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

HJ 471-2020

**Technical specification for dyeing and finishing wastewater
treatment of textile industry
(English Translation)**

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Foreword

In order to implement the Environmental Protection Law of the People's Republic of China, the Water Pollution Prevention Law of the People's Republic of China and other laws and regulations, Environmental pollution, improve the quality of the ecological environment, standardize the construction and operation management of textile dyeing and finishing industrial wastewater treatment facilities, and formulate this standard.

This standard specifies the technical requirements for the design, construction, acceptance, operation and maintenance of textile dyeing and finishing industrial wastewater treatment projects.

This standard is a guiding standard.

This standard was first published in 2009, and this is the first revision.

The main content of this revision.

--According to the requirements of "Technical Guidelines for the Development of Technical Specifications for Environmental Engineering" (HJ 526-2010), the elements and Content layout

--Updated the content of "4 Pollutants and Pollution Load";

--Clarified the design principles of "classified collection, classified treatment, and classified reuse", and improved wastewater treatment technology and various Process unit design parameters;

--Complement and improve the advanced processing and recycling processing technology;

-Added new technical requirements for "6.7 Sludge Treatment" and "6.8 Secondary Pollution Prevention and Control";

- Supplement and perfect the technical requirements of "7 Main Process Equipment and Materials";

--The technical requirements of "8 Inspection and Process Control" have been supplemented and improved.

This standard is revised by the Department of Science, Technology and Finance and the Department of Regulations and Standards of the Ministry of Ecology and Environment.

The main drafting organizations of this standard. China Environmental Protection Industry Association, Donghua University, China Printing and Dyeing Industry Association, Tsinghua University, China Shipbuilding Ninth Design and Research Institute Engineering Co., Ltd., Hubei Junji Water Treatment Co., Ltd., China Holding (Beijing) Water Operation Co., Ltd., Weishibang (Xiamen) Environmental Technology Co., Ltd. and Ziguang Environmental Protection Co., Ltd.

This standard was approved by the Ministry of Ecology and Environment on January 13, 2020.

This standard will be implemented on January 14, 2020.

This standard is interpreted by the Ministry of Ecology and Environment.

Technical specifications for textile dyeing and finishing industry wastewater treatment engineering

1 Scope of application

This standard specifies the technical requirements for the design, construction, acceptance, operation and maintenance of textile dyeing and finishing industrial wastewater treatment projects.

This standard is applicable to the construction and operation management of textile dyeing and finishing industry wastewater treatment projects, and can be used as the environment

for textile dyeing and finishing industry construction projects.

Environmental impact assessment, feasibility study and technical basis for the design, construction, acceptance and operation management of wastewater treatment projects.

2 Normative references

The content of this standard refers to the terms in the following documents. For undated reference documents, the effective version (including amendments) is suitable Used in this standard.

GB 4287 Water Pollutant Discharge Standard for Textile Dyeing and Finishing Industry GB 14048 Low-voltage switchgear and control equipment GB 14554 Emission Standard of Odor Pollutants GB 15603 General rules for storage of commonly used hazardous chemicals GB 18597 Pollution Control Standard for Hazardous Waste Storage GB/T 18920 Urban Wastewater Recycling and Urban Miscellaneous Water Quality GB/T 22580 Technical requirements for plateau electrical equipment under special environmental conditions Low-voltage switchgear and control equipment GB/T 25499 Urban Sewage Recycling Greenland Irrigation Water Quality GB 50013 Outdoor Water Supply Design Code GB 50014 Outdoor Drainage Design Code GB 50015 Code for Design of Building Water Supply and Drainage GB 50016 Code for fire protection of building design GB 50019 Design Code for Heating, Ventilation and Air Conditioning of Industrial Buildings GB 50033 Building Lighting Design Standard GB 50037 Building Ground Design Code GB/T 50046 Design standard for corrosion protection of industrial buildings GB 50052 Code for Design of Power Supply and Distribution System GB 50053 20kV and below substation design code GB 50054 Low Voltage Power Distribution Design Code GB 50055 General Electric Equipment Power Distribution Design Code GB 50057 Code for lightning protection design of buildings GB 50059 35kV~110kV Substation Design Code GB 50187 Graphic Design Specification for Industrial Enterprises GB 50194 Safety Code for Power Supply and Use at Construction Site GB 50204 Code for Acceptance of Construction Quality of Concrete Structure Engineering GB 50231 General specification for construction and acceptance of mechanical equipment installation engineering GB 50243 Code for acceptance of construction quality of ventilation and air conditioning engineering GB 50335 Design Code for Urban Wastewater Reclamation and Utilization Project GB J 22 Factory and Mine Road Design Code GBZ 1 Hygienic Standard for Design of Industrial Enterprises GBZ 2.1 Occupational exposure limit for hazardous factors in the workplace Chemical hazardous factors GBZ 2.2 Occupational Exposure Limits for Hazardous Factors in the Workplace Physical Factors HJ/T 242 Technical requirements for environmental protection products, belt press filter for sludge dewatering HJ/T 245 Technical Requirements for Environmental Protection Products Hanging Packing HJ/T 246 Technical Requirements for Environmental Protection Products Suspended Packing HJ/T 252 Technical requirements for environmental protection products, medium and microporous aerators HJ/T 283 Technical

Requirements for Environmental Protection Products, Chamber Filter Press and Plate and Frame Filter Press HJ/T 336 Technical Requirements for Environmental Protection Products Submersible Sewage Pump HJ/T 354 Technical Specification for Acceptance of Online Water Pollution Source Monitoring System (Trial) HJ 709 Technical specification for environmental protection acceptance of construction project completion textile dyeing and finishing HJ 861 Technical Specification for Application and Issuance of Pollution Permits for Textile Printing and Dyeing HJ 879 Technical Guidelines for Self-monitoring of Pollutant Discharge Units Textile Printing and Dyeing Industry HJ 990 Technical Guidelines for Pollution Source Intensity Accounting Textile Printing and Dyeing Industry HJ.2007 Technical Specification for Wastewater Air Flotation Treatment Engineering HJ.2016 Environmental Engineering Terminology HJ 2025 Technical specification for hazardous waste collection, storage and transportation HJ 2047 Hydrolysis acidification reactor sewage treatment engineering technical specification "National Directory of Hazardous Wastes" (Order No. 39 of the Ministry of Environmental Protection) "Regulations for the Printing and Dyeing Industry" (Announcement No. 37, 2017 of the Ministry of Industry and Information Technology) "Technical Requirements for Standardized Remediation of Sewage Outlets" (Trial) (Environmental Supervision [1996] No. 470) "Interim Measures for Environmental Protection Acceptance of Construction Projects Completed" (Guo Environmental Guidance and Environmental Assessment [2017] No. 4) "Regulations on the Environmental Protection Management of Construction Projects" (revised on July 16, 2017)

3 Terms and definitions

The relevant terms and definitions in HJ.2016 and the following terms and definitions apply to this standard.

3.1 Dyeing and finishing of textile

Refers to the process of chemical treatment of textile materials (fiber, yarn, thread and fabric), including pre-treatment, dyeing, Printing, finishing (including general finishing and functional finishing) and other processes.

3.2 Dyeing and finishing industry wastewater

Refers to the waste water discharged by textile dyeing and finishing facilities or enterprises outside the legal boundaries of the enterprise, including direct or indirect discharge from production and life Relationship of various effluents.

3.3 Comprehensive wastewater comprehensive wastewater

Refers to the textile dyeing and finishing enterprises that are discharged into the sewage treatment plant (station) after classified collection and pretreatment, or discharged into the sewage treatment after mixed collection the general term for wastewater from treatment