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Plastics-Identification and marking of recycled plastic

塑料 再生塑料的标识和标志

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Foreword

This document is in accordance with the provisions of GB/T 1.1-2020 "Guidelines for standardization work Part 1: Structure and drafting rules for standardization documents" Drafting is required.

Please note that some of the contents of this document may involve patents. The issuing organization of this document does not assume the responsibility for identifying patents.

This document was proposed by the China Petroleum and Chemical Industry Federation.

This document is under the jurisdiction of the National Technical Committee on Plastics Standardization (SAC/TC 15).

This document was drafted by: China Bluestar Chengdu Testing Technology Co., Ltd., Kingfa Technology Co., Ltd., Chongqing Kejufu New Materials Co., Ltd.

Co., Ltd., Guangzhou Shitian Material Technology Co., Ltd., Beijing Huasu Chenguang Technology Co., Ltd., Shanghai Zili Plastic Technology Co., Ltd.

Co., Ltd., Wuxi Yiwei Import and Export Co., Ltd., Jiangsu Saiweier New Material Technology Co., Ltd., Chengfa Green Ring Plastic Industry (Hebei) Co., Ltd., Fujian Sailon Technology Co., Ltd., Jiangxi Green Recycling Industry Co., Ltd., Shandong Dawn Polymer Materials Co., Ltd., China Petroleum Petrochemical Research Institute of Natural Gas Co., Ltd., Tonggui Technology Chengdu Co., Ltd., Taichu Environmental Plastic Technology (Zhejiang) Co., Ltd., Sinopec Zhongyuan Petrochemical Co., Ltd., Guangzhou Quality Supervision and Inspection Institute, Guizhou University, Shanghai Qianshi Technology Co., Ltd., South China University of Technology University, Donghua University, Guangzhou Customs Technology Center, Qingdao Dagang Customs of the People's Republic of China, Ningbo Customs Technology Center, Xinjiang Turpan Customs Natural Environment Testing

Research Center, Shenzhen Customs Industrial Products Testing Technology Center, China University of Metrology, Zhangjiagang Customs Comprehensive Technology Center, Xiamen Customs Technical Center.

The main drafters of this document are: Li Jianjun, Xie Peng, Liu Gang, Chen Minjian, Zheng Wen, Wen Jianghe, Chen Hongyuan, Chen Cunxing, Zheng Huiqin, Sun Xiao, Zhang Shuo, Ni Shuchen, Zhu Enbin, Lü Huaixing, Tian Hongchi, Qu Jingbo, Xie Jianling, Cao Weidong, Wang Xuefeng, Ye Yuanjian, Zhang Zhenming, Lu Ning, He Hui, Li Bin, Zhao Lei, Li Dan, Sun Liming, Zhang Yanjun, Gao Jianguo, Luo Chuan, Liu Lirong, Guo Chunyun, Qin Yufei, Li Tianyuan, Ren Cong, Zheng Youjing, Zhao Suhua, Yao Hongren, Sun Jiangang, Huang Li, and Shi Jianhan.

Plastics Recycled Plastics Logos and Signs

1 Scope

This document specifies the labeling requirements for the identification, marking, logo and logo of recycled plastic products.

This document applies to the production, circulation, trade and distribution of recycled resins and plastic products obtained through mechanical recycling, physical recycling and chemical recycling.

Easy and certified, etc., to identify and obtain relevant information such as its main material, composition, characteristic performance, etc.

2 Normative references

GB/T 1844

GB/T 2035

GB/T 8170

GB/T 40006.1-2021

3 Terms and definitions

The terms and definitions defined in GB/T 2035 and the following apply to this document.

3.1 recycled plastic

Plastics processed from waste plastics for their original or other uses, excluding energy recovery.

Note 1.In a broad sense, recycling of plastics includes any reuse of scrap or waste products, such as depolymerization to recover organic chemicals.

Note 2.Recycled plastics may or may not be mixed with fillers, plasticizers, stabilizers, pigments, etc.

[Source. GB/T 40006.1-2021, 3.1, modified]

3.2 Mechanical recycling

The process of processing waste plastics into secondary raw materials or products through screening, crushing, washing or melt extrusion granulation.

The chemical structure of the material does not change significantly during the process.

3.3 Physical recycling

The waste plastics are separated and purified by physical methods such as melting, splitting, stripping, dissolving, extraction (solid-liquid), precipitation or filtration for use in Original use or a similar use in which the chemical structure of the material is not significantly changed.

Note 1.This process can also recover other valuable components of plastics (such as metals, reinforcing fibers, etc.).

NOTE 2.Currently, most physical recovery is solvent-based.

3.4 Chemical recycling

In addition to energy recovery and incineration, the chemical structure of plastic waste can be changed through cracking, gasification or depolymerization to produce Into new monomers or raw materials.