



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

GB/T 46011.2-2025

**Road vehicle - General requirements for greenhouse gas
management - Part 2: Carbon footprint labels of road vehicle
products**

道路车辆 温室气体管理通用要求 第2部分:产品碳足迹标识

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Foreword

This document was drafted in accordance with the rules given in GB/T 1.1-2020, Directives for standardization - Part 1: Rules for the structure and drafting of standardizing documents.

This document is Part 2 of GB/T 46011 Road vehicle - General requirements for greenhouse gas management. The following parts have been issued under GB/T 46011:

- Part 1: Terms and definitions;
- Part 2: Carbon footprint labels of road vehicle products.

Please note that some of the contents of this document may involve patents. The issuing organization of this document is not responsible for identifying patents.

This document was proposed by the Ministry of Industry and Information Technology of the People's Republic of China.

This document shall be under the jurisdiction of National Technical Committee of Auto Standardization (SAC/TC 114).

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Introduction

As a major sector of global energy consumption and greenhouse gas emission, the

lowcarbon development of the road vehicle industry is a key link in addressing climate change and achieving sustainable development goals. In recent years, as the international community has attached increasing importance to greenhouse gas emission reduction, countries have successively introduced laws and policies to promote the green and low-carbon transformation of the road vehicle industry. The carbon footprint labels of road vehicle products, as an effective environmental management tool for product carbon footprint management, plays an extremely important role in promoting the establishment of a low-carbon assessment and lowcarbon procurement system based on the entire industry chain in the road vehicle industry, promoting the decomposition of carbon footprint indicators at each stage of the product life cycle of road vehicles and the formation of a collaborative management mechanism for carbon footprint reduction, and guiding low-carbon production and lowcarbon consumption. Against this backdrop, standardizing the content, data, and requirements for carbon footprint labels of road vehicle products has become a fundamental task for ensuring the consistency of the standard system, promoting technical exchanges, and regulating industry management.

GB/T 46011, Road vehicle - General requirements for greenhouse gas management is proposed to consist of five parts.

-- Part 1: Terms and definitions. The aim is to systematically integrate the professional terminology related to greenhouse gas management in the industry, and to clarify the definition, scope of application and interrelationship of each term.

-- Part 2: Carbon footprint labels of road vehicle products. The aim is to guide low-carbon production and low-carbon consumption in the industrial chain and improve the overall level of greenhouse gas management in China's automotive industry.

-- Part 3: Carbon footprint data format specifications of road vehicle products.

The aim is to build a standardized and structured data representation system to ensure the consistency and comparability of carbon footprint data from different companies, and to improve the universality and credibility of industry carbon footprint data.

-- Part 4: Zero-carbon factory construction standards. The aim is to clarify the technical path and management requirements for the construction of zerocarbon factories for road vehicles, guide enterprises to build a low-carbon and clean production system, and help the industry achieve the goals of green manufacturing and zero-carbon transformation.

aim is to standardize the qualifications of verification agencies, verification procedures and data verification standards, ensure the authenticity and reliability of product carbon footprint information, and provide an effective basis for carbon footprint of a product, market supervision and industry decision-making.

By clarifying the content and format of carbon footprint labels of a product, this document helps all parties reach a consensus on greenhouse gas emission management, reduce

misunderstandings and deviations, improve management efficiency and quality, guide low-carbon production and consumption across the industry chain, and assists the road vehicle industry in achieving greenhouse gas emission reduction targets and sustainable development.

1 Scope

This document specifies the content, data, and requirements for carbon footprint labels of road vehicle products.

This document applies to self-declarations of carbon footprint labels of road vehicle products used in China.

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.

3 Terms and definitions

Complete vehicle products such as motor vehicles, towed vehicles, and motorcycles used on roads, vehicle part products (including new parts, remanufactured parts, and recycled parts from scrap vehicles), and material products (including virgin automotive materials and recycled materials).

The sum of greenhouse gas emission and greenhouse gas removal in the product system, expressed in carbon dioxide equivalent, for which a life cycle assessment is conducted based on climate change as the single environmental impact type.

A label that indicates the quantitative value, class, and carbon neutrality of the carbon footprint of a product by a combination of carbon footprint markings, text, numbers, and symbols.

The carbon footprint labels of a product that quantifies the sum of greenhouse gas emissions and removals within a specified accounting boundary for road vehicle products.

The carbon footprint labels of a product that classifies and represents the carbon footprint values of road vehicle products.

The carbon footprint labels of a product that represents the result that the sum of greenhouse gas emissions, removals, and offsets within the specified accounting boundary of road vehicle products is zero.