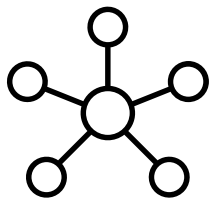


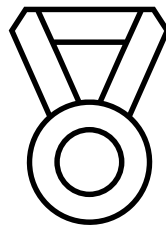
# CNC Nesting machine



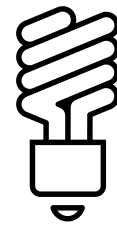
WITH NCG2812E SA NESTING MACHINE YOU GET 3IN1 MACHINE. THIS IS YOUR ALTERNATIVE TO A CIRCULAR SAW, A DRILLING MACHINE AND A ROUTER ALL IN ONE. FURTHERMORE, THE NESTING MACHINE OPTIMIZES THE WORKING CYCLE, SAVING YOU TIME AND RAW MATERIAL.



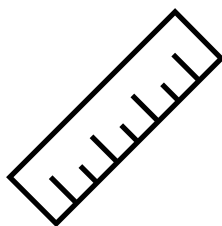
EASY  
APPLICATION  
WITH OTHER  
BRANDS



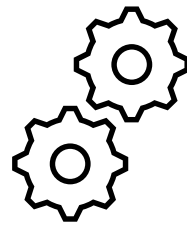
HIGH QUALITY  
FOR  
LOWER COST



EASILY REDUCE  
MATERIAL  
CONSUMPTION



COMPACT DESIGN  
SAVES SPACE



SAW, DRILLING &  
ROUTING ALL IN  
ONE



3 YEARS OF  
WARRANTY

## TECHNICAL DETAILS

The NCG2812E features four high-speed spindles, designed for tasks like nesting, shaping, and top-side boring. It achieves speeds of 60/60/20 m/min and has an automated feed-in/out table for efficiency.

With this type of processing work can save space, labor force but without compromise in accuracy and efficiency. Table dimensions 2800 x 1230 mm

The machine is in compliance with the applicable CE directives.

## DESCRIPTION OF DELIVERY

### VACUUM INFEED CUP AND ROLLER BRACKET



Machine is configured loading vacuum cups and roller brackets, easy to link to infeed & outfeed section.

### 9KW MAIN SPINDLE + 10 DRILLS DRILLING BLOCK



- 9kw air cooling spindle: powerful, max rotating speed up to 24000rpm/min, can work with 50mm thick panel.
- Coupler type ISO30 making contact between tool holder and clamp closely, fix tightly, fast for ATC
- 10 drills drilling block, rotating speed: 4000rpm/min
- With cover



### AUTOMATIC LINE TOOL CHANGER WITH 12 SLOTS



The automatic line tool change magazine with 12-slots suitable for complicated process requirements, no need to change tool manually offers maximum operation convenience, and shorter distance between main spindle and tool position, changing tool us faster.

Type ISO30 ER32

*Tip: Standard with two tool couplers.*

## DESCRIPTION OF DELIVERY

### UNLOADING PUSHER



Unloading pusher with dust collection to clear the scraps left on the working table while unloading work pieces, that offers most convenience for following processing work.

### REAR POSITIONING CYLINDERS AND DUST COLLECTOR



## TECHNICAL DETAILS

### WORKING TABLE



One-piece pressure plate is easy to install or change. 2800\*1220mm to work with 4x8' and 4x9'.

Table has divided by 7 sections; easy to control by valve based on processing requirement.

The crisscrossed grooves on top side ensure uniform distribution vacuum of absorption zone. Table thickness is 32mm.

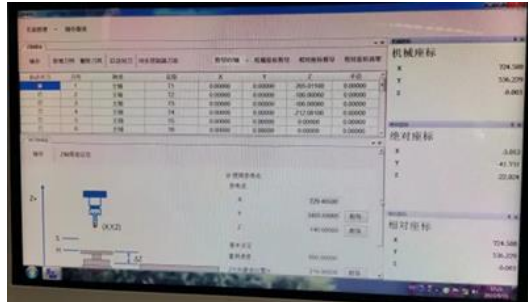
# TECHNICAL DETAILS

## 1PC LOW NOISE OIL COOLING VACUUM PUMP



1 pcs 7.5kw oil cooling vacuum pumps with suction flow rate 300m<sup>3</sup>/h, pressure 0.5 kg/cm<sup>2</sup> for high-performance sorption on the table, thus small parts could be fixed on the table firmly.

## TOOL SETTING GAUGE AND LOCKER



Automatic tool setting is precise and fast which ensures machine continuous working without need of changing tool by hand, save time.

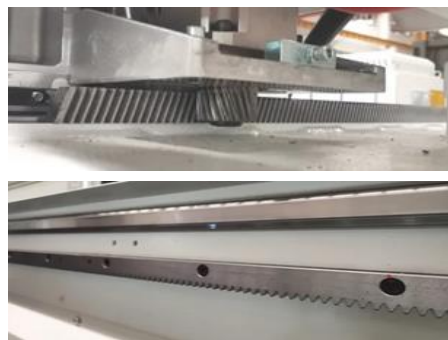
Tool locker is used to put tool for the time being.

## TANK CABLE CHAIN



High-quality chain in world famous brand, very wear proof and of longer service life, electric cables and tube can be protected well during high-speed movement.

## MOVEMENT OF EACH AXIS



### **X and Y direction**

Transmitted by high-stiffness inclined rack and pinion with large contact area, higher accuracy.

25mm guiding rail along X direction to ensure accurate and stable movement under high speed.



### **Z direction**

Ball screw gives the machine added precision in Z direction.



### **Servo Motor**

The accurate movement of each axis is ensured by the high-power servo motors.

Y axis: 1.3kw\*2;

X axis: 1.3kw

Z axis: 1.3kw

Max travelling speed: XN/Z: 60/60/20m/min.

## AUTOMATIC GREASING



Grease main transmission components automatically so as to prevent machine components from aging thus reducing the maintenance work by operators.

## SIDE POSITIONING CYLINDERS & POSITIONING CUPS



2 alignments on each side of Y direction, and each alignment raised automatically via two side positioning cylinders.

There are 2 vacuum cups around main spindle to move panel in proper working area before processing for positioning, friendly for different panel size.

## START/STOP BUTTON ON GANTRY



Additional buttons on side of gantry, easier operation for flip over panel in process for double side process.

## TECHNICAL DETAILS

### SAFETY FENCE & LIGHT CURTAIN



Machine is with safety fence and light curtain for safety.

### HAND CONTROLLER AND FOOT SWITCH



Hand wheel and foot switch make commissioning more convenient.

### CONTROL SYSTEM



Powerful SYNTEC control system provides stable performance, powerful functions and ease of use with friendly interface. Processing path is available at a glance.

Open port equipped to link with various international nesting software making processing much optimized, under controlled, well managed, design intended, and data networking included for easy operation.

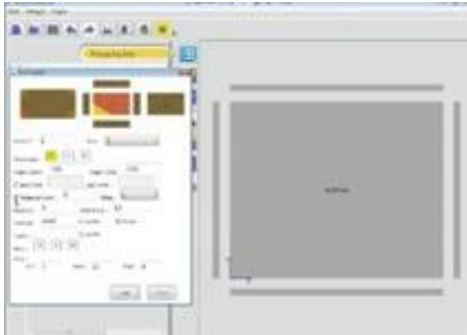
### OPTIMISING SOFTWARE



Machine is standard with FCC optimizing software. Combination of automation, Smartech, and Infotech in production.

# TECHNICAL DETAILS

## WORKPIECE EDITOR SOFTWARE



Office version editor software for basic design for single workpiece, linkable to FCC to generate layout, machine is optional even without furniture design software.

## SUPPORTING INFORMATION

### MACHINE BODY



Heavy duty bed structure machine body is welded with square tube and laser-cut steel plates by professional robots welding line, even welding marks and distance ensures high stability of body.

Vibration and aging to release internal strength.

Parts and machine body are processing by advanced CNC machine for metal work, just one positioning to finish most processing work, hence guarantees processing accuracy and reduce the vibration in the process.

### QUALITY CONTROL



Advanced measuring equipment and strict QC system help to make sure the machines and parts are checked and certificated by very high standard.

All the machines are delivered with Quality Certificate signed by QC specialist.

## ELECTRIC EQUIPMENT



### **Computer**

IPC with Windows operating system:  
DELL display  
USB port



### **Independent control cabinet**

Electric components are of high quality and famous brand. Equipped with air conditioner to control the operating temperature for highest performance. Door with sealing strip avoids dust and chips.



### **Air conditioner**

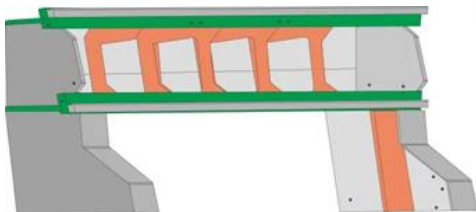
Machine is with air conditioner to ensure proper working temperature of electrical components for optimal performance and longer service life, very safe. Especially suitable for high-temperature zone.

## PROFESSIONAL ASSAMBLEY LINE



Wood Tech follow the SOP and set up the professional assembly lines. All the assembling is worked out by the experienced technicians that guarantee machine standardization and performance.

## GANTRY FRAME



Gantry frame, reliable for high-speed milling work and ensure high precision in the long term.

Compact support ribs inside gantry ensure the higher strength and stability, that means higher machining quality and longer service life.

All the machine bodies and gantries are through stress relief before installation.



## SUPPORTING INFORMATION

Control system	SYNTEC
Working range 50 mm	X-axis: 2,800 mm Y-axis: 1,220 mm Z-axis:
Working table	Size: 2,800x1,220 mm Height: 950 mm
Max traveling speed m/min	X-axis: 60 m/min Y-axis: 60 m/min Z-axis: 20
Main spindle	Quantity: 1 Power: 9 kW Tool holder type: ISO30
Automatic tool changer	Rotating speed: 24,000 rpm Line tool changer with 12 slots
Vacuum pump	Quantity: 1 Power: 7.5 kW Suction flow rate: 300 m <sup>3</sup> /h
Dust extraction	Outlet: Ø 150 mm*1 Ø125mm*2 Speed required: 28 m/s
Air supply	Air pressure required: 6~7 kg/cm <sup>2</sup>
Power supply	Voltage: 380V, 3-phase Frequency: 50 Hz
Total power	24 kW
Floor space	L×W×H: 4200×2460×2500 mm
Net weight	2500 kg