonia, Finland, Former Yugoslav Republic of Macedonia, France, Germany, Greece, Hungary, Iceland, Ireland, Italy, Latvia, Lithuania, Luxembourg, Malta, Netherlands, Norway, Poland, Portugal, Romania, Slovakia, Slovenia, Spain, Sweden, Switzerland, Turkey and the United Kingdom.

# 1 Scope

This European Standard provides a harmonized methodology for calculating GHG emissions from the lime industry. It includes the manufacture of lime, and any downstream lime products manufactured at the plant, such as ground or hydrated lime. This standard allows for reporting of GHG emissions for various purposes and on different basis, such as plant basis, company basis (by country or by region) or international organization basis.

Since lime is defined as the generic name for quicklime, dolime and sintered dolime, plants manufacturing at least one of these products shall be covered by this standard.

This European Standard addresses all of the following direct and indirect sources of GHG included as defined in ISO 14064-1:

— direct greenhouse gas emissions from greenhouse gas sources that are owned or controlled by the company, such as emissions resulting from the following sources:

  — calcination of carbonates and combustion of organic carbon contained in the kiln stone;

  — combustion of kiln fuels (fossil kiln fuels, alternative fossil fuels, mixed fuels with biogenic carbon content, biomass fuels and bio fuels) related to lime production and/or drying of raw materials;

  — combustion of non-kiln fuels (fossil kiln fuels, mixed fuels with biogenic carbon content, biomass fuels and bio fuels) related to equipment and on-site vehicles, heating/cooling and other on-site uses;

  — combustion of fuels for on-site power generation.

— indirect greenhouse gas emissions from the generation of imported electricity, heat or steam consumed by the organization;

— other indirect greenhouse gas emissions, other than energy indirect GHG emissions, which is a consequence of an organization's activities, but arises from greenhouse gas sources that are owned or controlled by other organizations such as from imported kiln stone.

This European Standard is to be used in conjunction with EN 19694-1, which contains generic, overall requirements, definitions and rules applicable to the determination of GHG emissions for all energy-intensive sectors, provides common methodological issues and defines the details for applying the rules. The application of this standard to the sector-specific standards ensures accuracy, precision and reproducibility of the results and is for this reason a normative reference standard.

Together these standards provide a harmonized method for:

a) measuring, testing and quantifying methods for GHG emissions;

b) assessing the level of GHG emissions performance of production processes over time, at production sites;

c) establishment and provision of reliable, accurate and quality information for reporting and verification purposes.

GHG emissions offset mechanisms, including but not limited to voluntary offset schemes or nationally or internationally recognized offset mechanisms, shall not be used at any point in the GHG assessment according to this standard.

## 2 Normative references

The following documents, in whole or in part, are normatively referenced in this document and are indispensable for its application. For dated references, only the edition cited applies. For undated references, the latest edition of the referenced document (including any amendments) applies.

EN 459-2, *Building lime — Part 2: Test methods*

EN 932-1, *Tests for general properties of aggregates — Part 1: Methods for sampling*

EN 12485, *Chemicals used for treatment of water intended for human consumption — Calcium carbonate, high-calcium lime, half-burnt dolomite, magnesium oxide and calcium magnesium carbonate — Test methods*

EN 13639, *Determination of total organic carbon in limestone*

EN 15442, *Solid recovered fuels — Methods for sampling*

EN 19694-1:2016, *Stationary source emissions — Determination of greenhouse gas (GHG) emissions in energy-intensive industries — Part 1: General aspects*

ISO 5069-1, *Brown coals and lignites — Principles of sampling — Part 1: Sampling for determination of moisture content and for general analysis*

ISO 13909 (all parts), *Hard coal and coke — Mechanical sampling*

ISO 18283, *Hard coal and coke — Manual sampling*

ISO 14064-1, *Greenhouse gases — Part 1: Specification with guidance at the organization level for quantification and reporting of greenhouse gas emissions and removals*