

The logo features the word "JINGPENG" in a bold, italicized, sans-serif font. The text is contained within a black, horizontal, curved shape that resembles a stylized swoosh or a partial orbit, with the top edge being thicker than the bottom edge.

**JINGPENG**

**精 鹏 数 控**

**母线加工设备创新领导者**

**BUSBAR PROCESSING  
EQUIPMENT INNOVATION LEADER**

以人为本  
诚信为基  
技艺为先  
制造精良  
追求卓越





## Enterprise purpose 企业宗旨



- 核心价值观  
创造价值、造福社会
- 发展理念  
信以发志、与时俱进、快速发展
- 经营理念  
领先科技、精益制造、品牌经营、创新发展
- 企业精神  
勤奋敬业、无私奉献、团结和谐
- 市场理念  
市场是海、质量是船、品牌是帆
- 创新理念  
产品创新、超越竞争

## 企业简介 Company Profile

济南精鹏数控设备有限公司是一家致力于电工设备和数控钣金设备开发和生产的科技型企业。公司具有先进的管理经验、雄厚的技术力量和强大的销售网络。公司主要产品在国内外同行业处于领先水平。本公司生产设备精良、工艺先进、合理、技术力量雄厚。在市场经营中，我们始终追求一流技术、一流产品、一流服务的目标。在不断革新中求发展。本公司的最大特点是充分利用自身的技术实力，在所有项目中最大限度地满足用户需求。

精鹏公司为客户提供400热线咨询服务、终身设备维护。目前已拥有3000多家国内外用户。在国内主业蓬勃发展的同时，公司在进出口贸易领域也有可喜建树拥有自主进出口权。产品远销世界各地。目前出口国有韩国、马来西亚、新加坡、南非、巴西、俄罗斯、泰国、越南、巴基斯坦。产品质量可靠、售后服务及时、深受客户信赖。产品广泛应用于高低压开关柜、变电站、变压器、电器开关、通讯设备、家用电器、船舶制造、办公自动化设备、电梯制造、机箱机柜制造等行业。主要产品有数控母线加工机、转塔式母线加工机、多工位母线加工机、数控母线冲剪线、便携式母线加工机、母线校平机、导轨切割机等等。铝排加工专用设备和变压器加工设备等。

“市场是海、质量是船、品牌是帆”是我们的市场理念。严格的质量控制体系和完善的售后服务队伍为我们的产品走向市场创造了良好的条件。

Jinan Jingpeng CNC machinery Co.,Ltd. is a technology company, specializing in the developing, production, selling of electrical & CNC metalplate machines. We have much advanced management experience, strong technology and large selling networks. Our products rank the leading place in the industry. Our manufacturing machines are excellent, technology is advanced, reasonable, and strong. We pursue in first-class technology first-class product, first-class service, and grow by constant innovations. Our advantage is try our best to meet users' requirement.

Jinan Jingpeng CNC machinery Co.,Ltd. offer users 400-0909-687 consultant hotline and lifelong maintenance. Now, we have more than 3000 users home and abroad. When our products are welcomed in China, we also take a big leap at international market. We get an import & export license of Independent import and export right. Our products are sold to many places in the world, such as Korea, Malaysia, Singapore, South Africa, Brazil, Russia, Thailand, Vietnam, Pakistan. Our products have reliable quality with on time after-sales and very welcomed by foreign users.

Our products are widely used in the following industries, such as high-low voltage switchgear, electric transformer station, voltage transformer, appliance switch, communication equipment, home appliance, ship manufacturing, office automation machine, electric elevator manufacturing, electric cabinet manufacturing, etc. Main products include CNC busbar processing machine, Turret busbar processing machine, Multi-station busbar processing machine, CNC busbar processing machine, CNC busbar punching line, portable busbar processing machine, busbar levelling machine, guide-rail cutting machine, copper/aluminum processing machine, and voltage transformer processing machine, etc..

Our market belief is that Market is a sea Quality is a boat Brand is a sail. Strict quality control system and perfect after-sale team are contributed to selling on the market home and abroad.



## CNC-502-6G 数控母线冲剪机

Cnc busbar punching and shearing machine



### 产品说明 Product description

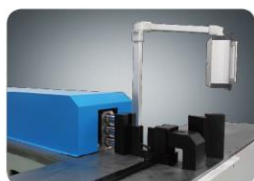
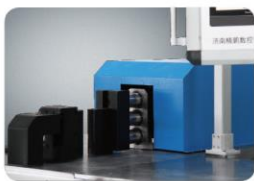
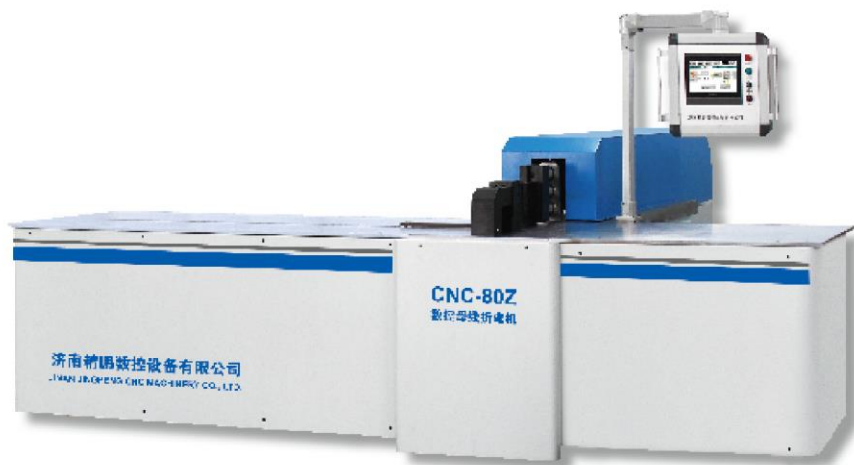
数控母线冲剪生产线是一种将自动送料、自动冲剪、自动更换模具完美地组合在一起。由计算机控制的高效率、高精度的母线排加工专用设备，能完成冲孔（圆孔、长圆孔、异形孔等）剪断、压花、开槽、切圆角等各种加工工艺。针对较长的铜排可实现自动倒换夹钳，无需人工干预，工件加工完成后输送带自动送出，广泛应用于高低压开关柜、变压器制造业、箱式变电站、母线槽等行业。

CNC busbar punching and shearing line is a perfect combined processing line with automatic feeding, automatic punching shearing, automatic replacing dies. It is a high efficiency and high accuracy busbar processing machine controlled by computer. This machine can make hole punching (round hole, oval hole and alien hole etc) cutting, embossing, slotting and cutting fillets etc. When bending long busbars, the machine can exchange the clamp automatically. Do not need manual intervention. The busbars will be delivered out automatically by the convey. It is widely used on high low voltage switchgear, electric transformer manufacturing, power station and busbar industries.

### 详细参数 Detailed parameters

项目 Item	单位 Unit	型号 Model		
		CNC-502-6G	CNC-802-6G	
加工参数 Processed parameter	冲孔模位 Number of punching die	set	5	5
	剪刀模位 Number of shearing die	set	1	1
	母线最大剪切尺寸 Max. Shearing size	mm	125 × 12	200 × 16
	母线最大加工长度 Max. processing length	mm	6000	6000
	最大冲孔直径 Max punching diameter	mm	φ25	φ34
液压部分 Hydraulic part	主油缸最大公称压力 Nominal Force	kn	500	800
	最大流量 Max flow rate	L/min	19	19
	主电机功率 Motor power	kw	5.5	7.5
	最大流量 Max flow rate	L/min	5	5
	主油缸活塞最大行程 Max stroke of cylinder	mm	50	50
	主油缸最大冲压频率 Max punching frequency	beat/min	60	60
	主夹钳最大行程 Max stroke of main clamp cylinder	mm	140	220
接料部分 Drag & Feeding part	拖料电机功率 Motor power	w	750	750
	拖料夹钳最大行程 Max stroke of main clamp cylinder	mm	2000	2000
	拖料轴最大运行速度 Max speed of drag and feed	m/min	40	40
	拖料轴运行精度 Operation precision	mm	0.1mm/1000mm	0.1mm/1000mm
	换模电机功率 Motor power of die changing axis	w	1000	1000
	换模轴最大行程 Max stroke of die changing axis	mm	550	550
	换模轴最大速度 Max speed of die changing axis	m/min	35	35
	换模轴精度 Precision of die changing axis	mm	0.1mm/300mm	0.1mm/300mm
	冲压缸移动电机功率 Motor power of punch press cylinder	w	750	750
	冲压缸移动最大行程 Max stroke of punch press cylinder	mm	160	240
	冲压缸最大速度 Max speed of punch press cylinder	m/min	35	35
	冲压缸移动精度 Operation precision of punching press cylinder	mm	0.1mm/300mm	0.1mm/300mm
电气部分 Electrical part	电源 Power supply	v	380	380
	总功率 Motor power	kw	10	12
	控制电压 Control voltage	v	24	24
设备尺寸及重量 Measurement and weight	主机外形 Outside dimension	mm	7150 × 2500 × 1780	8550 × 2700 × 1780
	机器重量 Total weight	kg	4200	5200

## 数控母线折弯机 CNC busbar bending machine



### 产品说明 Product description

数控母线折弯机主要针对铜、铝母线进行数控折弯加工。具有加工速度快、精度高等优点。设备由主机、挡料台、伺服动力单元以及电器控制柜组成。本机是一台伺服控制的自动化加工设备，设备通过X轴和Y轴移动的相互配合，人工辅助送料，选用不同的模具，可完成平面折弯、立面折弯等加工功能。本机使用交流伺服传动，平稳可靠、无污染、噪音小、折弯精度高、待机状态下耗电仅仅十几瓦。广泛应用于高低压开关柜、变压器、箱式变电站，以及母线槽等行业的铜铝母线自动化加工。

The cnc busbar bending machine is mainly for bending copper and aluminum busbars with high speed and high bending precision. The machine is composed of mainframe, gauge block, servo power system and control panel board. The machine is servo drive automatic bending equipment. Through the moving of the x-axis and Y-axis, the machine can complete vertical bending, horizontal bending and other functions with the right bending dies. The machine uses AC servo drive, smoothly operated, no pollution, low noise, high bending precision. It consumes only teens watts in standby mode. The bending machine is widely used in high and low voltage switchgear, electrical transformers, substation cabinet and busway industries.

### 详细参数 Detailed parameters

项目 Item	单位 Unit	CNC-50Z	CNC-80Z
公称压力 Nominal force	kn	350	500
最大折弯尺寸 Max size of bending	mm	12 × 160	250 × 16
X轴最大行程 Max stroke of X-axis	mm	1600/2000	1600/2000
X轴精度误差 Precision deviation of X-axis	mm	0.10/1000	0.10/1000
折弯精度 Bending precision	Degree	±0.1°	±0.1°
伺服最大长度 Max. long of hydraulic cylinder	mm	220	220
主机外形 Outside dimension	mm	4200 × 2500 × 1820	4600 × 2700 × 1820
重量 Net weight	kg	2600	3200

## 数控双台面母线加工机 CNC Double Table Busbar Processing Machine



### 产品说明 Product description

本系列母线加工机有冲、剪、折三个单元，每个加工单元的工作行程均可方便地调节，缩短加工时间，提高生产效率。折弯单元采用进口PLC控制，系统稳定、精确度高。本机主要功能为加工不同规格的铜、铝母线，只需用相应的加工单元，就能方便、快捷的对铜、铝排进行剪切、冲孔（圆孔、长圆孔），折平弯、立弯、压花等加工。通过更换模具还可完成压平、扭麻花、压电缆接头，对铜棒进行切断、压扁、冲孔、折弯等特殊加工。

This series CNC busbar processing machine has three units: punching, shearing and bending. It is easily to adjust each unit to shorten the processing time and improve the production efficiency. The bending unit uses the imported PLC control system, which have stable system and high precision. It is used to process copper and aluminum busbars in different specification. By relative operation unit it can easily and quickly do all kinds of processing to copper and aluminum busbar, such as shearing, punching (circular hole and oblong hole), flat/horizontal bending, vertical bending and knurling. Change different mold to do special processing to copper bar, such as flat press, embossing, cable connector process, and can do cutting, flat crushing, pushing, and bending.

### 主要特点 Main characteristics

- ◆ 剪切单元采用通用的推剪式剪切，切口平整无塌角、无毛刺，外型美观，剪切无废料。
- ◆ 冲孔单元采用齿形六模位整体式转盘，保证了上模和下模的绝对对中，提高了模具的同心度，延长了模具的使用寿命。转盘采用齿形结构，视线好强度高。工人无需频繁更换模具，劳动强度大幅降低，使用更加方便快捷，生产效率明显高于传统冲孔单元。
- ◆ 折弯单元采用双层工作台，三个加工单元同时工作互不影响。通过更换模具可完成平弯、立弯的加工。折弯角度数控，进口PLC控制，直接在数控触摸屏输入铜排厚度与角度，也可输入高度与边长直接加工成所需的工件(如Z型弯)，折弯精度 $\pm 1^\circ$ ，重复精度 $\pm 0.3^\circ$ 。用户可事先输入加工数据，系统根据输入的信息调出数据进行加工；可将加工过的工件现场数据随时存入系统，并调出重复使用。
- ◆ 机器上装有四个脚轮，可以很容易地移动到所需地方。有手动按钮和脚踏开关两种操作方式，操作简单，工人可以很容易地使用操作。根据用户要求，可配置不同模具或装具完成用户特殊形状加工。
- ◆ The shearing unit uses sharp shearing, the incision interface is flat, no droop and burrs and waste, beautiful shape.
- ◆ The punching unit uses a united six-mode turnplate in tooth shape to make sure the upper mold and the lower mold are absolutely in the center, improve the mold concentricity and longten the working life. The turnplate is in tooth shape with good view and high strength. No need to frequently change molds, labor intensity is highly reduced. It is easy and quick to use. Producing efficiency is obviously higher than a traditional one.
- ◆ The bending unit uses a double-decker working table, which can make sure that three working positions can do their operations at same time without bothering the others. By Changing different mold it can do flat bending, and verticle bending. CNC controls the bending angle by an imported PLC control system. Input a busbar thickness and an angle on a CNC touching screen, or input a height and a side length to get the result what you need, such as Z bending. Bending precision is  $\pm 1^\circ$ , repeat precision  $\pm 0.3^\circ$ . The user can input processing data in advance, and the system will do the process according to the inputted data. The field data can be put into the system at any time and be paged out for using repeatedly.
- ◆ The machine has four casters so it is easily to be moved everywhere. There are two operating modes, manual button and foot switch, which is easily for worker to operate and use. Based on users' requirement, it can do all kinds of special shape processing with different molds or equipping parts.



### 详细参数 Detailed parameters

功能 Function	项目 Item	型号 Model				
		JPMX-303ESK	JPMX-503ESK	JPMX-803ESK		
冲孔加工 Punching	最大冲力(Kn)	Max. punching force(Kn)	300	500	800	
	冲孔加工范围(mm)	Punching diameter range (mm)	$\phi 4.3 \sim \phi 25$	$\phi 4.3 \sim \phi 34$	$\phi 4.3 \sim \phi 34$	
	最大加工厚度(mm)	Max. thickness (mm)	12	16	20	
	最大加工宽度(mm)	Max. width (mm)	150	200	250	
剪切加工 Shearing/Cutting	最大剪切厚度(mm)	Max. shearing thickness (mm)	12	16	20	
	最大剪切宽度(mm)	Max. shearing width (mm)	150	200	250	
	最大折弯力(Kn)	Max. bending force (Kn)	300	500	800	
平弯加工 Horizontal bending	最大平弯宽度(mm)	Max. width (mm)	150	200	250	
	最大平弯厚度(mm)	Max. thickness (mm)	12	16	20	
	最大立弯宽度(mm)	Max. width (mm)	100	120	120	
立弯加工 Vertical bending	最小立弯角度(Degree)	Min. angle (Degree)	90°	90°	90°	
	外形尺寸	Out dimension	mm	1780 × 1380 × 1420	1850 × 1500 × 1550	1850 × 1500 × 1600
主电机功率	Power	Kw	3 × 4Kw	3 × 5.5 Kw	3 × 5.5 Kw	
机器重量	Weight	Kg	1400Kg	1950Kg	2350Kg	
数控描述	CNC precision	折弯精度(Degree)	Bending precision	$\pm 1^\circ$	$\pm 1^\circ$	$\pm 1^\circ$
		重复折弯精度(Degree)	Repeat bending precision	$\pm 0.3$	$\pm 0.3$	$\pm 0.3$

## 数控单台面母线加工机 CNC Busbar Processing Machine



### 产品说明 Product description

本系列母线加工机有冲、剪、折三个单元，每个加工单元的工作行程均可方便地调节，缩短加工时间，提高生产效率。折弯单元采用进口PLC控制，系统稳定、精确度高。本机主要功能为加工不同规格的铜、铝母线，只需用相应的加工单元，就能方便、快捷的对铜、铝排进行剪切、冲孔（圆孔、长圆孔），折平弯、立弯、压花等加工。通过更换模具还可完成压平、扭麻花、压电缆接头，对铜棒进行切断、压扁、冲孔、折弯等特殊加工。

This series CNC busbar processing machine has three units: punching, shearing and bending. It is easily to adjust each unit to shorten the processing time and improve the production efficiency. The bending unit uses the imported PLC control system, which have stable system and high precision. It is used to process copper and aluminum busbar, such as shearing, punching (circular hole and oblong hole), flat/horizontal bending, vertical bending and knurling. Change different mold to do special processing to copper bar, such as flat press, embossing, cable connector process, and can do cutting, flat crushing, pushing, and bending.

### 主要特点 Main characteristics

- ◆ 剪切单元采用通用的挫剪式剪切，切口平整无塌角、无毛刺，外型美观，剪切无废料。
- ◆ 冲孔单元采用齿形六模位整体式转盘，保证了上模和下模的绝对对中，提高了模具的同轴度，延长了模具的使用寿命。转盘采用齿形结构，视线好强度高。工人无需频繁更换模具，劳动强度大幅降低，使用更加方便快捷，生产效率明显高于传统冲孔单元。
- ◆ 折弯单元采用单层工作台，三个加工单元同时工作互不影响。通过更换模具可完成平弯、立弯的加工。折弯角度数控，进口PLC控制，直接在数控触摸屏输入铜排厚度与角度，也可输入高度与边长直接加工成所需的工件（如Z型弯），折弯精度±1°，重复精度±0.3°。用户可事先输入加工数据，系统根据输入的信息调出数据进行加工；可将加工过的工件现场数据随时存入系统，并调出重复使用。
- ◆ 机器上装有四个脚轮，可以很容易地移动到所需地方。有手动按钮和脚踏开关两种操作方式，操作简单，工人可以很容易地使用操作。根据用户要求，可配置不同模具或装具完成用户特殊形状加工。

◆ The shearing unit uses sharp shearing, the incision interface is flat, no droop and burrs and waste, beautiful shape.

◆ The punching unit uses an united six-mode turnplate in tooth shape to make sure the upper mold and the lower mold are absolutely in the center, improve the mold concentricity and prolong the working life. The turnplate is in tooth shape with good view and high strength. No need to frequently change molds, labor intensity is highly reduced. It is easy and quick to use. Producing efficiency is obviously higher than a traditional one.

◆ The bending unit uses a single-decker working table, which can make sure that three working positions can do their operations at same time without bothering the others. By Changing different mold it can do flat bending, and verticle bending. CNC controls the bending angle by an imported PLC control system. Input a busbar thickness and an angle on a CNC touching screen, or input a height and a side length to get the result what you need, such as Z bending. Bending precision is ±1°, repeat precision ±0.3°. The user can input processing data in advance, and the system will do the process according to the inputted data. The field data can be put into the system at any time and be paged out for using repeatedly.

◆ The machine has four casters so it is easily to be moved everywhere. There are two operating modes, manual button and foot switch, which is easily for worker to operate and use. Based on users' requirement, it can do all kinds of special shape processing with different molds or equipping parts.



### 详细参数 Detailed parameters

功能 Function	项目 Item		型号 Model	
			JPMX-303SK	JPMX-503SK
冲孔加工 Punching	最大冲孔力(Kn)	Max. punching force(Kn)	300	500
	冲孔加工范围(mm)	Punching diameter range (mm)	φ4.3-φ25	φ4.3-φ34
	最大加工厚度(mm)	Max. thickness (mm)	12	16
	最大加工宽度(mm)	Max. width (mm)	150	200
剪切加工 Shearing/Cutting	最大剪切厚度(mm)	Max. shearing thickness (mm)	12	16
	最大剪切宽度(mm)	Max. shearing width (mm)	150	200
	最大折弯力(Kn)	Max. bending force (Kn)	300	500
平弯加工 Horizontal bending	最大平弯宽度(mm)	Max. width (mm)	150	200
	最大平弯厚度(mm)	Max. thickness (mm)	12	16
	最大立弯宽度(mm)	Max. width (mm)	100	120
立弯加工 Vertical bending	最小立弯角度(Degree)	Min. angle (Degree)	90°	90°
	外形尺寸	Out dimension	mm	
主电机功率	Power	Kw		
机器重量	Weight	Kg		
数控描述	CNC precision	折弯精度(Degree)	Bending precision	
		重复折弯精度(Degree)	Repeat bending precision	

## 数控开式母线加工机

Turret Double Table Busbar Processing Machine



### 产品说明 Product description

本系列母线加工机有冲、剪、折三个单元，每个加工单元的工作行程均可方便地调节，缩短加工时间，提高生产效率。主要功能为加工不同规格的铜、铝母线，只需用相应的加工单元，就能方便、快捷的对铜、铝排进行剪切、冲孔（圆孔、长圆孔），折弯、立弯、压花等加工。通过更换模具还可完成压平、扭麻花、压电缆接头，对铜棒进行切断、压扁、冲孔、折弯等特殊加工。

This series CNC busbar processing machine has three units: punching, shearing and bending. It is easily to adjust each unit to shorten the processing time and improve the production efficiency. It is used to process copper and aluminum busbars in different specification. By relative operation unit It can easily and quickly do all kinds of processing to copper and aluminum busbar, such as shearing, punching (circular hole and oblong hole), flat/horizontal bending, vertical bending and knurling. Change different mold to do special processing to copper bar, such as flat press, embossing, cable connector process, and can do cutting, flat crushing, pushing, and bending.

### 主要特点 Main characteristics

- ◆ 剪切单元采用通用的挫剪式剪切，切口平整无塌角、无毛刺，外型美观，剪切无废料。
- ◆ 冲孔单元采用齿形六模位整体式转盘，保证了上模和下模的绝对对中，提高了模具的同心度，延长了模具的使用寿命。转盘采用齿形结构，视线好强度高。工人无需频繁更换模具，劳动强度大幅降低，使用更加方便快捷，生产效率明显高于传统冲孔单元。
- ◆ 折弯单元采用双层工作面，实现了真正意义上三工位同时工作互不影响。折弯工位采用开式折弯结构，拿取铜排更方便快捷。
- ◆ 机器上装有四个脚轮，可以很容易地移动到所需地方。有手动按钮和脚踏开关两种操作方式，操作简单，工人可以很容易地使用操作。根据用户要求，可配置不同模具或夹具完成用户特殊形状加工。

- ◆ The shearing unit uses sharp shearing, the incision interface is flat, no droop and burrs and waste, beautiful shape.
- ◆ The punching unit uses an united six-mode turnplate in tooth shape to make sure the upper mold and the lower mold are absolutely in the center, improve the mold concentricity and longten the working life. The turnplate is in tooth shape with good view and high strength. No need to frequently change molds, labor intensity is highly reduced. It is easy and quick to use. Producing efficiency is obviously higher than a traditional one.
- ◆ The bending station is a double deck worktable, which insures the three work stations be operated at the same time without any interference. The bending station adopt open structure, very convinient to pick out the processed copper busbar.
- ◆ The machine has four casters so it is easily to be moved everywhere There are two operating modes, manual button and foot switch, which is easily for worker to operate and use. Based on users' s requirement, it can do all kinds of special shape processing with different molds or equipping parts.



### 详细参数 Detailed parameters

功能 Function	项目 Item		型号 Model	
			JPMX-303A	JPMX-503A
冲孔加工 Punching	最大冲孔力(Kn)	Max. punching force(Kn)	300	500
	冲孔加工范围(mm)	Punching diameter range (mm)	φ4.3~ φ25	φ4.3~ φ34
	最大加工厚度(mm)	Max. thickness (mm)	12	16
	最大加工宽度(mm)	Max. width (mm)	150	200
剪切加工 Shearing/Cutting	最大剪切厚度(mm)	Max. shearing thickness (mm)	12	16
	最大剪切宽度(mm)	Max. shearing width (mm)	150	200
	最大折弯力(Kn)	Max. bending force (Kn)	300	500
平弯加工 Horizontal bending	最大平弯宽度(mm)	Max. width (mm)	150	200
	最大平弯厚度(mm)	Max. thickness (mm)	12	16
	最大立弯宽度(mm)	Max. width (mm)	100	120
立弯加工 Vertical bending	最小立弯角度(Degree)	Min. angle (Degree)	90°	90°
	外形尺寸	Out dimension	mm	
主机功率	Power	Kw	1780 × 1380 × 1420	1850 × 1500 × 1550
机器重量	Weight	Kg	3 × 4Kw	3 × 5.5 Kw
数控描述	CNC precision	折弯精度(Degree)	Bending precision	±1°
		重复折弯精度(Degree)	Repeat bending precision	±0.3



## 转塔式母线加工机 Turret Busbar Processing Machine



### 产品说明 Product description

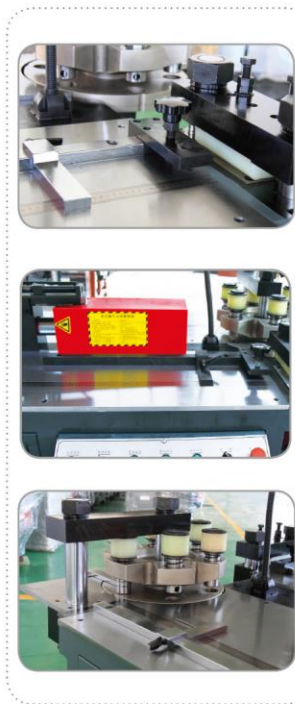
本系列母线加工机有冲、剪、折三个单元，每个加工单元的工作行程均可方便地调节，缩短加工时间，提高生产效率。主要功能为加工不同规格的铜、铝母线，只需用相应的加工单元，就能方便、快捷的对铜、铝排进行剪切、冲孔（圆孔、长圆孔），折弯、立弯、压花等加工。通过更换模具还可完成压平、扭麻花、压电缆接头，对铜棒进行切断、压扁、冲孔、折弯等特殊加工。

This series CNC busbar processing machine has three units: punching, shearing and bending. It is easily to adjust each unit to shorten the processing time and improve the production efficiency. It is used to process copper and aluminum busbars in different specification. By relative operation unit it can easily and quickly do all kinds of processing to copper and aluminum busbar, such as shearing, punching (circular hole and oblong hole), flat/horizontal bending, vertical bending and knurling. Change different mold to do special processing to copper bar, such as flat press, embossing, cable connector process, and can do cutting, flat crushing, pushing, and bending.

### 主要特点 Main characteristics

- ◆ 剪切单元采用通用的搓剪式剪切，切口平整无塌角、无毛刺，外型美观，剪切无废料。
- ◆ 冲孔单元采用齿形六模位整体式转盘，保证了上模和下模的绝对对中，提高了模具的同心度，延长了模具的使用寿命。转盘采用齿形结构，视线好强度高。工人无需频繁更换模具，劳动强度大幅降低，使用更加方便快捷，生产效率明显高于传统冲孔单元。
- ◆ 折弯单元采用封闭式整体框架结构，使其在加工平弯及压花时更均匀，大大提高了批量生产时的重复定位精度，并延长了使用寿命。折弯单元采用卧式加工，在加工时更安全方便。
- ◆ DM型可以三人同时工作，互不影响，工作效率明显提高；CM型只能一人顺序工作。
- ◆ 机器上装有四个脚轮，可以很容易地移动到所需地方。有手动按钮和脚踏开关两种操作方式，操作简单，工人可以很容易地使用操作。根据用户要求，可配置不同模具或夹具完成用户特殊形状加工。

- ◆ The shearing unit uses sharp shearing, the incision interface is flat, no droop and burrs and waste, beautiful shape.
- ◆ The punching unit uses a united six-mode turnplate in tooth shape to make sure the upper mold and the lower mold are absolutely in the center, improve the mold concentricity and prolong the working life. The turnplate is in tooth shape with good view and high strength. No need to frequently change molds, labor intensity is highly reduced. It is easy and quick to use. Producing efficiency is obviously higher than a traditional one.
- ◆ The unit uses a closed structure to make sure the flat bending and embossing more smooth, which highly improves the repeating precision during mass production and prolong the working time. The bending unit is a horizontally operating type and it is very easy to operate.
- ◆ DM series allow that three working positions can do their only operation at same time without bothering the others. Working efficiency is highly raised. CM series only allow one person to operate.
- ◆ The machine has four casters so it is easily to be moved everywhere. There are two operating modes, manual button and foot switch button, which is easily for worker to operate and use. Based on users' requirement, it can do all kinds of special shape processing with different molds or equipping parts.



### 详细参数 Detailed parameters

功能 Function	项目 Item		型号 Model		
			JPMX-303CM	JPMX-303DM	JPMX-503DM
冲孔加工 Punching	最大冲孔力(Kn)	Max. punching force(Kn)	300	300	500
	冲孔加工范围(mm)	Punching diameter range (mm)	φ4.3~φ25	φ4.3~φ25	φ4.3~φ34
	最大加工厚度(mm)	Max. thickness (mm)	12	12	16
	最大加工宽度(mm)	Max. width (mm)	150	150	200
剪切加工 Shearing/Cutting	最大剪切厚度(mm)	Max. shearing thickness (mm)	12	12	16
	最大剪切宽度(mm)	Max. shearing width (mm)	150	150	200
	最大折弯力(Kn)	Max. bending force (Kn)	300	300	500
	最大平弯宽度(mm)	Max. width (mm)	150	150	200
平弯加工 Horizontal bending	最大平弯厚度(mm)	Max. thickness (mm)	12	12	16
	最大立弯宽度(mm)	Max. width (mm)	100(10mm THM)	100(10mm THM)	120 (10mm THM)
	最小立弯角度(Degree)	Min. angle (Degree)	90°	90°	90°
外形尺寸	Out dimension	mm	1500×1300×1200	1500×1300×1200	1800×1500×1300
主电机功率	Power	Kw	1×4Kw	3×4Kw	3×5.5Kw
机器重量	Weight	Kg	1150Kg	1250Kg	1850Kg

## 摆臂式母线加工机 Multi-station Busbar Processing Machine



### 产品说明 Product description

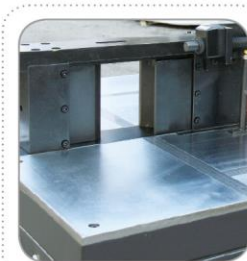
本系列母线加工机有冲、剪、折三个单元，每个加工单元的工作行程均可方便地调节，缩短加工时间，提高生产效率。主要功能为加工不同规格的铜、铝母线，只需用相应的加工单元，就能方便、快捷的对铜、铝排进行剪切、冲孔（圆孔、长圆孔），折平弯、立弯、压花等加工。通过更换模具还可完成压平、扭麻花、压电缆接头，对铜棒进行切断、压扁、冲孔、折弯等特殊加工。

This series CNC busbar processing machine has three units: punching, shearing and bending. It is easily to adjust each unit to shorten the processing time and improve the production efficiency. It is used to process copper and aluminum busbars in different specification. By relative operation unit it can easily and quickly do all kinds of processing to copper and aluminum busbar, such as shearing, punching (circular hole and oblong hole), flat/horizontal bending, vertical bending and knurling. Change different mold to do special processing to copper bar, such as flat press, embossing, cable connector process, and can do cutting, flat crushing, pushing, and bending.

### 主要特点 Main characteristics

- ◆ 剪切单元采用通用的搓剪式剪切，切口平整无塌角、无毛刺，外型美观，剪切无废料。
- ◆ 冲孔单元为方形整体式结构，视线好强度高。模具及模具架采用双向定位，保证了上模和下模的绝对对中，提高了模具的同轴度，延长了模具的使用寿命。
- ◆ 折弯单元采用封闭式整体框架结构，使其在加工平弯及压花时更均匀，大大提高了批量生产时的重复定位精度，并延长了使用寿命。折弯单元采用卧式加工，在加工时更安全方便。
- ◆ D型可以三人同时工作，互不影响，工作效率明显提高；C型只能一人顺序工作。
- ◆ 机器上装有四个脚轮，可以很容易地移动到所需地方。有手动按钮和脚踏开关两种操作方式，操作简单，工人可以很容易地使用操作。根据用户要求，可配置不同模具或装具完成用户特殊形状加工。

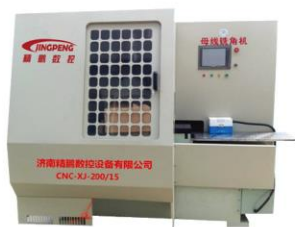
- ◆ The shearing unit uses sharp shearing, the incision interface is flat, no droop and burrs and waste, beautiful shape.
- ◆ The punching unit uses an united six-mode turnplate in tooth shape to make sure the upper mold and the lower mold are absolutely in the center, improve the mold concentricity and prolong the working life. The turnplate is in tooth shape with good view and high strength. No need to frequently change molds, labor intensity is highly reduced. It is easy and quick to use. Producing efficiency is obviously higher than a traditional one.
- ◆ The unit uses a closed structure to make sure the flat bending and embossing more smooth, which highly improves the repeating precision during mass production and prolong the working time. The bending unit is a horizontally operating type and it is very easy to operate.
- ◆ D series allow that three working positions can do their only operation at same time without bothering the others. Working efficiency is highly raised. C series only allow one person to operate.
- ◆ The machine has four casters so it is easily to be moved everywhere. There are two operating modes, manual button and foot switch, which is easily for worker to operate and use. Based on users' requirement, it can do all kinds of special shape processing with different molds or equipping parts.



### 详细参数 Detailed parameters

功能 Function	项目 Item		型号 Model		
			JPMX-303C	JPMX-303D	JPMX-503D
冲孔加工 Punching	最大冲力(Kn)	Max. punching force(Kn)	300	300	500
	冲孔加工范围(mm)	Punching diameter range (mm)	φ4.3~φ25	φ4.3~φ25	φ4.3~φ34
	最大加工厚度(mm)	Max. thickness (mm)	12	12	16
	最大加工宽度(mm)	Max. width (mm)	150	150	200
剪切加工 Shearing/Cutting	最大剪切厚度(mm)	Max. shearing thickness (mm)	12	12	16
	最大剪切宽度(mm)	Max. shearing width (mm)	150	150	200
	最大折弯力(Kn)	Max. bending force (Kn)	300	300	500
	最大平弯宽度(mm)	Max. width (mm)	150	150	200
平弯加工 Horizontal bending	最大平弯厚度(mm)	Max. thickness (mm)	12	12	16
	最大立弯宽度(mm)	Max. width (mm)	100(10mm厚)	100(10mm厚)	120 (10mm厚)
	最小立弯角度(Degree)	Min. angle (Degree)	90°	90°	90°
外形尺寸 Out dimension	mm	1500×1300×1200	1500×1300×1200	1800×1500×1300	
主电机功率 Power	Kw	1×4Kw	3×4Kw	3×5.5Kw	
机器重量 Weight	Kg	1050Kg	1200Kg	1750Kg	

## 数控母线铣角机 CNC busbar chamfering machine



### 产品说明 Product description

数控母线铣角机CNC-XJ-200/15是一种将自动定位、自动夹紧、自动铣角等动作完美地组合在一起的自动化程度较高、定位准确、使用方便的高可靠、高性能的母线加工设备。该设备广泛应用于电气开关柜和输变电行业的铜、铝母线的铣圆角、倒圆弧角，避免直角铜、铝母线易产生的尖端放电。

主要特点：

- ◆ 本机能对各种常见的母线排倒角进行自动加工；
- ◆ 夹具采用自动对中技术，能够始终将压头对准在母线排的中心线上；
- ◆ 压头板采用四轴定位，保证铣削过程中母线排与压头结合稳定，铣削效果更好；
- ◆ 采用国际统一标准的BT40刀柄，换刀简单，刚性好，铣削精度高；
- ◆ X、Y轴采用大功率松下交流伺服电机驱动，台湾上银滚珠丝杠和直线导轨传动，低噪音、低振动。

CNC busbar chamfering machine (CNC-XJ-200/15) makes a good combination of automatic positioning, automatic clamping and automatic chamfering. This is a high automatic busbar chamfering equipment with high precision positioning, high convenient and high performance. This machine is widely used in electrical switchgear, transformers, power transmission industries copper, aluminum busbar chamfering or milling, avoiding the discharging of the rectangular copper / aluminum busbar.

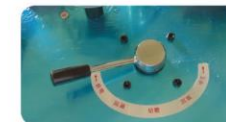
Main Character:

- ◆ This busbar chamfering machine can make automatic arc processing for various common busbar.
- ◆ The automatic alignment technology makes the jig always align the center line of the busbar indenter.
- ◆ The indenter plate adopt 4-axis positioning, which insures the good combination of the busbar and the indenter, make the best chamfering effect.
- ◆ Adopt international standard BT40 tool holders, easy to change, good rigid, high accuracy.
- ◆ X, Y axis are driven by high power Panasonic AC servo motor and conveyed by Taiwan HIWIN ball screw and linear guide transmission, low noise and low vibration.

### 详细参数 Detailed parameters

项目 Item	单位 Unit	参数 Parameter
切削部分 Cutting Section	主轴转速 Spindle speed	R/min 88-1256(七级调速 adjustable)
	电机功率 Motor Power	kW 4
	刀柄型号 Handle Model	BT40
进给部分 Feeding Section	X轴行程 Stroke of X-axis	mm 250
	Y轴行程 Stroke of Y-axis	mm 350
	伺服电机 Servo Motor	kW 2 × 1.5
	工进速度 Feeding Speed	mm/min 1200
刀具参数 Knife Parameter (直径 Diameter)	mm 100	
板材最小允许长度 Min Allowable Length of Plate	mm 280	
最大允许板材 Max Allowable Plate(宽*厚Width * Thickness)	mm 200 × 15	
最小允许板材 Min Allowable Plate(宽*厚Width*Thickness)	mm 30 × 3	
气源压力 Air Pressure	Mpa 0.5-0.9	
液压压力 Hydraulic Pressure	KN 300	
电源总功率 Voltage Total Power	kW 12	
主机外形尺寸 Outside Dimension	mm 2550 × 2050	
总重量 Total Weight	kg 2450	

## 组合式母线加工机 Combined Busbar Processing Machine



### 产品说明 Product description

本机参照国外先进产品，结合国内实际情况，为提高工作效率，节省工作时间，而设计制造。适合在车间及输配电工作的现场施工及配电柜和开关柜等电器制造厂使用。本机有切断、冲孔、平弯等功能。

Based on the most advanced foreign products and Chinese reality, it is designed to improve working efficiency and save some time. It is for PTD (power transmission and distribution) and workshop field operation and electric equipment manufacturing such as power distribution cabinet and switch cabinet. The machine has some functions, such as shearing, punching, horizontal punching, etc.

### 详细参数 Detailed parameters

项目 Item	参数 Parameter
	JPMX-301
加工工件 Workpiece	铜铝排、母线 copper/ aluminum bar, busbar
输入电压 Input voltage	220V
额定油压 Rated oil pressure	630Kn
最大剪切尺寸 Max. cut size	150 × 10mm
最大冲孔尺寸 Max. punch size	150 × 10mm
最大折弯尺寸 Max. bend size	150 × 10mm
工作台面尺寸 Table size	700(L) × 700(W) × 1000(H)mm
标准冲孔模具尺寸 Diameter of standard dies	10.5mm
	13.8mm
	17mm
	20.5mm
机器重量 Machine weight	190Kg

## 液压切断机 Hydraulic Cutting Machine



### 产品说明 Product description

本机是切断铜、铝排的专用加工机具，切断速度快，断面平整不变形，单边切断无废料，适用于现场或固定于工厂内进行铜铝排的切断加工。可选配手动泵、脚踏泵、电动泵使用。

It is a specialized machine for cutting copper and aluminium busbar, cutting speed fast, flat and non-deforming cutting interface, no waste after side cutting. It is used to cut copper and aluminium busbar at field operation or factory. Hand pump, foot pump and electric motor are all optional.

### 详细参数 Detailed parameters

型号	出力(T)	宽度(mm)	厚度(mm)	尺寸(mm)	重量(Kg)
CWC-150	15	150	10	410×275×180	26
CWC-200	20	200	12	430×340×200	35

## 液压冲孔机 Hydraulic Punching Machine



### 产品说明 Product description

本机是母线安装时冲孔的专用加工机具，适用于高空作业，速度快、无毛刺。定位准确、打孔精度不偏移。可选配手动泵、脚踏泵、电动泵使用。

It is a specialized machine for punching busbar and used for working aloft, cutting speed fast, no burr, precise location, no deviation in punching precision. Hand pump, foot pump and electric motor are all optional.

### 详细参数 Detailed parameters

型号	板厚(mm)	出力(T)	喉深(mm)	重量(Kg)	模具配置
CH-60	10	31	95	13.5	φ10.5、φ13.8、φ17、φ20.5
CH-70	12	35	115	28	φ10.5、φ13.8、φ17、φ20.5

## 液压弯排机 Hydraulic Bending Machine



### 产品说明 Product description

本机是对铜、铝母线进行平弯加工的专用机具。CB-150D可掀式，当弯曲长条铜排时，N型或L型可以将卡栓拔出，整条排拿出不受阻碍。

It is a specialized machine for horizontal/level bending the copper and aluminium busbar. CB-150D is a flip-open type. When bend copper busbar to a N or L shape, location pin can be pulled out and the mold is open up, it is easy to get out of the shaped busbar.

### 详细参数 Detailed parameters

型号	板宽(mm)	板厚(mm)	出力(T)	重量(Kg)
CB-150D	150	10	16	17.5
CB-200A	200	12	20	24

## 液压手动泵 Hydraulic Hand Pump



CP-700

### 产品说明 Product description

液压手动泵 Hydraulic hand pump

- ◆ 本泵是野外作业的最佳选择，无需电力供应，操作方便
- ◆ 手持操作方式，油管可以定购加长
- ◆ 压力可以保持中间停止，内部设计高压安全保护液压阀
- ◆ 该泵给其他液压工具配合提供压力保障
- ◆ It is a best option for field operation. Need no power, easy to use.
- ◆ Hand-operated type, oil tube length be ordered at any length.
- ◆ It is designed with a hydraulic valve of high pressure safety.
- ◆ It can be a pressure resource along with other hydraulic tools.

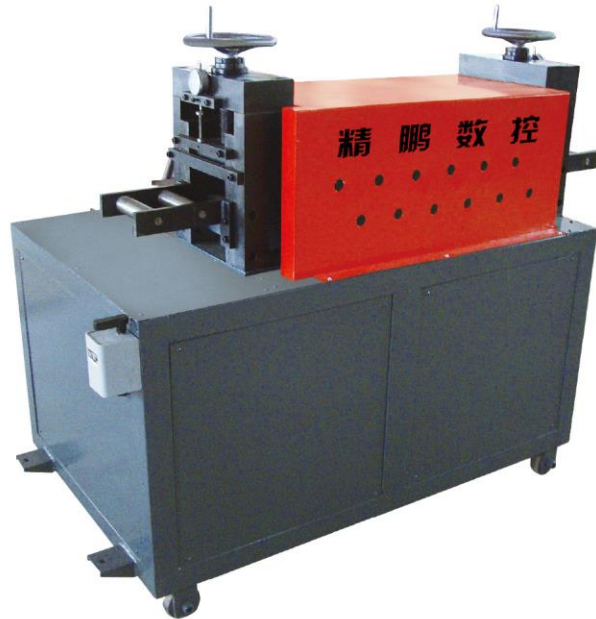
液压电动泵 Electric hydraulic pump

- ◆ 220V 电动液压泵
- ◆ 电磁阀控制，可在任何位置退回活塞
- ◆ 高低压两段出油量快，涡轮叶式吸油可达最高有效油量
- ◆ 压力安全阀过载保护装置避免超载破坏或过度紧迫 700kg/cm<sup>2</sup> 时自动泄压。
- ◆ 高压为推动活塞，低压为使活塞还原(CTE-25AD)
- ◆ 油管可以任意加长、附快速接头
- ◆ 油管接头配 PT3/8" 牙
- ◆ 220V hydraulic electric pump
- ◆ Electromagnetic valve control, to withdraw piston in any position
- ◆ High and low speed, two stages for quick oil output. Turbine oil absorption to ensure max. effective oil volume.
- ◆ Pressure safety valve overpressure unit to avoid over pressure damage or extremely pressured. At 700kg/cm<sup>2</sup>, automatically pressure release.
- ◆ High pressure is for driving piston and low pressure is for piston reset(CTE-25AD).
- ◆ Oil pipe fitted with quick coupling can be ordered at any length.
- ◆ Oil pipe coupling fitted with PT3/8" thread.

### 详细参数 Detailed parameters

型号	Model	HB-700A	CP-700
类型	Type	脚踏	手压
额定压力(Mpa)	Rated pressure	63	63
电机功率(Kw)	Motor power	750	1
重量(Kg)	Weight	28	8
油箱容积(L)	Fuel tank capacity	5	0.7
外形尺寸(mm)	Outline dimensions	350×270×490	570×140×150

## 母线校平机 Busbar Levelling Machine



### 产品说明 Product description

母线校平机是近年来电工开关控制行业最新发展起来的铜铝加工设备。它的出现使母线在剪断、冲孔、折弯等成形前所需整平的工序变的更轻松快捷，且平整美观，消除了人工手锤击打整平带来的外观、截面精度缺陷，影响产品性能质量，同时工作效率更高，一般是人工的数十倍以上。因此，母线校平机已成为电控柜行业生产提高产品质量及生产效率必不可少的生产母机。

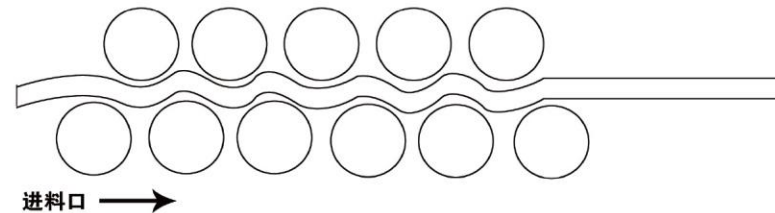
Busbar levelling machine is a newly-arising equipment for processing copper and aluminum in technical switch control industry. Its presence makes the leveling easier, before shearing and punching and bending of busbar, and get a smooth and beautiful appearance, which eliminates the appearance flaw and the cutting surface accuracy caused by manual work and hammer punching which can harm the quality and performance of the busbar. Otherwise, the working efficiency is higher, usually ten times more than manual work. Therefore, a busbar levelling machine is a necessary machine for improving quality and production efficiency in the electric control cabinet industry.

### 主要特点 Main characteristics

- ◆ 本机为辊轮式校平机，输出速度快，效率高，无需安装，操作简单方便，可与母线加工机配套使用。本机采用了曲率补偿技术，和传统辊式校平相比，工件打滑现象得到改善，受力合理，节约电能一半多，同时大大延长了机器的使用寿命。
- ◆ 该系列机为辊轮式校平机，是我公司自行研发的专利产品。该产品在传统辊轮校平原理的基础上，进行优化设计、改造，博得了广大用户的一致赞赏。
- ◆ 该机采用链条传动方式，取代了传统的齿轮变速箱及连接杆等。构造简单，工作平稳，效率高、维护方便。
- ◆ 采用双手轮调整方式，方便快捷。
- ◆ 采用11辊轮结构及双动力，有效改善了工件打滑现象，即节约了电能，又能保证工件的表面质量。
- ◆ It is a roller-type levelling machine. Fast speed, high efficiency, easy to operate, no need to install. It can be used along with a busbar machine. It uses a curvature compensation tech, comparing with a traditional one, it improves the condition of workpiece slipping and makes the bear stress more neat. Save a half energy and prolong the working life.
- ◆ It is a roller-type levelling machine, developed and patented by our company. Based on a traditional leveling principle, we do some optimized design and reform, winning an unanimous praise from the users.
- ◆ It uses a chain transmitting way, replacing a traditional speed-changing gear box and a connecting rod and so on. Simple structure, operate smoothly, high efficiency, maintenance easily.
- ◆ Double hand wheel adjusting mode, convenient and quick.
- ◆ 11-roller structure, two motor drive, to improve the condition of workpiece slipping, save electricity, keep the workpiece in good quality.

### 母线排校平机原理图

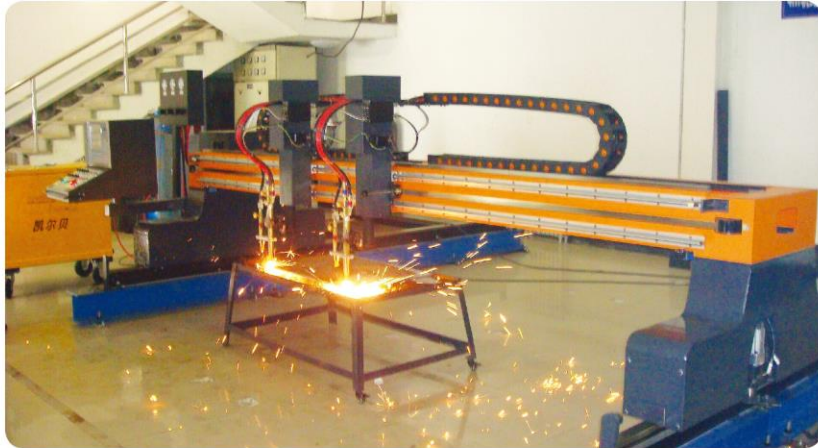
#### Busbar straightening machine schematic



### 详细参数 Detailed parameters

项目	Item	JXP-160	JXP-260
校平母线排材质	School bus row material	铜、铝	铜、铝
最大加工宽度	Max. width	160mm	260mm
加工厚度范围	Processing thickness range	3-12mm	3-12mm
校平辊数量	Leveling roll number	11根	11根
辊轴转速	Roller shaft speed	34RPM	34RPM
校平辊线速度	Leveling roll linear speed	6500mm/min	6500mm/min
校平辊直径	Leveling roll diameter	φ90mm	φ100mm
工作台高度	Height of working table	860mm	860mm
电机功率/电压	Motor power / voltage	3Kw/380V	5.5Kw/380V
不平度	Roughness	<1mm/m	<1mm/m
机器尺寸	Machine size	1250 × 800 × 1150mm	1350 × 1000 × 1250mm
机器重量	Weight	700Kg	1200Kg

## 龙门式数控火焰切割机 Gantry CNC flame cutting machine



### 产品说明 Product description

- ◆ 宽体横梁设计，保证了机械刚性及动态稳定性
- ◆ 等离子电源可根据实际切割要求进行选配
- ◆ 机架采取炉内退火处理和精细加工，保证了设备长寿命及运行精度
- ◆ 数控系统、伺服系统、减速器、等离子切割系统等关键件均选用国际知名品牌
- ◆ 采用集成线路控制板，提高了设备运行灵敏度
- ◆ 结构美观、精度高、刚性好、惯性小、运行平稳等优点

- ◆ The wide beam design ensures the mechanical rigidity and dynamic stability.
- ◆ Plasma power can be selected according to the actual requirements of cutting.
- ◆ The machine frame take furnace annealing treatment and precision machining, to ensure the running accuracy and long life of the machine.
- ◆ CNC system, servo system, reducer, plasma cutting systems and other key parts are all selected world famous brands.
- ◆ The integrated circuit control board improves the sensitivity of the equipment operation.
- ◆ The structure is beautiful, high precision, good rigidity, low inertia, smooth running.

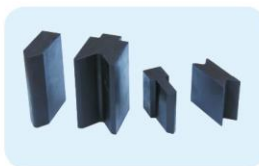
### 详细参数 Detailed parameters

项目 Item	参数 Parameter				
型号 Model	JPNC-4000/JPNC-5000/JPNC-6000/JPNC-7000/JPNC-8000				
轨距 Rail gauge	4000mm/5000mm/6000mm/7000mm/8000mm				
有效切割宽度 Effective cutting width	轨距-900mm (Rail Gauge-900mm)				
驱动方式 Drive mode	双边伺服驱动(Two side Servo)				
伺服系统 Servo motor	日本松下(Panasonic)				
减速系统 Reducer	宁波中大(Zhong da)				
数控系统 CNC system	美国海宝M-EDGE PRO / 上海交大				
数控割炬 CNC cutting flame	海宝原装等离子割炬+火焰割炬 Plasma cutting torch+Flame cutting torch				
弧压调高器 Arc voltage height controller	深圳宏宇达(HONGYUDA)				
等离子电源 Plasma power	海宝PM系列(Hyperthem Powermax)				
等离子型号 Plasma model	HPR800	HPR400	HPR260	HPR130	MAX200
穿孔厚度 Perforation thickness	55mm	38mm	32mm	16mm	25mm
等离子型号 Plasma model	PM125	PM105	PM85	PM65	PM45
穿孔厚度 Perforation thickness	20mm	16mm	12mm	10mm	6mm
空程速度 Idling speed	12m/min				
标准轨长 Standard rail length	10000mm, 可根据使用要求选择长度 (rail length customized)				
切割长度 Cutting length	≤轨长-2000mm (≤rail length-2000mm)				
切割质量 Cutting quality	JB/T10045.4-1999标准 (Quality standard)				

生产场景  
Workshop



模具配件&加工样件  
Molds/dies & Samples After Processing



平弯模具  
Molds/dies for Horizontal bending



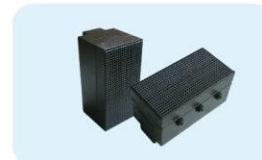
立弯模具  
Molds/dies for Vertical bending



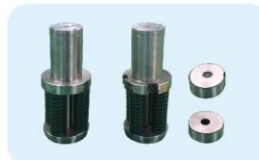
压电缆模具  
Cable pressing mold



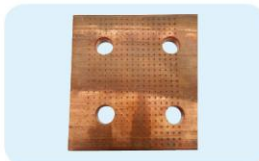
冲孔模具  
Molds/dies for Punching



压花模具  
Molds/dies for Embossing



冲孔模具  
Molds/dies for Punching



冲孔及压花样件  
Sample of punching and embossing



立弯和麻花样件  
Sample of Vertical bend and twist



剪切样件  
Sample of cutting



U型弯样件  
U-shaped bending sample



平弯样件  
Flat bend samples



铣角机样件  
Sample of Milling machine

承诺，源于专业

*Promise, from professional*

