

CNC Panel Saw

Diamond 500

# Instruction Manual

## IMPORTANT

For your safety, read instructions carefully before assembling or using this product. Save this manual for future reference.



Original Instruction  
V.1-201810

## HEALTH AND SAFETY GUIDELINES

Always follow the instructions provided with the manual. Always wear safety glasses when using woodworking equipment. Always disconnect the power before adjusting any equipment. Failure to observe proper safety procedures and guidelines can result in serious injury.

**WARNING:** Do not allow familiarity (gained from frequent use of your machine and accessories) to become commonplace. Always remember that a careless fraction of a second is sufficient to inflict severe injury.



Always wear safety glasses when using woodworking equipment.



Always read the instructions provided before using woodworking equipment.

# INDEX

- 1 GENERAL INFORMATION
  - 1.1 FOREWORD
  - 1.2 MACHINE IDENTIFICATION
  - 1.3 CUSTOMER SERVICE RECOMMENDATIONS
- 2 SAFETY PRECAUTIONS
  - 2.1 SAFETY REGULATIONS
  - 2.2 RESIDUAL RISKS
  - 2.3 SAFETY AND INFORMATION SIGNALS
- 3 SPECIFICATIONS
  - 3.1 MAIN COMPONENTS
  - 3.2 TECHNICAL SPECIFICATION
  - 3.3 ELECTRICAL CONNECTION
  - 3.4 NOISE LEVEL
  - 3.5 DUST EXTRACTION
- 4 INSTALLATION
  - 4.1 PACKAGE
  - 4.2 LIFTING AND UNLOADING
  - 4.3 INSTALLATION ZONE CHARACTERISTIC
  - 4.4 INSTALL OF LOOSE PARTS-INTRODUCTION
- 5 ADJUSTMENT
  - 5.1 SCORER ADJUSTMENT
  - 5.2 EXTENSION TABLE FLATNESS ADJUSTMENT
  - 5.3 RIP FENCE PRECISION ADJUSTMENT
  - 5.4 DIGITAL READOUT RULER GUIDING ADJUSTMENT
- 6 OPERATING PROCEDURES
  - 6.1 MACHINE START AND STOP
  - 6.2 PANEL OPERATION INSTRUCTIONS
  - 6.3 REPLACE BELT AND ADJUST ROTATE SPEED
  - 6.4 CUTTING OPERATION
  - 6.5 PROPER USAGE OF SLIDING PANEL SAW
  - 6.6 CUTTING TEST AFTER MACHINE INSPECTION
  - 6.7 MATERIAL AND SAW BLADE
- 7 MAINTENANCE
  - 7.1 REPLACE SAW BLADE
  - 7.2 OVERALL CLEANING
  - 7.3 GENERAL LUBRICATION
  - 7.4 REPLACEMENT AND DISPOSAL
- 8 TROUBLE SHOOTING

# 1. GENERAL INFORMATION

## 1.1 FOREWORD

This machine is designed to make straight and mitre cut for wood material, especially for wood board cutting. CAM software which can automatically calculate the best layout plan is built in the machine. Also rip fence is controlled by CNC computer.

Some information and illustrations in this manual may differ from the machine in your possession, since all the configurations inherent in the machine complete with all the optionals are described and illustrated. Therefore, refer only to that information strictly connected with the machine configuration you have purchased.

With this manual we would like to provide the necessary information for maintenance and proper use of the machine. The distribution network is at your service for any technical problem, spare parts or any new requirement you may have for the development of your activity.

This manual must be read and understood before operating the machine. This will provide a better working knowledge of the machine, for increased safety and to obtain the best results.

To facilitate its reading, the manual has been divided into sections pointing out the most important operations. For a quick research of the topics, it is recommended to consult the index. To better stress the importance of some basic passages, they have been marked by some preceding symbols:



### **WARNING**

Indicates imminent risks which may cause serious injury to the operator or other persons. Be careful and scrupulously follow the instructions.



### **CAUTION**

A statement advising of the need to take care lest serious consequences result in harm to material items such as the asset or the product.

## 1.2 MACHINE IDENTIFICATION

There is an identification plate fixed to the machine, containing the manufacturer's data, year of construction, serial number and technical specifications.

## 1.3 CUSTOMER SERVICE RECOMMENDATIONS

Apply the machine to skilled and authorized technical staff to carry out any operation dealing with parts disassembly. Keep to the instructions contained in this manual for the correct use of the machine.



### **CAUTION**

Only skilled and authorized staff shall use and service the machine after reading this manual. Respect the accident prevention regulations and the general safety and industrial medicine rules.

# 2. SAFETY PRECAUTIONS

## 2.1 SAFETY REGULATIONS



### **WARNING**

Read carefully the operation and maintenance manual before starting, using, servicing and carrying out any other operation on the machine.

The manufacturer disclaims all responsibilities for damages to persons or things, which might be caused by any failure to comply with the safety regulations.

- The machine operator shall have all necessary prerequisites in order to operate a complex machinery.

- It is prohibited to use the machine when under the influence of alcohol, drugs or medication.

- All the operators must be suitably trained for use, adjustment and operation of the machine.

- The operators must carefully read the manual paying particular attention to the warning and safety notes. Furthermore, they must be informed on the dangers associated with use of the machine and the precautions to be taken, and must be instructed to periodically inspect the guards and safety devices.

- Before carrying out adjustment, repair or cleaning work, disconnect the machine from the electric power by setting the main switch to stop.
- After an initial bedding-in period or many hours of operation, the driving belts may slacken; this causes an increase in the tool stopping time (the stopping time must be less than 10 seconds). Immediately tighten them.
- The working area around the machine must be kept always clean and clear, in order to have an immediate and easy access to the switchboard.
- Never insert materials which are different from those which are prescribed for the machine utilization. The material to be machined must not contain any metal parts.
- Never machine pieces which may be too small or too wide in respect to the machine capacity.
- Do not work wood which has evident defects (cracks, knots, metal parts, etc.)
- Never place hands among the moving parts and/or materials.
- Keep hands clear from the tool; feed the piece with the aid of a pusher.
- Keep the tools tidy and far away from those not authorized persons.
- Never employ cracked nor unbalanced, neither not correctly ground tools.
- Never use the tools beyond the speed limit recommended by the producers.
- Carefully clean the rest surfaces of tools and make sure that they find perfectly horizontally positioned, and with no dents at all.
- Always wear gauntlets when handling the tools.
- Mount the tools in the right machining direction.
- Never start the machine before having correctly installed all the protections.
- Connect the dust suction hoods to an adequate suction system; suction must always be activated when the machine is switched on.
- Never open doors or protections when the machine or the system is operating.
- Many unpleasant experiences have shown that anybody may wear objects which could cause serious accidents. Therefore, before starting working, take any bracelet, watch or ring off.
- Button the working garment sleeve well around the wrists.
- Take any garment off which, by hanging out, may get tangled in the MOVING UNITS.
- Always wear strong working footwear, as prescribed by the accident-prevention regulations of all countries.
- Use protection glasses. Use appropriate hearing protection systems (headsets, earplugs, etc.) and dust protection masks.
- Never let unauthorized people repair, service or operate the machine.
- The manufacturer is not responsible for any damage deriving from arbitrary modifications made to the machine.
- Any transport, assembly and dismantling is to be made only by trained staff, who shall have specific skill for the specified operation.
- The operator must never leave the machine unattended during operation.
- During any working cycle break, switch the machine off.

- In case of long working cycle breaks, disconnect the general power supply.
- The operating method to be followed in the event of accident or breakdown, the machine should be turned off immediately and unplug from main power and ask for assistance for the authorized people. If a blockage is likely to occur, the workpiece should be move back a little and enable the equipment to be safely unblocked.



### **WARNING**

The manufacturer shall not bear any liability for the accidents caused by the failure of the electrical components of the connected machine and the non-standard installation.



### **WARNING**

The manufacturer shall not bear any responsibility for changing the mechanical use or altering the accident caused by parts.



### **WARNING**

The manufacturer shall not be liable for any accidents caused by the operation of any part or any part thereof.

## 2.2 RESIDUAL RISKS

Despite observance of all the safety regulations, and use according to the rules described in this manual, residual risks may still be present, among which the most recurring are:

- contact with tool
- contact with moving parts (belts, pulleys, etc..)
- recoil of the piece or part of it
- accidents due to wood splinters or fragments
- tool insert ejection
- electrocution from contact with live parts
- danger due to incorrect tool installation
- inverse tool rotation due to incorrect electrical connection
- danger due to dust inhalation in case of working without vacuum cleaner.

Bear in mind that the use of any machine tool carries risks.

Use the appropriate care and concentration for any type of machining (also the most simple).

The highest safety is in your hands.

## 2.3 SAFETY AND INFORMATION SIGNALS

This signals may be applied on the machine; in some cases they indicate possible danger conditions, in others they serve as indication.

Always take the utmost care.

### SAFETY SIGNALS:



Risk of eye injury. Wear eye protection.



Wear hearing protection systems.



Danger of electric shock. Do not access the area when the machine is powered.



Carefully read and understand the manual before using the machine.

### INFORMATION SIGNALS:

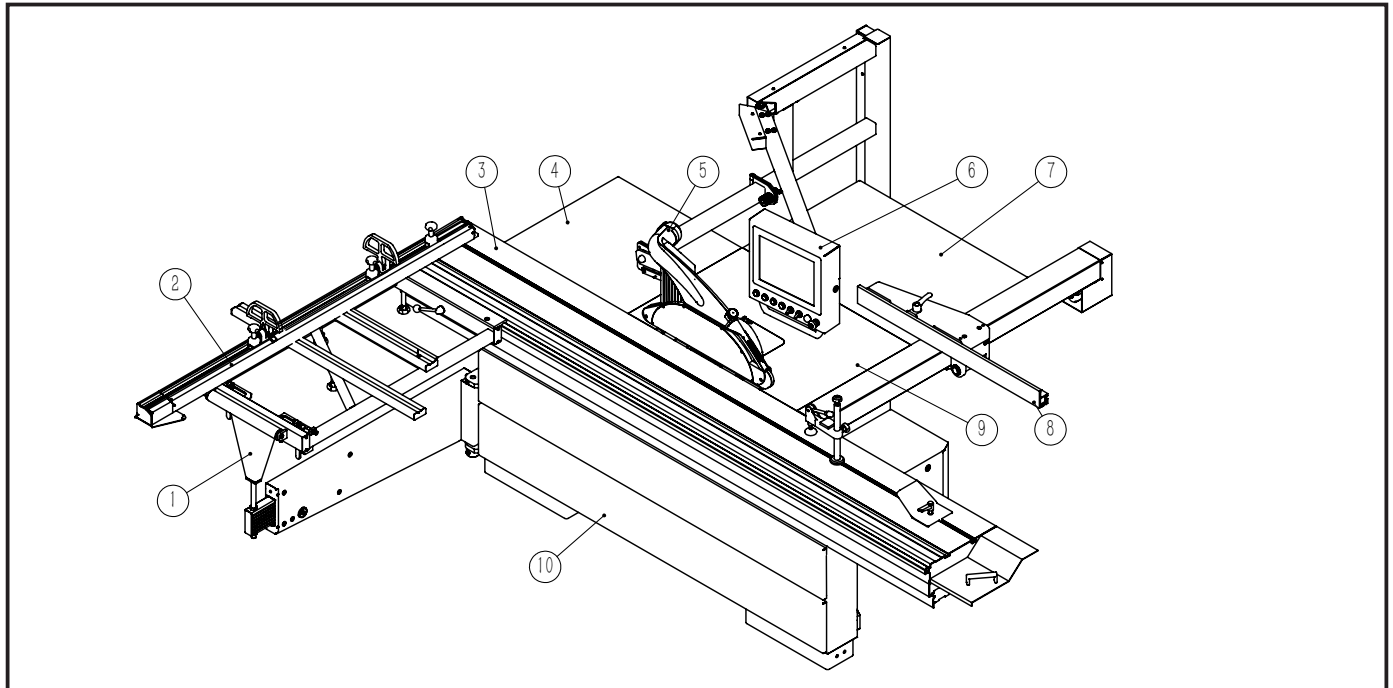
Indicate the technical characteristics, direction of rotation and inclination, block and release, etc.

Carefully following the directions to simply the use and adjustment of the machine.

The signals are graphically described and do not require further explanation.

## 3. SPECIFICATIONS

### 3.1 MAIN COMPONENTS



- 1 - Sliding carriage assembly
- 2 - Cross cutting fence assembly
- 3 - Sliding table assembly
- 4 - Rear extension table
- 5 - Saw blade guard assembly

- 6 - CNC Computer
- 7 - Right extension table
- 8 - Rip fence assembly
- 9 - Main working table
- 10 - Frame Assembly

### 3.2 TECHNICAL SPECIFICATION

Motor voltage	415V/50Hz
Main motor power	7.5HP
Scoring motor power	1HP
Main blade diameter	400mm
Scoring blade diameter	120mm
Main saw blade axis diameter	30mm
Scoring blade axis diameter	20mm
Main blade speed	3000/4000/5000rpm
Scoring blade speed	8000rpm
Blade tilt degree	45°~ 90°
Sliding table cutting stroke	3800mm
Max cutting thickness	125mm
Max cutting width	1500mm

### 3.3 ELECTRICAL CONNECTION

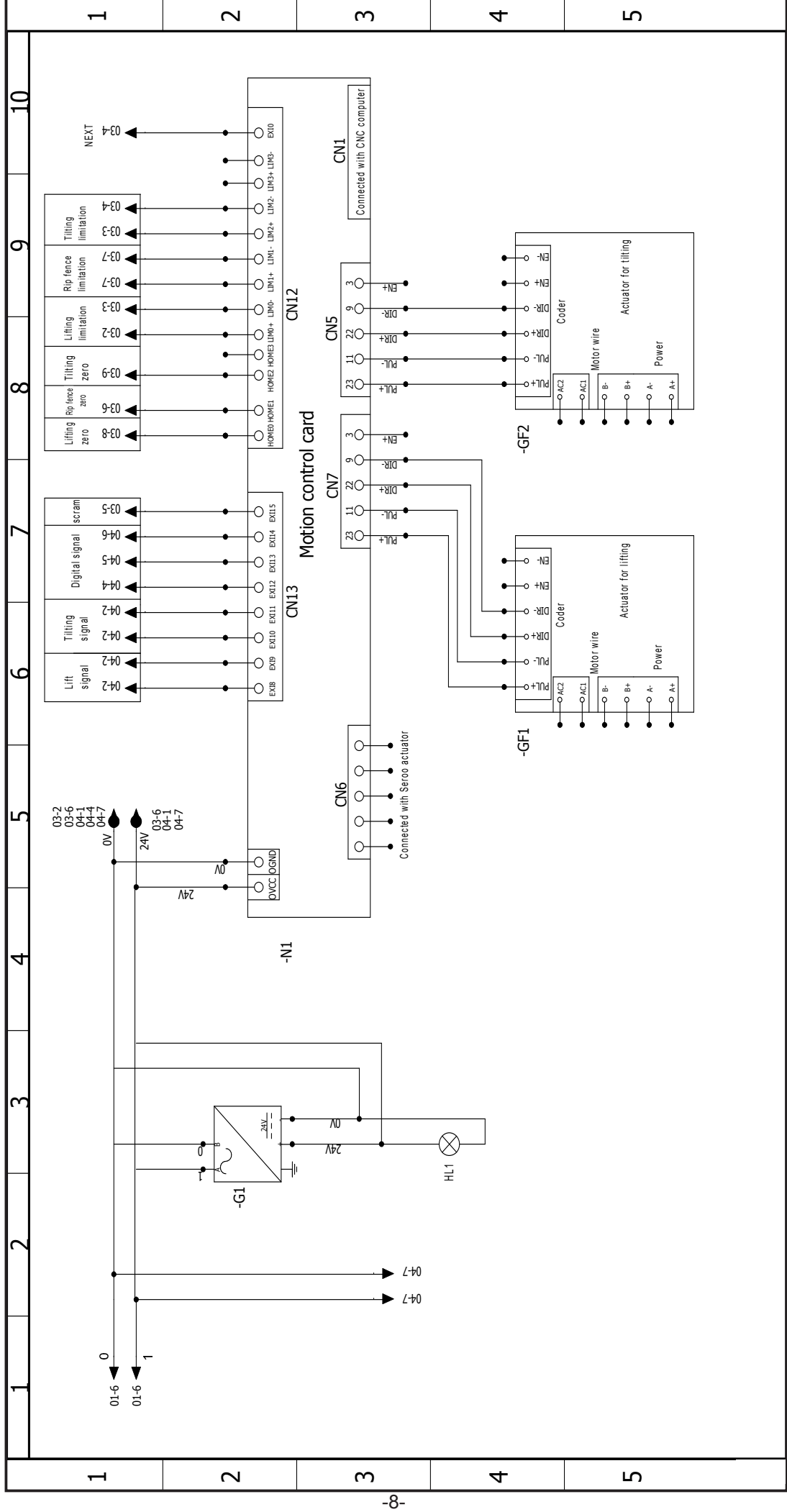
- Electrical installation should be carried out by competent, qualified personnel.
- The mains connection should be made using the terminal box.
- Replacement of the power supply cable should only be done by a qualified electrician
- Connect main leads to a standard 400V  $\pm 10\%$  electrical supply which has protection devices of under-voltage, over-voltage, over-current as well as a residual current device(RCD) which maximum residual current rated at 0.03A.



#### **WARNING**

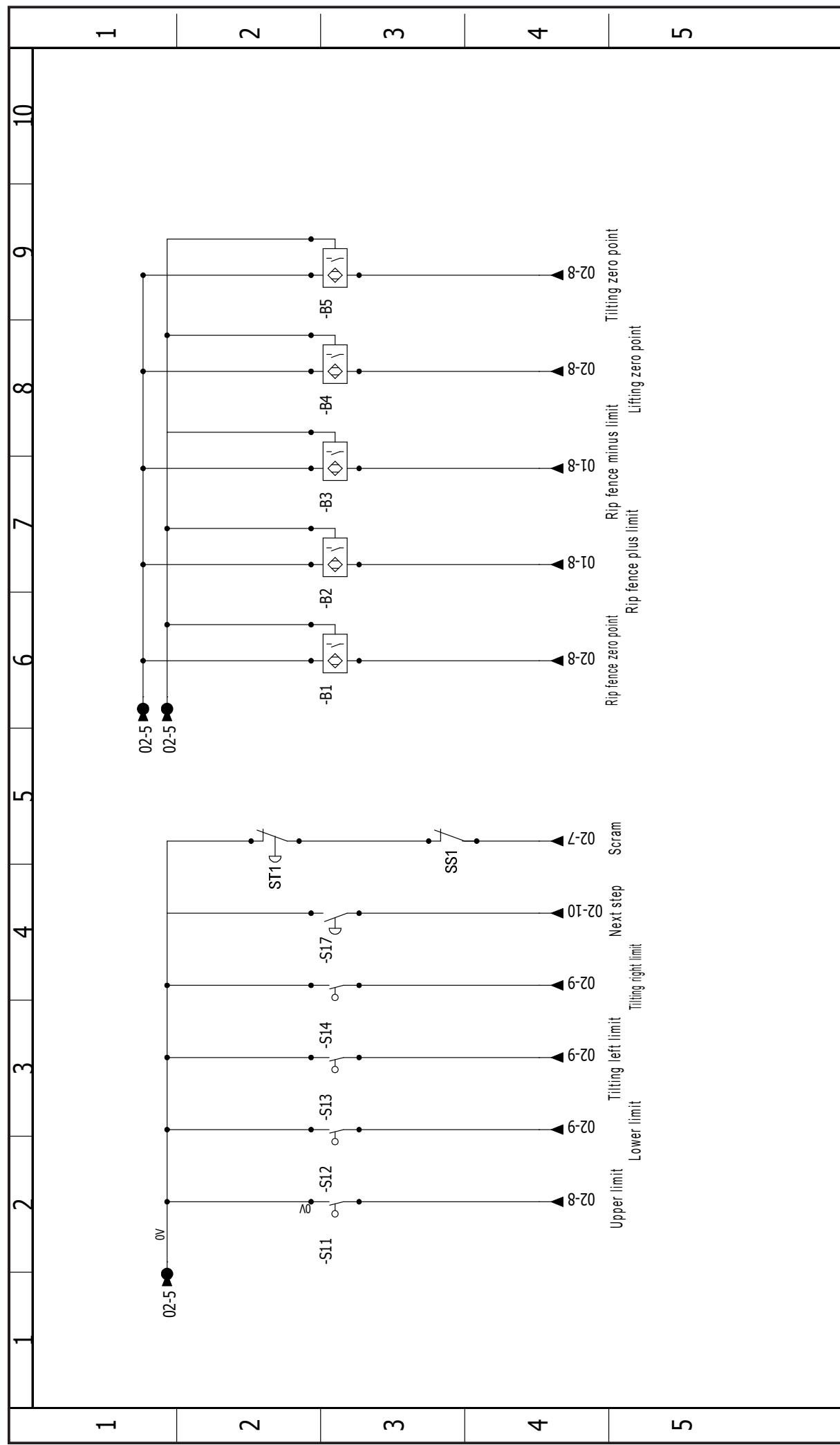
For avoiding electric shock or fire, maintenance of electric system should be carried out by professional staffs and using authorized original accessories.



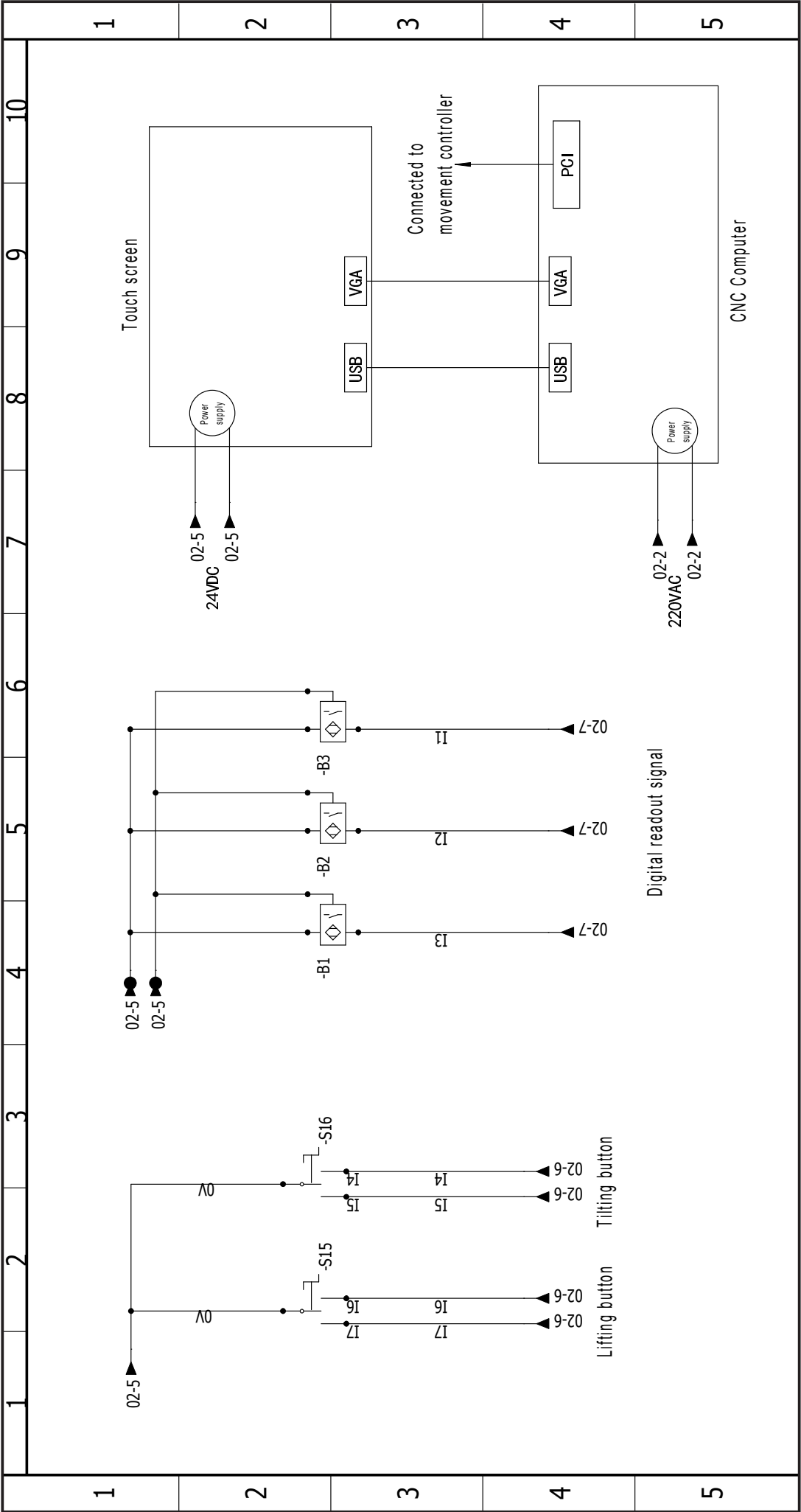


Stepper motor motion controller





Motion controller signal



Computer

Photoelectric


Manual

3.4 NOISE LEVEL

	No load	Load
Sound Pressure Level	< 80.4dB(A)	< 85.7dB(A)
Sound Power Level	< 98.1dB(A)	< 100.7dB(A)

Associated uncertainty K=4dB  
Measurement made in accordance with EN ISO 3746:1995 and EN ISO 11202:1995  
The noise levels measured are emission levels and not necessarily the safe working level. Although there is a correlation between the emission levels and the exposure levels, this cannot be used reliably to determine whether or not further precautions are required. The factors which affect the actual level of operator exposure include the duration of exposure, the ambient characteristics and other sources of emission, for example, the number of machines and other adjacent machining. The permitted exposure values may also vary from country to country. Nevertheless, this information allows the user of the machine to better evaluate the dangers and risks.

- Other factors which reduce exposure to noise are:
- correct tool choice
  - tool and machine maintenance
  - use of hearing protection systems (e.g. headsets, earplugs,...)



**WARNING** Please always use the hearing protection systems if the noise level is over 95dB(A).

3.5 DUST EXTRACTION


Proper suction eliminates the risks of dust inhalation and aids better functioning of the machine. The tables list the minimum air flow and speed values referenced to each single suction operation. The related pressure drop at the dust port is 530Pa.

Saw	
Upper hood	Lower hood
Air flow 140 cu.m/h	690 cu.m/h
Minimum air speed 20 m/s	

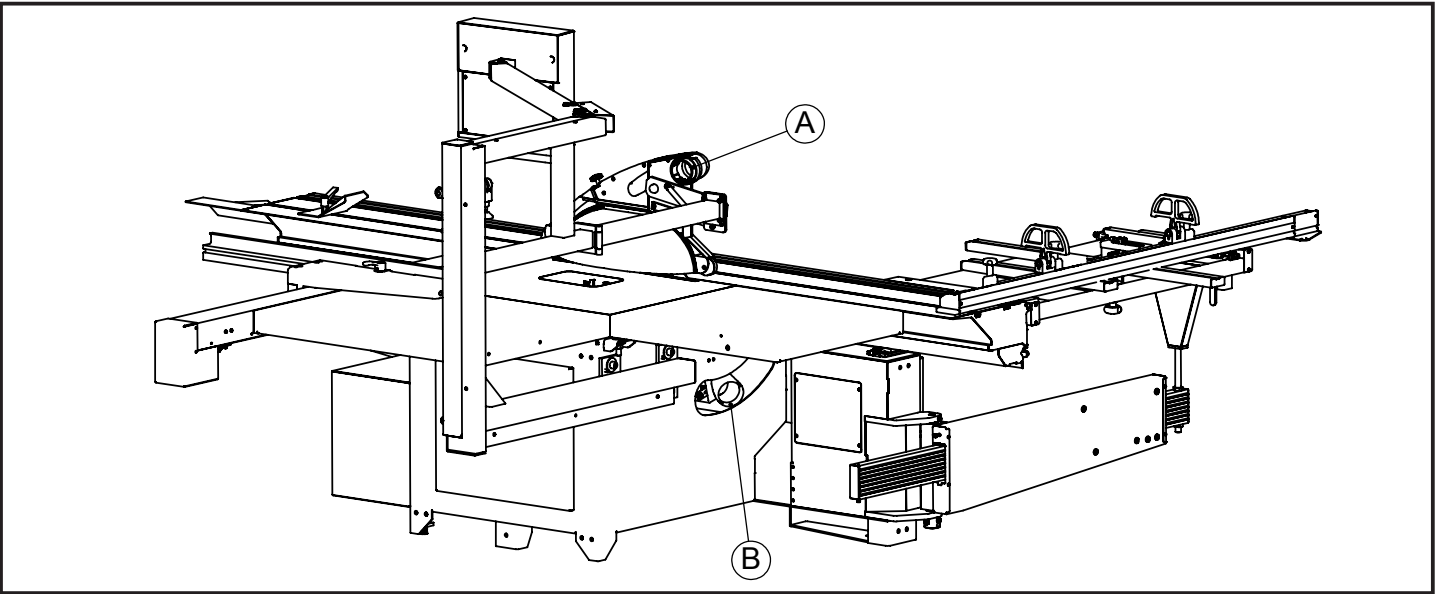
Ensure that the suction system guarantees these values at the hood-houth connection point. (3.5)

- Suction mouth diameter:
- A - Blade guard ..... ø80 mm
  - B - Body dust suction ..... ø100 mm

Connect the mouths to the suction system with flexible tubes of adequate diameter. Tighten with clamps. The tube must be positioned in such a way so as not to obstruct the operator during machining.



**WARNING** Always work with the suction system on. Always start the suction system and the machine at the same time.



# 4. INSTALLATION



**CAUTION** Assembly need to be done by an experienced and trained person.

## 4.1 PACKAGE

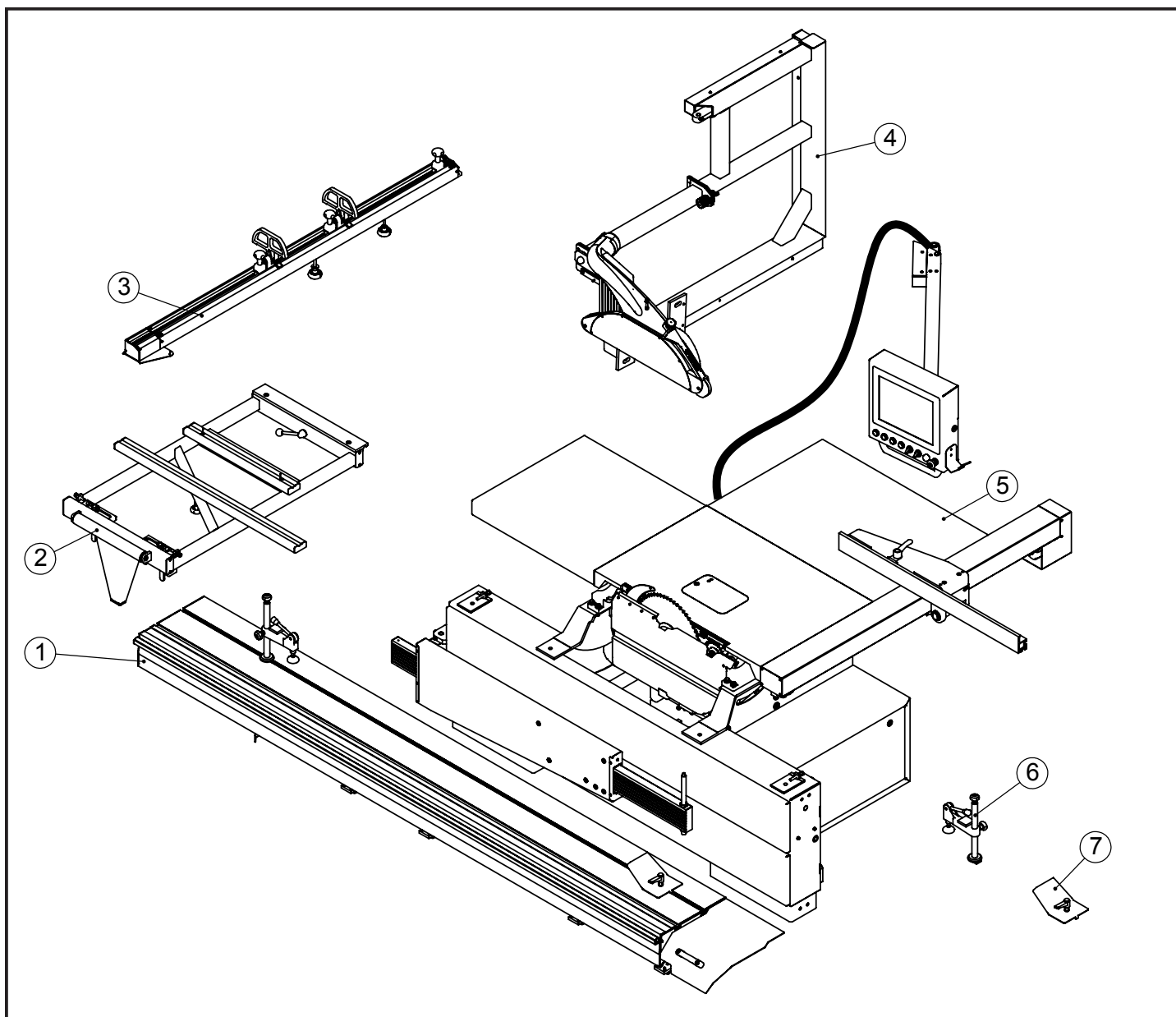
- The machine is supplied partly assembled. Prior to use, further assembly is required
- When unpacking the machine the following components are included for the initial assembly
- If any parts are missing, do not attempt to assemble the machine; plug the power cord, or turn the switch off until the missing parts are obtained and properly installed.

2 cartons: First carton

1- Sliding table assmebly

Second carton

- 2- Sliding carriage assembly
- 3- Cross cutting fence assembly
- 4- CNC computer assembly
- 5- Frame assembly
- 6- Eccentric locking assebmly
- 7- Clamp assembly



## 4.2 LIFTING AND UNLOADING



### WARNING

Lifting and handing should only be carried out by skilled personnel specially trained to execute this kind of operations. During loading and unloading, avoid knocks to prevent damages to persons and things. Make sure no one is standing under the overhung load and/or within the bridge crane working range during machine lifting and handing.

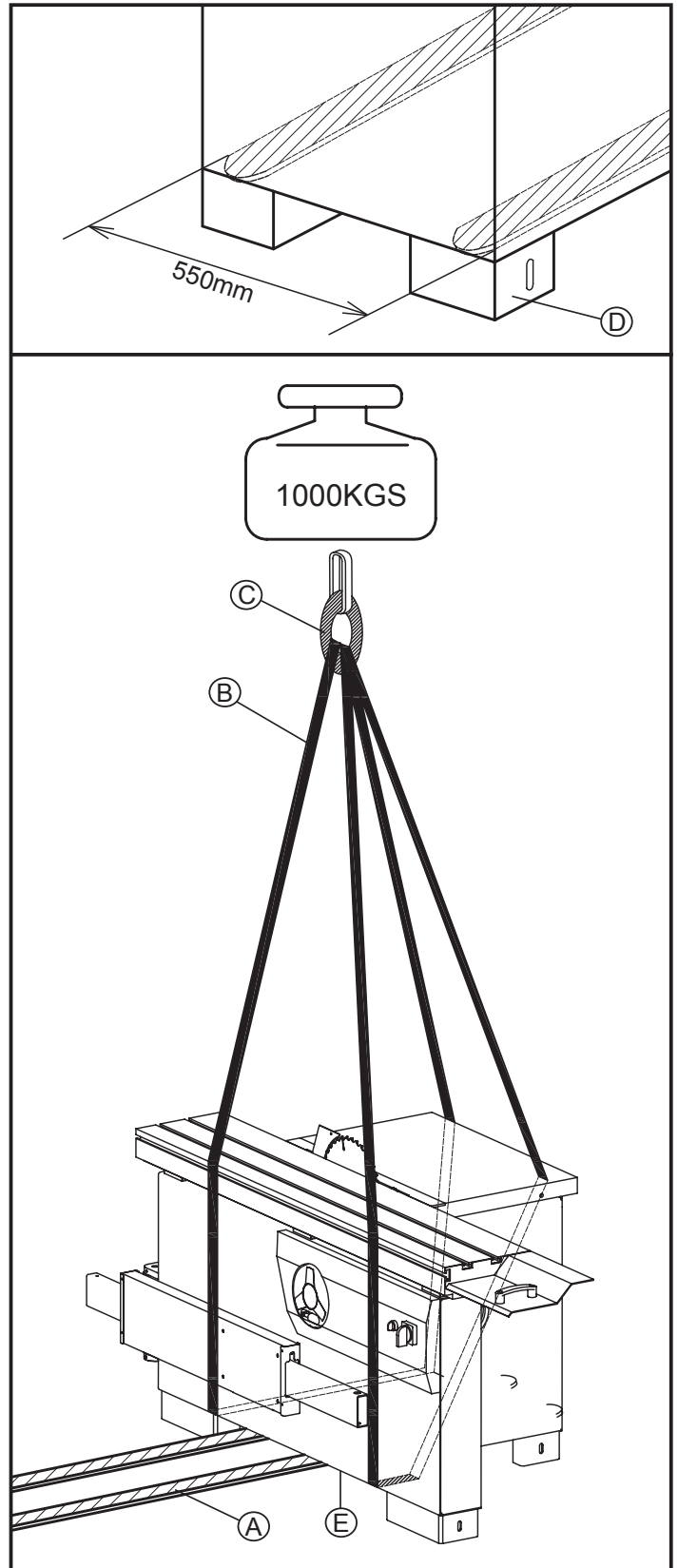
Lifting may be carried out by bridge crane or self-propelled lift truck. Before starting the manoeuvres, free the machine of all the parts used for transport or Packaging that have remained on the machine. Check that the capacity of the lifting equipment is adequate for the gross weight of the machine indicated Fig.4.2.

If hoisting is carried out with a lift truck, proceed as follows:

- adjust the width of the forks A to 550 mm.
- Insert forks A as in the figure in correspondence to name plates E ensuring that these are wedged against the back of the rear feet D.

If a bridge crane or a crane is available, proceed as follows:

- provide two slings B of suitable length and capacity (Belts minimum length 4000mm)
- lift the slings and position them as is shown in the Fig.4.2
- fasten the slings to the bridge crane C having adequate lifting power.
- move the bridge crane by small steps to allow the slings B to settle, until optimum stability conditions are reached.
- lift carefully and slowly, without causing the load to swing, and place the machine in the selected setting.
- remove the protective wax coat from all tables and unpainted surfaces, using kerosene or its derivative products. Do not use any solvent, petrol or gas oil, which might dull the paint or oxidate machine parts.



4.2

### 4.3 INSTALLATION ZONE REQUIRMENTS



#### WARNING

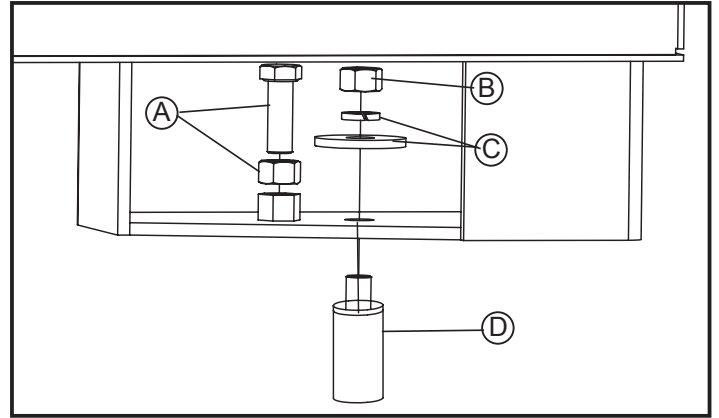
- It is prohibited to install the machine in explosive environments.

The installation zone must be selected evaluating the work space required depending on the dimension of the pieces to be machined, and taking into account that a free space of at least 800 mm must be left around the machine. It is also necessary to check the floor capacity and its surface, so that the machine base is evenly resting on its four supports. A power outlet and a chip-suction system connection shall be close to the selected machine setting and it must be conveniently lighted (luminous intensity: 500 LUX).

#### Fixing to the floor

The machine must be fixed to the floor.

- Use bolt/nut A to level the feet to ensure machine is well located.
- Put expansion bolts D into ground, use washer/lock washer C and hex nut B to fasten the bolts.



4.3

### 4.4 INSTALL OF LOOSE PARTS - INTRODUCTION

A few elements will be disassembled from the machine main structure due to packaging and shipping requirements. These loose parts should be installed as follows.

Please tighten all bolts and nuts absolutely. Otherwise, may cause machine wobble or serious injury to the operator or other persons.

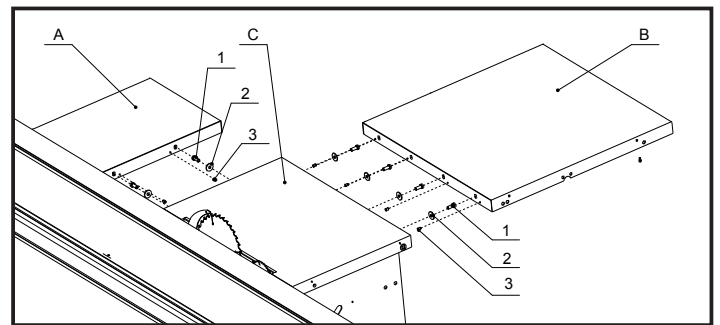
#### 4.4.1 INSTALL EXTENSION TABLE

Tools required for assembly

- Wrench 16mm
- 6mm socket head wrench

Install rear subsidiary board A to main operating board with bolt 1 and washer 2.

Install right subsidiary board B to main operating board with bolt 1 and washer 2.



4.4.1

#### 4.4.2 INSTALL BLADE GUARD

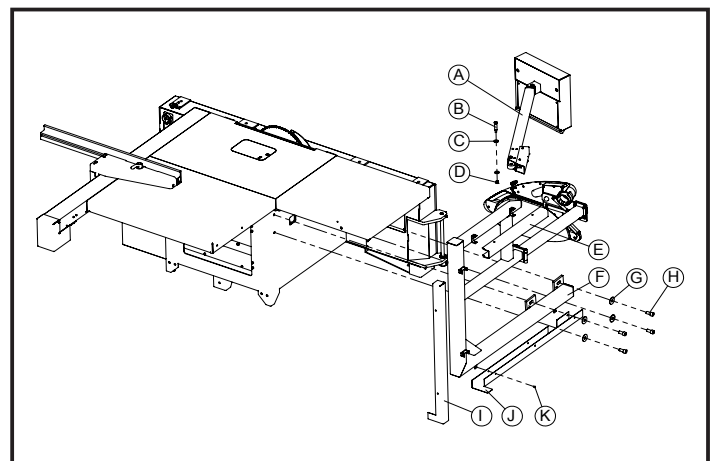
Tools required:

- 4mm socket head wrench
- 12mm socket head wrench
- 13-16mm wrench

- Install engineering bracket F to the main body with 4 bolts H and washer G.

- Cross the rotation axis B through washer C, CNC computer A, engineering bracket F, tightening with washer C and nut D.

- Then locating the connected cord attached with the CNC computer to the groove of bracket F with cable buckle E/I/J. Tighten it with screw K.

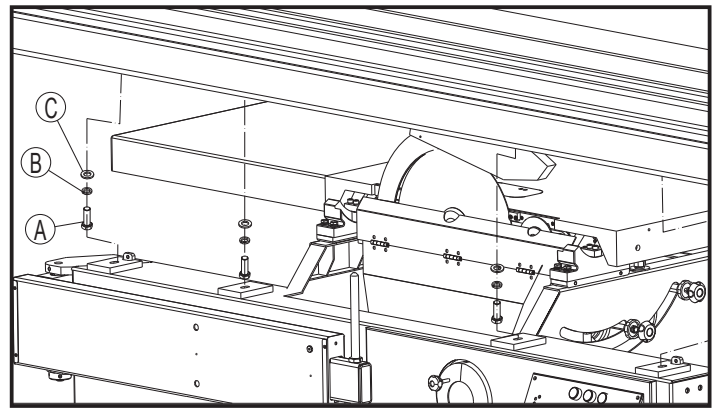


4.4.2

#### 4.4.3 INSTALL SLIDING TABLE

Tools required for assembly:  
10mm socket head wrench

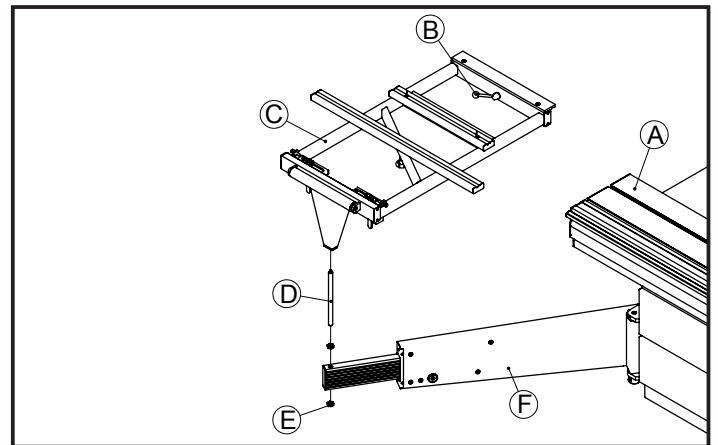
- Put the sliding table onto the frame support surface.
- Lock the sliding table onto the frame using part A,B and C.



4.4.3

#### 4.4.4 INSTALL SLIDING CARRIAGE TABLE

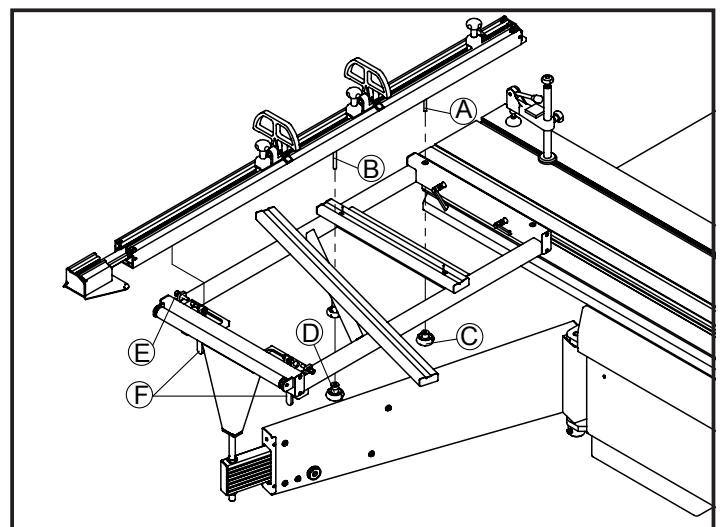
- Put the sliding carriage table C into the slot of sliding table A.
- Put the support rod D into the bottom hole of sliding carriage table C.
- Lock the handle B.



4.4.4

#### 4.4.5 INSTALL CROSS CUTTING FENCE

- Insert pin A into the corner hole of sliding carriage, mount knob C to the pin and lock it.
- Insert pin B into the slotted hole of middle sliding carriage, mount knob D to the pin and lock it.
- Fasten locking handle F of sliding carriage.
- Regulate extension of bolt E could adjust angle between cross cutting fence and saw blade.



4.4.5

# 5. ADJUSTMENT



## WARNING

Handle the tools with protective gloves.

### 5.1 SCORER ADJUSTMENT



## WARNING

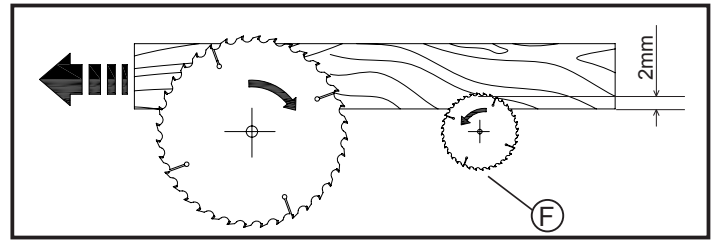
Using scoring blade when cutting composite board. The top height of scoring blade should be 2 mm higher than the operating board. ( 5.1.1)

Tools required:

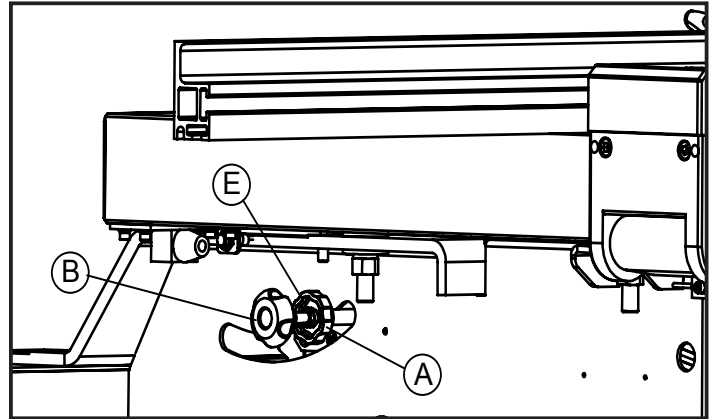
- 5mm socket head wrench

Please adjust the scoring blade as following(5.1.2):

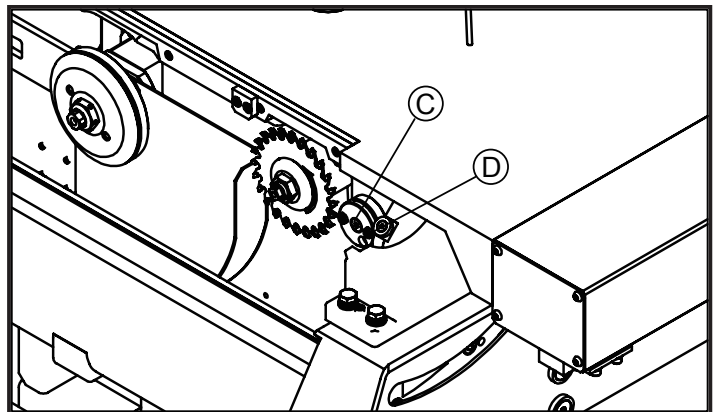
- Loosen the handwheel A, adjust the scoring blade to the right height with knob B, then tighten handwheel A.
- Loosen the bolt D 3 rings using 5mm socket head wrench, then rotating axis C, adjusting the location of the scoring blade, tighten bolt D at last.(5.1.3)



5.1.1



5.1.2



5.1.3



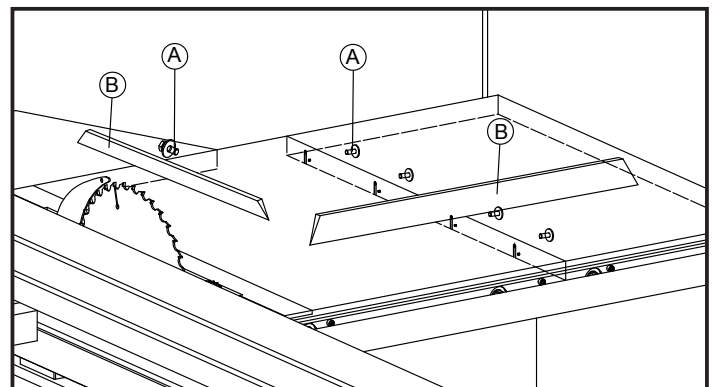
## WARNING

Forbid to adjust nut E after location(5.1.3).

### 5.2 EXTENSION TABLE FLATNESS ADJUSTMENT

Tools required:

- 5mm socket head wrench
- 16mm fork wrench
- Put the straight edge B on the main table and extension table to check the flatness.
- Loosen the bolts A to micro-adjust the flatness.



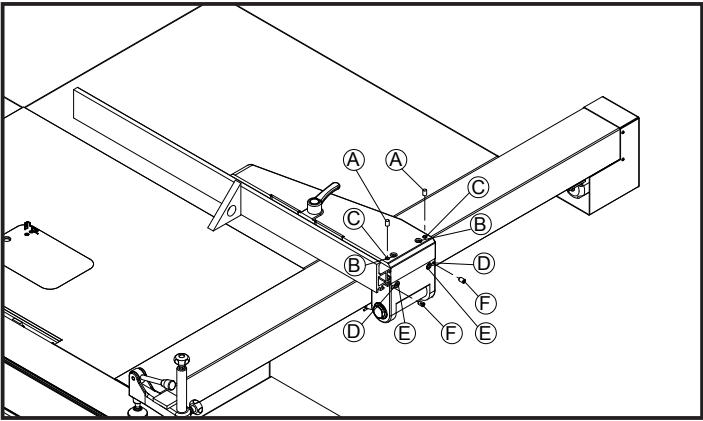
5.2



5.3 RIP FENCE PRECISION ADJUSTMENT

- Tools required:
- 5mm socket head wrench
  - 8mm socket head wrench

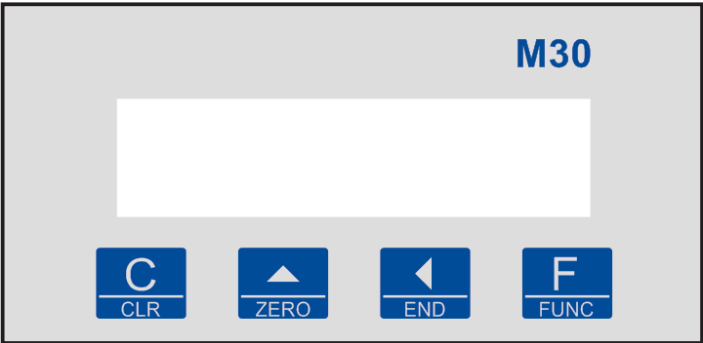
- Check the verticality between table and rip fence. Firstly, remove 2 locking screws A, then loosen 2 bolts B and 2 bolts E. Secondly, adjust 2 bolts C with 5mm socket head wrench to get perfect verticality. At last, tighten 2 bolts B and 2 bolts E, lock 2 screws A.
- Check the parallel between blade and rip fence. Firstly, remove 2 locking screws F, then loosen 2 bolts B and 2 bolts E, adjust 2 bolts D with 5mm socket head wrench to get perfect parallelism. At last, tighten 2 bolts B and 2 bolts E, lock 2 screws F.



5.3

5.4 M30 ANGLE METER INSTRUCTION MANUAL

- 5 digital tube display, clear and easy to read
- Measuring scope:±180°
- Automatically read the angle for unexpected power outage
- Buttons can be locked, avoiding faulty operation.
- Angle data react quickly
- Initial angle setting(0° )
- Final angle setting(45°)



5.4

5.4.1 SPECIFICATIONS/PERFORMANCE

Electric performance		Mechanical performance	
Resolution ratio	0.1°,0.5°	Out dimension	74*36*32mm
Measurement range	±180°	Cutout size	66*32mm
Current	Max.50mA	Fixed mode	Fixed by screw on back
Power	DC:9V~24V;AC:9V~24V	Sensor	Default wire length 2.5m
Operating temperature	0℃~+50℃	Waterproofing grade	Data display instrument IP40, sensor IP65
Storage temperature	-10℃~+60℃	Weight	Max.230g

5.4.2 BUTTON INSTRUCTION



short press: ESC      long press: clear the result, long press again will turn back to earlier result



short press: Increase      long press: show initial angle, initial angle can be set in menu P06, operate cautiously



short press: Move to next      long press: Invalid



short press: Confirm      long press: entering into menu

5.4.3 DISPLAY INSTRUCTION

Display content	Info. Statement
-179.9~180.0	Display the measured angle
E30	Display item no. when turning on
Err06	Sensor fault: 1) sensor damaged: 2) sensor wire damaged: 3) display function damage
Err	Beyond Angle linear correction, calibration failure

#### 5.4.4 MENU INSTRUCTION

No.	Function Description	Parameter	Default parameter	Parameter Description	Remarks
P00	Resolution	0.1、0.5	0.1	Angle display resolution	Default setting 0.1°
P01	Correction parameters	0.0001~2.0000	1.0000	Angle correction parameters	Angle liner proportion adjustment, return ERR if adjustment fail
P02	Shake to unlock	0、0.2、0.5、1、2	0.2	Shake exceed the default degree, unlock automatically.	Default setting 0.2°
P03	Lock time	0~9	5	Maintains a constant Angle for a period of time, lock the Angle	Default setting 5s
P04	Angle direction	0、1	0	Positive and negative Angle switching	0: clockwise Angle is positive; 1: clockwise Angle is negative
P05	Press to lock	0、1	0	Lock CLR、ZERO、END	0: unlock; 1: lock
P06	Initial angle	000.0~359.9	0	Initial Angle value, regardless of the sensor in which position, long press ZERO will display the Initial Angle value	When the initial Angle shows 0, can do any position reset function. Under the guidance of manufacturer operation is recommended.
P07	Final angle	000.0~359.9	45.0	Final Angle value, regardless of the sensor in which position, long press ZERO will display the final Angle value.	Default final angle is 45°, especially designed for woodworking machinery.
P08	Buzzer	0、1	1	Buzz warning every 45°	0: Stop to use; 1: start to use, -135°、-90°、-45°、0°、45°、90°、135°buzz warning

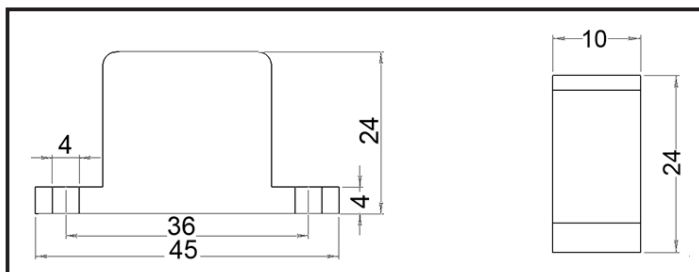
#### 5.4.5 FAST ADJUSTMENT

Internal calibration has been done at factory, if customers have need to do further liner calibration, please following below steps (take woodworking equipment as an example):

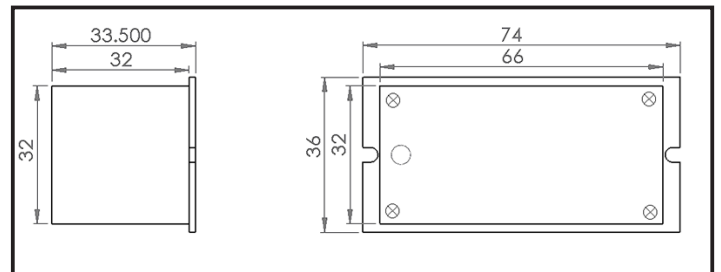
- 1、Equipment operate to the initial position, long press the ZERO key, the current Angle will be set to 0 °
- 2、Equipment operate to END position, long press the END key, the current point is set to 45 °
- 3、Angle linear correction is complete. Adjust the P06, P07 data, can be set to other Angles

#### 5.4.6 DIMENSIONS

Installation instructions: sensors use M3 screws, meter use back panel thimble.



Sensor Dimension



Meter Dimension

#### 5.4.7 CAUTIONS

- When install this product, if the deviation is too big, will influence the use of precision, can't even use
- Please do not use this product in the environment of corrosion, acid or alkali, direct sunlight, etc., it may cause failure.
- Reading head wire bending radius must be greater than 25 mm
- The installation of this equipment should be at least 0.5 meters from the circuit breaker, relay, motor capacitor, brakes, clutch, inverter, etc.
- Cables direction must be separate with power lines in order to reduce noise.

## 5.5 DIGITAL READOUT ADJUSTMENT

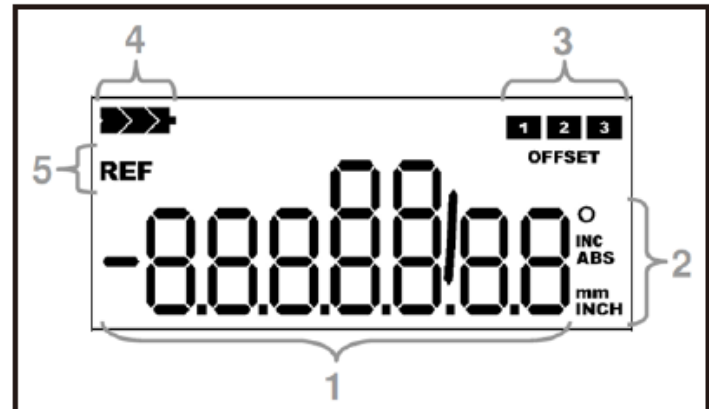
Operation of Digital readout cross cutting fence contains parameters setting panel and operating panel. All signals are inputted by 4 buttons on operation panel and displayed on screen by LED built-in.

### 5.5.1 Overview-Display

The following display icons or segments of the LCD-display are used in this software version.(5.5.1)

- 1-Segments for numeric and text display(including signs, decimal points, fraction display)
- 2-Symbols for units and display mode
- 3-Icons for active tool-offsets 1 ... 3
- 4-Battery-Status Icons
- 5-REF symbol: unit needs to be referenced

- For different applications the symbol may be changed for the unit by parameterP02.
- The standardization of the indicator value must be done manually with the corresponding multiplication factorP08 and the decimal pointP03.
- In the Inch-mode an additional fraction display is available.



5.5.1

### 5.5.2 Key overview

The function of the keys in the parameter level is shown on the button in the dark box on the left below, the function at the operating level is shown in the bright field size. (5.5.2)

Keys	Function at the operating level	Function at the parameter level
	Base-keys for keyboard shortcuts	Parameter level enable/disable
	Fraction display in the Inch mode	Next digit (decades) select
	Incremental enable/disable	Increases the value by 1
	Tool-offsets enable/disable	Sign change

5.5.2

### 5.5.3 Parameter Level

#### 5.5.3.1 Activate the Parameter Level

- Hold for about 3 seconds/ then press each 1x.
- The parameter level is activated with this key. After about 3 seconds the display shows „P01“for the firstparameter. When the button is actuated again, the corresponding parameter value is displayed, which can then be changed. With the help of this all parameters are successfully selected.(5.5.3.1)



5.5.3.1

#### 5.5.3.2 Election of the Decade

- 1x pressed
- With this key the decade will be advanced by a passage from left to right. The selected, changeable decade is flashing on the display.(5.5.3.2)



5.5.3.2


#### 5.5.3.3 Change Value

- 1x pressed
- With this key the value in the selected decade is always increased by 1 (0...9or 0/1)(5.5.3.3)



5.5.3.3


#### 5.5.3.4 Change Sign

- With  key the sign can be changed for some parameters.  
(Negative sign is only possible if the value is not ZERO)(5.5.3.4)



5.5.3.4

#### 5.5.3.5 Leave Parameter Level

- Press  for about 3 seconds in the parameter level
- All parameters will be retentively stored in the internal flash memory when leaving the parameter level.  
(5.5.3.5)





5.5.3.5

#### 5.5.3.6 Parameter list

Parameter:	Description:	Default:
P01: A	System configuration: A = 0: Counting positively A = 1: Counting negatively	1
P02: A	Display mode (affect only the display of symbols!) A = 0: mm-Mode / Display symbol „ mm “ A = 1: Inch-Mode / Display symbol „ Inch “ A = 2: mm-Mode / Display symbol „ m “ A = 3: mm-Mode / Display symbol „ ° “ A = 4: mm-Mode / Display non symbol	0
P03: A	Decimal point ( 0 ... 4 ) only for mm-Mode	1
P05: ABC	Keylock: A: Key „Set“ (0= activated / 1= deactivated) B: Key „Incr/Abs“ (0= activated / 1=deactivated) C: Key „*“ (0= activated / 1= deactivated)	000
P08:	Multiplication factor ( 0,0001 ... 9,9999 )	0.1000
P09:	Reference value ( -9999999 ... +9999999 )	Factory setting
P10:	Offset 1 ( -9999999 ... +9999999 )	0
P11:	Offset 2 ( -9999999 ... +9999999 )	0
P12:	Offset 3 ( -9999999 ... +9999999 )	0
P13: A	Configuration Offset (0...3) A = 0: offset cannot be activated A = 1: offset 1 can be activated A = 2: offset 1 & 2 can be activated A = 3: offset 1 & 2 & 3 can be activated	3
P90:	(without function)	0
P99:	Indicator in the company version	x.xx

## 5.5.4 Function at the Operator Level


### 5.5.4.1 Working with the device

- Keys   1x press at the same time
  - With this shortcut, the actual value (display value) on the adjustable reference value is set (in absolute -mode only possible when the offset is not enabled).
  - The reference value can be entered with the parameter P09.
- (5.5.4.1)



5.5.4.1


### 5.5.4.2 Switching incremental or absolute

- 1x pressed 
- With this key the indicator is switched from absolute mode to incremental mode:
- The display value is temporarily set to ZERO, the symbol „INC“ appears in the display.
- Actuating the key again the absolute is activated and the symbol “ABS” is displayed.(5.5.4.2)



5.5.4.2


### 5.5.4.3 Activation Offset Measurements

- 1x pressed 
- This key enables/disables each of the three adjustable offset dimensions (only possible in the absolute mode). In each case an offset is added to the display value.
- The activation of an offset level is indicated by the symbols 1, 2 or 3.
- The offset measurements can be entered in the parameter P10, P11 and P12.
- Additionally, parameters can be determined with P13, whether and how many offset measurements can be selected.(5.5.4.3)



5.5.4.3

### 5.5.4.4 Fraction Display in the Inch-Mode

- 1x pressed 
- With this key the display can be changed in the Inch-mode (parameter P02 = 1) as follows:
  - 1x key pressed: Display Inch- fraction display 1/64 Inch
  - 1x key pressed: Display Inch- fraction display 1/32 Inch
  - 1x key pressed: Display Inch- fraction display 1/16 Inch
  - 1x key pressed: Inch-Decimal Display 0.001 Inch etc.(5.5.4.4)



5.5.4.4

## 6. OPERATING PROCEDURES



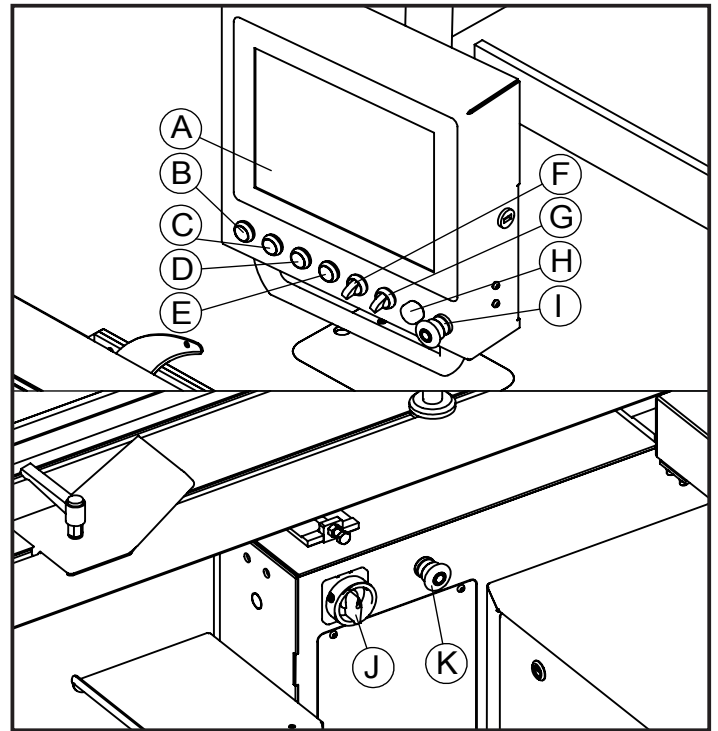
### WARNING

Please be careful to operate the machine while saw blade is running and always DO NOT use the machine unless all the guards and safety devices are normal.

### 6.1 Panel keys

Panel keys like Figure 6.1

- A- Operation panel
- B- Main blade start button
- C- Scoring blade start button
- D- Blade stop button
- E- Cutting next step button
- F- Main blade elevating button
- G- Main blade tilt button
- H- Power supply indicate light
- I- Scram button
- J- Main power control switch
- K- Scram button



6.1

#### - Power on

Switch on main power control switch J, indicate light H works accordingly, then operation panel shows WINDOWS desktop, double click "SCut.exe" to access main operation interface.

System main program locates in "For jinling xx" file under the inventory of C disk. The operation interface can also be opened through "SCut.exe" under the inventory of C disk

#### - Power off

Click main operation panel **QUIT** interface button, then turn off the computer through "start" menu. Power off main power control switch J. Finally disconnect the power.



### CAUTION

Please make sure the right shut down procedure, Power off the main electric control switch after turning off the computer to avoid obliterated data.

### 6.2 Main operation panel

- T-SET** - Layout optimization panel
- M-CUT** - Manual operation panel
- A-CUT** - Automatic cutting panel
- PARA** - Parameters operaiton panel
- INFO** - System information display panel
- QUIT** - Quit system
- Soft keyboard start button

**System is working properly!** - System status display bar

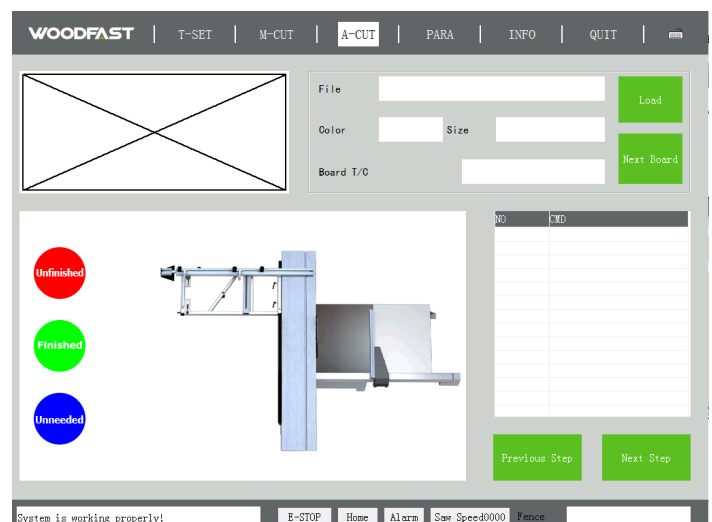
**E-STOP** - Emergency status display bar

**Home** - Back to the zero status display bar

**Alarm** - Rip fence collision alarm display bar

**Saw Speed0000** - Main saw blade speed display bar

**Fence** - The fence absolute position display bar



6.2



## WARNING

When use this machine for the first time or the parameters of saw blade tilt, saw blade lifting and rip fence has discrepancy to the practical, enter manual operation panel **M-CUT** and click **Home SRCH** in the box of saw tilt, saw up-down and positioning fence to calibration in turn. Otherwise, the machine cannot work properly.



## WARNING

Click **Home SRCH** button, ensure no collision risk when back to the zero stroke, next click "OK" button in the dialogue of "SCut".



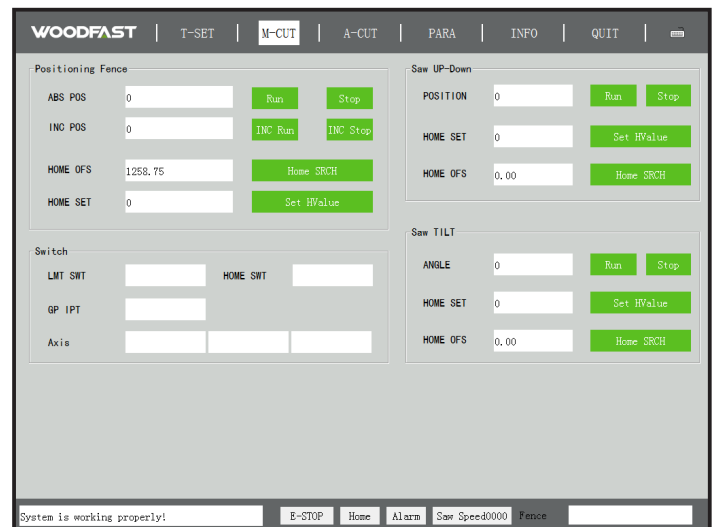
## WARNING

System status shows **System is working properly!**, the machine can work properly;  
 - Safety switch is open, shows red alert status, the machine can work after release alarm.  
 - If the rip fence has collision risk with the saw blade guard and saw blade, alarm shows in the operation panel, the rip fence can work after release alarm

### 6.2.1 Manual operation panel

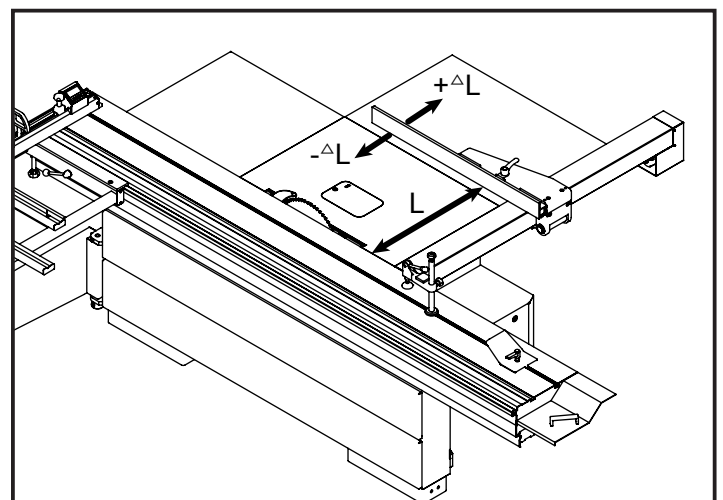
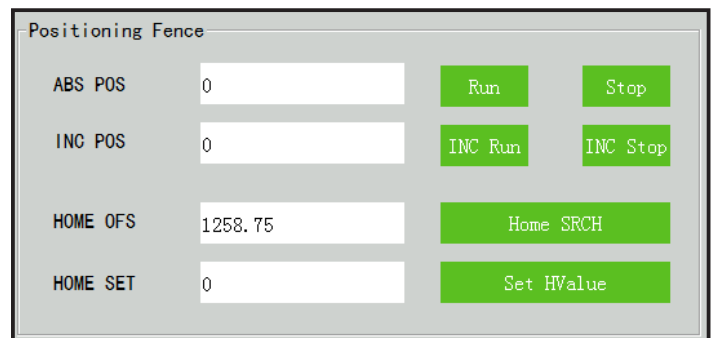
#### ● Manual Operation panel (6.2.1)

- Positioning Fence** - Rip fence cutting display column
- Switch** - Switch status display column
- Saw UP-Down** - Main blade lifting display column
- Saw TILT** - Main blade tilt display column



#### ● Fence Operation panel (6.2.1.1)

- ABS POS** -Distance "L" between fence and blade
- INC POS** -Fence moving distance " $\Delta L$ "
- HOME OFS** -Distance between fence zero position and main blade
- HOME SET** -Manual setting distance between fence zero and main blade
- Run** -Moving fence to the right position
- INC Run** -Increment with fence moving
- Stop** **INC Stop** -Fence stop moving
- Home SRCH** -Fence searching zero automatically
- Set HValue** -Setting practical distance from fence to blade







## CAUTION

- **INC POS** Input negative value, fence moving close to blade
- **INC POS** Input positive value, fence moving close to zero position
- **HOME OFS** Different from practice, change **HOME OFS** to practice, reset **Home SRCH**; Fence deviation distance < 1250mm, reset
- **HOME SET** is used in debugging machine for manufacturer

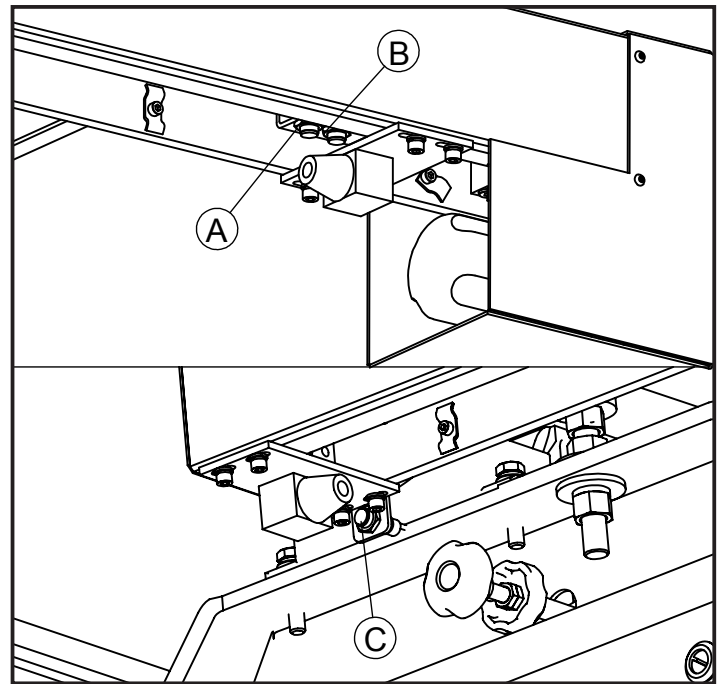
When **Fence** shows different location to the practice, set input value as the practice value.

### Fence deviation zero location 6.2.1.3

A-Zero switch

B-Positive limitation switch

C-Negative limitation switch



6.2.1.3

### Right status for fence zero and absolute location like 6.2.1.4

#### ● Saw blade lifting operation panel (6.2.1.5)

**POSITION** - Distance between blade to slide table

**HOME SET** - Manual set distance between blade zero to slide table

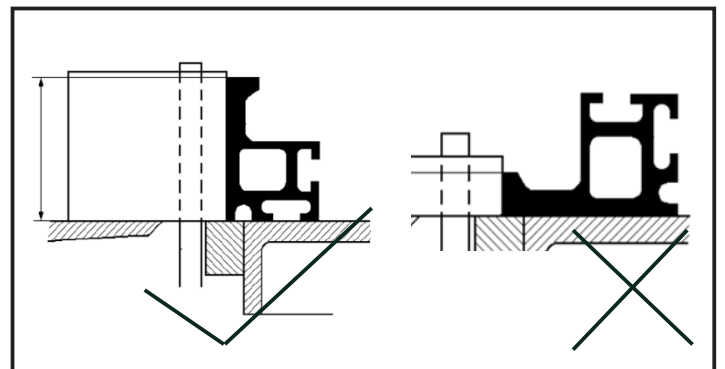
**HOME OFS** - Distance between blade to zero (Default to zero, inalterable)

**Run** - Blade moving to corresponding position

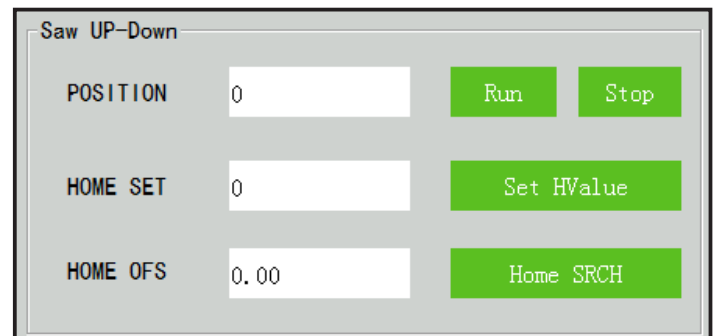
**Stop** - Blade stop moving

**Set HValue** - Set practice distance between blade to slide table

**Home SRCH** - Blade searching zero automatically



6.2.1.4



6.2.1.5



## CAUTION

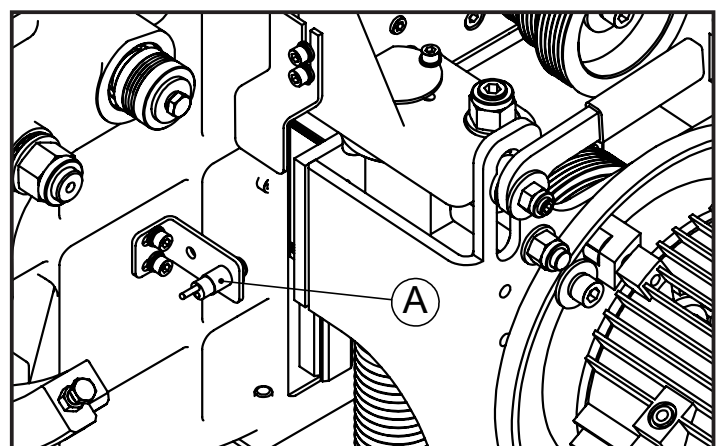
- **HOME OFS** is different from practice, adjust zero switch position, reset **Set HValue**
  - **HOME OFS** is used in debugging machine for manufacturer
- When **POSITION** shows different location to the practice, set input value as the practice value.

### A-Lifting zero switch(6.2.1.6)



## WARNING

The default specification of blade is  $\Phi 400$ . If change to other models of blade, set the lifting height manually



6.2.1.6



### ●Blade tilt operation panel (6.2.1.7)

**ANGLE** - Blade tilt angle

**HOME SET** - Manual set blade tilt angle

**HOME OFS** - Tilt from blade to work table( Default to zero, inalterable)

**Run** - Blade deflect to corresponding position

**Stop** - Blade stop deflecting

**Set HValue** - Set practice tilt angle from blade to work table

**Home SRCH** - Blade searching zero automatically



#### CAUTION

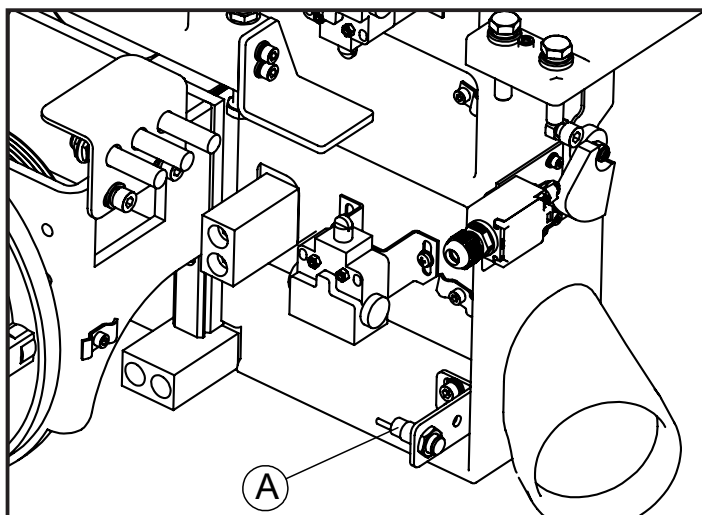
- **HOME OFS** is different from practice, adjust zero switch position, reset **Set HValue**

- **HOME SET** is used in debugging machine for manufacturer

When **ANGLE** shows different location to the practice, set input value as the practice value.

A- Tilting zero switch(6.2.1.8)

6.2.1.7



6.2.1.8

## 6.2.2 Layout optimization panel

### ●Layout optimization panel (6.2.2)

**TypeSetting Show** - Layout plan display column

**TypeSetting Operation** - Raw material board setting column

**Part List** - Finished board display column

**Part Operation** - Finished board setting column

NO	LEN	WIDTH	THK	QTY	COLOR
1	2000.0	300.0	18.0	6	

6.2.2

### ●Layout preview panel (6.2.2.1)

**Board T** - requisite amount for raw material board

**/C** - Single raw material board preview

**Pre-Board** - Preview last raw material board layout

**Next-Board** - Preview next raw material board layout

6.2.2.1

- File** - Open/Save names of parts list
- Saw W** - Set blade width
- Margin** - Raw material board layout deburring size
- Open** - Open new finished board list
- Save** - Save new finished board list
- AutoTypeset** - Layout fishied board as raw material
- Save T-File** - Save layout files
- B-Size** - Set length, width and thickness of board/  
Choose saved raw material board

### 6.2.2.2

 **CAUTION**

- ### ●Parts list panel (6.2.2.3)

### 6.2.2.3

L    2000    W    600

- Set size, length and width of board/Choose saved finished board

Qty - Single finished board number

Add - Input length, width and numbers of finished board into parts list

Clear - Empty parts list

Delete - Delete selected number from parts list

Modify - Revise selected parameters from parts list

Collect - Collect current finished board

#### 6.2.2.4

## 6.2.3 Automatically cutting panel

### ●Automatically cutting panel (6.2.3)

**File** - Finished layout plan

**Color** - Finished board color

**Size** - Size of raw material:length, width, thickness

**Board T** -Required numbers of raw board according to layout

**/C** - Preview order of single raw board

**Load** - Open layout plan saved

**Next Board** - Preview layout plan and cut next raw board

**Previous Step** - Fence carry out last instruction

**Next Step** - Fence carry out next instruction

**Unfinished** - Current steps cutting left raw material

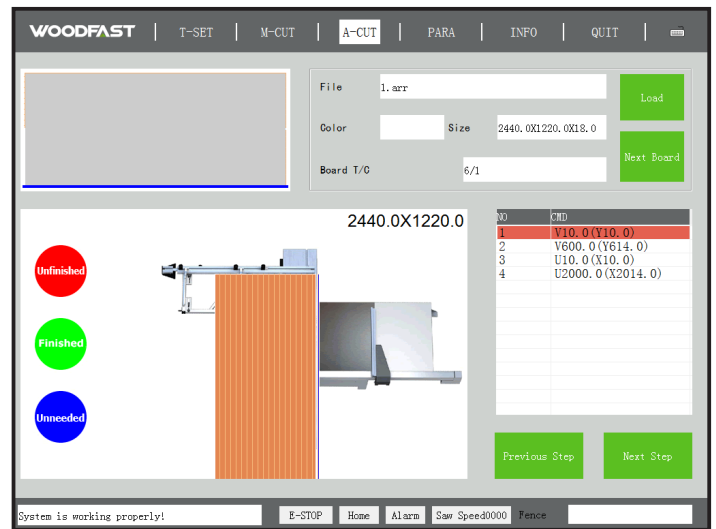
**Finished** - Current steps cutting finished board

**Unneeded** - Current steps cutting generated waste



### WARNING

Automatically cutting panel, forbid blade tilt over 0°



6.2.3

## 6.2.4 Parameters operation panel

### ●Parameters operation panel (6.2.4)

**Language** - Language switch column

**Unit (mm)** - Set unit of measurement

**mm** - Set metric system

**inch** - Set british system

**Saw Compensation**

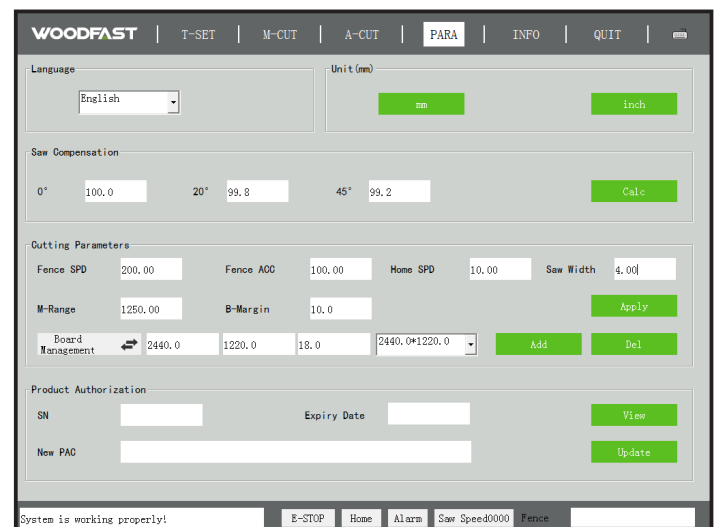
- Deviation offset compensation of tilt blade caused by blade tilt( Set by manufacturer, unalterable)

**Cutting Parameters**

- Parameters of fence setting column

**Product Authorization**

- Authorized information display column



6.2.4



**CAUTION** The machine will be unable to run when the authorization is failed, please contact manufacturer.

### ●Cutting operation panel (6.2.4.1)

Cutting Parameters					
Fence SPD	200.00	Fence ACC	100.00	Home SPD	10.00
M-Range	1250.00	B-Margin	10.0	<div>Apply</div>	
<div>Board Management</div> <div>↔</div> <div>2440.0</div> <div>1220.0</div> <div>18.0</div> <div>2440.0*1220.0</div>					
				<div>Add</div>	<div>Del</div>

#### 6.2.4.1

**Fence SPD** - Fence running speed( Set by manufactuer, unalterable)

**Fence ACC** - Fence acceleration (Set by manufactuer, unalterable)

**Home SPD** - Fence running speed when back to zero (Set by manufactuer, unalterable)

**Saw Width** - Main blade width

**M-Range** - Fence maximun stroke when rip cutting (Set by manufactuer, unalterable)

**B-Margin** - Raw material layout deburring width

**Apply** - Change blade width, default deburring width

**Board Management** ↔ - Switch to board management, press **B-Size** ▲ to act

**Part Management** ↔ - Switch to parts management, press **L** ▲ to act

**Add** - Add size to collection

**Del** - Delete current size collected

## 6.3 Replace belt and adjust rotate speed

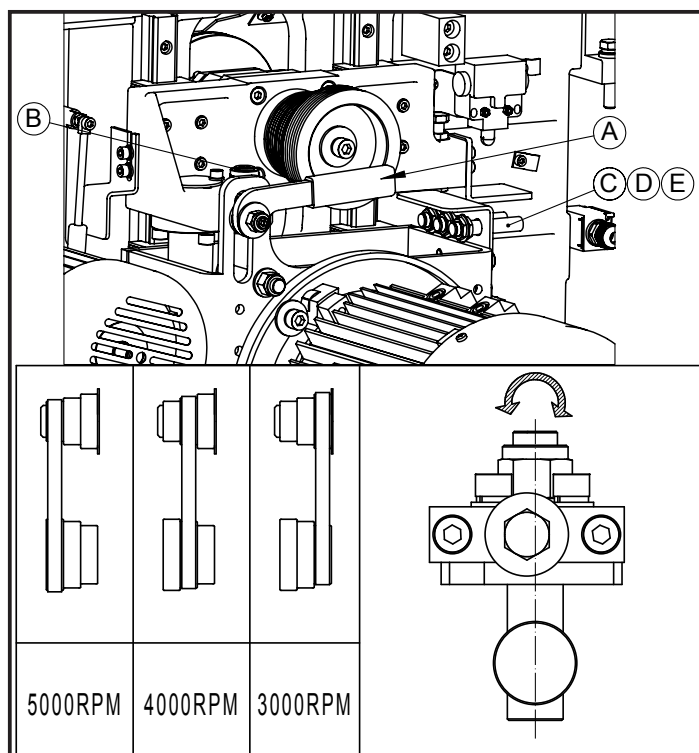
A- Locking handlebar

B- Speed regulating bolt

C/D/E-3000/4000/5000RP moptoelectronic switch

- Tools required
- T-type internal hexagon wrench

- Firstly, elevating the saw blade to the highest location, then take off the cover from the worktable
- According to the direction from 6.3.1, pull up locking handlebar A, and rotate speed-regulating bolt B along clockwise, last loosen belt.
- When replace the belt, take out the old one and add a new one, then rotate speed-regulating bolt B along anticlockwise.
- When regulate the speed, put the belt on the proper position, tighten the belt and lay down the worktable cover-
- Speed of main blade 0000 shows discrepancy to the practice, turn the induction knob on optoelectronic switch C/D/E ( 6.3.2) to regulate photoelectric induction distance.

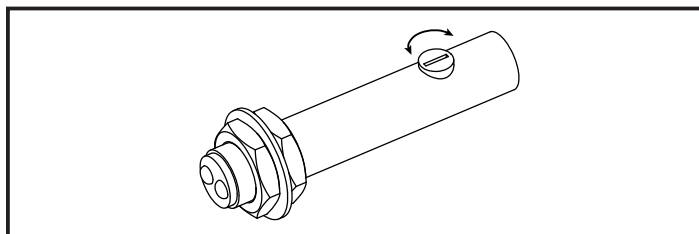


6.3.1



### WARNING

- Ensure pre-regulating speed of main blade is lower than the fastest safety speed.
- Periodic cleaning the powder inside of optoelectronic switch C/D/E to ensure best working status.



6.3.2

## 6.4 Cutting operation

Choosing cutting method is mainly according to wood size and cutting technology. When cutting valuable wood material, using scoring blade could help to avoid break or burr. When not need scoring blade, please drop it to bottom of table.

### 6.4.1 Manual cutting model

- After starting up machine, on operation panel (6.2), click **M-CUT** into manual operation panel (6.4.1).
- Click blade tilting "Start Searching Zero Position", Blade lifting "Start Searching Zero Position" and Fence "Start Searching Zero Position" button, when status line in bottom of the screen show "System work normally", machine begin to work normally.
- After setting fence position, main blade lifting height and main blade titling angle on operation screen ( 6.4.1), you could cutting wood material in normal manual method.
- Main blade lifting height also could be set up by main blade lift button F through panel button ( 6.1).
- Main blade tilting angle also could be set up by main blade tilt button G through panel button ( 6.1).
- Operator push wood material according to cutting demand.



#### WARNING

- Prohibit putting down fence
- Prohibit using main blade with diameter over  $\varnothing 400$

### 6.4.2 Design arrangement drawing

After starting up machine correctly, click **T-SET** into arrangement operation panel (6.4.2) on main operation panel (6.2)

#### ●Setup raw material panel

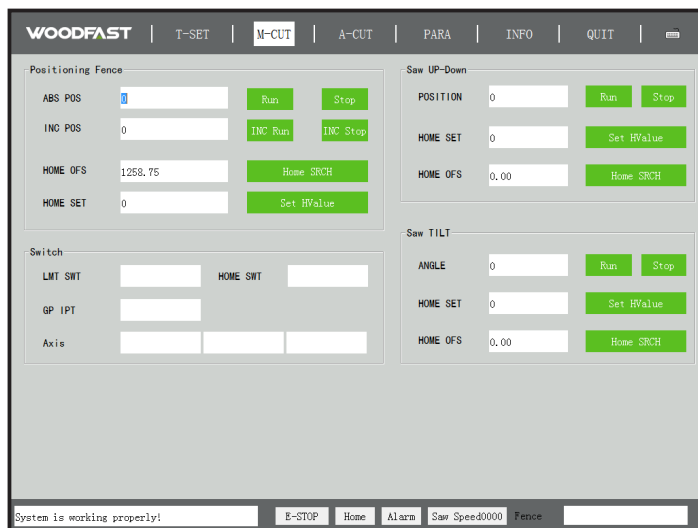
- Click **Saw W** button in arrangement operation list, setup main blade edge width according to exact setting main blade edge wide.
- Click **Margin** button in arrangement operation list, setup deburring size of raw material panel.
- Click **B-Size** button in arrangement operation list, setup length , width and thickness of raw material panel ; or click **B-Size** button to choose collected raw material panel specification.

#### ●Set-up finished board

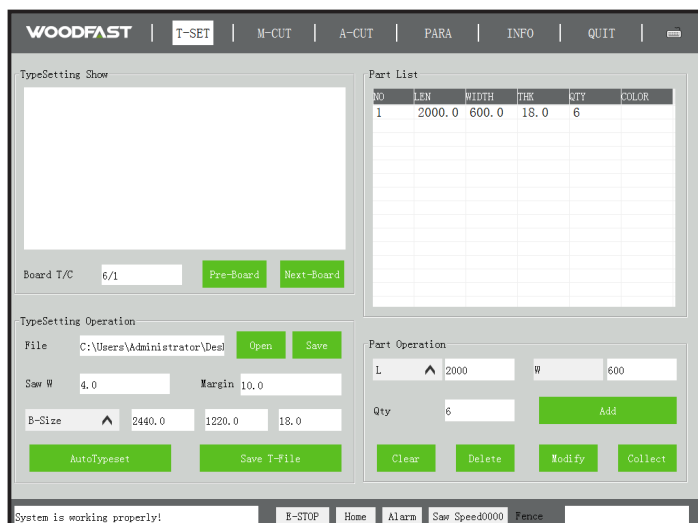
- Setup panel length and width in part operation list **L** 2000 **W** 600 ; Or choose collected panel **L** through click.
- Setup quantity of unit made-up articles panel through click **Qty** button in part operation list.
- Click **Add** button to lead current length, width and quantity of panel to part operation list.

#### ●Create arrangement optimum proposal.

- Click **AutoTypeset** button in arrangement operation list, Made-up articles list makeup optimization according to raw material panel size, and show on arrangement preview list.
- Click **Save T-File** button in arrangement operation list, save the arrangement optimum proposal in folder of computer.
- Complete arrangement optimum proposal design



6.4.1



6.4.2

### 6.4.3 Auto cutting model

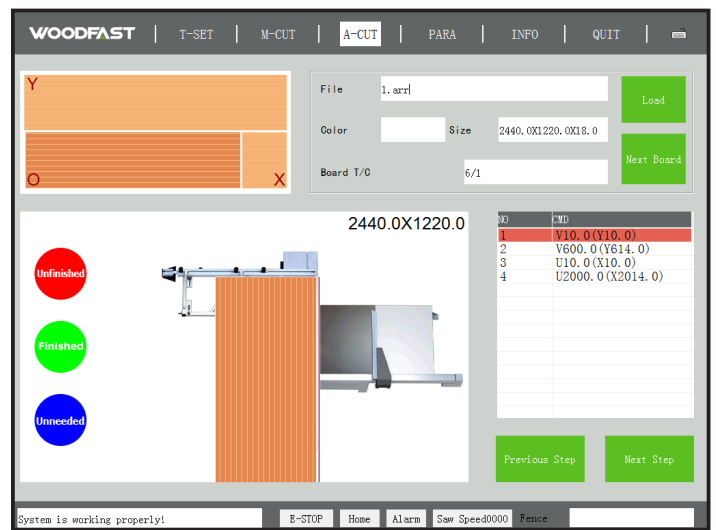
On main operation panel (6.2), click button **A-CUT** into auto operation panel (6.4.3)

#### 6.4.3.1 Manual uploading arrangement optimization file

- Click **Load** button, chose arrangement model to save optimum proposal, cutting length and order will show on widow after complete.

#### 6.4.3.2 Cutting material automatically

- Click **Next Step** button or panel (6.1) "NEXT" button E, the system will control fence to next order automatically  
 -Operator push material for cutting according to cutting note graphic, cutting proposal preview graphic shown in auto operation list.



6.4.3



#### WARNING

Prohibit put down fence  
 Prohibit use main blade with diameter over  $\varnothing 400$   
 Prohibit blade tilting angle over  $0^\circ$

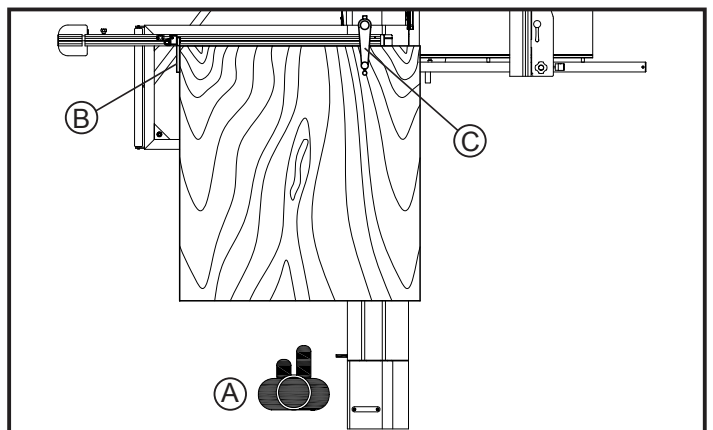


#### CAUTION

If need joint furniture design software, please contact local agency or manufacture

### 6.4.4 Cutting wood with sliding table

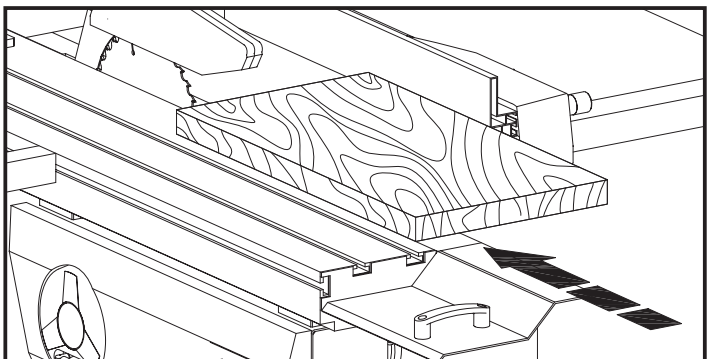
- Put the wood board on sliding table, fix the wood board with block B and wood presser C  
 - Operator stand in the A position, push the handle on sliding table, cutting wood board, complete cutting operation.



6.4.4

### 6.4.5 Cutting wood with fence bracket

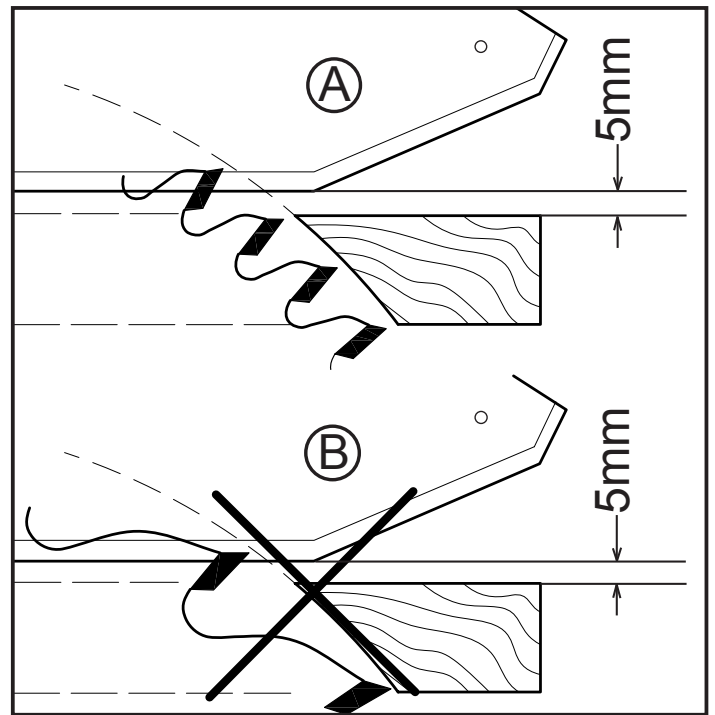
- Lock sliding table. Adjust the position of fence bracket, get close to side of wood board, push wood board to blade direction.  
 - Consider your safety, we suggest you push the wood board through plastic handle.  
 - When you cutting small size wood board, please use small push hand to avoid cutting your finger.



6.4.5

## 6.5 CORRECT USE FOR THIS MACHINE

- First make sure that the machine does not vibrate. Do not try to take off the material when the cut has already started; proceed with a continuous and uniform speed. workpiece feeding towards the blade (especially where there are knots) should not be too fast (feeding speed should be in accordance with workpiece thickness). Do not let workpieces stop between the saw fence and the blade.
- Avoid contact of the tips against metallic objects. When necessary sharpen the saw blade. Often clean the steel body and the tips with proper liquid products. Let the saw blade in the bath, then clean it with brush: don't use metallic brushes. As regards the toothing at least 2-3 teeth shall cut at the same time A. If only one tooth cuts B, you don't get a good cutting. Whenever this is possible, it is also critical to lift the blade until the whole tooth cutting part protrudes from the wood thickness.



6.5

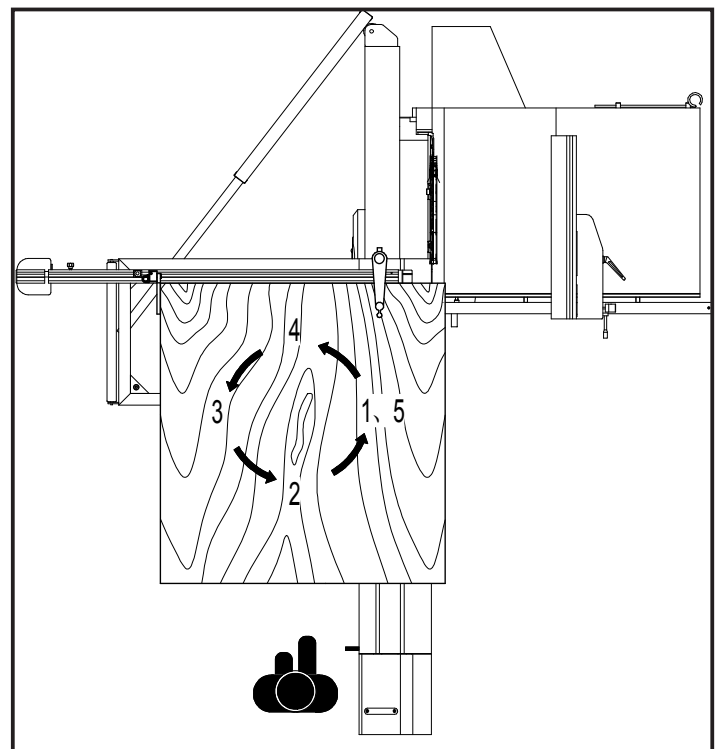


### WARNING

Before touching the machine parts, ensure to turn off the main switch and disconnect the general power supply.

## 6.6 The adjustment of the machine after the cutting party inspection

Before cutting party should guarantee the sliding table and guiding rule adjustment in place, you should use sharp quality assured saw blade, choose a 1000 mmx1000mm particieboard or density board, 19 mm thickness is greater than the last saw trimming will be tight on the guiding rule, plank counterclockwise, each 10 mm, cutting 5 times, check the 5th after cutting wood width, requires the allowed tolerance shall not be more than 0.2 mm.



6.6



## 6.7 Texture and use of saw blade comparison table (for reference only)

material	Cutting speed(m/s)	Diameter of feed saw blade D=250mm	Diameter of feed saw blade D=300mm	Diameter of feed saw blade D=350mm	Diameter of feed saw blade D=400mm
Soft wood Longitudinal cutting	60-80	24W	28W	32W	36W
Soft wood crosscutting	60-80	40W	48W	54W	60W
Hard wood Longitudinal cutting	60-80	24W	28W	32W	36W
Hard wood crosscutting	60-80	40W	48W	54W	60W
veneers	70-80	60W	72W		
Pressing plate	50-70	40W	48W		
Composite board	60-80	48W	60W	72W	
plywood	50-80	40W	48W	54W	
Particle board	60-80	48W	60W	72W	
Coated particle board	60-80	60TF	72TF	84TF	
Density board	60-80	48W	60W	72W	
Coated density board	60-80	60W	72W	84W	
Fiber board	60-80	60W	72W	84W	
sheet	50-70	60TF	72TF	84TF	
Gypsum board	40-60	48W	60W	72W	

Remarks: W: staggered teeth (left and right teeth)

TF: ladder teeth

Groove saw blade specification: diameter = 120mm, 24 teeth, ladder teeth, inner hole diameter =20mm



# 7. MAINTENANCE



## WARNING

Disconnect the general power supply before doing any maintenance.

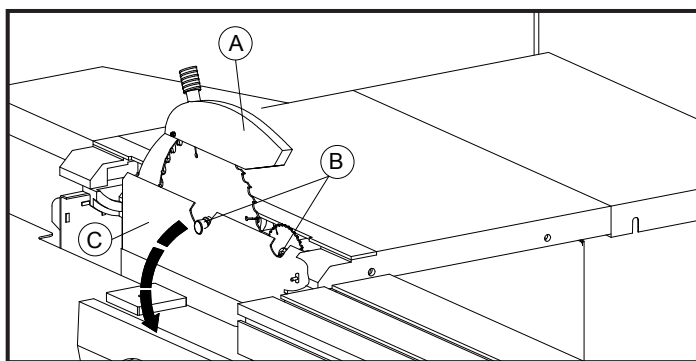
### 7.1 REPACE SAW BLADE



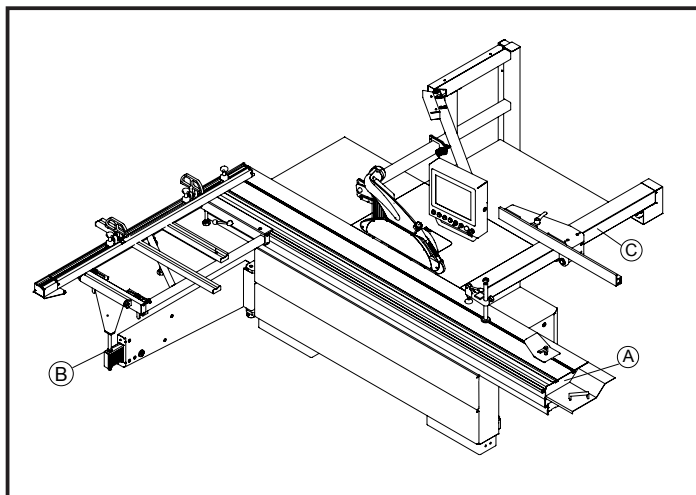
## WARNING

Only correctly sharpened saw blades manufactured in accordance with the requirements of EN 847-1:2005 shall be used. Don't use the saw blade whose maximum marked speed is lower than the maximum rotational speed of the saw spindle. Please always keep the gap between the riving knife and the saw blade to be at least 3mm and not exceed 8mm.

- Rotate the blade lifting handwheel to move the blade to toppest position.
- Take out the blade guard A.
- Push the sliding table to backmost position.
- Open the blade cover D.
- Unscrew the nut C to take out the blade for replacement.



7.1



7.2

### 7.2 OVERALL CLEANING



## WARNING

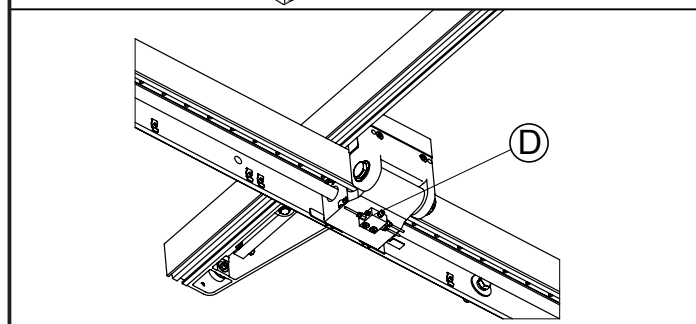
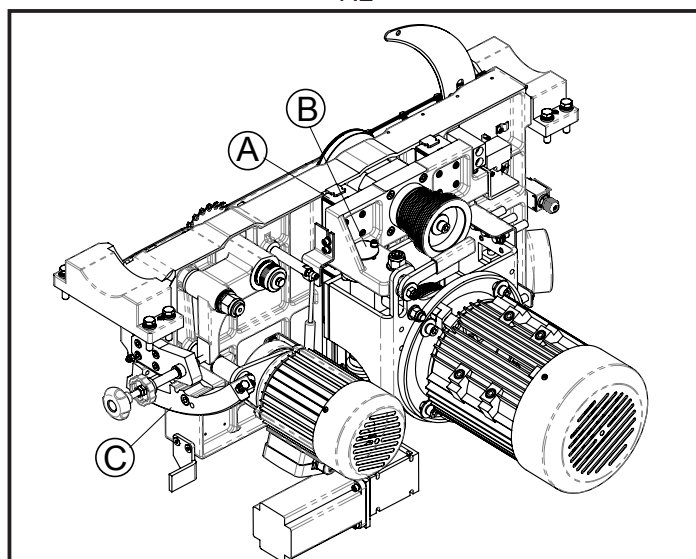
Please DO NOT to try removing chips while the saw blade is running.

After each working cycle, thoroughly clean the machine and all of its parts, vacuum the shavings and dust and remove any resin residues.

Use compressed air only when strictly necessary, using protective glasses and a mask.

In particular, clean the following parts:

- the sliding table rail A;
- the sliding support extension B;



7.3

### 7.3 GENERAL LUBRICATION

- Weekly clean and lubricate all the mobile couplings of the machine A with a thin film of oil and grease.
- Protect all belts and pulleys to avoid contamination with oil.

### 7.4 REPLACEMENT AND DISPOSAL

Should replacement become necessary, the machine parts must be replaced with original components in order to guarantee their efficiency.

The replaced parts must be disposed of in compliance with the laws in force in the country of use.

Component replacement requires specific training and technical skills; for this reason, the above interventions must be carried out by qualified personnel to prevent damage to the machine and risks to the safety of persons.



## CAUTION

- In case of mechanical or functional faults in the machine, including guards or tools, please call the local authorized agent for technical assistance and maintenance.
- Any maintenance must be only done when the machine is isolated from all energy sources (plug out).

# 8. TROUBLE SHOOTING



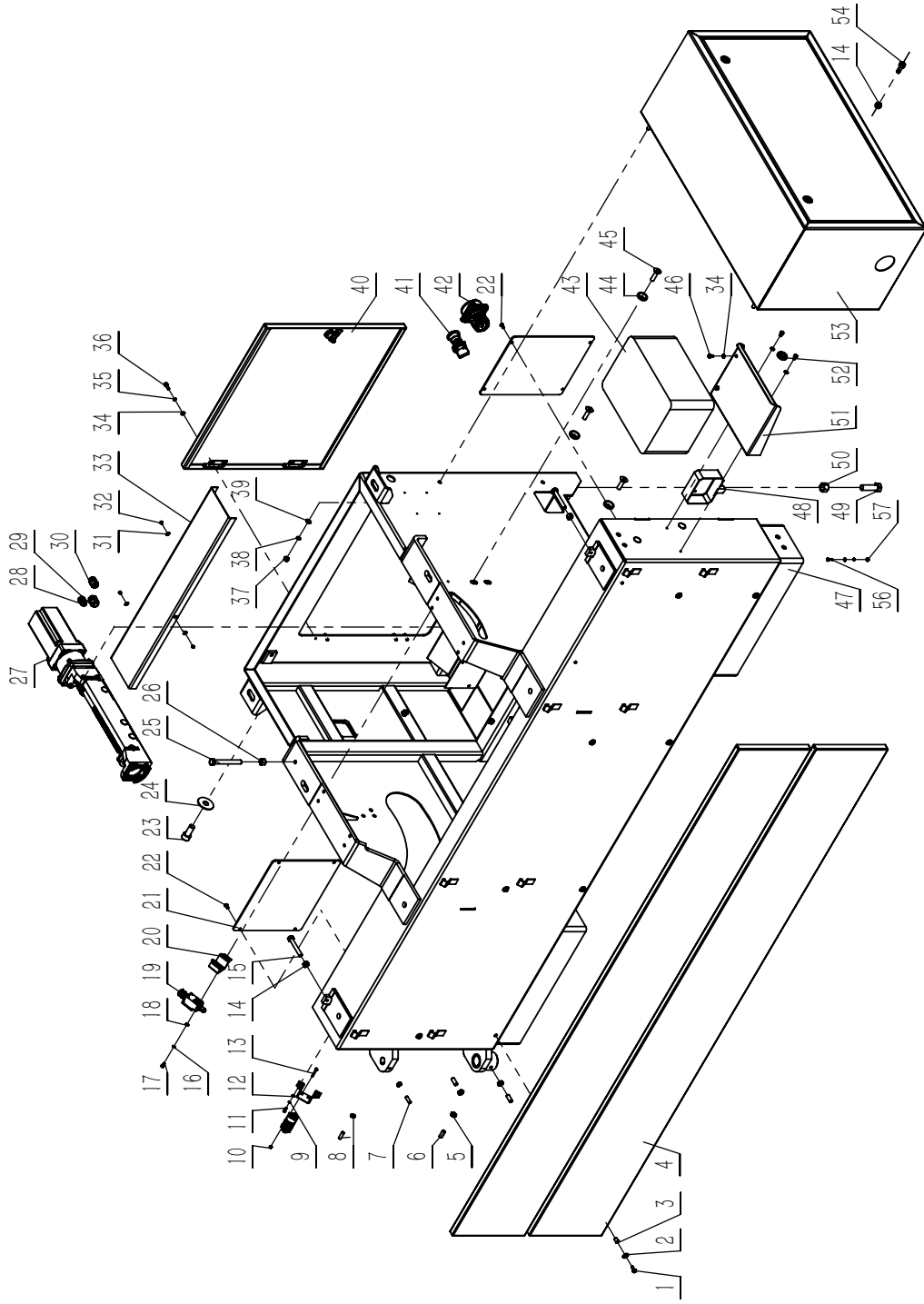
## WARNING

- For any information or problem contact your area dealer or our technical service center. The necessary interventions must be carried out by specialised technical personnel.
- Before carrying out any fault service or maintenance work, please always TRUN OFF THE SWITCH, UNPLUG POWER CABLE, WAIT FOR SAW BLADE TO COME TO STANDSTILL.

Common problems	cause	solutions
The device stops or does not start	1. Motor overload, into protective status	1. Wait for the motor to cool and restart
	2. Overload protection start	2. Reset the circuit breaker
	3. The emergency stop button is pressed	3. Pull back the emergency stop button
	4. The safety switch is not activated (the saw blade cover is open)	4. Close saw blade cover
	5. Power failure or factory power supply	5. Find out if the reason for the power failure of the factory is missing
	6. The fuse is burned and damaged	6. Replace the fuse
	7. Use an unsharp saw blade or feed speed too quickly and result in overload protection start	7. Wait for the motor to cool and restart or reset the circuit breaker
	8. Damaged wire cable or loose wiring	8. Replace cable or check wiring
Amounted to less than 45° or 0° cutting	1. The saw blade has not searched for zero position	1. Researching the saw blade deviation
	2. The adjustment of the zero-position switch of the saw blade is incorrect	2. Adjust the position of the zero position switch of the saw blade
Get stuck on the workpiece when entering	1. The saw blade is not sharp	1. Replace the sharp saw blade
	2. Not match the blade thickness with the saw blade used	2. Install the correct heel plate; The thickness must be greater than the thickness of the saw blade
The forming size of the workpiece is not consistent with the sawing width	1. The ruler is not accurate	1. Adjust the ruler by ruler
	2. The baffle does not search for zero	2. Research for baffle zero
	3. Adjustment of baffle zero deviation is incorrect	3. Change to the actual zero offset, and re-search the baffle zero
	4. Adjustment of baffle zero switch is incorrect	4. Reset the position of baffle position
When using material baffle, wood and saw card die	1. The material baffle is not parallel to the saw blade, and the direction is reversed	1. Check and reset the parallelism
	2. Timber bending	2. Replace a piece of wood
	3. The feeding speed is too fast	3. Reduce feeding speed
	4. Not parallel to blade and saw blade	4. Readjust the parallelism of the blade blade relative saw blade
The cutting effect is not ideal	1. The saw blade is not sharp	1. Replace the saw blade
	2. The saw blade is installed backwards	2. Reinstall the saw blade
	3. The saw blade is not clean	3. Remove the saw blade and clean it
	4. Use non-conforming saw blades	4. Replace the appropriate saw blade
	5. The table is not clean	5. Clean the workbench
With a slotting saw	1. The main saw and slot saw are not in a straight line	1. Adjust the position of slot saw blade
	2. Slot saw blade is too narrow	2. Adjust slot saw blade height or replace slot saw blade
The workpiece is warped with a slotting saw	1. Slot saw blade is not sharp	1. Replace the slot saw blade
	2. Slot saw blade height is not enough	2. Adjust the blade height

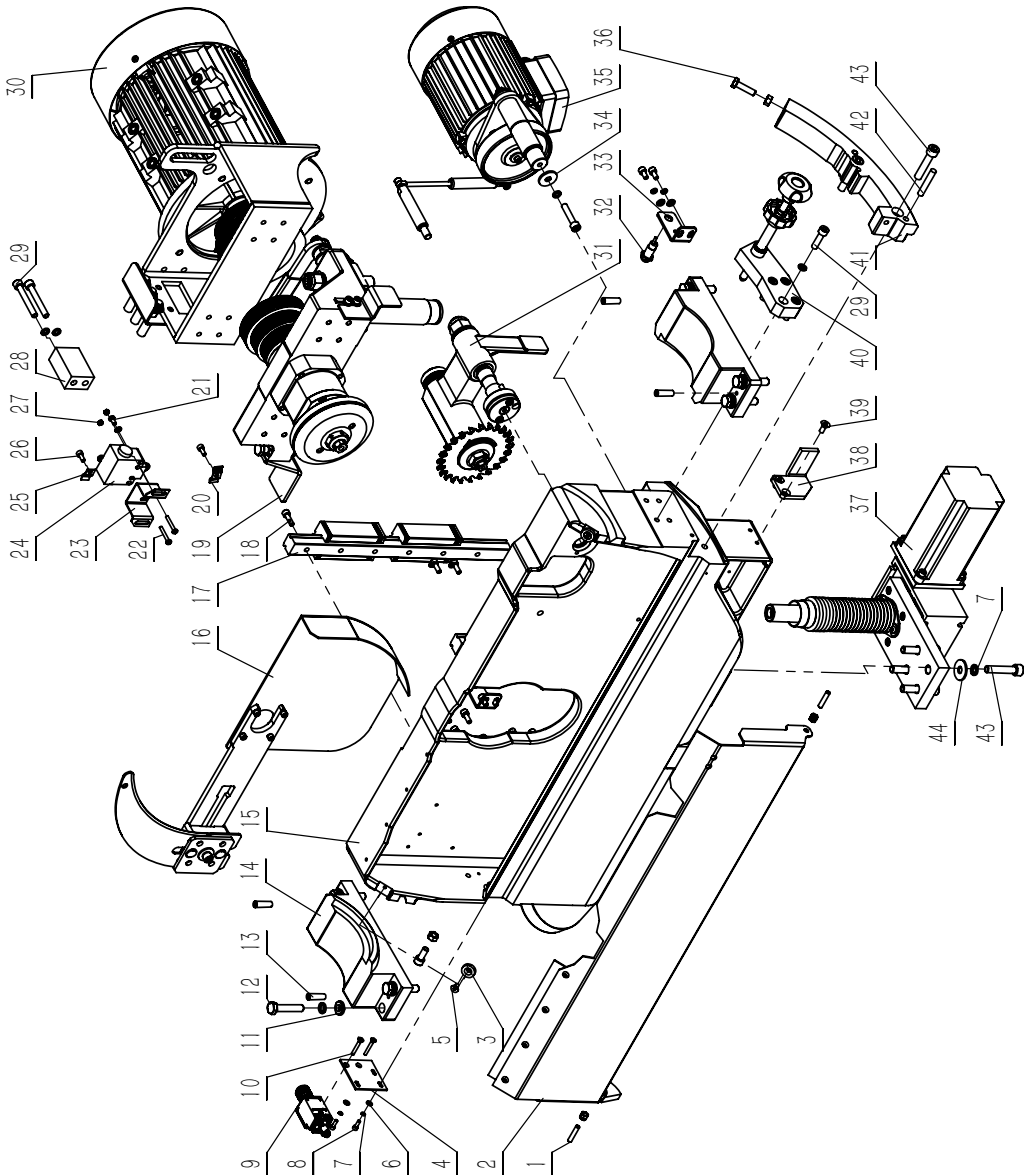
Common problems	cause	solutions
The saw blade is too slow	1. External cable extension cord is too light or too long	1. Replace the cable with suitable size
	2. Low voltage	2. Contact the local power company
	3. The wrong voltage of the motor	3. Check the motor terminal box and connect the correct voltage
Vibration is too large	1. Uneven floor	1. Adjust the position and place on the flat surface
	2. Blade damage	2. Replace the saw blade
	3. The belt is badly worn	3. Replace the belt
	4. Bend the pulley	4. Replace the pulley
	5. The motor installation is too loose	5. Tighten the bolts of the mounting motor
	6. Excessive clearance of lift structure	6. Adjust the lifting structure
	7. The fastener is too loose	7. Re-lock the firmware
The wood bounces back or pushes hard	1. The parallel degree of material baffle is undesirable	1. Adjust the parallel degree of the material baffle
	2. Not parallel to blade and saw blade	2. Adjust the relative saw blade parallel to the blade
	3. Uninstalled material baffle feeding	3. Install the material baffle
	4. Not installed with knife board	4. Installation and cutting board
	5. Blade damage	5. Replace the saw blade
	6. Not pushing wood until it passes through the saw blade	6. Push the wood until it passes through the saw blade
Saw blades cannot be raised or deflected	1. The lifting structure locks too tightly	1. Rearrange the lifting structure to loosen the tightness
	2. The sawdust block	2. Clean the sawdust thoroughly and lubricate it
The ruler can't be shown by the ruler	1. Battery drain	1. Replace the battery
The main saw speed cannot be displayed	1. Sawdust blocking photoelectric switch light sensor	1. Clear the sawdust
	2. The belt exceeds the sensing distance	2. Adjust the detection distance of photoelectric switch
Automatic typesetting cannot load files	1. File format error	1. Loading the correct arr format file
	2. Error of storage location of scan source file2. Error of storage location of scan source file	2. The source file is stored in the specified folder

# 1.Frame Assembly



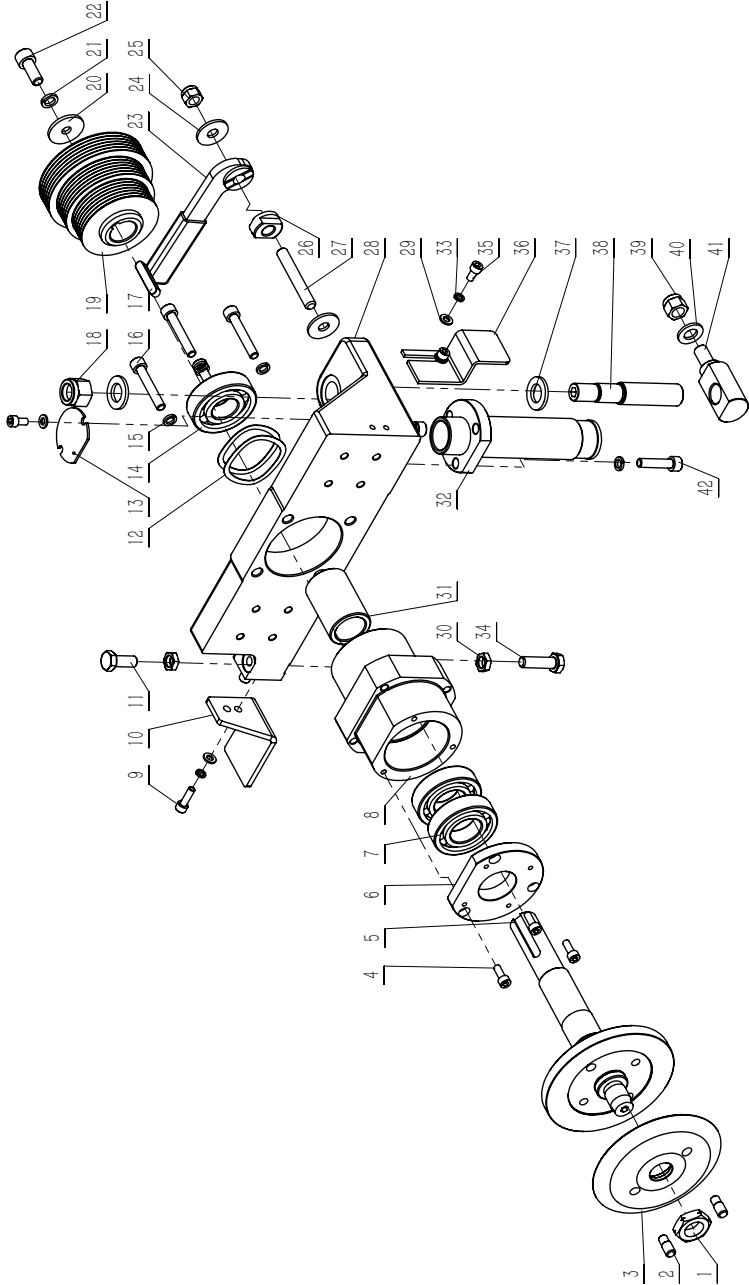
No.	Description	Parts No.	QTY
1	Hexagon-headed bolt(full thread)	M6X16GB5783Z	8
2	Oversize washer A class	WSH6GB96D1Z	8
3	Small countersunk head riveted nuts	M6X13D5GB17880D3Z	8
4	Front cover	JXPS1604010002	2
5	Hexagon thin nut	M10GB6172D1Z	3
6	Hex socket set screws with flat point	M10X25GB77B	3
7	Hex socket set screws with flat point	M8X25GB77B	2
8	Hexagon thin nut	M8GB6172D1Z	2
9	Stardard spring washer	WSH4GB93Z	2
10	Hexagon nut type-1	M4GB6170Z	4
11	Hexagon socket cap screws	M4X12GB70D1Z	2
12	Flat washer A class	WSH4GB97D1Z	2
13	Cross recessed pan head screw	M4X30GB818Z	4
14	Hexagon nut type-1	M10GB6170Z	3
15	Hexagon-headed bolt(full thread)	M10X70GB5783Z	2
16	Stardard spring washer	WSH5GB93Z	6
17	Hexagon socket cap screws	M5X10GB70D1Z	2
18	Flat washer A class	WSH5GB97D1Z	6
19	Limited switch	QKS7-02	2
20	Limited switch mounting plate	JXPS1604020007	2
21	Electric appliance door	JXPS1604010001	2
22	Hexagon socket button head screw	M6X12GB70D2Z	10
23	Hexagon socket cap screws	M16X35GB70D1B8D8	4
24	Oversize washer A class	WSH16GB96D1Z	4
25	Hexagon-headed bolt(full thread)	M12X100GB5783Z	1
26	Hexagon nut type-1	M12GB6170Z	1
27	Deflection worm assembly	JXPS1604027000	1
28	M12 cable gland	JL91046200	3
29	M20 cable gland	JXSM0401010003	5
30	M16 cable gland	JXSM0401010004	3
31	Oversize washer A class	WSH4GB96D1Z	3
32	Cross recessed pan head screw	M4X6GB818Z	3
33	Winning slot cover	JXPS1604010003A	1
34	Flat washer A class	WSH6GB97D1Z	8
35	Stardard spring washer	WSH6GB93Z	4
36	Hexagon socket cap screws	M6X16GB70D1Z	4
37	Hexagon nut type-1	M8GB6170Z	4
38	Stardard spring washer	WSH8GB93Z	4
39	Flat washer A class	WSH8GB97D1Z	3
40	Back door board assembly	JXPS1604012000	1
41	Emergency switch (Self-lock)	XB5AS542C	1
42	Change over switch	ZH-HD-2-01	1
43	Zebra printer	GK888CN ( optional)	1
44	Countersink gasket	SCPS1601026009	3
45	Hex socket countersunk head screws	M10X40GB70D3Z	3
46	Hexagon socket cap screws	M6X10GB70D1Z	4
47	The main body assembly( CNC)	JXPS1604011000	1
48	Junction box assembly	JXPS1201090009	1
49	Hexagon-headed bolt(full thread)	M16X55GB5783Z	2
50	Hexagon nut type-1	M16GB6170Z	2
51	Printer supporter 2	JXPS1604080007	1
52	Rubber bushing	JL20072003	1
53	Electric appliance box assembly	JXPS1604091000	1
54	Hexagon-headed bolt(full thread)	M10X40GB5783Z	1
55	Transformer	BK-800VA	1
56	Cross recessed pan head screw	M5X16GB818Z	4
57	Hexagon nut type-1	M5GB6170Z	4
58	Power cable	V15250600-1007	1

# 2.Trunion Assembly



No.	Description	Parts No.	QTY
1	Hex socket set screws with flat point	M6X30GB77B	2
2	Saw blade shield assembly	JXPS1604029000	1
3	Magnet	JXPS1602020013	2
4	Travel switchboard	JXPS1604020011	1
5	Hex socket countersunk head screws	M5X12GB70D3Z	2
6	Flat washer A class	WSH6GB97D1Z	12
7	Standard spring washer	WSH6GB93Z	43
8	Hexagon socket cap screw	M4X12GB70D1Z	2
9	Safety switch	QKS7-01	1
10	Cross recessed countersunk head screw	M4X30GB819D1Z	1
11	Thick washer	JL46090009	8
12	Hexagon-headed bolt(full thread)	M10X50GB5783Z	8
13	Taper pins with internal thread	PIN8X30GB118Z	4
14	Bracket base	JXPS1602020004E	2
15	Trunion	JXPS1604020003	1
16	Riving knife assembly	JXPS1602029000B	1
17	Linear guide assembly	JXPS1604020001	2
18	Hexagon socket cap screw	M6X12GB70D1Z	35
19	Spindle seat assembly	JXPS1604021000	1
20	Cable clamp	I502014-01	1
21	Cross recessed pan head screw	M5X10GB818Z	4
22	Cross recessed pan head screw	M4X30GB818Z	4
23	Limited switch mounting plate	JXPS1604020007	2
24	Limited switch	QKS15	2
25	Cable clamp	I502014-02	2
26	Hexagon socket cap screw	M5X12GB70D1Z	3
27	Hexagon nut type-1	M8GB6170Z	8
28	Stop block	JXPS1604020006	3
29	Hexagon socket cap screw	M8X20GB70D1Z	10
30	Motor assembly	JXPS1604023000	1
31	Scorig saw assembly	JXPS1604022000	1
32	Approach switch	PR-12N4B	2
33	Limited switch mounting plate	JXPS1604020018	2
34	oversize washer	WSH8GB5287Z	1
35	Scoring motor assembly	JXPS1604024000	1
36	Hexagon-headed bolt(full thread)	M8X30GB5781Z	1
37	Alevator assembly(stepper motor)	JXPS1604026000	1
38	Deflection adjusting board	JXPS1604020016	1
39	Hexagon socket countersunk head screws	M6X16GB70D3Z	2
40	Scoring adjust assembly	JXPS1604028000	1
41	Worm wheel	SCPS1601026004	1
42	Taper pins	PIN8X50GB117Z	2
43	Hexagon socket cap screw	M10X50GB70D1B	6
44	large washer A class	WSH10GB96D1Z	6
45	Poly V-blet	JXPS1602020002B	1
46	Poly V-blet	4PJ560GB16588	1
47	Tension screw	JXPS1604020005	1
48	Adjusting nut	JXPS1604020004	1
49	Locking nut	JXPS1604020008	1
50	Locking handle wedlment	JXPS1604020009	1
51	Hexagon locking nut	M10GB889D1Z	5
52	Circlips for shaft type A	CLP20GB894D1B	1
53	Hexagon socket set screws with flat point	M10X70GB77B	1
54	Sliding bearing	P20X23X20GB12613D	2
	Lock sleeve	JXPS1604020013	1

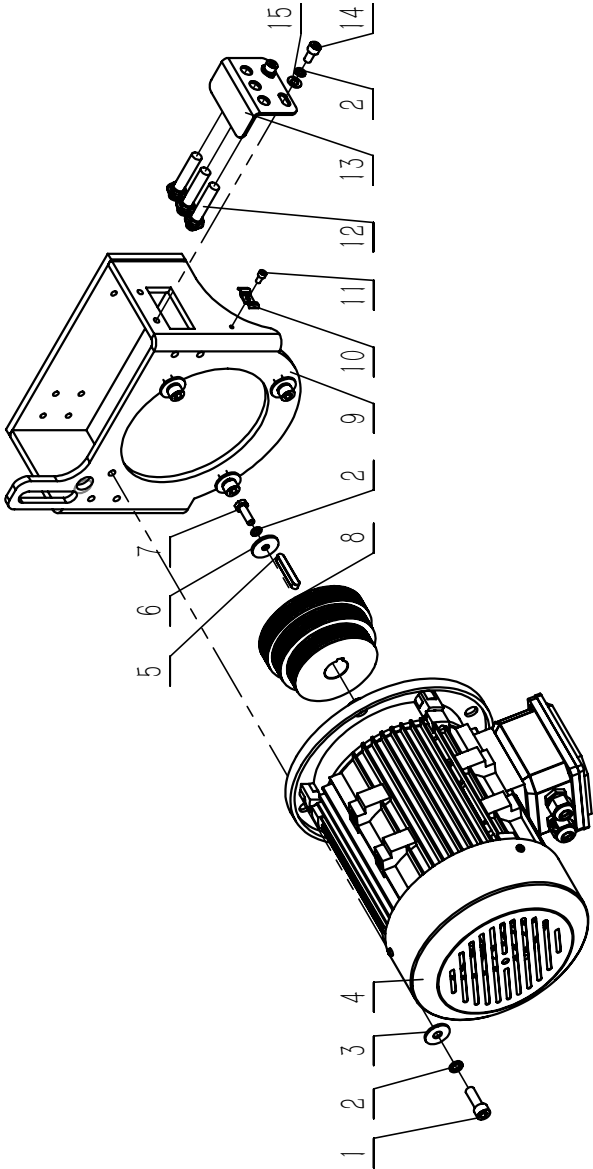
### 3.Spindle assembly



No.	Description	Parts No.	QTY
1	Locking nut	JXPS1201021001	1
2	Locating pin	GRPS1401021002	2
3	Saw blade clamp	JXPS1602021002A	1
4	Hexagon socket cap screw	M6X16GB70D1Z	3
5	Principle axis	JXPS1602021001B	1
6	Bearing end plate	JXPS1602021010A	1
7	deep groove ball bearing	BRG6206-2RSLGB276SKF	2
8	Bearing base	JXPS1604021002	1
9	Hexagon socket cap screw	M6X20GB70D1Z	2
10	Elevator stop plate	JXPS1604021004	1
11	Hexagon-headed bolt(full thread)	M10X25GB5783Z	1
12	Wave spring washers	WSH62JB7590B	2
13	Dust cover	JXPS1604021006	1
14	deep groove ball bearing	BRG6305-2RSLGB276SKF	1
15	Standard spring washer	WSH8GB93Z	7
16	Hexagon socket cap screw	M8X50GB70D1Z	4
17	Flat key A type	PLN8X7X40GB1096	1
18	Hexagon locking screw	M16GB889D1Z	1
19	Spindle belt pulley	JXPS1602021007E	1
20	oversize washer	WSH10GB5287Z	1
21	Standard spring washer	WSH10GB93Z	1
22	Hexagon socket cap screw	M10X25GB70D1Z	1
23	Locking handle wedlment	JXPS1604020009	1
24	Large washer A class	WSH10GB96D1Z	2
25	Hexagon locking screw	M10GB889D1Z	1
26	Lock sleeve	JXPS1604020013	1
27	Hex socket set screws with flat point	M10X70GB77B	1
28	Axle seat	JXPS1604021001	1
29	Flat washer A class	WSH6GB97D1Z	6
30	Hexagon thin screw	M10GB6172D1Z	2
31	Spindle axis spacer bush	JXPS1604021003	1
32	Lifting set	JXPS1604021005	1
33	Standard spring washer	WSH6GB93Z	4
34	Hexagon-headed bolt(full thread)	M10X35GB5783Z	1
35	Hexagon socket cap screw	M6X12GB70D1Z	4
36	Elevator switchboard	JXPS1604020019	1
37	Flat washer A class	WSH16GB97D1Z	2
38	Tension rod	JXPS1604020005	1
39	Hexagon locking screw	M12GB889D1Z	1
40	Flat washer A class	WSH12GB97D1Z	1
41	Adjusting screw nut	JXPS1604020004	1
42	Hexagon socket cap screw	M8X35GB70D1B12D9	3

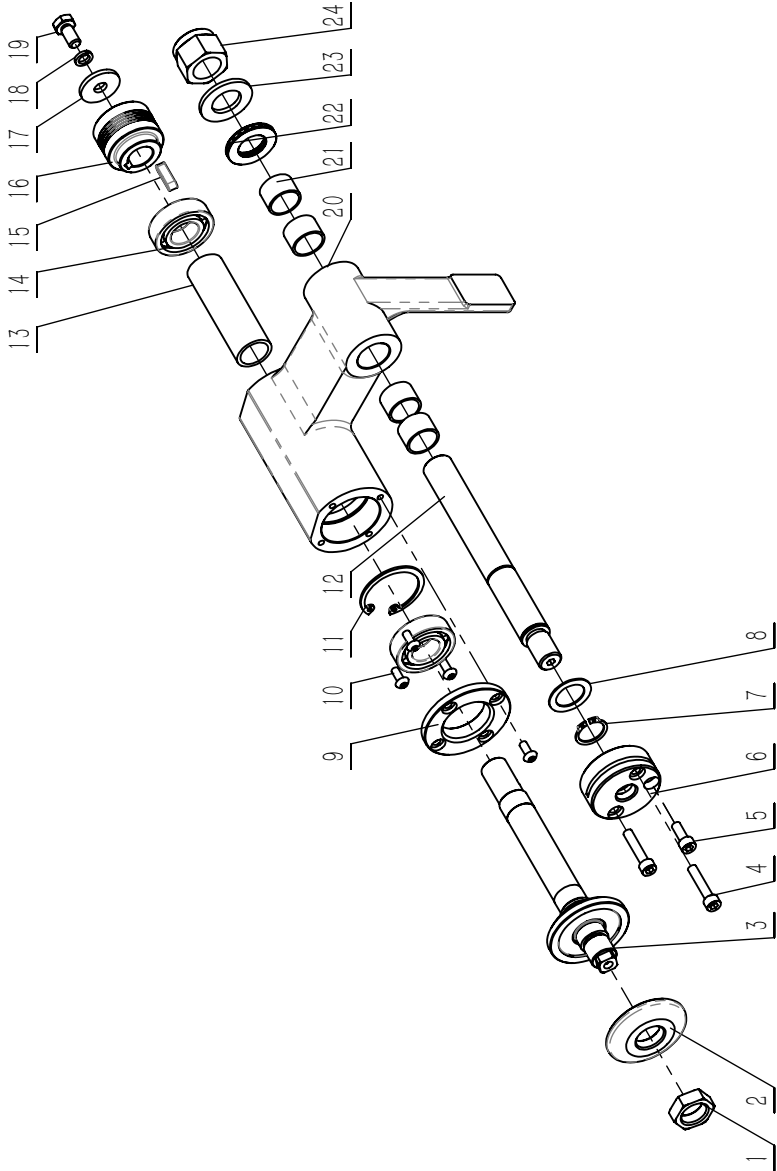


4.Main motor assembly



No.	Description	Parts No.	QTY
1	Hexagon socket cap screw	M10X30GB70D1Z	4
2	Standard spring washer	WSH8GB93Z	7
3	Large washer A class	WSH10GB96D1Z	4
4	Motor	YSH115552A	1
5	Flat key A type	PLN8X7X50GB1096	1
6	Washer	JXPS1202070005	1
7	Hexagon-headed bolt(full thread)	M8X25GB5783BF	1
8	Motor pulley wheel	JXPS1602023001E	1
9	Motor seat weldment	JXPS1604023100	1
10	Cable clamp	1502014-01	1
11	Hexagon socket cap screw	M5X10GB70D1Z	1
12	Photoelectric switch	E3F-DS30C4	3
13	Speed measurement bracket	JXPS1604023002A	1
14	Hexagon socket cap screw	M8X16GB70D1Z	2
15	Flat washer A class	WSH8GB97D1Z	2

# 5-1.Scoring saw assembly

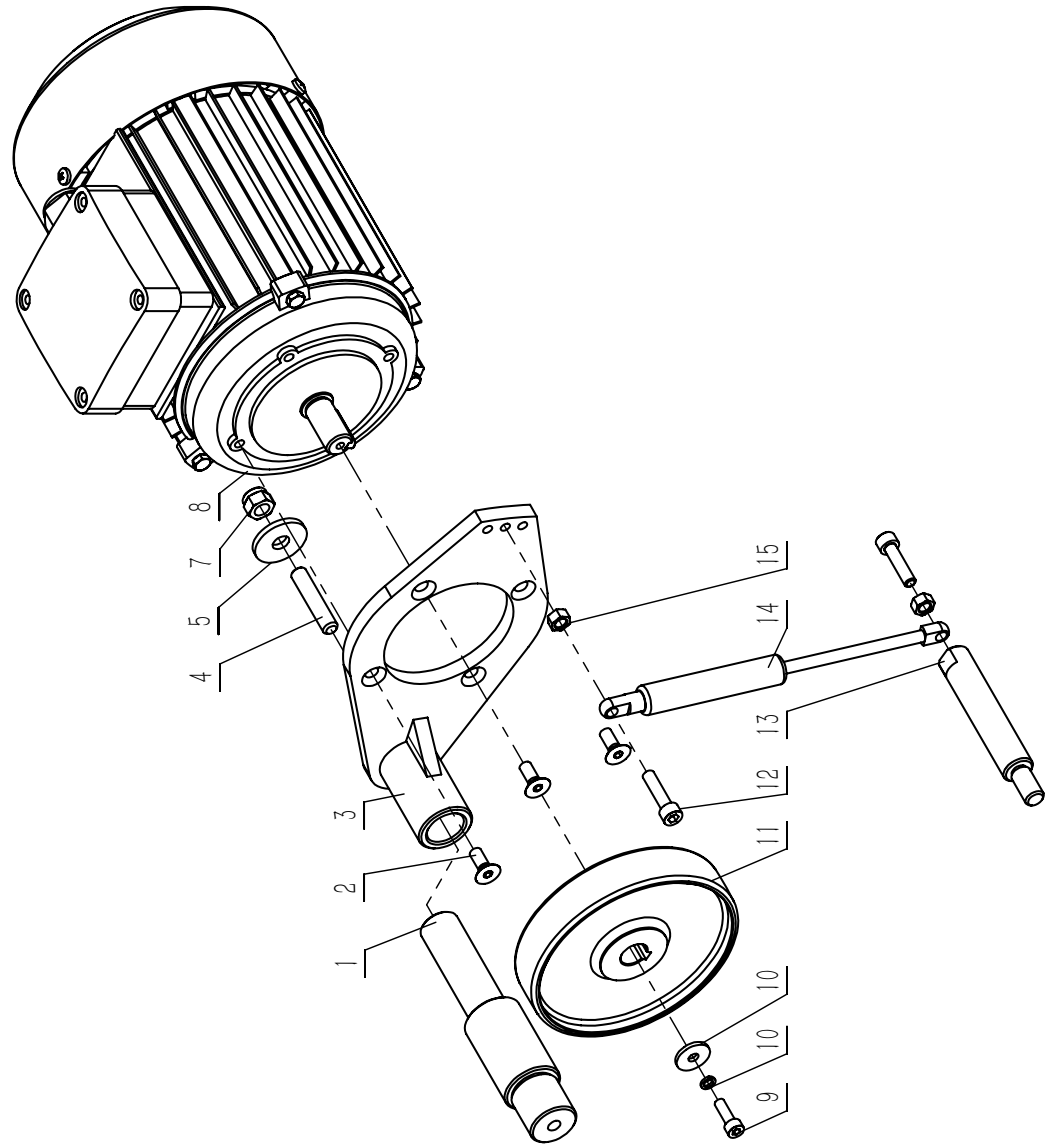


No.	Description	Parts No.	QTY
1	Hexagon thin nut	M18GB6173Z	1
2	Scoring saw blade clamp	JXPS1602022017	1
3	Scoring principle axle	JXPS1604022001	1
4	Hexagon socket cap screw	M6X30GB70D1Z	2
5	Hexagon socket cap screw	M6X16GB70D1Z	1
6	Locking nut	JXPS1604020008	1
7	Circlips for shaft type A	CLP20GB894D1B	1
8	Washer	0000306088F	1
9	Scoring axle seat end cap	JXPS1602022003	1
10	Hexagon socket button head screw	M5X12GB70D2B10D9	4
11	Circlips for aperture type A	CLP42GB893D1B	1
12	Scoring support axle	JXPS1604022002	1
13	Scoring spacer bush	JXPS1604022005	1
14	Deep groove ball bearing	BRG6004-2RZGB276	2
15	Flat key A type	PLN6X6X22GB1096	1
16	Scoring pulley	JXPS1604022006	1
17	Oversize washer	WSH8GB5287Z	1
18	Standard spring washer	WSH8GB93Z	1
19	Left-handed screw	JL82080003	1
20	Scoring axle seat	JXPS1604022004	1
21	Sliding bearing	P20X23X20GB12613D1	4
22	Pushing bearing	BRG2035AXKASGB4605	1
23	Flat washer A type	WSH20GB97D1Z	1
24	Prevailing torque type 1 hexagon nut	M20GB889D1Z	1

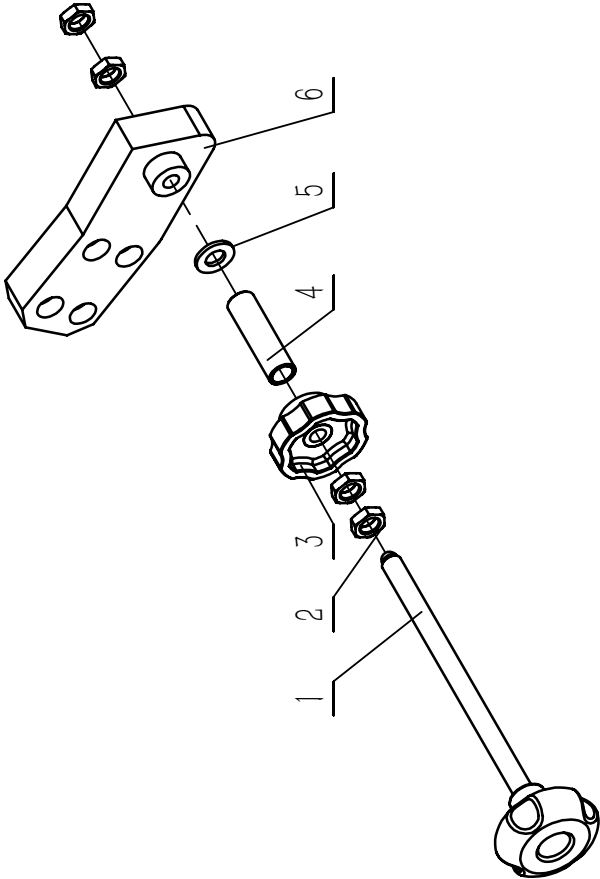


# 5-2.Scoring motor assembly

No.	Description	Parts No.	QTY
1	Scoring motor support axle	JXPS1602024001	1
2	Hex socket countersunk head screws	M6X16GB70D3Z	4
3	Scoring motor seat	JXPS1604024002	1
4	Hex socket set screws with flat point	M8X40GB77B	1
5	Oversize washer	WSH8GB5287Z	1
6	Prevailing torque type 1 hexagon nut	M8GB889D1Z	1
7	Scoring motor	YSH715082	1
8	Hexagon socket cap screw	M5X16GB70D1Z	1
9	Standard spring washer	WSH5GB93Z	1
10	Oversize washer	WSH5GB5287Z	1
11	scoring motor wheel	JXPS1602024005	1
12	Hexagon socket cap screw	M6X25GB70D1Z	2
13	Air spring back shaft	JXPS1604024001	1
14	Air spring (100N/180mm)	JXPS1602023005	1
15	Hexagon nut type 1	M6GB6170Z	2



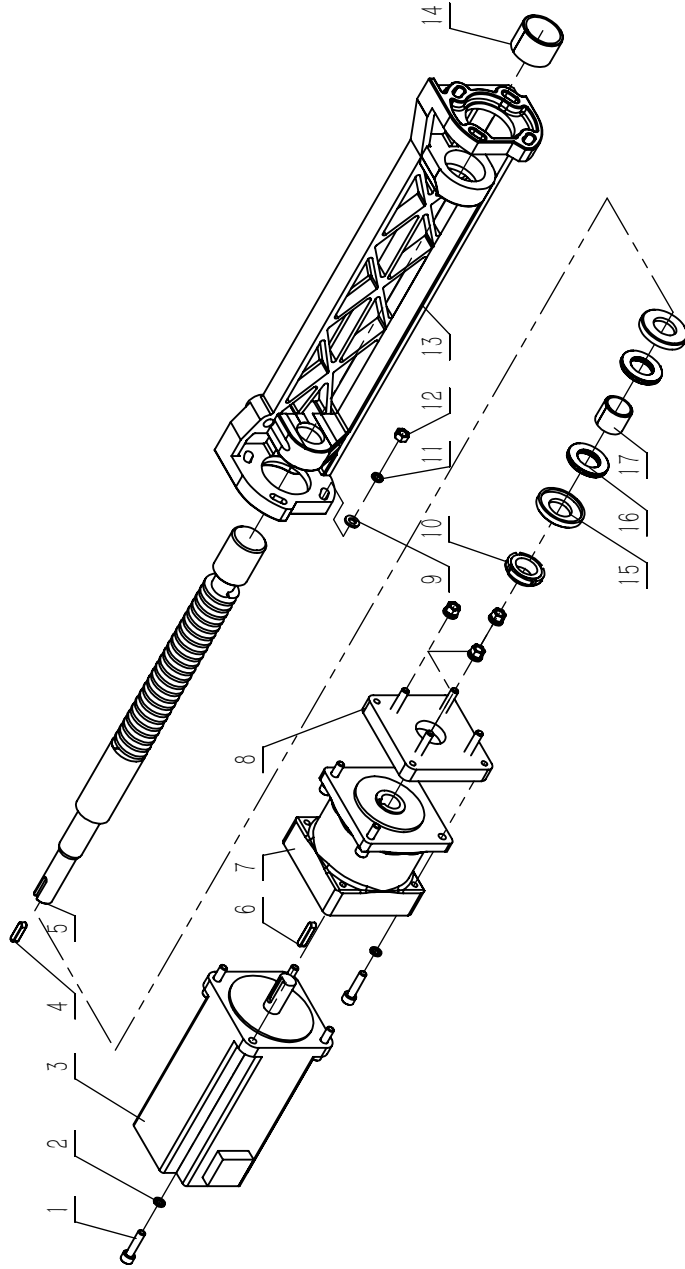
# 5-3.Scoring elevating adjustment assembly



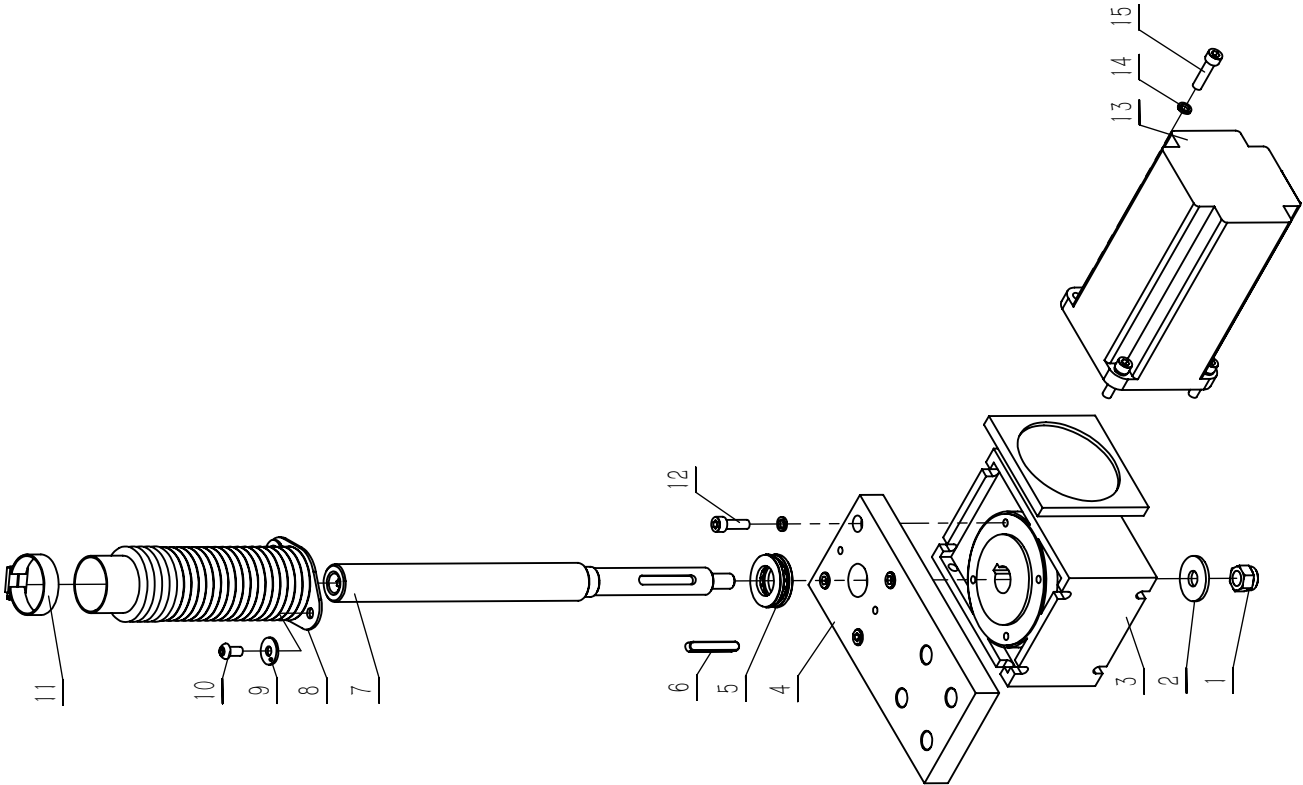
No.	Description	Parts No.	QTY
1	Locking handle assembly	JXPS1201027100	1
2	Hexagon thin nut	M10GB6172D1Z	4
3	Locking wheel	JXTS1201028004	1
4	Sleeve	JXPS1201027001A	1
5	Flat washer A class	WSH10GB97D1Z	2
6	Supporting plate	JXPS1604028001	1

## 6. Main blade tilting assembly

No.	Description	Parts No.	QTY
1	Hexagon socket cap screw	M6X25GB70D1B12D9	8
2	Standard spring washer	WSH6GB93B	8
3	Stepper motor	3404HS60U14	1
4	Flat key	PLN5X5X20GB1096	1
5	Worm	JXPS1604027003	1
6	Flat key	PLN5X5X25GB1096D1	1
7	planetary reducer	PX86N004S0-JXX	1
8	Tilting motor seat assembly	JXPS1604027004	1
9	Flat washer A class	WSH6GB97D1Z	4
10	Circle nut M20×1	000301849F	1
11	Standard spring washer	WSH6GB93Z	4
12	Hexagon nut type 1	M6GB6170B	4
13	Axle seat	SCPS1601026005	1
14	Roll sleeve	P30X35X24GB12613	1
15	Aluminum cap 2	0346631500L	2
16	Pushing bearing	BRG2035AXKASGB4605	2
17	Roll sleeve	P20X24X20GB12613	1



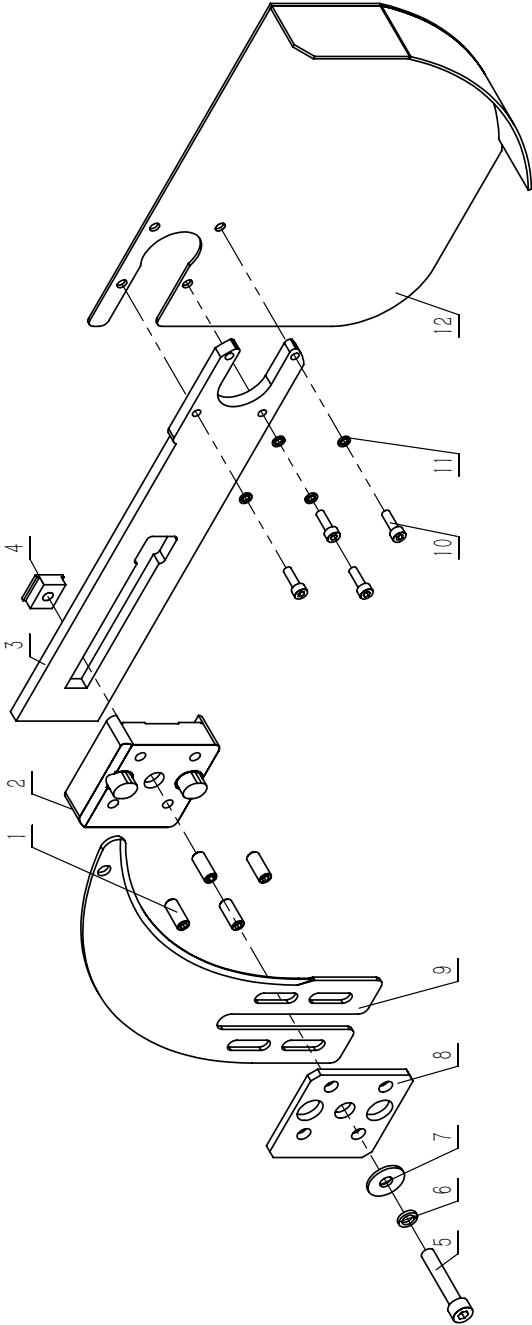
# 7.Main blade elevating assembly



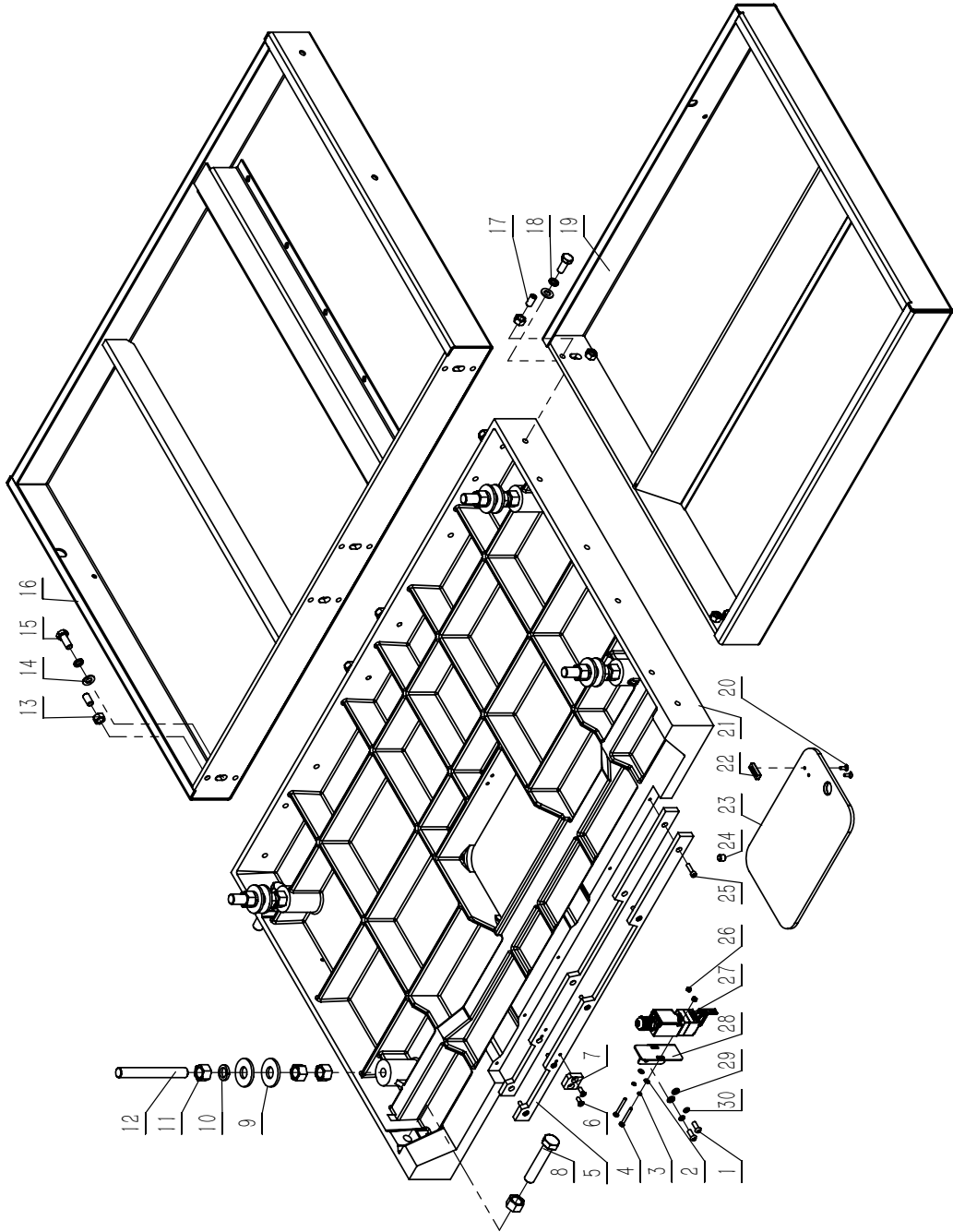
No.	Description	Parts No.	QTY
1	Prevailing torque type 1 hexagon nut	M10GB889D1Z	1
2	Large washer A class	WSH10GB96D1Z	1
3	Square flange reducer	NMRV40-7D5-86	1
4	Elevating plate	JXPS1604026001	1
5	Pushing ball bearing	BRG51104GB301	1
6	Flat key A type	PLN6X6X40GB1096	1
7	Elevating thread	JXPS1604026002	1
8	Shield assembly	JXPS1604026003	1
9	Large washer A class	WSH6GB96D1Z	2
10	Hexagon socket button head screw	M6X12GB70D2Z	2
11	Eye protective cover clamp	JL50000017	1
12	Hexagon socket cap screw	M6X20GB70D1Z	4
13	Stepper motor	3404HS60U14	1
14	Standard spring washer	WSH6GB93Z	8
15	Hexagon socket cap screw	M6X25GB70D1Z	4

# 8.Riving knife assembly

No.	Description	Parts No.	QTY
1	Hexsocket set screws with flat point	M8X20GB77Z	4
2	Riving knife mounting seat	JXPS1602029004B	1
3	Riving knife adjust plate	JXPS1602029001B	1
4	Riving knife locking block	JXPS1201028005A	1
5	Hexagon socket cap screw	M8X45GB70D1Z	1
6	Standard spring washer	WSH8GB93Z	1
7	Large washer A class	WSH8GB96D1Z	1
8	Riving knife mounting plate	JXPS1602029003C	1
9	Riving knife	JXPS1602029002B	1
10	Hexagon socket cap screw	M5X16GB70D1Z	4
11	Standard spring washer	WSH5GB93Z	4
12	Dust cover	JXPS1602020015B	1

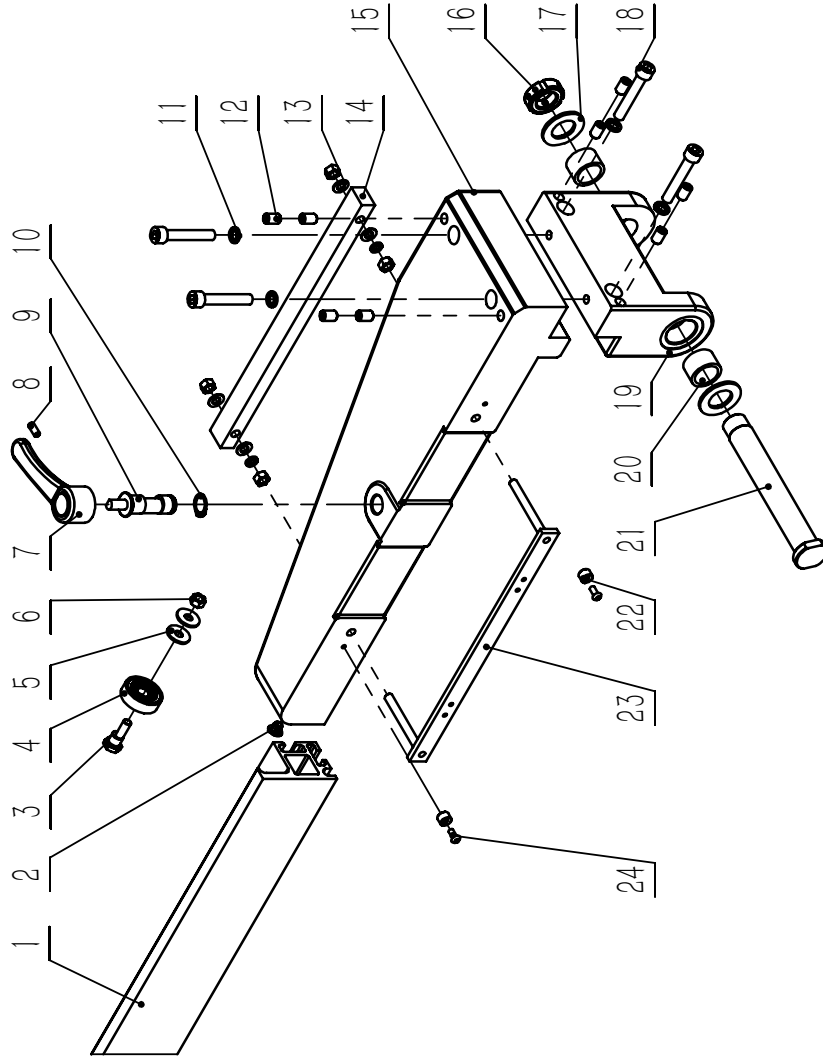


# 9. Table assembly



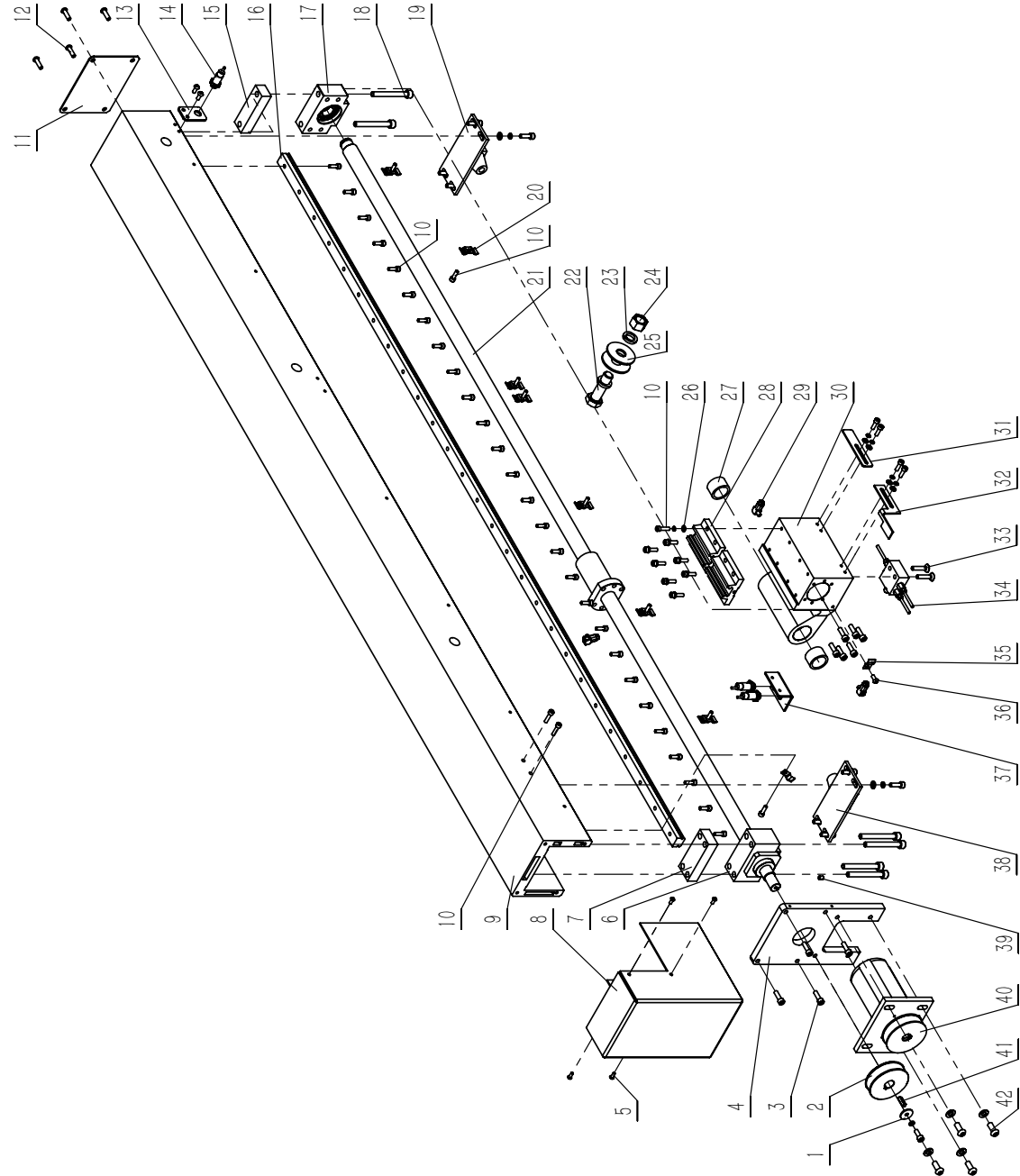
No.	Description	Parts No.	QTY
1	Hexagon socket button head screw	M6X16GB70D2Z	2
2	Flat washer A class	WSH4GB97D1Z	2
3	Standard spring washer	WSH4GB93Z	2
4	Cross recessed pan head screw	M4X35GB818Z	2
5	Insert panel	JXPS1602030002	2
6	Cross recessed countersunk head screw	M5X14GB819D1B	2
7	Insert panel block	JXPS1602030004	1
8	Hexagon-headed bolt(full thread)	M16X80GB77B	2
9	Locking flat washer	JL81020017	8
10	Standard spring washer	WSH16GB93Z	4
11	Hexagon nut type 1	M16GB6170Z	14
12	Thread rod	JXPS1602000001	4
13	Hexagon nut type 1	M10GB6170Z	13
14	Flat washer A class	WSH10GB97D1Z	6
15	Hexagon-headed bolt(full thread)	M10X25GB5783B	6
16	Right subsidiary operating board	JXPS1604031000A	1
17	Hex socket set screws with flat point	M10X20GB77Z	13
18	Standard spring washer	WSH10GB93Z	6
19	Back subsidiary operating board	JXPS1602031000	1
20	Hex socket countersunk head screws	M4X12GB70D3B	2
21	Main operating board	JXPS1604030001	1
22	Thread board	JL27010017	1
23	Movable board	JXPS1604030005	1
24	Hex socket set screws with flat point	M10X10GB77B	4
25	Hexagon socket cap screw	M5X20GB70D1B	5
26	Hexagon nut type 1	M4GB6170Z	2
27	Limited switch	QKS8	1
28	Limited switch mounting plate	JXPS1604091003	1
29	Flat washer A class	WSH6GB97D1Z	2
30	Standard spring washer	WSH6GB93Z	2

# 10.Rip fence assembly



No.	Description	Parts No.	QTY
1	Rip fence L type	JXPS1201060004B	1
2	Plastic cover	JXPT1201040021	1
3	Deflection adjustable axle	JXPS1201061004	1
4	Rubber wheel	JXPS1604061007	1
5	Large washer A class	WSH8GB96D1Z	2
6	Hexagon nut type 1	M8GB6170Z	5
7	Locking handle assembly with rip fence	JXPS1201061100	1
8	hex socket set screw with cup point	M6X16GB80B	1
9	Locking axle	JXPS1604061004	1
10	Circlips for shaft type A	CLP18GB894D1B	1
11	Standard spring washer	WSH10GB93B	6
12	Hex socket set screws with flat point	M10X16GB77B	8
13	Flat washer A class	WSH8GB97D1Z	4
14	Locking plate	JXPS1604061005	1
15	Rip fence seat	JXPS1604061001	1
16	Locking nut	R-M24X1.5	1
17	Large washer	JXPS1201020005	2
18	Hexagon socket cap screw	M10X60GB70D1B	4
19	Rotary seat	JXPS1604061002	1
20	Slide sleeve	P25X32X20GB18323	2
21	Rip fence seat connected shaft	JXPS1604061003	1
22	eccentric sleeve	JXPS1602061006	2
23	Locking plate assembly	JXPS1604061100	1
24	Hexagon socket button head screw	M5X12GB70D2Z	2

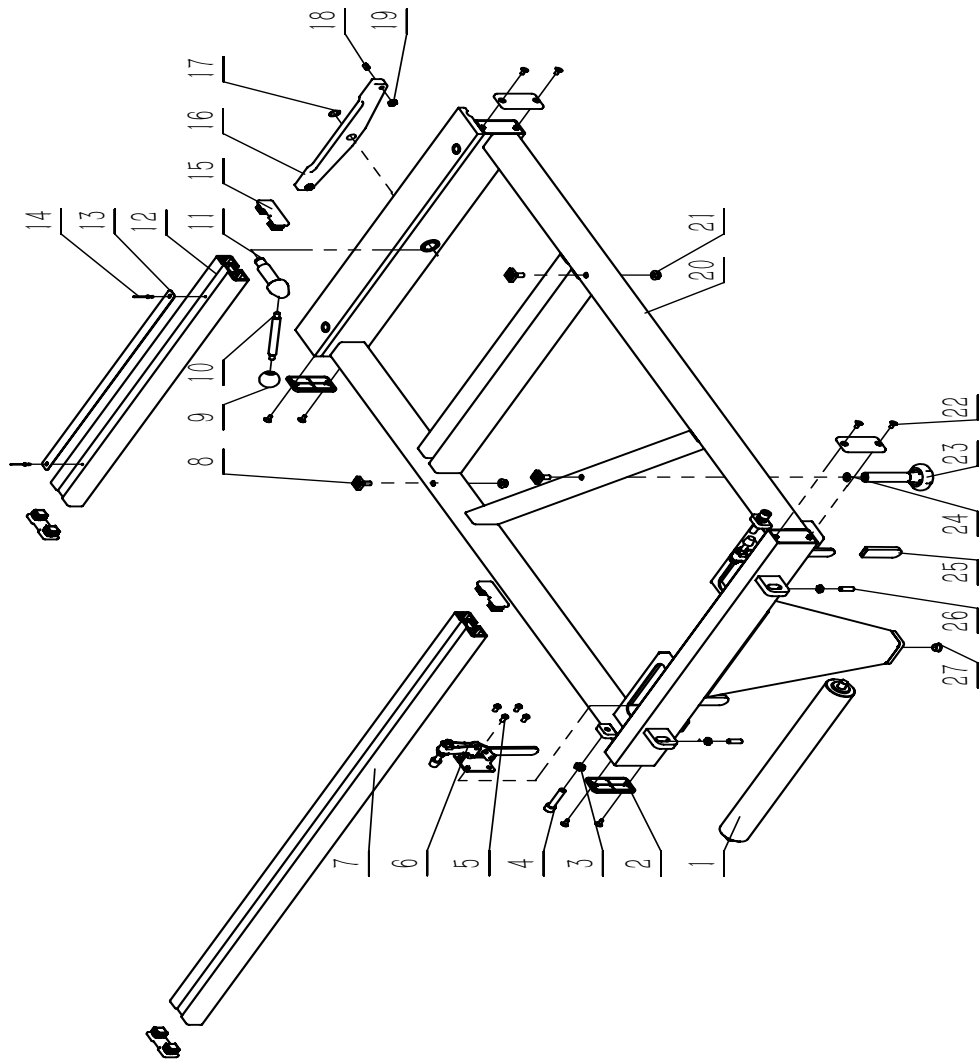
# 11.Rip fence rail assembly



No.	Description	Parts No.	QTY
1	Oversize washer	WSH6GB5287Z	1
2	small synchronous pulley	JXPS1604062007	1
3	Hexagon socket cap screw	M6X20GB70D1Z	19
4	Junction plate	JXPS1604062004	1
5	Hexagon socket button head screw	M4X10GB70D2B	4
6	Ball-screw seat	BK-20	1
7	Wide heel block	JXPS1604062008	1
8	Servo motor cover	JXPS1604062006	1
9	Locating seat	JXPS1604062002	1
10	Hexagon socket cap screw	M5X20GB70D1B	49
11	Slide cover	JXPS1604062005	1
12	Hexagon socket button head screw	M6X20GB70D2Z	4
13	Proximity switch locating plate	JXPS1604062012	1
14	Proximity switch	PR-12N4B	3
15	Narrow heel block	JXPS1604062009	1
16	Linear guide 2	JXPS1604062003	1
17	Screw supporting assembly	BF-20	1
18	Hexagon socket cap screw	M8X70GB70D1B	6
19	Stop block assembly	JXPS1604062300	1
20	Cable clamp	1502014-01	7
21	Ball-screw assembly	JXPS1604062100	1
22	Hexagon-headed bolt(full thread)	M16X55GB5783Z	1
23	Standard spring washer	WSH16GB93Z	27
24	Hexagon nut type 1	M16GB6170Z	1
25	Large washer A class	WSH16GB96D1Z	2
26	Flat washer A class	WSH6GB97D1Z	24
27	Slide sleeve	P25X32X20GB18323	2
28	Guide slider	TRS20FN-NZ0-FF	2
29	Tube joint assembly 2	JXPS1604062700	3
30	Screw seat	JXPS1604062001	1
31	Proximity switch connected plate	JXPS1604062010	1
32	Zero switch connected plate	JXPS1604062013	1
33	Hex socket countersunk head screws	M6X30GB70D3Z	2
34	Oil injection block assembly	JXPS1604062500	1
35	Cable clamp	1502014-02	3
36	Hexagon socket button head screw	M5X12GB70D2Z	4
37	Proximity switch locating plate 2	JXPS1604062011	1
38	Zero stop block assembly	JXPS1604062400	1
39	Hex socket set screws with flat point	M6X8GB77B	1
40	Servo motor assembly	JXPS1604062200	1
41	Flat key	PLN5X5X20GB1096	2
42	Hexagon socket button head screw	M8X20GB70D2Z	4
43	arc-teeth synchronous belt	400-5M15JB7512D1	1

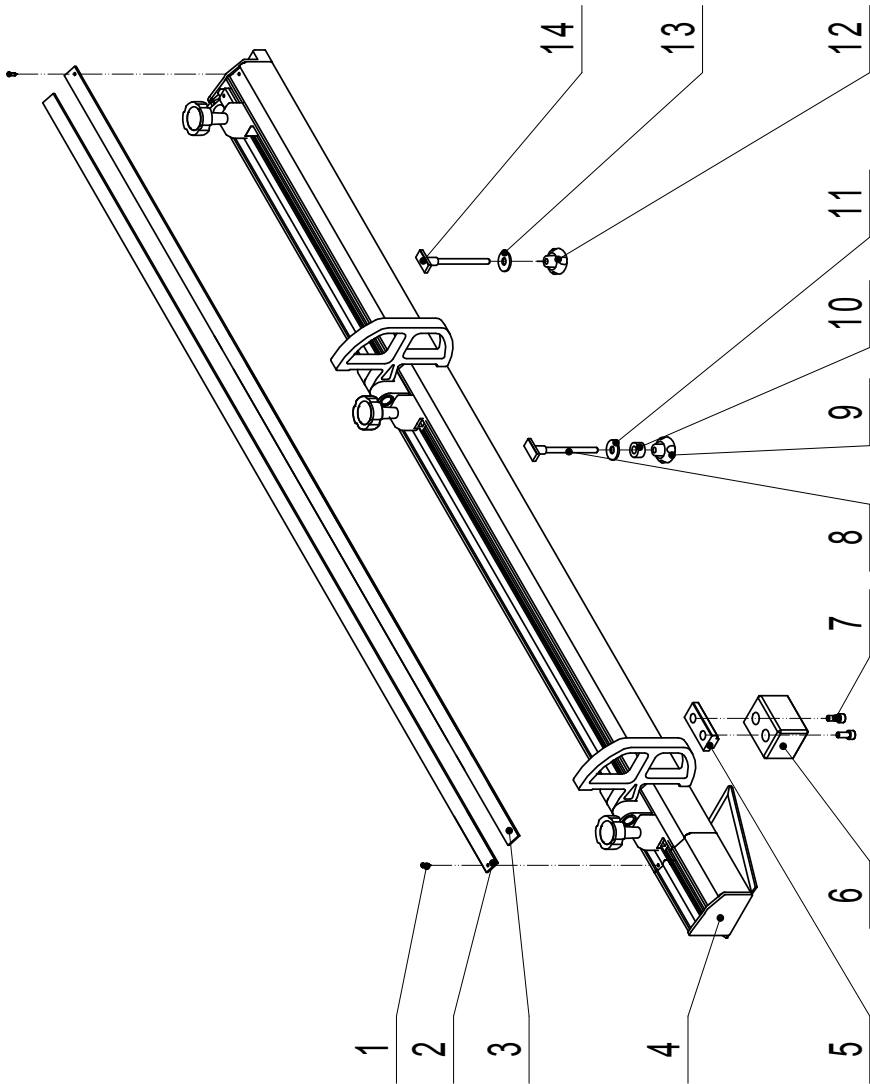


# 12.Sliding carriage assembly



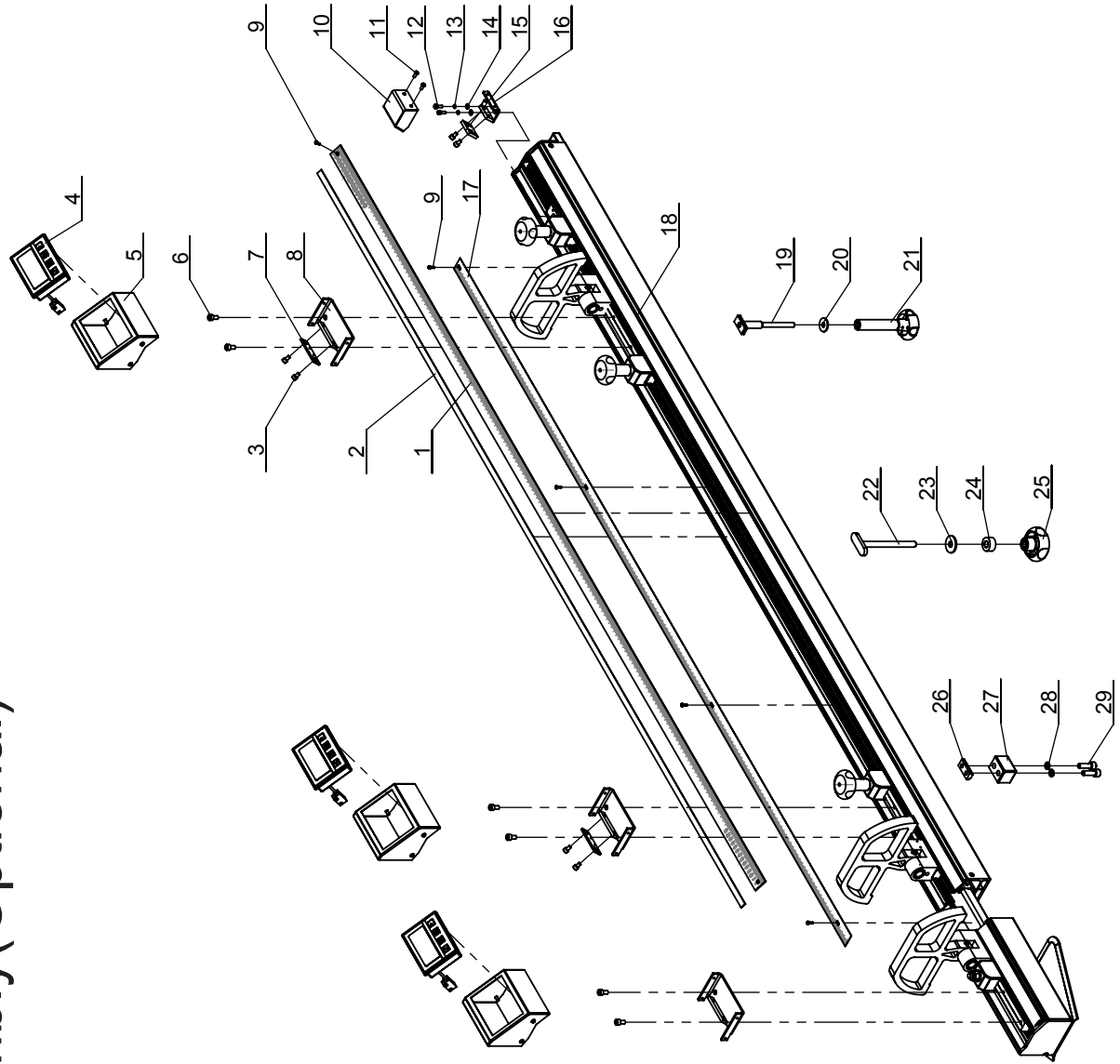
No.	Description	Parts No.	QTY
1	Roller	JXPS1604051002	1
2	Plastic cover	JXPS1201051014	4
3	Hexagon thin nut	M10GB6172D1Z	2
4	Hexagon socket cap screw	M10X45GB70D1Z	2
5	Hexagon socket button head screw	M6X12GB70D2Z	8
6	Quick release	JXPS1201051006	2
7	Long supporting plate	JXPS1201051011A	1
8	Locking block	JL84100003	3
9	Handle knob	JMBS1402040004	1
10	Handlebar	JXSM0401042104	1
11	Lateral bar locking axle	JXPS1604051003A	1
12	Scale plate seat	JXPS1201051012	1
13	Angular scale	JXPS1602051003	1
14	Blind rivets	RVT3X7GB12618A	2
15	Plastic cover	GRPS1401051003	4
16	Lateral bar locking block	JXPS1604051001	1
17	Circlips for shaft type A	CLP14GB894D1B	1
18	Slotting set screws with flat point	M8X10GB73S	2
19	Hexagon thin nut	M8GB6172D1Z	4
20	Sliding carriage supporting assembly	JXPS1604051100A	1
21	Hexagon flange nut	M8GB6177D1Z	2
22	Hex socket countersunk head screws	M5X12GB70D3B	8
23	Locking handle assembly	JL84102000	1
24	Flat washer A class	WSH8GB97D1Z	1
25	Tool kit handle sleeve	JXPS1201051007	2
26	Hex socket set screws with flat point	M8X25GB77B	2
27	Wrapped bushed	P12X10X8-AGB12613	1

13.Cross cutting fence assembly



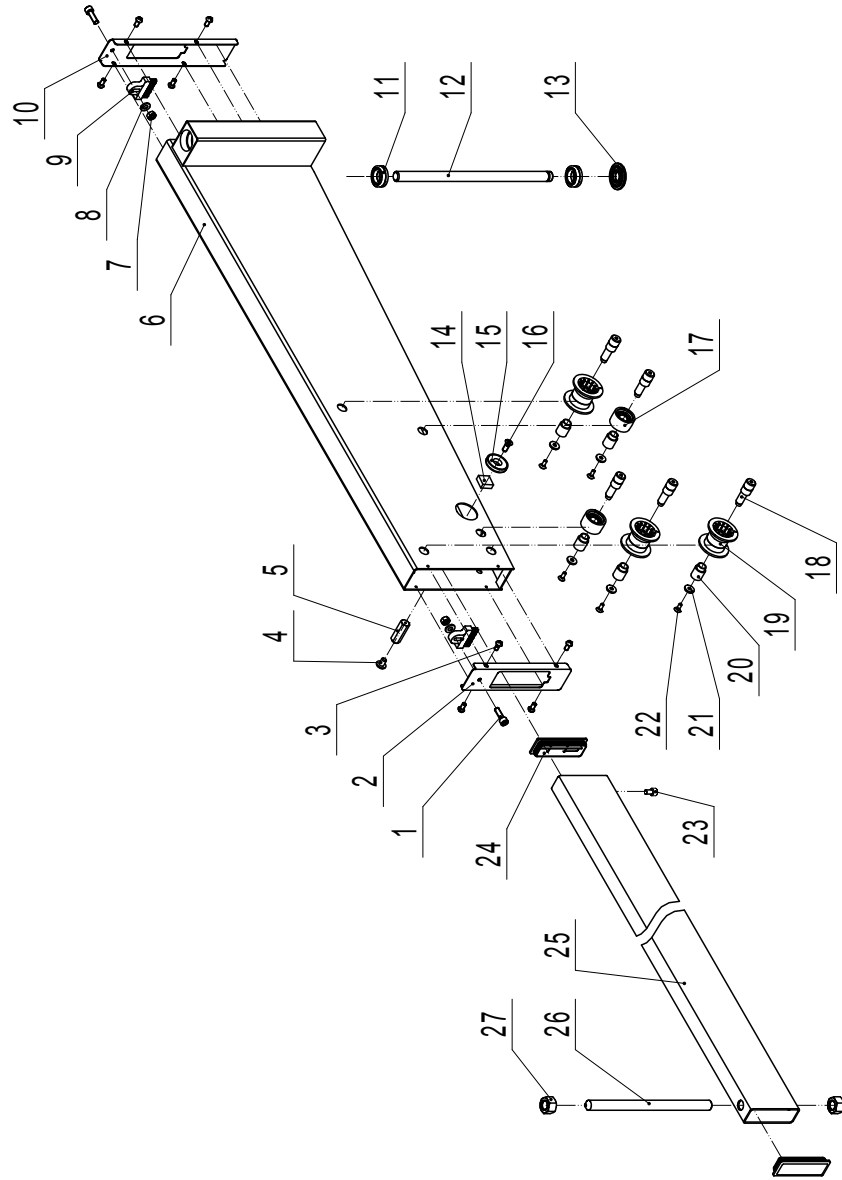
No.	Description	Parts No.	QTY
1	Cross recessed pan head screw	M4X6GB818Z	4
2	Ruler	JXPS1602053003A	1
3	Deputy ruler	JXPS1602053004A	1
4	Cross cutting fence assembly	JXPS1602053110	1
5	Slide block	JXPS1201053005H	1
6	Locating block	JXPS1201053007A	1
7	Screw	M8X20GB70D1Z	2
8	Type T bolt	JXPS1602053005	1
9	Circle handlebar M10	JXPT1201060013	1
10	Sleeve	JXPS1602053006	1
11	Large washer	WSH10GB96Z	1
12	Circle handlebar M8	JXTS1201131001-001S	1
13	Large washer	WSH8GB96Z	2
14	Slide block	JXPS1201053005D	1

# 14.Digital cross cutting fence assembly(Optional)



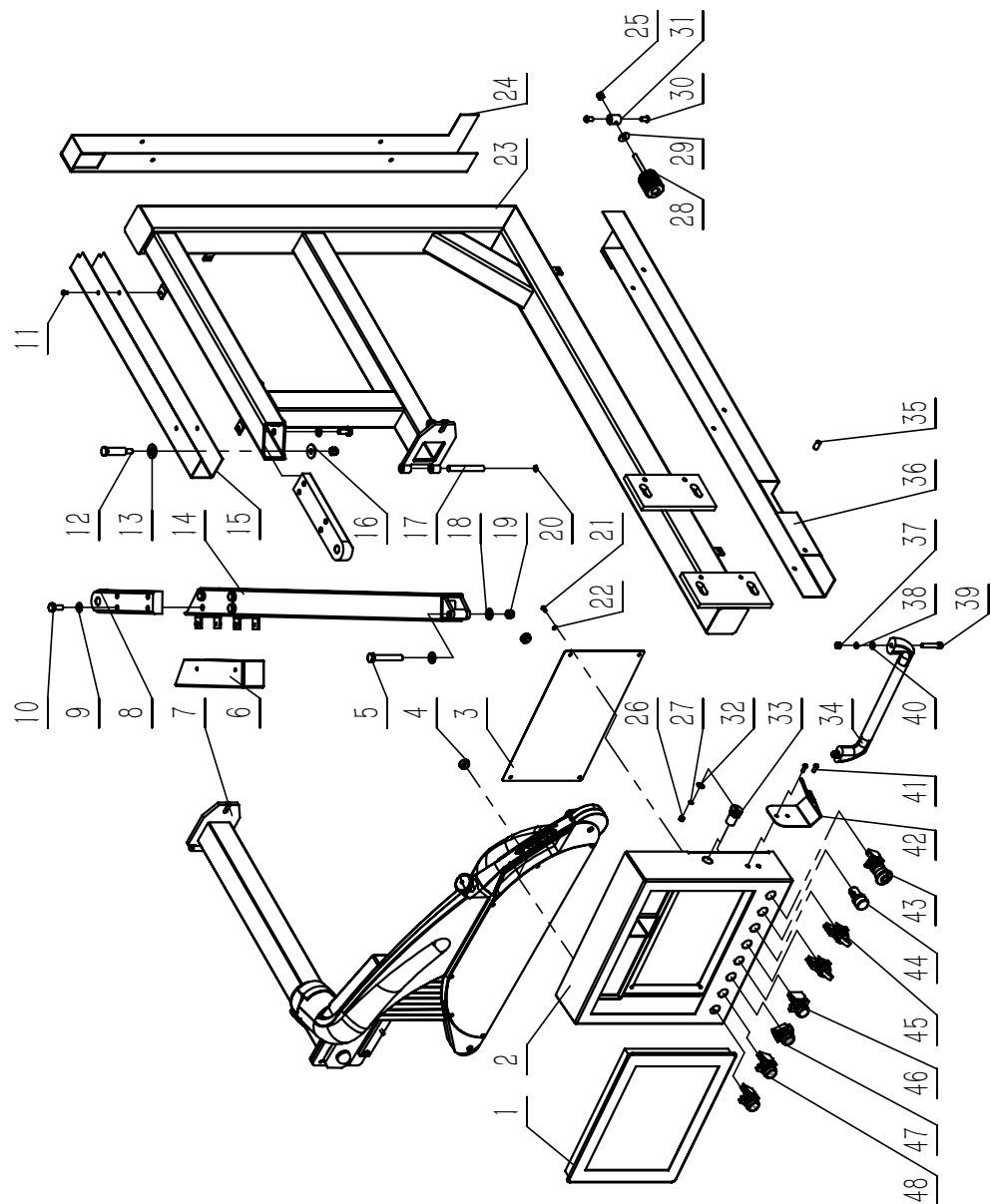
No.	Description	Parts No.
1	Main scale	JXPS1602053003F
2	Magnetic scale	EMB2025-1820
3	Hexagon socket screw	M5X8GB70D1Z
4	Digital display	IZ16E
5	Digital display guard	JXPS1604053001
6	Hexagon socket screw	M6X12GB70D1Z
7	Adjust plate	JXPS1604053004
8	Digital display bracket	JXPS1604053200
9	Screw	M3X10GB818Z
10	Sensor guard	JXPS1604053006
11	Hexagon socket screw	M4X10GB70D2B
12	Hexagon socket screw	M4X12GB70D1Z
13	Spring washer	WSH4GB93Z
14	Washer	WSH4GB97D1Z
15	Adjust plate	JXPS1604053004A
16	Digital display bracket	JXPS1604053200A
17	Scale	JXPS1602053004G
18	Fence Assembly	JXPS1604053100A
19	Sliding block	JXPS1604053005
20	Washer	WSH8GB96D1Z
21	Lock handle	JL84102000
22	T-bolt	JXPS1602053005
23	Washer	WSH10GB96D1Z
24	Sleeve	JXPS1602053006
25	Handle	JXPT1201060013
26	Sliding block	JXPS1201053005H
27	Set block	JXPS1201053007A
28	Spring washer	WSH8GB93Z
29	Hexagon socket screw	M8X25GB70D1Z

# 15.Support arm assembly



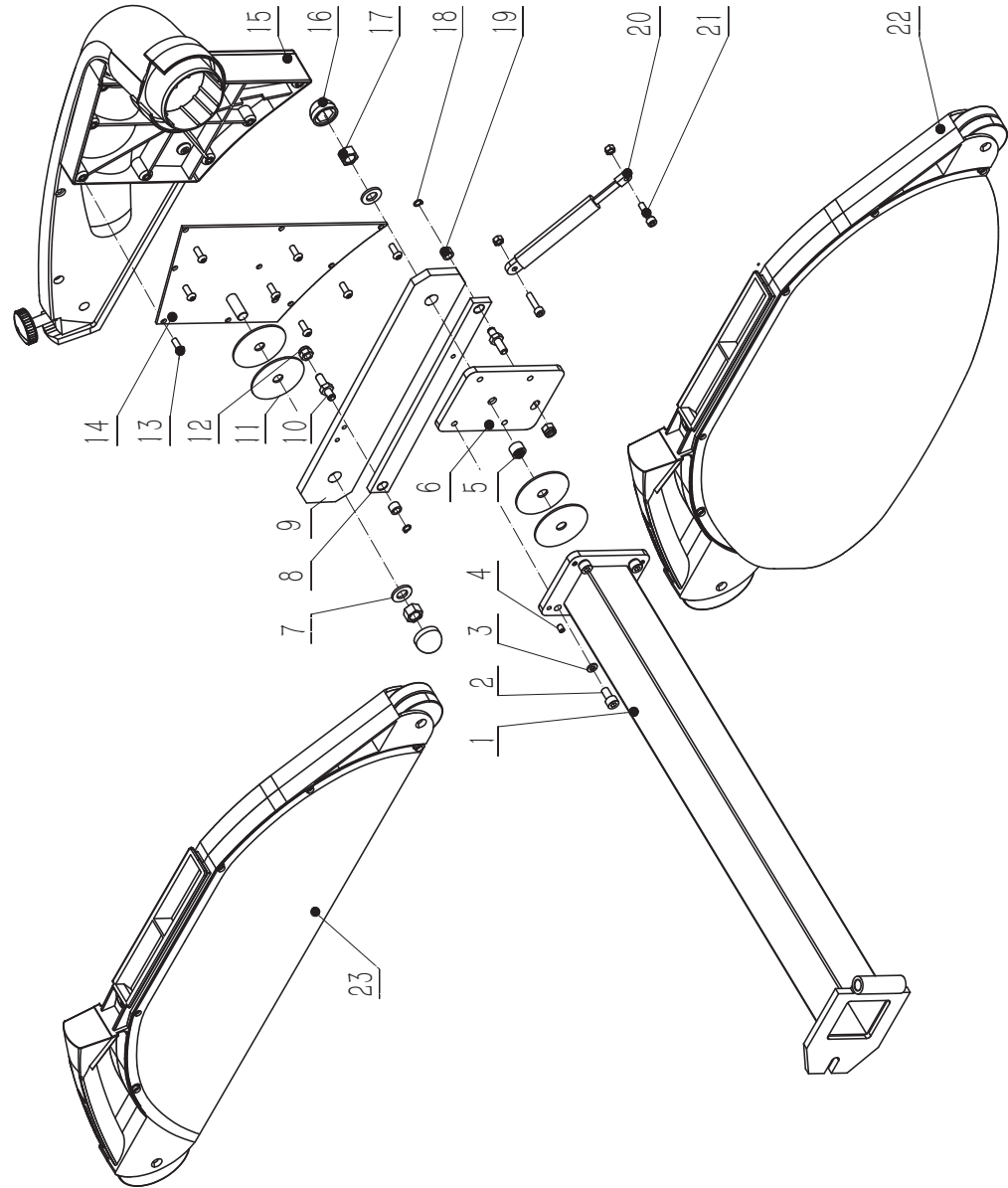
No.	Description	Parts No.	QTY
1	Hexagon socket button head screw	M6X20GB70D2Z	2
2	Cover board 1	JXPS1602052005	1
3	Cross recessed pan head screw	M5X12GB818Z	8
4	Flat screw M10	SCPS1601052015	1
5	Hexagon prism	JXPS1204050001	1
6	Support frame	JXPS1602052003B	1
7	Hexagon nut type-1	M6GB6170Z	2
8	Flat washer A class	W5H6GB97D1Z	2
9	Brush	JXTS1201052005	2
10	Cover board 2	JXPS1602052006	1
11	deep groove ball bearing	BRG6004-2RZGB276	2
12	Connective axle	JXPS1201052005B	1
13	Gasket	JXPS1201052006A	1
14	Sponge	SCPS1601052020	1
15	Magnet	SCPS1601052014	1
16	Hexagon socket cap screw	M4X20GB70D1B	1
17	Bearing roller 1	SCPS1601052007	2
18	Deflection axle	SCPS1601052004	5
19	Bearing roller 2	SCPS1601052019	3
20	Axle sleeve tube	SCPS1601052005	5
21	Tapered bore washer	SCPS1601052006	5
22	Hexagon socket countersunk head screws	M6X16GB70D3Z10D9	5
23	Hexagon socket cap screw	M6X12GB70D1Z	1
24	Plastic cover	JXPS1602052008	2
25	Back and forth tube	JXPS1602052004B	1
26	Support rod	JXPS1604052001	1
27	Hexagon thin nut	M20GB6173Z	2

16. Opearting platform assembly



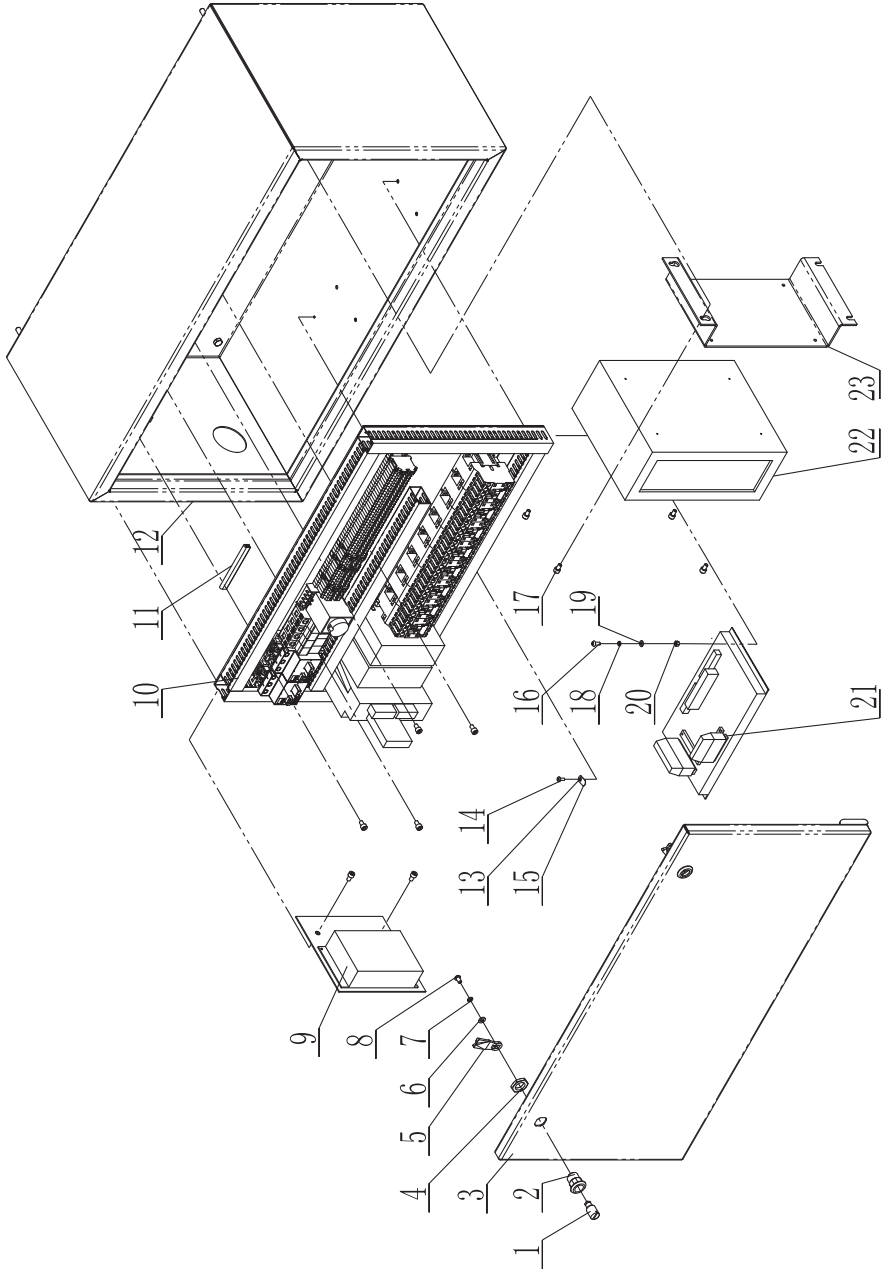
No.	Description	Parts No.	QTY
1	15 inch display	TPC150-27	1
2	Operating platform cover assembly	JXPS1604083000A	1
3	Back cover panel	JXPS1604080005A	1
4	Plug	JL22011006	2
5	Hexagon-headed bolt(full thread)	M12X80GB5783Z	1
6	Cable fender	JXPS1604080010	1
7	Fixed blade cover	JXPS1604081000A	1
8	Connective rod	JXPS1604082010A	2
9	Flat washer A class	WSH10GB97D1Z	8
10	Hexagon-headed bolt(full thread)	M10X25GB5781Z	8
11	Hexagon socket button head screw	M6X10GB70D2B	16
12	Hinge axis	JXPS1604080011	1
13	Flat washer A class	WSH16GB97D1Z	1
14	Operating platform connective rod assembly	JXPS1604084000A	1
15	Upper shield panel	JXPS1604080009	1
16	Large washer A class	WSH10GB96D1Z	1
17	Rotatory axle	JXPS1201080001	1
18	Flat washer A class	WSH12GB97D1Z	2
19	Hexagon locking nut	M10GB889D1Z	2
20	Circlips for aperture type A	CLP12GB893D1B	1
21	Cross recessed pan head screw	M5X10GB818Z	4
22	Flat washer A class	WSH5GB97D1B	4
23	Locating support assembly	JXPS1604082000A	1
24	Shield panel	JXPS1604080002A	1
25	Hexagon locking nut	M8GB889D1Z	1
26	Hexagon nut type-1	M6GB6170Z	2
27	Standard spring washer	WSH6GB93Z	2
28	Fine adjustment handle	JXPS1201061010	1
29	Large washer A class	WSH8GB96D1Z	1
30	Hexagon socket button head screw	M8X16GB70D2Z	2
31	Rotating arm locking block	JXPS1201080002	1
32	Flat washer A class	WSH8GB97D1B	1
33	USB transform interface	U09A-AF-AF-B	2
34	Tubular handle	JE8040-25X320	1
35	Hexagon socket set screws with flat point	M10X20GB77Z	1
36	Shield panel	JXPS1604080003	4
37	Hexagon nut type-1	M8GB6170Z	1
38	Standard spring washer	WSH8GB93Z	2
39	Hexagon socket cap screw	M8X45GB70D1Z	2
40	Flat washer A class	WSH8GB97D1Z	2
41	Hexagon socket button head screw	M6X16GB70D2B	2
42	Support	JXPS1604083005	1
43	Scram botton	XB5AS542C	1
44	Power indicator ( white)	AD16	1
45	Infed button	M22-WLK3-W-K11-LED	2
46	Start button (1 no)	M22-D-G-K10	1
47	Stop button	M22-D-S-X0-K01	1
48	Start button	M22-D-W-X1-K10	2

17.Fixed blade cover assembly



No.	Description	Parts No.	QTY
1	Rotating arm assembly	JXPS1604081100A	1
2	Hexagon socket cap screw	M8X16GB70D1Z	4
3	Flat key A class	WSH6GB97D1Z	6
4	Hex socket set screws with flat point	M6X8GB77B	4
5	Copper sleeve 1	JXPS1201083004	1
6	Connective welding plate	JXPS1201083100	1
7	Flat key A class	WSH12GB97D1Z	2
8	Connective rod	JXPS1602083002B	1
9	Long connective plate	JXPS1602083001B	1
10	Bolt for axle	JXPS1201083001	2
11	Gasket	JXPS1201083002	4
12	Hexagon locking nut	M8GB889D1Z	2
13	Hexagon socket button head screw	M6X16GB70D2Z	9
14	Locking welding plate	JXPS1201083200	1
15	Shield frame	JXPS1201083300	1
16	Nut cover	JXPS1201083005	2
17	Hexagon nut type-1	M6GB6170Z	4
18	Circlips for shaft type A	CLP8GB894D1B	2
19	Copper sleeve 2	JXPS1201083006	2
20	Gas spring	JKPS1601080002	1
21	Hexagon socket cap screw	M6X25GB70D1Z	2
22	Shield (45 degree)	JXPS1201083400	1
23	Shield (90 degree)	JXPS1201083400A	1

18.Electrical cabinet assembly



No.	Description	Parts No.	QTY
1	Key cylinder	JL20010010C	2
2	Key body	JL20010011A	2
3	Door weldment	JXPS1604091100	1
4	Hexagon nut	JL20010012	2
5	Tongue	JL20010009	2
6	Flat washer A class	WSH6GB97D1Z	2
7	Standard spring washer	WSH6GB93Z	2
8	Hexagon socket button head screw	M6X10GB70D2Z	2
9	Power source assembly	JXPS1604092000	1
10	Electrical assembly	JXPS1604091400	1
11	Rubber side bar	RG-1	1
12	Power distribution cabinet	JXPS1604091300A	1
13	External teeth lock washer	WSH5GB862D1Z	1
14	Cross recessed pan head screw	M4X10GB818Z	1
15	Grounding copper	1506016	1
16	Hexagon socket button head screw	M5X12GB70D2Z	4
17	Hexagon socket cap screw	M6X10GB70D1Z	10
18	Standard spring washer	WSH5GB93Z	4
19	Flat washer A class	WSH5GB97D1Z	4
20	Hexagon nut type 1	M5GB6170Z	4
21	Motion control card	GE-4000-SG-LASER-PCI	1
22	Embedded computer	BIS-6595	1
23	Computer mounting bracket	JXPS1604091208	1







