



蓝深集团股份有限公司简称蓝深集团，创建于1958年，是国家环保骨干企业、国家级高新技术企业。作为国内首台潜水泵排污泵和搅拌器的生产制造企业，经过多年发展，目前已形成泵类产品、水处理专用机械成套设备、矿用设备及高、低压电控产品的批量生产能力，能够自行生产污水厂和泵站70%以上的设备。

蓝深集团运用科学现代的管理手段，先后通过了欧盟CE认证、ISO9001:2000国际质量体系认证、ISO14001:2004国际环境管理体系认证、GB/T28001-2001职业健康安全管理体系认证以及国家强制性产品3C认证、水泵生产许可证、水工金属结构生产许可证等相关认证。

蓝深集团自1985年与德国ABS制泵公司合作生产国内第一台具有国际领先水平的潜水泵以来，坚持科技自主创新，拥有潜水泵类产品研发、生产制造方面的核心技术和领先流体技术，拥有40多项国家专利。成立了国内泵行业第一家国家级博士后科研工作站、江苏省企业院士工作站，集团流体技术研究所被认定为江苏省水泵工程技术研究中心、江苏省企业技术中心。现有本科以上科技研发人员85人，其中享受国务院特殊津贴2人，江苏省333高层次人才培养对象1人，全国泵技术委员会委员2人，在中国工程院院院士1人，在站博士后3人，在站研究生6人。完成了国家“863科技计划”等课题项目的研究和实施，为国家科委火炬计划项目验收合格企业，国家科委“潜水泵”技术依托单位，并于1998年实施国债项目建成国内最大、最先进的流体测试中心。特别是在行业内率先将PDM技术、CFD流场分析技术、有限元分析应用到实际工作中，通过五轴联动数控技术加工，提高了产品研发效率，技术处于国内领先，对国内泵及水处理设备行业的技术发展起到了积极的推动作用。获得国务院颁发的国家科学技术进步二等奖等荣誉。

蓝深产品辐射二十五个国家和地区的十五个经济领域。在三峡工程、神华集团、广州自来水公司南洲、西洲水厂、西安污水处理厂、桂林污水处理厂、大庆油田、扬子石化、鞍钢集团、大亚湾核电站、上海虹桥国际机场、广州地铁、南京地铁、悉尼歌剧院等国内外众多国家重点工程项目中被广泛应用。

蓝深集团具备市政工程总承包及环境污染治理设施运营资质。已承接并成功实施黑龙江安达市污水处理厂(出水一级A)总承包工程、辽宁大连长兴岛污水处理厂(出水一级A)设备成套供货项目、山西临县污水处理厂(出水一级A)设备供货和安装工程、山东东营港开发区北部污水厂(出水一级A)设备供货和安装工程等数十个市政污水工程项目。

蓝深集团以社会责任为己任，振兴民族环保工业为目标，依靠对水务的深刻理解，在“营销导向、不断创新、快速反应、一次做对”的管理原则指导下，蓝深人正为履行“创绿色环境，向未来负责”的企业宗旨与各界朋友携手合作，成为众多项目的投资主体以及合作伙伴，不断改写中国水工业的历史。

LanShen Group Corp., LTD. (hereinafter referred to as LanShen group, established in 1958, is the national environmental protection backbone enterprises Industry, national high and new technology enterprise. As a domestic first submersible sewage pump and blender manufacturing enterprise, after many years Development, currently has a pump products, water treatment special machinery equipment and mining equipment and high and low voltage electric product batch production can Force that can make production sewage treatment plant and the pumping station more than 70% of the equipment.

LanShen group using scientific modern management means and the company has passed the European Union CE authentication, the ISO9001:2000 international Quality system certification, ISO14001:2004 international environmental management system certification, GB/T28001-2001 occupational health Ann The management system certification and country forceproduct 3 C authentication, water pump production license, the hydraulic metal structure production license Certificates of relevant certification.

LanShen group since 1985 and Germany ABS system pump company to produce a domestic the first with advanced world level Submersible sewage pump since, adhere to scientific and technological innovation, has the submersible pump products research and development, production manufacture of the core technology And leading fluid technology, with 40 many national patents. Set up the domestic pump industry the first national postdoctoral research work Be standing, jiangsu province academicians workstation, group fluid technology institute was identified as jiangsu province water pump engineering technology research Center, the jiangsu provincial enterprise technology center. Existing bachelor of science and technology researchers 85 people, among them to receive the state council special salvia Put 2 people, jiangsu province 333 high-level talents cultivation object 1 person, the national pump technology committee 2 people, standing in Chinese engineering Academician courtyard, 1 in 3 people standing postdoctoral, standing in the graduate student six people. Completed the national "863 science and technology plan projects, etc The study and implementation of, the state science and technology commission for the torch project acceptance of enterprise, the state science and technology commission "submersible sewage pump" technology Relying on the unit, and in 1998, the national debt project was the biggest and the most advanced fluid test center. Especially in Within the industry will take the lead in PDM technology, CFD flow field analysis technology, the finite element analysis is applied to practical work, through the five axis Linkage numerical control technology processing, improve the product r&d efficiency, is in the domestic leading technology in China, the pump and water treatment equipment The technology of industry of development which has played a positive role in promoting this. Get the state council issued in national science and technology progress prize in honor.

LanShen product radiation 25 countries and regions of the 15 of the economy. In the three gorges project, shenhua group, widely State tap water company following, west continent waterworks, xian sewage treatment plant, guilin sewage treatment plant, daqing oil field, the yangzi stone Change, anshan group, the daya bay nuclear power station, Shanghai hongqiao international airport and guangzhou metro, nanjing subway, Sydney opera house At home and abroad, such as many national key project project has been widely used.

LanShen group have municipal engineering contracting and environmental pollution treatment facility operation qualification. Accepted and the success implementation black Longjiang AnDaShi sewage treatment plant (water level 1 A) the total contract projects and dalian in liaoning changxing island sewage treatment plant (water level A) complete equipment supply project, shanxi LinXian sewage treatment plant (water level 1 A) equipment supply and installation project in dongying, shandong Port development zone north wastewater treatment plant (water level 1 A) equipment supply and installation engineering dozens of municipal wastewater engineering projects.

LanShen group with social responsibility as own duty, promoting national environmental protection industry as the goal, rely on to a deep understanding of the water, In "marketing guidance, continuous innovation, and rapid response, a time to do" under the guidance of the principle of management, LanShen people are to perform "Gen green environment, to the future is responsible for" of the enterprise purpose cooperate with all friends, become numerous projects in the Lord Body and partners, and constantly rewrite the history of the water industry of China.

Profile of
Lanshen pumps



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产品概述

Products overview

蓝深集团作为国内第一台潜水搅拌器的诞生地，始终专注于潜水技术的研究与开发，发展至今已作为国内潜水行业的佼佼者。蓝深集团通过不断引进先进技术，大力推行科技创新。现已形成了混合搅拌和低速推流两大系列产品。1999年蓝深集团的QJB型潜水搅拌机被国家经贸委确定为“城市污水处理关键设备技术开发项目”，从而使该产品的技术水平再上新台阶。2001年9月通过了部级鉴定，因其在型式、结构、试验方法和产品标准上的创新，叶轮通过CFD优化设计，使得总体性能超过国外同类产品同期先进水平。潜水电机采用长江三峡用潜水排污泵的密封技术，大大提高了潜水搅拌机的可靠性。在搅拌机的性能测试方法上，蓝深集团已获国家专利。该项目获得2001年度国家机械工业科学技术进步奖。

作为该系列设备行业标准的起草和制定单位，蓝深集团持续投入开发和改造潜水搅拌机，精益求精。在国家863计划研究课题——城市污水处理成套设备研究中，蓝深承担了潜水搅拌机这一研究课题。现在开发生产的QJB型多功能旋流式潜水搅拌机，是我公司采用先进的计算机辅助设计，在原有潜水搅拌机业已成熟的技术基础上，结合数万例实际工程的运行业绩和成果反馈，从优化潜水搅拌机的搅拌效果考虑，就潜水搅拌机的叶片设计、性能设计、可靠性设计、移动式安装等关键核心技术进行的有序组合。采用全新的设计理念，从水力部件的工作效率和工作方法考虑，以实现搅拌机对搅拌介质的全方位、多角度、旋流往复式搅拌，完成搅拌介质的活性流动，使得搅拌效果更均匀、彻底和开放。完全打破原有潜水搅拌机的思维模式，提升了产品竞争力。

LanShen group as a domestic the first diving mixer, the birthplace of always focus on diving technology research and development, development now has a domestic diving industry leader. LanShen group, through and the introduction of advanced technology, vigorously carry out the science and technology innovation. Has created a mixing and low speed push flow two series products. 1999 years of LanShen group QJB dive type Water mixer the state economic and trade commission determined for "the urban sewage treatment key equipment technical development project", so as to make the product technical level to a new level. In September 2001 through the..... Ministerial appraisal, because of its type in, structure, test method and product standards of innovation, the impeller through the CFD optimization design, make overall performance more than the same products abroad advanced in the same period Level. The submersible motors using the Yangtze river three gorges in diving sewage pump sealing technology, greatly improving the reliability of the submersible mixer. In blender to test the properties of the method, LanShen group Has been granted the national patent. This project won the 2001 national mechanical industry science and technology progress prize.

As the series equipment industry standard drafting and making unit, LanShen group continuously invest development and transform submersible mixer, keep improving. In the national 863 plan research subject—the urban sewage treatment equipment study, LanShen submersible mixer for the research subject. Now development and production of QJB type multi-functional spin streaming submersible mixer, is I The company USES the advanced computer aided design, in the original submersible mixer has mature technical basis, combining with the actual engineering example of tens of thousands of performance and results feedback, from optimization The submersible mixer mixing effect thought the submersible mixer blade design, performance design, reliability design, installation, and other key core mobile technology for orderly combination, mining With the new design concept, hydraulic components from the work efficiency and working method considering, in order to realize the full range of medium of stirring mixer, the multiple perspectives, vortex reciprocating mix, completed Stir the activity of medium flow, making the mixing effect more even, thoroughly and open. Completely break original submersible mixer's mode of thinking, and to promote the competitiveness of their products.

用途

use

高速混合系列QJB型多功能旋流式潜水搅拌机适用于污水处理厂平衡池、硝化/反硝化池、污泥处理和储存池，以及工业流程中搅拌含有悬浮物、固杂物的液体，防止沉淀。

低速推流系列QJB型多功能旋流式潜水搅拌机适用于工业和城市污水处理厂曝气池和厌氧池、大型硝化及反硝化池、圆盘式活性污泥处理池、消毒池及工业搅拌。其产生低切向开放式的强力水流，可轻易实现在大容积流体中产生水循环及硝化、脱氮和除磷阶段创建水流等。

- | | |
|---|---|
| <ul style="list-style-type: none"> ■ QJB型多功能旋流式潜水搅拌机主要适用范围： ■ 污水、废水、污泥水的混合、均匀 ■ 稠化过程 ■ 污泥脱水过程 ■ 传热优化 ■ 污水池清洁 ■ 防止颗粒在池壁和池底的凝结和沉淀 ■ 去除悬浮物 ■ 防止结冰 ■ 创建水流 ■ 循环水等 | <ul style="list-style-type: none"> ■ QJB type multi-functional swirling submersible mixer mainly suitable for: ■ sewage and waste water and sludge water mixed and evenly ■ thick process ■ sludge dewatering process ■ heat transfer optimization ■ sewage pool clean ■ prevent particles in the wall and the bottom of the condensation and precipitation ■ Remove suspended ■ remove suspended solids ■ create water flow, etc ■ circulating water, etc |
|---|---|

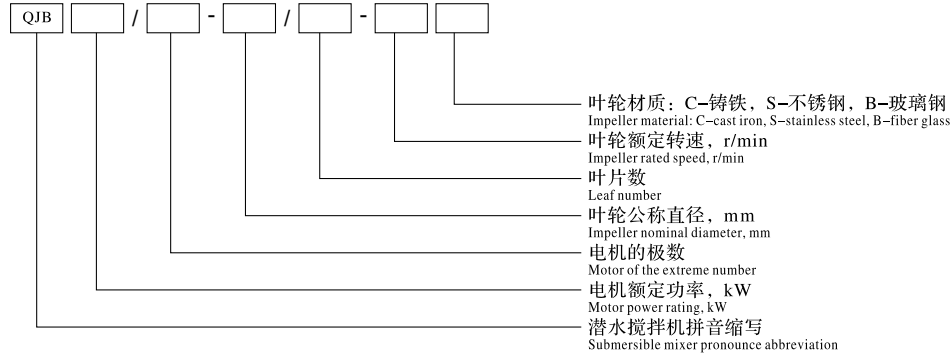
High-speed mixing series QJB type multi-functional spin streaming submersible mixer is applicable to the sewage treatment plant balance pool, nitrification/denitrification pool, sludge treatment and storage tank, and industrial processes. Mixing contains suspended solids, solid sundry liquid, prevent precipitation.

Low-speed flow QJB type multi-functional series tyre spin streaming submersible mixer used in industrial and urban sewage treatment plants aeration pool and Yan Yang Chi, large nitrification and denitrification pool, the disc type live Sex ChuLiChi sludge, disinfection and industrial mixing pool. Its produce low cut open water to strong, can be easily realized in a large volume of water cycle and fluid produced nitrification and denitrification and phosphorus removal Stage to create water flow, etc.





型号表示方法
Model said method



使用条件
Use conditions

QJB型多功能旋流式潜水搅拌机在下列条件下可正常连续运行:

- 1、最高介质温度不超过40℃;
- 2、介质的PH值在5-9之间;
- 3、介质密度不超过1150kg/m³;
- 4、长期潜水运行, 潜水深度一般不超过20m。

QJB type multi-functional swirling submersible mixer in the following conditions can be normal run continuously:

- 1.the highest temperature of the medium no more than 40 ℃;
- 2.medium PH value in between five to nine;
- 3.medium density of not more than 1150 kg/m³;
- 4.the long-term diving operation, diving depth in general not more than 20 m.

特点
characteristics

- 1、QJB型多功能旋流式潜水搅拌机结构紧凑, 体积小, 重量轻, 操作维护简单、安装检修方便、使用寿命长。
 - 2、叶轮具有最佳的水利设计结构、工作效率高, 后掠式叶片具有自洁功能可防杂物缠绕、堵塞。
 - 3、与曝气系统配合使用可使能耗大幅度降低, 充氧量明显提高, 有效防止沉淀。
 - 4、独特的电缆密封设计, 排除了电缆漏水的隐患。
 - 5、电机绕组为F级绝缘, 防护等级为IP68, 选用一次润滑免维护优质轴承, 具有油室泄漏检测和电机绕组过热保护功能, 使电机的工作更加安全可靠。
 - 6、两道独立的机械密封, 机械密封的摩擦付材质为耐腐蚀的碳化钨, 所有紧固件均为不锈钢材质。
 - 7、标准部件采用电解分离技术, 可以有效防止腐蚀。
- 1.QJB type multi-functional spin streaming submersible mixer compact structure, small volume, light weight, easy operation and Maintenance, easy installation and maintenance and long service life.
 - 2.Impeller water conservancy has the best design structure, high efficiency, sweptback blade with consecrated the mselves function can prevent sundry winding, jam.
 - 3.and aeration system can be used together to reduce energy consumption, oxygen filling improved obviously, effectively prevent Precipitation.
 - 4.unique cable seal design, ruled out cable slack hidden trouble.
 - 5.motor winding for class F insulation, protection grade for IP68, choose a lubrication free maintenance high quality bearing, has the Oil leak detection room and motor winding overheating protection function, make electricity Machine work more safety and reliable.
 - 6.Two way independent mechanical seal, mechanical seal of the friction material for corrosion resistance of pay and tungsten carbide All fasteners for stainless steel material.
 - 7.Standard components are electrolytic separation technology, which can help to prevent corrosion.

结构简介
Structure introduction

QJB型多功能旋流式潜水搅拌机主要由设备主机、安装系统及电控设备组成。
QJB型多功能旋流式潜水搅拌机按其作用形式可分为混合型潜水搅拌机和低速推流型潜水搅拌机。混合型潜水搅拌机为直联冲压式潜水搅拌机。低速推流型潜水搅拌机属于非直联式潜水搅拌机。

混合系列QJB型多功能旋流式潜水搅拌机按其叶片成形方式又分为铸件搅拌机和冲压搅拌机。铸件搅拌机叶片(叶轮)为铸造成形, 机体外壳材料为铸铁。冲压搅拌机叶片为冲压成形, 机体外壳材料为不锈钢。

直联冲压式结构的潜水搅拌机采用多极电机, 水力部件经冲压成型, 精度高、效率高, 叶轮有不同的叶片角度。采用水力平衡的无堵塞的拽后设计, 结构紧凑, 体积小、重量轻, 操作维护简单、安装方便快捷, 使用寿命长。壳体全部采用不锈钢制造, 外形美观流畅。经国家环保局认定, 是国内外潜水搅拌机中的首选产品。

混合型潜水搅拌机一般配制导流罩以增加轴向流动并减少径向流动, 减少叶轮振动, 增加运转的平稳性。而低速推流型潜水搅拌机不配制导流罩。

如图1所示, 直联式潜水搅拌机主要由叶轮、潜水电机两大部分组成, 叶轮直接装在电机轴上。

QJB type multi-functional swirling submersible mixer mainly by the equipment installation and the electric control system, the host of equipment.

QJB type multi-functional swirling submersible mixer according to their function forms can be divided into mixed submersible mixer and low speed push flow pattern submersible mixer. Mixed according to the structure characteristics of submersible mixer and points For straight league stamping type and the submersible mixer straight association-like submersible mixer. Low speed push flow pattern is a submersible mixer straight association-like submersible mixer.

Mix series QJB type multi-functional swirling submersible mixer blade way according to the forming and divided into casting mixer and stamping mixer. Casting mixer blade (impeller) for casting process, machine Body shell material generally for cast iron. Stamping mixer blade for stamping. The body shell material for stainless steel.

Straight league stamping type structure of the submersible mixer multipole motor, the hydraulic parts stamping forming, good accuracy, high efficiency, impeller blades have different Angle. The hydraulic balance No blocked after pulling design, compact structure, small volume, light weight, easy operation and maintenance, installation is convenient and fast, long service life. Cases all adopt the stainless steel manufacturing, appearance beautiful View fluent. Approved by the national environmental protection bureau that, at home and abroad in the submersible mixer is first selection product.

Mixed submersible mixer made to increase the general diversion cover axial flow and reduce the radial flow, reduce vibration, increase operation of the impeller smoothness. And low speed push flow pattern submersible mixer not preparation Diversion hood.

As shown in figure 1 shows, the straight association-like submersible mixer mainly by the impeller, submersible motors two main components, directly into the motor shaft impeller.

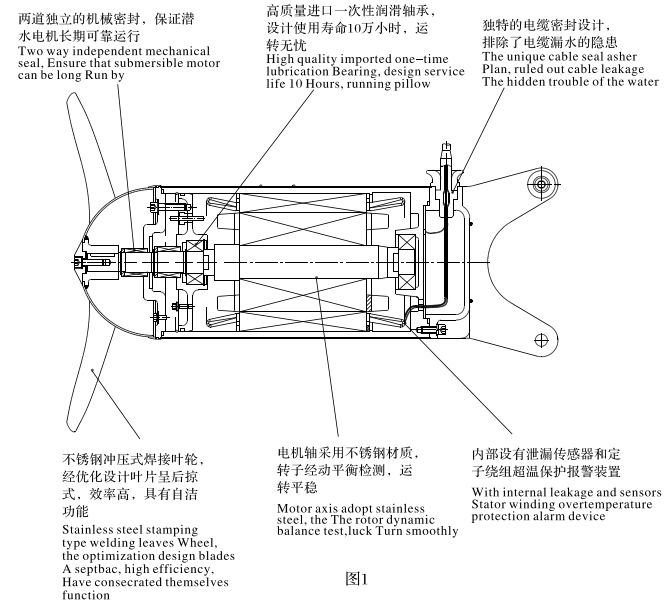


图1