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**NATIONAL STANDARD OF THE
PEOPLE'S REPUBLIC OF CHINA**

GB/T 43620-2023

**Environmental management - Life cycle assessment - Data
documentation format**

环境管理 生命周期评价 数据文件格式

(English Translation)

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Foreword

This document complies with the provisions of GB/T 1.1-2020 "Standardization Work Guidelines Part 1: Structure and Drafting Rules of Standardization Documents" Drafting:

This document is modified to adopt ISO/T S14048:2002 "Environmental Management Life Cycle Assessment Data File Format", the file type is:

ISO technical specifications are adjusted to my country's national standards:

The technical differences between this document and ISO/T S14048:2002 and their reasons are as follows:

---Deleted the normative reference documents ISO 8601:2000, ISO 14040:1997, ISO 14041:1998, ISO 14042:2000, ISO 14043:2000, these documents are obsolete;

---The normative reference document ISO 9000:2000 has been deleted and this document no longer refers to this standard:

The following editorial changes have been made to this document:

--- Added informative references to GB/T 7408-2005 (see Table 1), GB/T 24040-2008 (see Chapter 3), GB/T 24044-2008 (see 5.2:2, 5:2:3 and Table A:1);

---References changed:

Please note that some content in this document may be subject to patents: The publisher of this document assumes no responsibility for identifying patents:

Introduction

GB/T 43620 provides a framework and requirements for the unambiguous documentation of life cycle inventory analysis (LCI) data: Refer to ISO 14040 this document aims to support the overall framework of life cycle assessment (LCA) specified in ISO 14041 and the requirements and guidance on LCI provided by ISO 14041:

Maintain reporting transparency, support interpretation and review of data collection, data calculations, data quality and data reporting, and facilitate data exchange Change: This document supports the use and development of LCA and is mainly intended for data providers, LCA practitioners and LCA information system developers:

dispatch personnel:

The data file format facilitates reporting of LCI data and conforms to ISO 14040 and ISO 14041 regarding data collection, data recording and According to quality requirements, it also helps to interpret the LCI data described in ISO 14043: In addition, the data file format allows for ISO 14042 Documentation and use of important information for Life Cycle Impact Assessment (LCIA), including environmental information, environmental conditions and geographical location:

The data file format also facilitates the transparent exchange of LCI data: This document does not put forward specific requirements for data exchange implementation, but it is allowed to design different data exchange and data communication formats according to the actual situation, and to design software that fully meets the data file requirements of this document:

tools:

Although the data file format is primarily used for documenting lifecycle data, it can also be used for the management of environmental data, for example, for reporting, Performance evaluation and benchmarking:

As practice develops or the scope of application expands, the format and structure contained in the data file format may be expanded to include other sources:

Information such as environmental performance assessment, health and safety, life cycle costing, etc:

This document contains a comprehensive list of requirements and is not a procedural specification: This document specifies LCI numbers in the form of data fields:

Documented overall requirements (see ISO 14040): The saved text for each data field is selected from specific terms or quantitative data and uses a short the text describes its meaning: The structure of the file itself specifies the relationships between data fields:

Each chapter of this document describes the specification, interpretation and

implementation of the data file format as follows:

---Chapter 5 covers the specification and structure of the data file format and the names of all data fields;

---Chapter 6 covers the specification of data types used in data file formats;

---Chapter 7 covers the specification of terminology used in data file formats;

---Appendix A contains the format requirements and explanatory descriptions of each data field to help users understand the correspondence of each data field:

information;

---Appendix B contains a detailed example of data file format application:

Environmental management life cycle assessment data file format

1 Scope

This document specifies data for the transparent and unambiguous recording and exchange of life cycle assessment (LCA) and life cycle inventory (LCI) data:

According to the file format and structure, the relevant information is elaborated and structured to ensure data documentation, data collection reports, data Consistency of calculations and data quality:

This document specifies the requirements for subdividing data files into data fields: Each data field has a corresponding explanatory description: The data file format the formula structure specifies the description of each data field in more detail:

This document applies to the specification and structure of questionnaire forms and information systems, as well as to other elements of environmental data management:

This document does not place requirements on data file integrity, and the data file format is independent of any application software or database:

This document does not require any specific serialization, imaging, or programming solution for data presentation or processing, nor does it describe LCI and Specific modeling methods for LCA data:

2 Normative reference documents

This document has no normative references:

3 Terms and definitions

The following terms and definitions apply to this document:

datasourcedatasource the provenance of the data:

datatypedatatype

properties of the data:

Examples: unit, quantitative, short string, free text, numeric, logical:

datafielddatafield

A specific data carrier with a specific data type:

The structure of the data file:

Note: Including data fields, data field sets and the relationships between them:

representativeness

Qualitative evaluation of data reflecting actual focus groups:

Note: Considerations include, for example, geography, time period and technology scope:

[Source: GB/T 24044-2008,4:2:3:6]