COMPANY PROFILE 公司简介

浙江诺德智能自动化科技有限公司是一家专注于无刷电机自动化生产解决方案的科技型企业，是江苏本格自动化有限公司关联企业，公司坐落在宁波望春工业园区。产品主要聚焦在无刷电机定转子绕制单机设备，及全自动生产线，包括插纸机、端板机、绕线机、内绕机、外转子绕线机、端子机、测试机、磁瓦机及其他一些电机制造非标设备等。

公司拥有强大的研发团队，汇聚行业技术精英及国外专家，产品设计既汲取欧日技术特点，又结合自我创新，高效、稳定、安全是我们产品特点，绕线速度最高可达 1000 转 / 分钟，效率是同类产品的 2-3 倍。只聚焦一种产品，让我们变得更加专业！

市场是导向，客户为中心，“服务、专业、快捷、诚信、创新”是我们一直坚持不变的经营理念，“Just for easy”把困难留给自己，简便送给客户，是我们行为准则！







Zhejiang Nide Intelligent Automation Co.,Ltd, which is wholly-owned by Ningbo Nide Mechanical Equipment Co.,Ltd, sitting in the industrial hub city Ningbo, mainly focus on the latest winding and assembly technology for all kinds of BLDC motor, including the stand-alone machine and fully automatic production line. Meanwhile, we also customize some non-standard machines to cater for clients needs in motor manufacturing field.

Strict quality control system, plus strong technical team allow us to offer the reliable machines to our customers. The philosophy of " Service, Profession, Prompt, Sincere" help us to win the customer favor.

Nide--Just for easy, is try to not only make motor manufacturing easier, customer easier, but also strike for future life easier !







TESTING EQUIPMENT 检测设备



二次元影像测量仪：
测量行程 400x300x200mm
Binary Image Measuring Instrument:
measure stroke 400x300x200mm



激光打标机 Laser Marker



洛氏硬度计
测试金属硬度
Rockwell Hardness Tester



偏摆仪：测量长度 300mm，中心高 170mm
Deflection Instrument: Measuring Length 300mm,
Central Height 170mm



盐水孔针试验仪 Pinhole Testing Instrument

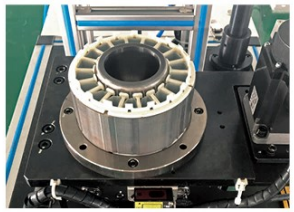
ND-SSI01 定子插纸机

ND-SSI01 Slot Paper Inserting Machine

设备简介 Introduction:

本机可用无刷电机定子、伺服电机、步进电机定子自动插纸，其主要特点是自动成型、切纸、插入，人机界面设定所需特殊参数，操作简单、噪音小、速度快、自动化程度高，设备有远程诊断功能。

The machine is suitable for brushless motor stator, servo motor and stepping motor stator paper inserting. It automatically complete paper cutting, folding and inserting. The parameter can be set on HMI, Easy operation, low noise, high speed and high automation, machine has remote diagnosis function.





技术参数 Specification:

- 叠厚范围 / Stack height：20mm ～ 60mm
- 定子内径 / Stator I.D：50~ 150mm
  (特殊可定制 can be customized if special)
- 绝缘纸宽度 / Insulation paper width：
  10mm ～ 55mm(特殊可定制 can be customized if special)
- 绝 缘 纸 厚 度 / Insulation paper thickness：
  0.188mm ～ 0.3mm
- 适应槽 数 / Slot No.: 偶数槽（槽数大于 8 槽）
  Odd(more than 8 slots)
- 生产节拍 / Cycle time：11 秒 / 件 11pcs/pc
- 气源压力 / Air pressure: 0.4~0.8MPa
- 电源 / Power supply：220V AC 50/60Hz
- 重量 / Weight：600Kg
- 外形尺寸 / Dimension：
  1600mm×700mm×1780mm
- 冲缺大小 / Notching dimension：0-3x45
- 功率 / Power：7KW

ND-SW01 单工位单针伺服内绕机

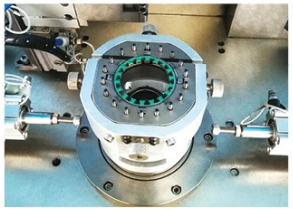
ND-SW01 Single Station Servo Needle Winding Machine

设备简介 Introduction:

适用于无刷电机定子线圈绕制。手工上下料、自动夹紧模具、绕线、夹剪线；绕线过程可实现多次抽头（屏幕设定）、夹线，剪线功能。槽数，圈数均可通过人机界面设定。可多股同时绕线，设备有远程诊断功能。

It's suitable for brushless motor stator coil winding, manually loading/unloading, the machine automatically complete mold clamping, winding, wire clamping and cutting, it can achieve multi tapping(set on HMI). The slot No. and turn No. can be set on HMI. It can do multi strands wire parallel winding, machine has remote diagnosis function.





技术参数 Specification:

- 线径范围 / Wire dia.：0.25-1.2 mm
- 绕线速度 / Winding speed：0-350 r/min adjustable
- 绕线方式 / Winding Method：针式绕线 / Needle winding
- 适应叠厚 / Stack length：10-180mm
- 定子内径 / Stator ID：50-180mm
- 定子外径 / Stator OD：70-210mm
- 适应电机级数 / Pole No.：4
- 气源压力 / Air pressure：0.5MPa ～ 1 MPa
- 电源 / Voltage：380V/50HZ 三相四线 380V/50HZ three phase four wires
- 总功率 / Power：9.5KW
- 外形尺寸 / Dimension：长 L\ 宽 W\ 高 H(1200×750×1900)
- 重量 / Weight：≈大约 400Kg About 400kg

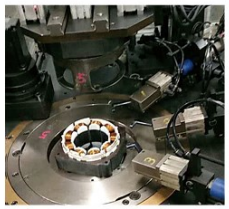
ND-SW03 单工位三线嘴内绕机

ND-SW03 Single station Needle Winding Machine With three needles

设备简介 Introduction:

此无刷定子绕线机采用内绕设计，单工位 3 线嘴自动绕线、自动转位、自动剪断、自动夹线、手动搬运定子送料。参数可编程：槽数、匝数、转角度数、绕线度数、转向等可编程，张力器控制过桥线、绕线、排线、加减速等过程的张力，设备有远程诊断功能。

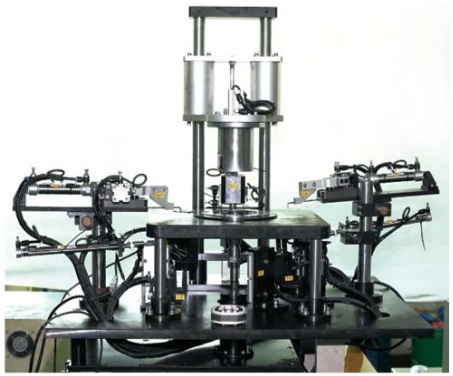
It's suitable for BLDC motor stator winding, Single station, three needles winding, manual loading/unloading, automatically winding, indexing, wire clamping and cutting. The slot No. , turn No., indexing angle, rotation direction,etc. can be set on HMI. The wire tensioner control the tension during bridge wire routing, winding, wire arraying, acceleration and deceleration,etc. Machine has remote diagnosis function.











技术参数 Specification:

- 线径范围 / Wire dia.：0.4-1.0mm（特殊规格可定制 can be customized)
- 绕线速度 / Winding speed: 1200RPM（空载 no-loading)/1000RPM
- 适应叠厚 / Stack length：10-50mm
- 定子内径 / Stator ID：36-60mm
- 定子外径 / Stator OD：70-150mm
- 气源压力 / Air pressure：0.4MPa ～ 0.7 MPa
- 电源 / Voltage：380V/50HZ 三相四线 380V / 50HZ three phase four wires
- 总功率 / Power：7.0KW
- 外形尺寸 / Machine dimension：L1100×W1600×H1700mm
- 重量 / Weight：≈ 750Kg

ND-S2W01 双工位多极定子内绕机

ND-S2W01 Double stations Needle Winding Machine

设备简介 Introduction:

采用双工位设计，手工上下料、自动夹紧、绕线、夹剪线。槽数，圈数均可通过人机界面设定。特别适用于风扇电机，无叶风扇电机，直流无刷电机。设备有远程诊断功能。

Double stations, Needle winding, manual loading/unloading, automatically mold clamping, wire winding, wire clamping and cutting. The slot No. and turn No.,etc. can be set on HMI. It is especially suitable for fan motor, bladeless fan motor and BLDC motor stator winding. Machine has remote diagnosis function.





技术参数 Specification:

- 线径范围 / Wire dia.：Φ0.5-Φ1.0mm
  (特殊可定制 Can be customized if special)
- 绕线速度 / Winding speed：0-600r/min adjustable
- 适应叠厚 / Stack length：10-90mm(标准行程 standard stroke)，90-130mm(长行程，特殊可定制 long stroke, can be customized if special)
- 定子内径 / Stator ID：Φ25mm ～ Φ80mm
  (特殊可定制 Can be customized if special)
- 定子外径 / Stator OD：Φ50mm ～ Φ120mm
  (特殊可定制 Can be customized if special)
- 气源压力 / Air pressure：0.5MPa ～ 1MPa
- 电源 / Voltage：380V/50HZ 三相四线
  380V/50HZ three phase four wires
- 总功率 / Power：10KW
- 外形尺寸 / Machine dimension：1670×1080×1790mm
  (不包括线架 exclude wire support)
- 重量 / Weight：≈ 600Kg

ND-S4W01 四工位无刷定子绕线机

ND-S4W01 Four stations Needle Winding machine

设备简介 Introduction:

用于无刷电机定子绕线，采用四工位。手工上下料、自动夹紧、绕线、夹剪线。槽数，圈数均可通过人机界面设定。设备有远程诊断功能。

Four stations, Needle winding, it is suitable for BLDC motor stator winding. Manual loading/unloading, automatically mold clamping, wire winding, wire clamping and cutting. The slot No. and turn No.,etc. can be set on HMI. Fast change-over. Machine has remote diagnosis function.







技术参数 Specification:

- 线径范围 / Wire dia.：Φ0.20-Φ0.8mm
  (特殊可定制 Can be customized if special)
- 绕线速度 / Winding speed：0-1000 r/min
- 适应叠厚 / Stack length：10mm ～ 80mm(标准行程 standard stroke)，80-120mm(长行程，特殊可定制 long stroke, can be customized if special)
- 定子内径 / Stator ID：Φ25mm ～ Φ80mm
- 定子外径 / Stator OD：Φ50mm ～ Φ120mm
  (特殊可定制 can be customized if special)
- 气源压力 / Air pressure：0.5MPa ～ 1 MPa
- 电源 / Voltage：380V/50HZ 三相四线
  380V/50HZ three phase four wires
- 总功率 / Power：16KW
- 外形尺寸 / Machine dimension：
  L1670×W1080×H1790mm
- 重量 / Weight：≈ 750Kg

ND-S4W01
NIDE JUST FOR EASY
浙江诺德智能自动化科技有限公司 ZHEJIANG NIDE INTELLIGENT AUTOMATION CO.,LTD.

ND-R2SW02 双工位针式外绕机

ND-R2SW02 External Needle Winding Machine

设备简介 Introduction:

主要用于多极定子绕线。每次动作循环将绕制 2 个定子，绕线过程可实现多次抽头（屏幕设定）、自动挂钩、夹线，剪线功能。槽数，圈数均可通过人机界面设定；设备有远程诊断功能。

Suitable for multi-poles stator winding, It is manually loading, automatically clamping tooling. During winding, it can achieve multi times tapping(set on HMI), automatically wire hooking, wire clamping and wire cutting. The slot No. and turn No. can be set on HMI. Machine has remote diagnosis function.







技术参数 Specification:

- 定子外径 / Stator O.D：Φ50—Φ120 mm (can be customized if special)
- 定子内径 / Stator ID：Φ20—Φ80 mm (can be customized if special)
- 适应线径 / Wire diameter：Φ0.5—Φ1.5 mm (can be customized if special)
- 叠厚范围 / Stack length：10-80mm(标准行程 standard stroke) 100—200mm (长行程，特殊可定制 long stroke, can be customized if special)
- 电源 / Voltage：380V/50HZ 三相四线 380V/50HZ three phase four wires
- 尺寸 / Dimension：1200×1360×1800 (L×W×H,exclude the dimension of wire support)
- 重量 / Weight: 600Kg
- 总功率 / Total power: 20KW

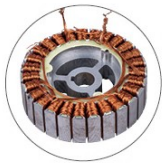
ND-R2SW01 电动车轮毂绕线机

ND-R2SW01 Wheel motor Stator Winding machine

设备简介 Introduction:

本机型专为轮毂电机绕线而设计，整机采用伺服电机控制系统实现产品绕制。人机界面具有故障诊断、产量计存等功能，可设定自动绕线、多线径绕线、自动分度、自动跨槽、绕线速度等参数设定；操作简单，生产效率高等特点。设备有远程诊断功能。

This machine is designed for the wheel motor coil winding. It is equipped with the servo control system, able to diagnose the fault, count the output etc. The other function such as auto winding, multi wires winding, auto indexing, auto skip slot and winding speed could be programmed, easy for operation and maintenance. Machine has remote diagnosis function.







技术参数 Specification:

- 定子内径 / Stator ID：10-100mm
- 定子外径 / Stator O.D：80-310mm
- 定子叠厚 / Stator stack length：10-50mm
- 线径 / Wire dia.：0.2-1.3mm
- 最大转速 / Max.winding speed: 500RPM
- 电压 / Voltage：three phase 380V/50HZ or single phase 220V/50HZ
- 气源压力 / Air pressure：0.4MPa ～ 0.7MPa
- 总功率 / Total power：<7KW
- 绕线根数 / Parallel winding wire number: 1-8
- 尺寸 / Dimension：L1100×W1000×H1700mm
- 设备重量 / Weight：≈ 750kg

ND-R2W01 外转子绕线机

ND-R2W01 External Rotor Winding Machine

设备简介 Introduction:

单飞叉，双工位绕线，选用三轴微电脑（CNC300A）控制器，可实现自动绕线、自动转位，排线和转位为步进电机控制，绕线由变频器控制交流电机运转，圈数可精确到 0.1 圈。

Adapts Single flyer winding, double stations, adapts micro chip controller, manually feeding, it can achieve automatically wire winding, wire arraying and indexing. The wire arraying and indexing is controlled by stepping motor, winding is controlled by frequency inverter and AC motor, the precision of turn No. is 0.1turn.





技术参数 Specification:

- 飞叉回转直径 / Flyer swing diameter: 200mm
  (特殊可定制 can be customized if special)
- 排线轴行程 / Displacement of wire arraying spindle: 130mm
- 适用线径 / Wire diameter: 0.1-0.7mm
- 主机外形 / Dimension: 1500×800×1600mm (LXWXH)
- 总重量 / Weight: 300KG
- 电压 / Voltage：单相 Single phase AC220V/50Hz
- 功率 / Power：1.1KW
- 绕线转速 / Winding speed： 0-2000rpm
- 气源 / Air pressure：0.4 ～ 0.7MPa

ND-RSI01 外转子插纸机

ND-RSI01 Rotor Paper Inserting Machine

设备简介 Introduction:

主要用于外转子插纸，适用于吊扇电机，轮毂电机，各种无刷电机。设备有远程诊断功能。

used for external rotor paper inserting, suitable for ceiling fan motor, wheel motor and varies type of brushless motor. Machine has remote diagnosis function.





技术参数 Specification:

- 定子外径 / Stator O.D：80-200mm
- 定子叠厚 / Stack length：18-35mm
- 绝缘纸厚度 / Paper thickness：0.188-0.35mm
- 电压 / Voltage：220V, 50/60 Hz
- 设备重量 / Weight：350kg
- 尺寸 / Dimension：500×550×1500mm
- 工位数 / Station qty：双工位 double

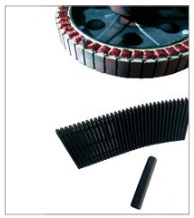
ND-RWI01 外转子插片机

ND-RWI01 Rotor Wedge Inserting machine

设备简介 Introduction:

本机采用伺服驱动分度转位，以气动方式完成自动送料、自动插片。工作频率可无级变速，整机无明显振动，噪音。人机界面可以设定定子槽数、插片槽数、插片用完后会自动报警提示。设备有远程诊断功能。

Indexing automatically driven by servo system, wedge feeding and inserting pneumatically. The working frequency is infinitely variable speed. The slot number and wedge inserting slot can be set in the HMI. After wedge is finished, machine will auto alarm. Machine has remote diagnosis function.





技术参数 Specification:

- 定子直径 / Stator O.D：150~200mm
- 定子叠厚 / Stack length：18~35mm
- 槽楔厚度 / Wedge thickness：3.5~6mm
- 电源 / Voltage：220V 50/60Hz, 0.6KW
- 总功率 / Power: 2.3KW
- 设备重量 / Weight：350Kg
- 尺寸 / Dimension：1650×450×1500mm(L×W×H)

无刷电机定子全自动生产线（ND-AB01）

Fully Automatic BLDC motor stator production line

设备简介 Introduction:

此自动定子生产线适用于无刷电机定子的制造。
线体上可以接入多款设备，主要包括插纸机，插端板机，三针式绕线机，定子端子压装机，电性能检测机以及追溯系统组成。整线由全自动单机设备配合皮带流水线组成，操作工补充原材料，设备自动完成各工序的加工，工件自动被移至下一工序。工艺参数可在触摸屏上存储并可随时调用。各工位可与追溯系统进行信息交流，方便产品数据的调用以及存储。高智能化，自动化程度高，效率高，精度高，低噪音。

This production line is suitable for brushless motor stator production.
It consists of paper inserting machine, end insulation board inserting machine, needle winding machine, stator tester, tracing system and belt conveyor. Operator fill material, each process is completed automatically, automatically transfer the stator to next process. The processing parameter can be set and saved on HMI, and can be called out at any time. It features High intelligent, high automation, high efficiency and low noise.

技术参数 Specification:

- 定子外径 / Stator OD：50-150mm
- 定子内径 / Stator ID：30-90mm
- 铁芯叠厚 / Stack length：20-60mm
- 绕线速度 / Winding speed：Max.1000RPM
- 线径 / Wire dia.：0.25-1.1mm
- 输入电压 / Voltage：220V±10%，交流 (50Hz/60Hz)/380V±10% 220V±10%，AC(50Hz/60Hz)/380V±10%
- 工作气压 / Air pressure：0.5-0.7Mpa
- 绕线方式 / Winding method：针式绕线 needle winding



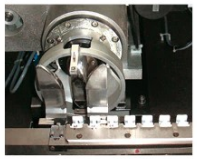
ND-SSW01 直条绕线机

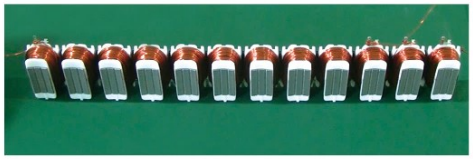
ND-SSW01 Linear Stator winding machine

设备简介 Introduction:

本机型专为直条式定子绕线而设计，整机采用伺服电机控制系统实现产品绕制。人机界面可设定自动绕线、自动跨槽、自动抽头，自动排线，绕线速度等参数设定；操作简单，生产效率高等特点。设备有远程诊断功能。

The machine is suitable for linear/segment stator winding machine, servo motor control the winding. It can achieve auto winding, auto wire acrossing, auto tapping, auto wire arraying, the winding speed can be set on the HMI. It features easy operation and high efficiency. Machine has remote diagnosis function.







技术参数 Specification:

- 轴数 / Spindle No.：4 轴 4 spindles
- 额定绕线速度 / Rated Winding speed：0-1000 R.P.M
- 定子叠厚 / Stator stack length：6-47mm
- 线径 / Wire dia.：0.5-1.0mm
- 电压 / Voltage：380V 50/60Hz
- 尺寸 / Dimension：1000×1300×1500mm
- 设备重量 / Weight：≈ 400kg

ND-SLR01 三针直条外绕机

ND-SLR01 Linear Stator Winding Machine with Three Needles

设备简介 Introduction:

主要用于直条定子绕线，采用三线嘴针式绕线。每次动作循环将绕制 1 个定子，人工上料，自动夹紧模具，减少人工劳动强度；绕线过程可实现多次抽头（屏幕设定）、夹线，剪线功能。槽数，圈数均可通过人机界面设定。

The machine is suitable for linear/segment stator winding, adopts needle winding with three needles. It winds 1pc stator one time, manually loading/unloading, automatic clamping fixture. During winding, it can achieve multi tapping(set on the HMI), wire clamping, wire cutting. The slot No. and turn No. can be set on HMI.



技术参数 Specification:

- 尺寸 / Dimension：1100×850×1600(L×W×H)
  不包括线架 (exclude the wire tensioner dimension)
- 重量 /Weight：500KG
- 伺服机构 / Servo mechanism： 3KW 带刹车绕线电机 1 台，750W 左右及排线电机 2 台
  1pc 3KW winding motor with brake,
  2pcs 750W left-right and wire arraying motor
- 电源 / Voltage：380V/50HZ 三相四线
  380V/50Hz three phase four wires
- 定子尺寸范围 / Stator dimension：
  10-80mm（高度）60-300mm(长度)
  10-80mm(stack height) 60-300mm(length)
- 转速范围 / Speed range：0-500 RPM 可调
  0-500RPM adjustable
- 压缩空气气压 / Air pressure：0.5-1MPa
- 适应线径 / Wire dia.: ϕ0.2-ϕ1.5mm
  (其它规格可特殊设计 can be customized if special)
  适用极数 / Pole No.：多极 multi poles
- 总功率 / Power： 20KW

ND- RWD01 单工位无轴点焊机

ND-RWD01 Single Station Spot Welding Machine

设备简介 Introduction:

无轴转子漆包线和导电片焊接专用设备，机械式初定位铁芯，转子大小可调，品牌焊接电源，可设定多种规格产品所需参数。点焊机的点焊头由气缸带动做上下运动，分度由伺服控制，可通过触摸屏方便快速调整焊接参数。精密电阻焊接无耗材，无需焊条、焊丝和焊剂等。

专用冷水机：高效冷却循环系统保证了焊接电源及变压器能长期处于常温下连续稳定工作。焊接时启动吹气系统，将烟雾吹至排风口，由工业排风扇排出。

The machine is used for welding the wire and terminal of No-shaft rotor, mechanical preliminary positioning the rotor core, the machine can be adjusted for different dimension rotor, good quality welding source, the welding parameter can be set. Welding head is driven by cylinder to move up and down, servo driven indexing. It adapts Precision resistance welding, no consumption parts, no need welding strip, welding wire and solder,etc.

Adapts special water cooling machine, high efficiency cooling circulation system ensures welding power source and transformer can continuously work under normal temperature. During welding, it has blowing system to discharge the smog to the exhaust outlet and be discharged by the exhaust fan.



技术参数 Specification:

- 转子外径 / Rotor dia.：50-160mm
- 转子叠厚 / Stack length：10-80 mm
  (特殊可定制 Can be customized if special)
- 线径范围 / Wire dia.：0.38-1.5mm
- 焊接效率 / Welding efficiency：15 秒 / 件 15sec/pc
- 焊接位移变形量 / Welding displacement deformation：0.1 ～ 0.8mm 可设定及可控 adjustable and controllable within 0.1 ～ 0.8mm
- 焊接电阻 / Welding resistance：≤ 0.02 毫欧≤ 0.02milli-ohm 冷却循环系统，流水速度≥ 1000mL/min，水温控制在 25℃～ 30℃之间
  Cooling circulation system, flow velocity ≥ 1000mL/min, water temperature can be controlled within 25℃～ 30℃
- 主机外形 / Dimension：1000X1200X1600（LXWXH）
- 输入电压 / Voltage：三相 AC380V±10% 50/60HZ
  Three phase AC380V±10% 50/60HZ
- 输入功率 / Power：20KW

