



北京京城机电控股有限责任公司(简称:京城机电)是由北京市人民政府出资设立的国有独资公司,始终致力于服务国家战略和"卡脖子"工程,专注于大型智能装备的研发、设计、制造与服务,长期位列中国机械工业百强企业榜单。现拥有150余家下属企业,28家重要子公司,10家"专精特新"企业,3家制造业单项冠军企业和1家A+H股上市公司。

京城机电历史悠久,其前身可追溯到1949年成立的北京市人民政府工业管理局。在70余年的发展历程中,始终坚持科技创新,从万能铣床到高精度数控机床,从工业气瓶到氢能储运装备,从传统液压件到数字液压系统,从胶版印刷设备到智能印刷生产线,从传统制造到绿色环保产业园,从火力发电设备到新能源发电装备,京城机电见证了中国装备工业不断自我超越的历史传奇,先后填补了一系列装备领域国内空白,奠定了在国家装备制造行业中的领先地位。打造出"京城"、"北一"、"北人"、"华德"、"天海"等众多知名品牌,产品销往70多个国家和地区,在国内外装备制造领域中享有盛誉。

京城机电始终遵循"高精尖"发展道路,始终坚持将科技创新作为持续发展源动力,充分利用北京科技创新中心优势,传承企业历史积淀,推动技术产品创新、商业模式创新、管理创新、机制创新以及文化创新,持续构建创新链和产业链深度融合的高精尖产业结构,不断夯实核心竞争力。凭借资本运作,产业协同、创新研发、国际合作等多种方式,全力打造装备制造与服务、科技文化园区运营与服务的双提升。

京城机电始终坚持党的领导、加强党的建设,落实全面从严治党和党风廉政建设责任,以党建为引领,以"精于术理,诚以信合"为核心价值理念,不忘初心,砥砺前行。专注于为用户提供实现价值的精品与服务,坚持用诚实承载信用,用忠诚对待事业,用热诚对待工作,用合作实现和谐,达到合作伙伴之间、企业与员工之间的共同成长和成功,构筑可持续发展的生态共同体。

京城机电在习近平新时代中国特色社会主义思想的引领下,积极践行新发展理念,积极融入新发展格局,厚植发展优势,努力建设中国特色社会主义现代化企业。

Beijing Jingcheng Machinery Electric Holding Co., Ltd. (hereinafter referred to as JCME)isa wholly state-owned company funded by the People's Government of Beijing Municipality. It is always committed to not only serving the national strategy and the "stranglehold" engineering but also focusing on the R & D, design, manufacturing and service of large-scale intelligent equipment, and it has been ranked among the top 100 China machinery industry company for a long time. Now, it has more than 150 subordinate enterprises, 28 important subsidiaries, 10 "specialized and sophisticated" enterprises that produce new and unique products, 3 single champion enterprises in the field of manufacturing industry and one company listed on Shanghai and Hong Kong stock markets (A + H).

JCME has a long history. Its predecessor was the Industrial Administration Bureau of the People's Government of Beijing Municipality, which was established in 1949. JCME always adheresto scientific and technological innovation over 70 years of development process.It witnessed the historical legend of the constant self-transcendence of China's equipment industry, namely, from universal miller to high-precision CNC machine tools, from industrial gas cylinders to hydrogen energy storage and transportation equipment, from traditional hydraulic parts to digital hydraulic systems, from offset printing presses to intelligent printing production lines, from traditional manufacturing to green environmental protection industrial parks and from thermal power generation equipment to new energy power generation equipment. Moreover, it has also successively filled a series of domestic gaps in the field of equipment and established its leading position in the national brands, such as "Jingcheng", "Beiyi", "Beiren", "Huade" and "Tianhai". Its products are sold to more than 70 countries and regions, so JCME enjoys a high reputation in the field of equipment manufacturing at JCME always follows the "high-level, elite and top-notch" development path and consistently sees scientific and technological innovation as the source power of sustainable development. By making full use of the advantages of Beijing Science and Technology Innovation Center and inheriting the historical accumulation of the enterprises, JCME constantly promotes the innovation in technological products, business model, management, mechanism and culture, and continuously builds a high-level, elite and top-notch industrial structure with a deep integration of innovation chain and industrial chain to consolidate core competitiveness. By means of capital operation, industrial collaboration, innovative research and development, international cooperation and other ways, JCME makes every effort to improve equipment manufacturing and service as well as the operation and service of scientific, technological and cultural innovation parks.

JCME always adheres to the leadership of the Party, strengthens the Party building, implements the responsibility of full and strict Party self-governance, the Party's work style and clean government, stays true to its original aspiration and works together with the Party building as the guide, and "the proficiency in technology and the management and sincerity in business and cooperation" as the core value concept. Focusing on providing users with high-quality products and services that can realize their value, JCME insists on the principle of "carrying credit with honesty, treating cause with loyalty, working with devotion and achieving harmony with cooperation", thus achieving common growth and success among partners, enterprises and employees, and building a sustainable ecological community.

Under the guidance of by Xi Jinping Thought on Socialism with Chinese Characteristics for a New Era, JCME actively implements the new development philosophy and integrates into the new development paradigm to foster the strengths in development and strive to build a modern enterprise of socialism with Chinese characteristics.





# 机器人

Robot

京城机电机器人板块,围绕高速铁路、航天航空、汽车、3C、酿酒、家具家电等领域,积极培育控制器、减速器、伺服系统等机器人核心零部件、机器人本体,重点聚焦工业机器人领域,开发智能制造装备、系统集成应用和整体解决方案,拓展新应用场景,积极构建机器人应用和智能制造服务体系。

Focusing on high-speed railway, aerospace, automobile, 3C, wine-making, furniture and household appliances and other fields, the robot sector of Beijing Jingcheng Machinery Electric Co., Ltd. actively cultivates the core parts of robots (such as controllers, reducers and servo systems) and robot bodies, and highlights the field of industrial robots to develop intelligent manufacturing equipment as well as applications and overall solutions of system integration, expand new application scenarios, and construct a service system of robot applications and intelligent manufacturing.

# 北京配天技术有限公司

Beijing Peitian Technology Co., Ltd.

专注于工业机器人本体、核心零部件(伺服系统、数控系统、视觉系统)及自动化解决方案研发制造,产品已在3C、汽车零部件、玻璃加工、电子通信等制造行业及医药行业广泛应用。

Specializing in the R & D and manufacturing of industrial robot body, core components (servo system, numerical control system, vision system) and automation solutions, the products have been widely used in 3C, auto parts, glass processing, electronic communications and other manufacturing industries and pharmaceutical industries.

# 北京京城智通机器人科技有限公司

Beijing Jingcheng Zhitong Robot Technology Co., Ltd.

以留美博士为领军人物,致力于智能工业机器人柔性加工系统集成研发制造,产品广泛应用于高铁、航空航天、工程机械、智能酿酒等领域,是智能酿酒领域的龙头企业。

Beijing Jingcheng Zhitong Robot Technology Co., Ltd., with Doctorsonce studied in the United States as the leader, is committed to the integrated R&D and manufacturing of the flexible processing system of intelligent industrial robots. Its products are widely used in high-speed rail, aerospace, engineering machinery, intelligent wine-making and other fields, and it is now a leading enterprise in the field of intelligent wine making.

# 青岛北洋天青数联智能有限公司

Qingdao BYTQ United Digital Intelligence Co., Ltd.

长期致力于为白色家电领域提供工业智能化与信息化的产品,提供智能工厂与数字化生产车间整体解决方案,主要服务海尔、奥柯玛、美的等重点客户。

Qingdao BYTQ United Digital Intelligence Co., Ltd. has long been committed to providing industrial intelligent and information-based products for the field of white household appliances and overall solutions for intelligent factories and digital production workshops. It mainly serves Haier, Okoma, Midea and other key customers.

# 北京智同精密传动科技有限责任公司

Beijing Chietom Precision Transmission Technology Co. Ltd.

在国内知名专家组成的核心团队带领下,致力于机器人核心零部件——高精密 RV 减速器的研发制造,对标行业龙头,从源头创新上解决国家"卡脖子"技术,实现进口替代。

Under the leadership of a core team composed of well-known experts in China, Beijing Chietom Precision Transmission Technology Co. Ltd. is committed to the R&D and manufacturing of high-precision RV reducer, the core component of robots, and solving the problem of national "stranglehold" technology from the source of innovation to achieve import substitution by benchmarking industry leaders.

# 机器人

Robot

# 北京配天技术有限公司

Beijing Peitian Technology Co., Ltd.





北京配天技术有限公司成立于2010年,系国家级高新技术企业。

公司总部位于安徽省蚌埠市高新区,总投资 5000 万元,厂房建筑面积 18400 平方米,可年产 5000 台智能工业机器人,产品负载范围涵盖 3 公斤至 280 公斤,已在多个行业、领域成功应用。

公司在北京、安徽、深圳均设立研发中心,经过多年的技术积累,在该技术领域保有专利870余项。

公司业务包括工业机器人本体及核心部件(伺服驱动、伺服电机等)产品的生产、销售、维修服务、技术支持和培训,同时提供机器人控制系统解决方案、成套柔性制造设备及系统、机器人应用行业自动化解决方案。

 $\label{eq:condition} \textit{Beijing Peitian Technology Co.}, \textit{Ltd}, \textit{established in 2010}, \textit{is a national high-tech enterprise.} \\$ 

The company is headquartered in Bengbu High-tech Zone, Anhui Province, with a total investment of 50 million yuan and a factory building area of 18,400 square meters. The annual output is 5,000 intelligent industrial robots. The load of our industrial robot products covers the range from 3 kg to 280 kg, which has been successfully applied in many industries and fields.

The company has set up R&D centers in Beijing, Anhui and Shenzhen and holds more than 870 patents in this technical field after years of technical accumulation.

Our company's business includes the production, sales, maintenance service, technical support and training of industrial robot body and core components (servo drive, servo motor, etc.). At the same time, we can provide robot control system solutions, complete sets of flexible manufacturing equipment and systems, industry automation solutions of robot application.



# 主要产品

#### 智能部件

数控系统:适用于全系列车床、钻、镗、雕铣、加工中心等,功能丰富,性能优越

伺服系统:伺服驱动器及电机覆盖 100W~5kW 功率范围,满足各种工业场景需求,进口性能,国产价格

机器视觉:为图形化编程,能够完成缺陷监测、物体识别、目标分类等丰富的功能



数控系统 / Numerical control systems



伺服系统 / Servo systems

### **Main products**

#### **Intelligent Components**

Numerical Control System: applied for all series lathes, drills, borer, engraving and milling machine, machining centers, etc., with rich functions and superior performance

Servo System: the servo driver and motor cover the power range of 100W~5kW, meeting the needs of various industrial scenes with the super imported performance and the competitive domestic price

Machine Vision: applied for graphical programming, with many functions such as defect monitoring, object recognition and target classification and so on



视觉系统 / Vision system



#### 培育板块 Cultivating fields

# 机器人

Robot



### 主要产品

#### 工业机器人本体

六轴工业机器人,负载范围: 4-280Kg

SCARA 工业机器人,负载范围:3-20Kg

自动化焊接工业机器人,支持 TIG、MIG、MAG、等离子切割、激光焊接等

软件产品:工艺应用软件包(弧焊功能包、折弯、码垛) 3D 离线编程与仿真软件(RobotLive)、智能设备管理系统(E-Manager)、PC端编程软件(RPsim)、MES

### **Main products**

#### **Industrial Robot Body**

Six-axis Industrial Robot, Load Range: 4-280Kg

SCARA Industrial Robot, Load Range: 3-20Kg

Automatic-welding Industrial Robot: supporting TIG, MIG, MAG, plasma cutting, laser welding, etc

Software Products: Software Package of Process Application (arc-welding function package, bending and palletizing), 3D Off-line Programming and Simulation Software (RobotLive), intelligent Equipment Management System (E-Manager), PC Programming Software (RPsim), MES



六轴工业机器人 Six-axis Industrial Robot



SCARA 工业机器人 SCARA Industrial Robot



自动化焊接工业机器人 Automatic-welding Industrial Robot



智能设备管理系统 Intelligent Equipment- management System

### 主要产品

#### 智能机器人

科研教育机器人、特种机器人

定制机器人业务:以客户场景引导,定制化开发,进入 多个细分行业,掌握众多应用场景需求

智能主执行器技术:基于现有执行器技术,开发具有任务级规划、智能识别、动态避障、柔性操作等功能的智能主执行器产品,建立通用机器人技术的重要基石



实训平台 / Training platform

### **Main products**

#### **Intelligent Robot**

Research and Education Robot, Specialized Robot

Customized Robot Business: taking customer scenarios as a guide with customized development, and supporting multiple sub-industries, and mastering the requirements of many application scenarios

Intelligent Master Actuator Technology: based on the existing actuator technology, to develop the intelligent master actuator products with the functions of task-level planning, intelligent identification, dynamic obstacle avoidance and flexible operation, and establish the important cornerstone of general robot technology



定制工作站 / Customized workstation





# 主要产品

#### 智能自动化

自动化工作单元及产线实现设备互联和工艺互联 智能仓储、物流实现原料、半成品、成品的存储、运输和管理 生产管理软件实现智能生产排程及人员计划安排 自动化设备、传感器、机器视觉实时采集生产数据 智能设备管理系统实时监控设备状态



匣钵拆垛卸料 Sagger unstacking and unloading



食品厂纸箱码垛 Carton palletizing in food factory



手机壳打磨抛光 Grinding and polishing of mobile phone case



电子元件锡焊 Tin soldering of the electronic components

#### **Main products**

#### **Intelligent Automation**

To Realize the Equipment and Process Interconnection of Automatic Work Unit and Production Line

The intelligent warehousing and logistics realizes the storage, transportation and management of raw materials, semi-finished products and finished products

The production management software realizes intelligent production scheduling and personnel planning

The automatic equipment, sensors and machine vision collect production data in real time

The intelligent equipment management system monitors equipment status in real time



冲压上下料 Stamping loading and unloading



无源滤波器自动化智能柔性装配生产线 Automatic intelligent flexible assembly line of passive filter



检测线 Detection line



滤波器谐振杆装配 Filter resonant rod assembly



# 机器人

Robot

# 北京京城智通机器人科技有限公司

Beijing Jingcheng InterSmart Robotic System Co., Ltd.

北京京城智通机器人科技有限公司成立于 2019 年,是北京京城机电控股有限责任公司联合北京国有资本经营管理中心成立的专业化的机器人产业运营平台,是国内领先的工业机器人柔性加工系统集成和行业解决方案供应商。

公司以其专有技术"交互式柔性机器人加工系统"为依托,以酿酒自动化、轨道交通自动化业务为核心,旗下拥有国家专精特新小巨人企业 1 家、国家高新技术企业 4 家、省级技术领先型企业 1 家,省级研发中心 1 个、市级研发中心 1 个,实现了以工业 4.0 智能生产为指向的全产业链布局。

公司致力于成为北京市智能制造和先进装备领域的领军企业,成为全球智慧工厂的引领者。

Beijing Jingcheng InterSmart Robotic System Co., Ltd was established in 2019, founded in 2019, is a professional robot industry operation platform established by Beijing Jingcheng Machinery Electric Holdings Co., Ltd. and Beijing State-owned Capital Operation And Management Center. It is a leading supplier of industrial robot flexible machining system integration and industry solutions in China.

Beijing Jingcheng InterSmart Robotic System Co., Ltd relies on its proprietary technology "Interactive flexible Robot processing system" and takes brewing automation and rail transit automation business as the core. It has 1 national specialization-refinement-specialty-novelty leading enterprise, 4 national high-tech enterprises, 1 provincial technology leading enterprise, 1 provincial R & D center and 1 municipal R & D center, realizing the layout of the whole industry chain directed by industrial 4.0 intelligent production.

Beijing Jingcheng InterSmart Robotic System Co., Ltd is committed to becoming a leading enterprise in the field of intelligent manufacturing and advanced equipment in Beijing and a leader in global smart factories.

# 主要产品

酿酒机器人自动化生产线 轨道交通装备智能系统 交互式机器人柔性加工系统 智能柔性生产线

### **Main products**

Automatic production line with robots of brewing Intelligent system of rail transit equipment Interactive flexible robot processing system Intelligent flexible production line

交通生产线 / Transit production line



酿酒生产线 / Brewing production line





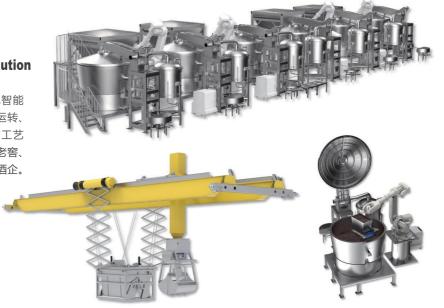
# 典型应用 ———

### **Typical Applications**

### 白酒智能酿造系统解决方案 Intelligent Liquor Brewing System Solution

白酒智能酿造系统以全产线、全工艺、一体化智能酿造为特点,以"智能控制"为核心,集物料运转、发酵、蒸馏、出酒为一体,实现传统白酒生产工艺的自动化、数字化和智能化,并广泛应用于泸州老客、郎酒、水井坊、西凤、古井、洋河、酒鬼等知名酒企。

The intelligent liquor brewing system is characterized by whole production line, takes "intelligent control" as the core, and integrates material transfer, fermentation, distillation and liquor production to realize the automation, digitization and intelligence of traditional liquor production technology, which has been widely applied in Luzhou Laojiao, Lang Jiu, Swellfun, Xifeng, Gujing, Yanghe, Jiugui and other well-known wine enterprises.



### 先进轨道交通装备智能系统解决方案

#### **Intelligent System Solution of Advanced Rail Transit Equipment**

包含车体型材焊前打磨、组对焊接、焊缝打磨、拉丝、钻孔、腻子打磨、喷涂;转向架焊缝打磨、焊接、装配等柔性制造装备,以及智能仓储物流和生产过程信息化控制系统。采用机器人技术为核心,配合力位视觉技术检测装备,引入离线编程、在线校准过程控制技术,实现了铝合金车身、转向架生产过程智能化。客户包括中车旗下各大轨道交通车辆公司。

It includes the profile pre-welding grinding for car body, group welding, weld grinding, wire drawing, drilling, putty grinding and spraying, and also the bogie weld grinding, welding, assembly and other flexible manufacturing equipment, as well as the control system of the intelligent warehousing logistics and production process information. The intelligent production process of aluminum alloy body and bogie is realized by using robot technology as the core, combined with force position vision inspection equipment, and introducing the process control technology of off-line programming and on-line calibration. They have provided the service and to the customers of all the major rail transit vehicle companies under CRRC.







#### 培育板块 Cultivating fields



Stamping bounding-Multidimensional bounding, Automatic Stamping

青岛北洋天青数联智能有限公司

Qingdao BYTQ (Beiyang Tianqing) Digital Intelligence Co., Ltd

青岛北洋天青数联智能有限公司(以下简称北洋天青) 成立于 2013 年,立足于家电行业,面向制造业,是 一家专注智能制造、以技术创新为核心引领行业发展 的智能工厂整体解决方案供应商,为自我革新的制造 企业提供基于云端、算法驱动、灵活可配置的多平台 实时协同系统,搭配机器人应用、自动化设备、智能 物流等硬件设施,用轻量高效的方式帮助制造业客户 提高生产效率、降低制造成本、打通信息孤岛,真正 实现数据驱动制造。针对不同行业的需求,整合运动 控制、影像处理、机械人应用等技术,配合软件系统 开发为客户提供最具竞争力的产品和服务。业务涵盖 消费类电子、家电业、医疗品、新能源电池、食品领域。



信息化工业软件系统 地面输送装配系统 空中输送系统 机器人集成应用 自动化冲压连线



Robot integrated application



地面输送装配系统 Ground transportation and assembly system

### 主要优势

公司以企业信息化业务版块 为驱动核心,以定制化智能 制造装备为基础,打通设备 层、控制层、运营层、决策层, 为客户提供工业自动化、数 字化、网络化、智能化的端 到端、一站式产品和服务, 包含前期工厂的整体规划、 项目实施、交付验收、后续 服务等的各个阶段。帮助企 业建立智能化数字化工厂, 推进数字化变革,实现降本 增效,改进设计,提高效率, 模式升级,高质量制造。

Established in the household appliance industry for the manufacturing industry in 2013, QINGDAO BYTQ UNITED DIGITAL INTELLIGENCE CO., Ltd. (hereinafter referred to as BYTQ) is a supplier of integrated solutions for intelligent plants focusing on intelligent manufacturing and leading industry development with the core of technological innovation. BYTQ provides self-renewing manufacturing enterprises with Cloud-based, algorithm-driven, flexible and configurable multi-platform real-time cooperative systems. Supported with hardware systems such as robot application, automation equipment and intelligent logistics, BYTQ assists customers of the manufacturing industry in enhancing productivity, reducing cost, and breaking through isolated islands of information in a light-weighted and efficient way, to actually realize data-driven manufacturing. Aiming at different demands of various industries, integrated with various technologies such as motion control, image processing and robot application, supported with software system development, it provides customers with the most competitive products and services, covering the business scope of consumer electronics, household appliances, medical treatment products, new energy batteries and food products.

### Main products

Information industry software system

The assembly system of ground transportation

Air transportation system

Robot integrated application

Automatic stamping connection

### Main advantages

With the driving core of the enterprise information business field, and based on customized intelligent manufacturing equipment, the company breaks through different levels such as the equipment level, the control level, the operation level and the decision-making level, to provide customers with industrial automated, digitalized, networked and intelligentized end-to-end one-stop products and services, covering various stages such as early integrated planning for plants, project implementation, delivery & acceptance check and follow-up services. The company assists enterprises in establishing intelligentized and digitalized plants, facilitating digitalized reforms, realizing cost reduction and benefit increasing, improving designs, increasing efficiency, upgrading modes and realizing high-quality manufacturing