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

GB/T 45065-2024

**Leather and fur-Chemical tests-Determination of residual
methylcyclsiloxane volatiles**

皮革和毛皮 化学试验 挥发性甲基环硅氧烷残留量的测定

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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 China Light Industry Federation.

This document is under the jurisdiction of the National Technical Committee for Standardization of Leather Industry (SAC/TC 252).

This document was drafted by Zhejiang Shenghui Chemical Co., Ltd., Shaanxi University of Science and Technology, Shanghai Institute of Quality Supervision and Inspection Technology, Asahikawa Chemical (Suzhou) Co., Ltd., China Textile Standards (Shenzhen) Testing Co., Ltd., Wenzhou Guoshibang Polymer Materials Co., Ltd., Zhejiang Weifengxin Materials Co., Ltd., Dongguan Weiside Technology Development Co., Ltd., China Leather and Shoe Research Institute Co., Ltd., China Light Industry Inspection and Certification Co., Ltd. company.

The main drafters of this document are: Zhao Hailang, Lü Bin, Sang Jun, Jiang Sujie, Gao Dangge, Zhang Dahua, Chen Pei, Hu Kang, Ma Jianzhong, Mao Linrong, Bu Qiaoqiao, Zhang Wenfu, Bao Haifeng, Chen Peipei, Ren Keshuai.

Leather and fur Chemical testing Determination of residual volatile methylcyclsiloxane Warning. Operators using this document should have practical experience in regular laboratory work. This document does not indicate all possible safety hazards.

The user is responsible for taking appropriate safety and health measures and ensuring that the conditions specified in relevant national laws and regulations are met.

The substances and wastes generated in some steps may be harmful to the local environment and their treatment process should comply with the provisions of relevant documents.

1 Scope

This document describes a method for the determination of residual amounts of volatile methylcyclasiloxanes in leather and fur products.

This document applies to octamethylcyclotetrasiloxane (D4), decamethylcyclopentasiloxane in various types of leather, fur and their products. Determination of residual amounts of (D5) and dodecamethylcyclohexasiloxane (D6).

2 Normative references

GB/T 39364

3 Terms and definitions

There are no terms or definitions that require definition in this document.

4 Principle

The residual volatile methylcyclasiloxane in the leather or fur is extracted with ethyl acetate, and the extract is purified by filtering through a filter membrane and then Select gas chromatograph (GC/MSD) with detector for determination and internal standard method for quantification.

5 Reagents and Materials

5.1 General provisions. Unless otherwise specified, all reagents used were of analytical grade.

5.2 Ethyl acetate, chromatographic grade.

5.3 Methylcyclasiloxane standard substance/standard sample, purity $\geq 98.0\%$, chemical information see Table 1.