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PEOPLE'S REPUBLIC OF CHINA**

GB/T 46803.2-2025

**Information technology - Low power wireless communication
network based on polar coding - Part 2: Data link layer**

信息技术 基于极化码的低功耗无线通信网络 第2部分：数据链路层

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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 Part 2 of GB/T 46803 "Information Technology - Low-Power Wireless Communication Networks Based on Polar Codes". The following sections have been released.

1.Physical Layer;

2.Data Link Layer. This document was proposed and is under the jurisdiction of the National Information Technology Standardization Technical Committee (SAC/TC28). This document was drafted by: China Electronics Technology Standardization Institute, Huawei Technologies Co., Ltd., and CESI (Shenzhen) Electronic Information Product Standards. Chemical Engineering Center Co., Ltd., Shenzhen ZTE Microelectronics Technology Co., Ltd., Shenzhen Titanium & Baron Technology Co., Ltd., Beijing Post & Telecommunications

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GB/T 46803 aims to standardize the relevant specifications and test methods for low-power wireless communication networks based on polar codes. It consists of two parts.

1. Physical Layer. The purpose is to specify the physical layer technical requirements and testing methods for low-power wireless communication networks based on polar codes. Try different methods.

2. Data Link Layer. The purpose is to specify the data link layer technology requirements for low-power wireless communication networks based on polar codes. Summation test method. The issuing organization of this document draws your attention to the fact that a declaration of compliance with this document may involve "a certification method, device, and..." "System", "A Bluetooth Node Pairing Method and Related Apparatus", "A Pairing Method and Apparatus", "Information Processing Method, Apparatus and Device", "A "Address verification method and corresponding apparatus" and "Frequency hopping communication method and related equipment for short-range wireless communication" are related to sections 6.1, 7.1, 7.2, and 7.3. The use of relevant patents. The issuing organization of this document makes no position on the authenticity, validity, or scope of the patent. The patent holder has assured the issuing authority of this document that he is willing to grant any organization a free license on a fair, reasonable, and non-discriminatory basis. Or an individual may be implementing the patent while implementing this national standard. The patent holder's statement has been filed with the issuing organization of this document. Related Information You can obtain this information through the following contact methods. 1.ZL201910630536.4 "An authentication method, device, and system for intelligent vehicles" Contact Person. Yan Shan Contact information. 010-60614800 Email. yanshen@huawei.com Contact Person. Yan Shan Contact information. 010-60614800 Email. yanshen@huawei.com Contact Person. Yan Shan Contact information. 010-60614800 Email. yanshen@huawei.com Contact Person. Yan Shan Contact

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communication based on polar codes Network Part

1 Scope

GB/T 46803.2-2025 is the Chinese national standard covering the data link layer above that
physical layer - the framing and addressing, the channel access for thousands of devices
that wake rarely, the acknowledgement and retry, and the security of a link that must cost
almost no energy. At 97,500 words it is the largest 2025 standard published so far in this
catalogue. Part 2, first edition. It was issued on 2 December 2025 and has been in force
since 1 July 2026, as a first edition. The document is under the responsibility of the
Standardization Administration of China. This page is published from the official record of
the 2025 edition; the clause text of a standard this recent is not yet in circulation, and the
figures, limits and tables it contains are those of the document itself, delivered in full with
the English translation.

This document specifies the data link layer technical requirements and test methods for
low-power wireless communication networks based on polar codes. This document applies
to the development of low-power wireless communication network devices based on polar
codes.

2 Normative references

The contents of the following documents, through normative references within the text,
constitute essential provisions of this document. Dated citations are not included. For
references to documents, only the version corresponding to that date applies to this
document; for undated references, the latest version (including all amendments) applies.
This document.

GB/T 46803.1-2025 Information Technology - Low-Power Wireless Communication
Networks Based on Polar Codes - Part

3 Terms and Definitions

The terms and definitions defined in GB/T 46803.1-2025, as well as the following terms and
definitions, apply to this document.

3.1 control panel Protocols and procedures for control signaling in transmission systems.

3.2 Data Panel Protocols and processes for transmitting application data.

3.3 whitelist A list of entities that have been granted certain privileges, service licenses, and permissions.

3.4 Data frames that send system-level scheduling data.

4. Abbreviations The following abbreviations apply to this document. CBG. Code Block Group ECDH. Elliptic Curve Diffie-Helman Key Exchange