

● Standard ○ Optional - Nonapplicable

Product Category	Detailed Features	Tube Cutting		
		XC4000T2 2-chuck	XC4000P Cut-off	XC4000C 1-chuck
Axis Number	Axis Number	5+	4	5+
CNC- Axis	CNC- Axis	X/Y/U/U2	-	X/Y/U
Motion Control Algorithm	Z-Axis	●	●	●
	Focus Control	●	-	●
Motion Control Algorithm	Acceleration-Max(g)	Unlimited	Unlimited	Unlimited
	Idle Speed(m/min)	Unlimited	Unlimited	Unlimited
	Cutting Speed(m/min)	Unlimited	Unlimited	Unlimited
Control Method	Non-Busfield-Pulse Control	●	●	●
	EtherCAT	●	●	●
	Real-time Calibration	●	-	●
Height Controller	Capacitor Compensation	●	-	●
	Non-Height Controller Mode	Only Round Tube Cutting	●	●
	Fixed Height Cutting Mode	Only Round Tube Cutting	●	●
	LeapFrog	●	-	●
	optimize short travel	●	-	●
Piercing Method	Calibration Monitoring	●	-	●
	Multi-level Piercing	1 Level	●	●
		2 Level	●	●
Energy Control		3 Level	-	●
	Speed & Power & Frequency Curve	●	-	●
	Tube Corner Processing	●	-	●
Positioning Method	Thick Round Tube Cutting Traceless	●	●	●
	Cutting	●	-	●
Function	Calibration	Square Tube	●	●
		Round Tube	●	●
		Horizontal	●	●
	Zero Detect	Beam Center	●	●
		Single-side	●	●
		Double-side	●	●
		Two-point	●	●
		Four-side	●	●
	Tube Modification	Four-point	●	●
		Five-point	●	●
		Tube Modification	●	●
	Welding Seam Recognition	Round Tube	-	●
		Square Tube	-	●
Nesting	Graphics Making	Graphics Making	●	●
		Nesting Function	●	●
	Neating	Nesting files export	●	●
		Round Tube	●	●
	Island Type Co-edge	Manual Nest	●	●
		Leadline	●	●
	Start Point	Start Point	●	●
		Manual Setting of Start Point	●	●
	MicroJoint	Over/ Gap	●	●
		Micropoint	●	●
Loading Device	Toolpath Planning	Auto Pos/neg Cutting	●	●
		Toolpath Reverse	●	●
		Auto Loading Table	●	●
Unloading Control	Control Type	External Loading Table	●	●
		Cylinder	●	●
Support Controller	Control Type	Floating-Axis	●	●
		Cylinder	●	●
Other Information	Drive Monitoring (Busfield)	Floating-Axis	●	●
		Cylinder	●	●
	Third-party CAM Software	Drive Monitoring (Busfield)	●	●
		Third-party CAM Software	●	●
	Custom Functions	Custom Input/output	●	●
		Custom Alarm	●	●
	Alignment Mechanism Control	Platform Config Tool	●	●
		Cylinder	-	●
	Maintenance Reminder	Maintenance Reminding	●	●
		Software Lock	●	●

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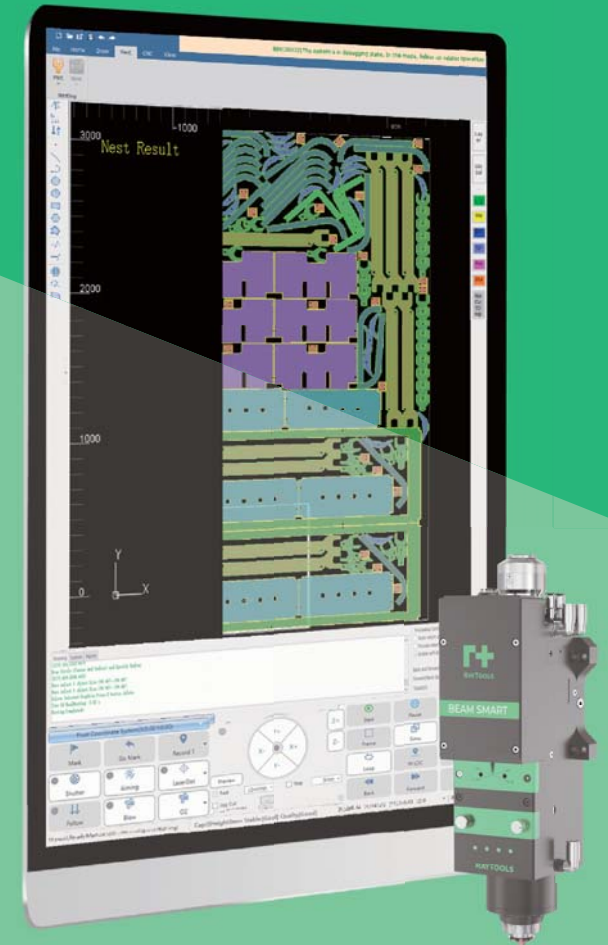
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SMART xCNC
SYSTEMS

● Standard ○ Optional - Nonapplicable

Category	Product		Flat Welding		
	Detailed Features		XW100 Standard Welding		
Axis Number	Axis Number		5+		
CNC- Axis	CNC- Axis		X/Y/Z/A/B		
Motion Control Algorithm	Acceleration-Max		Unlimited		
	Idle Speed		Unlimited		
Control Method	Welding Speed		Unlimited		
	Non-Busfield-Pulse Control		●		
Nesting	Drawing	EtherCAT	●		
	Teaching Drawing	Basic Drawing and Transform Processing, Spot Weld	●		
Graphics Process Operation	DO point		●		
	Overheating Welding		●		
	Pre Spot Weld		●		
	Leadline		●		
	Start Point		●		
	Direction		●		
Welding Process	Sort		●		
	Layer	Process Layers & 1 Non-process Layer	●		
	General Process	Power Curve	●		
		Starting&Ending power ascent and descent	●		
		POS Function	○		
	Galvo Function	Basic Process	●		
Raytools Galvo Welding Head		○			
Process Control	Powder Feeder		○		
	Wire Feeder		○		
	Manual Control	Axis Control	●		
		Auto Control	Basic Process Control	●	
	Manual Laser Control	Shutter	●		
		Aiming	●		
	Manual Gas Control	Laser	●		
		Coaxial Protective Gas	●		
	Positioning Method	Air Knife	●		
		Floating Coordinate	●		
	Tool Setting	Machine Coordinate System		●	
		Step	●		
		Marked Point	●		
		Speed Rate	●		
		Processing Number	●		
		Diagnosis	●		
	Monitoring	1 Point	●		
		2 Points	●		
4 Points		●			
Diagnosis	Start Monitoring		●		
	IO Status		●		
	Slave device Connection(OP)		●		
Advanced Settings	Following Error		●		
	State Machine		●		
Other Information	Pitch Compensation		●		
	Accuracy Control		●		
	Low-power Laser		○		
Other Information	Pallets Welding		○		
	Custom Functions	Custom Function Button config	●		
		Custom Alarm	●		
		Platform Config Tool	●		
	Lubrication		●		
	Language Setting	Chinese, Traditional Chinese, English	●		
Backup	Backup		●		
	CCD Visual Positioning		○		
	Software Lock		●		

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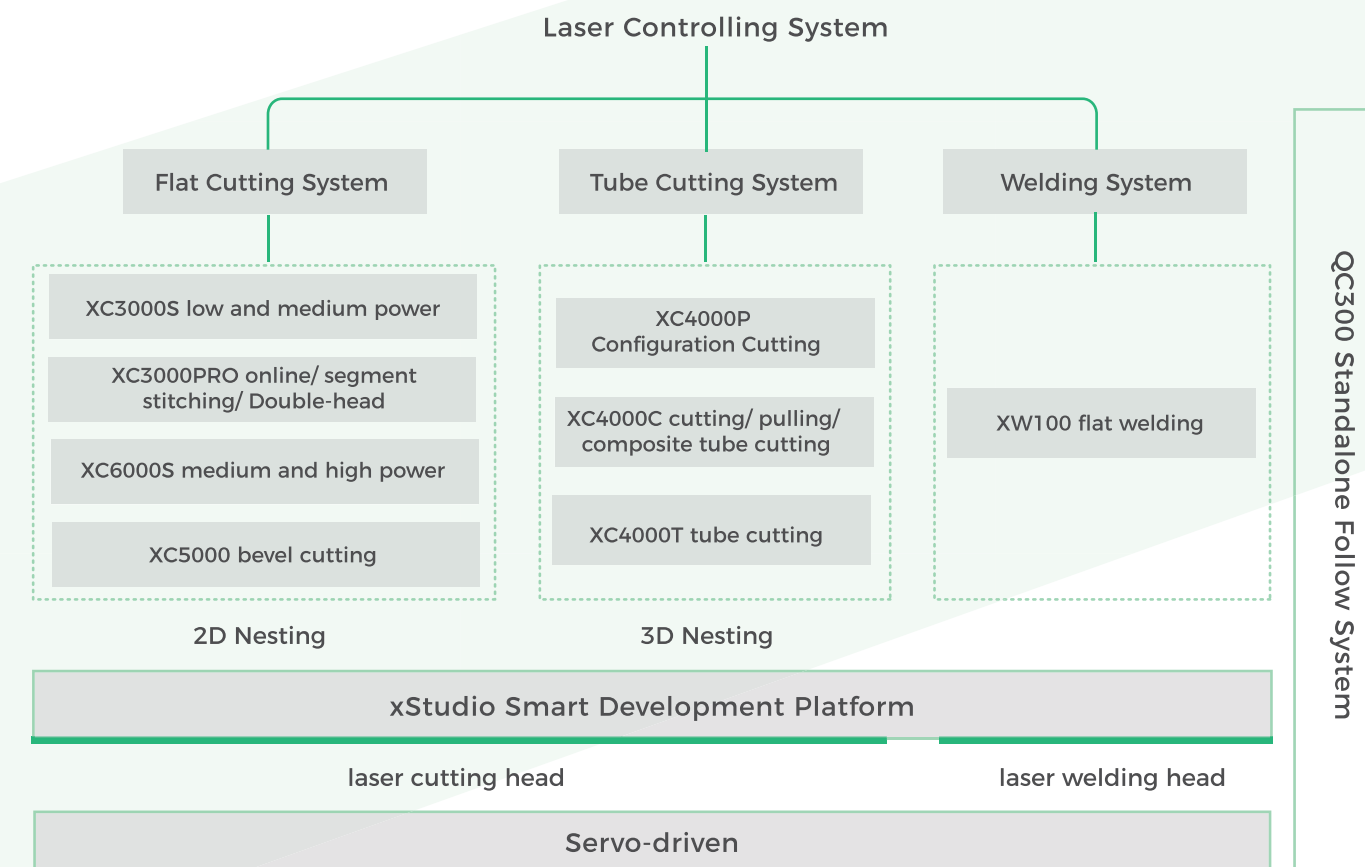
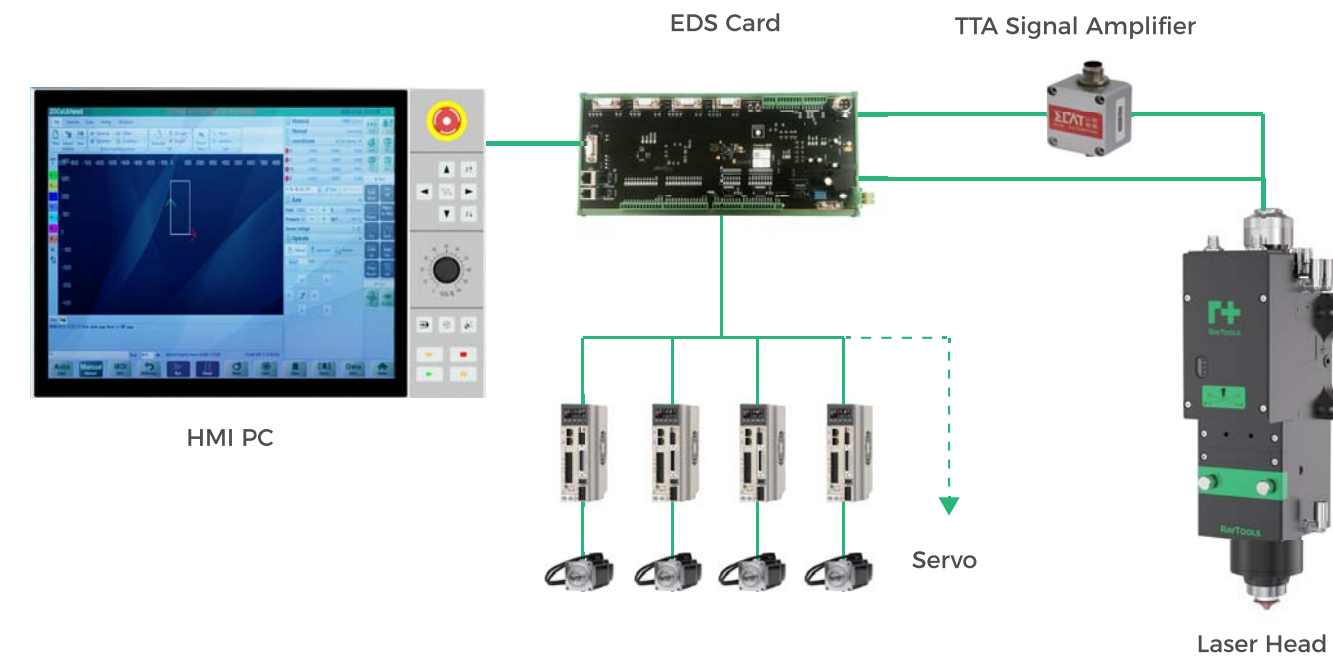
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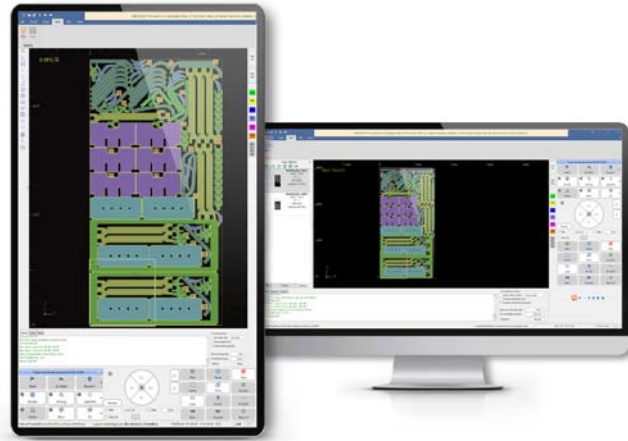


QC300 Standalone Follow System

Profile

XC-Series Laser Flat Cutting System

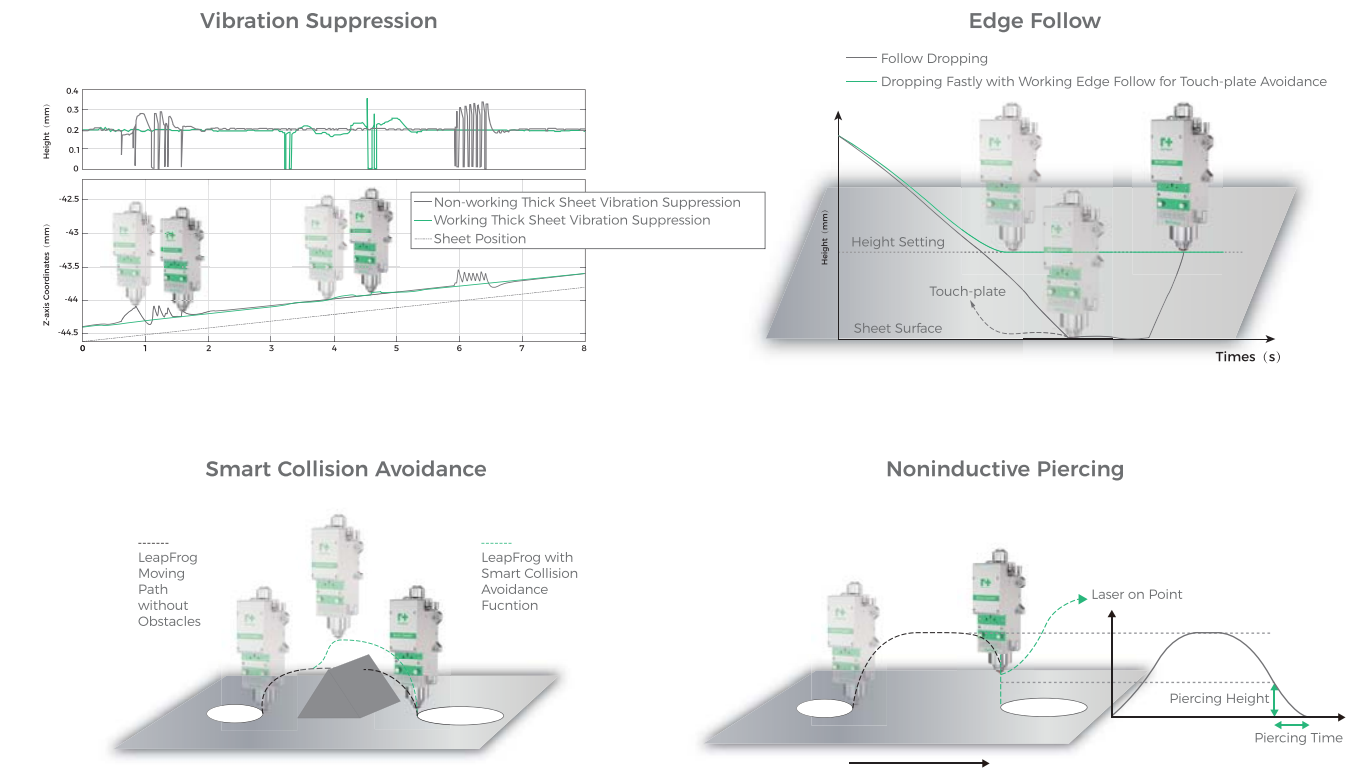
X-series flat laser cutting system, developed from xStudio platform, covers XC3000S/XC3000PRO/XC6000S models. Such systems enable EtherCAT busfield servo and pulse servo with various unique features such as noninductive piercing, piercing slag removal, co-edge overcutting, vibration suppression, sharp corner starting, traceless microJoint, etc., mainly used in general flat cutting machines, micro machines, coil stock segmentation, online cutting machine, etc. For example, XC3000PRO system supports double-head cutting, segment feeding stitching, processing large parts in small format.



Application Field

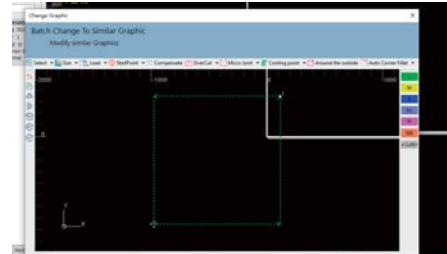


Control Features



Function

Batch Modify



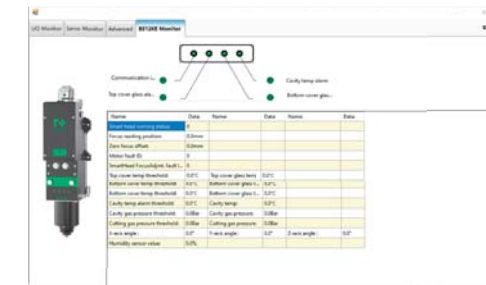
Support batch modification of some graphic process in the drawing including MicroJoint, to make editing more convenient.

Auto Cleaning Nozzle



The nozzle will move to the specified place for auto cleaning after meeting the cleaning conditions, with auto calibration if cleaning is completed.

Smart Head Monitoring



The system monitors working data of key components of the Smart head in real time, with alarms for stoppage in time in abnormal conditions, to avoid affecting the cutting effect, achieve safe and efficient production and improve the lifespan of the equipment.

Focus Lens Temp

Monitoring focus lens status for quick feedback when lens contamination occurs.

Cavity Temp

Monitoring the cavity temperature of the cutting head to avoid affecting optics and cutting effect from high temperature.

Laser Monitoring



Supporting various laser communication control methods, such as I/O, RS232, TCP/IP. Real-time monitoring of laser status, with alarms for stoppage in time in abnormal conditions, to improve safety and avoid affecting the processing effect. It's also applicable to set the power, frequency, duty cycle and achieve online control.

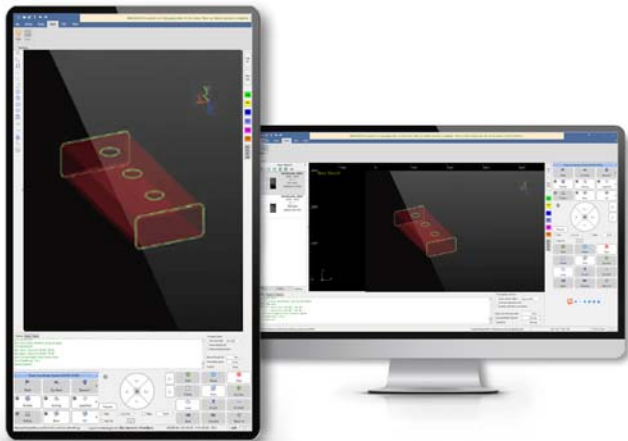
Process Samples



Profile

XC-Series Laser Tube Cutting System

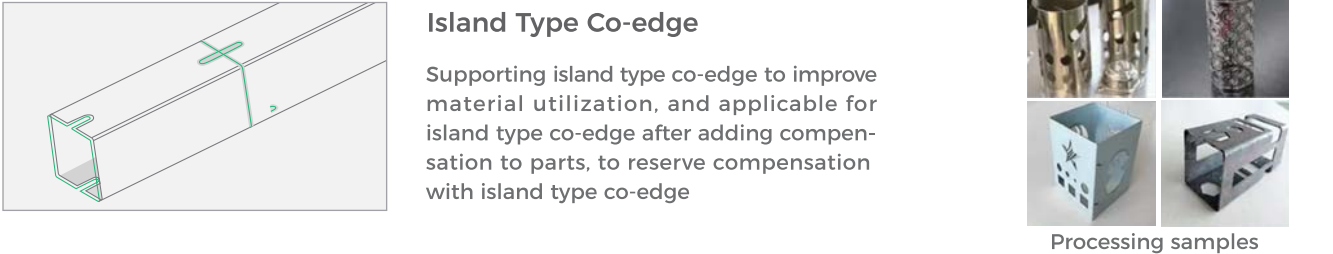
X-series laser tube cutting system, developed from xStudio platform, covers XC4000P/XC4000C/XC4000T and other models. Such systems boast various functions including EtherCAT busfield servo, pulse servo, welding seam recognition, auto edge-alignment and island type co-edge, mainly used in configure screen tube cutting, composite pulling and standard 2-card and other machines.



Application Field



Features



Profile

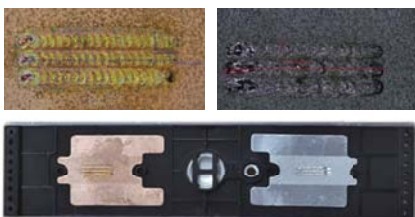
XW-series Laser Welding System

XW100 flat welding system can match various laser welding machines with functions like PSO and teaching, widely used in new energy and other industries

Features

CCD Visual Positioning

CCD visual auxiliary positioning system supports to identify plenty of mark points, positioning mark points through shooting and adjusting the processing coordinate through calculating.



Product Function List				
Product Category	Detailed Features	Flat Cutting		Bevel Cutting
		XC3000S Medium and Low Power	XC3000PRO online/Segment Stitching/Double-head Customized Cutting Software	XC5000 Bevel Cutting
Axis Control	Axis Number	4	5	5
	Non-Interpolation Axis	-	•	-
	Double heads	-	•	-
	Focus Control	•	•	•
Motion Control	Non-Busfield-Pulse Control	•	•	•
	EtherCAT	•	•	•
	Flexible Acceleration and Deceleration	•	•	•
	Interferometer Data Compensation	•	•	•
Height controller	Offset Detection	•	•	•
	Real-time Calibration	•	•	•
	Quick Calibration	•	•	-
	Capacitance Compensation	•	•	•
Gas Control	LeapFrog	•	•	•
	Optimize Short Travel	•	•	•
	Calibration Monitoring	•	•	•
	Gas Pressure Close-loop Control (HOERBIGER Proportional Valve)	•	•	•
Nesting	Cutting Head Cooling Gas	•	•	-
	Graphic Auto Optimization	•	•	•
	Cutoff Line Function	•	•	•
	Advertising Words Making	•	•	•
Piercing	Graphics Making	•	•	•
	Bridged	•	•	•
	Nesting Function	•	•	•
	Nesting File Export	•	•	•
Special Process	Leadlines	•	•	•
	Manual Setting of Start Point	•	•	•
	Over/ Cap	•	•	•
	Micropoint	•	•	•
Process Parameter Management	Toolpath Reverse	•	•	•
	Sort	•	•	•
	Noninductive Piercing	•	•	•
	Lightning Piercing	•	•	•
Flycut Type	Multi-level Piercing	•	•	•
	Prepiercing	•	•	•
	Auto Group Piercing	•	•	•
	Slag Removal Process after Piercing	•	•	•
EdgeDetect	Leadline Process	•	•	•
	Cooling Point	•	•	•
	Film Covering Technology	•	•	•
	Fixed HeightFixed Height	•	•	•
Positioning Method	Vibration Suppression of Thick Sheet	•	•	-
	Vibration Suppression of Thin Sheet	•	•	-
	Traceless MicroJoint	•	•	-
	Slow Start Process	•	•	•
Pallet Changer	Slow Stop Process	•	•	•
	Speed Power & Frequency Curve	•	•	•
	Corner Process	•	•	•
	Process Import & Export	•	•	•
Advanced Functions	Process Lib.	•	•	•
	Line & Round Hole	•	•	•
	Film Hole	•	•	•
	Radar	•	•	•
Check before Processing	Leadline & Flycut	•	•	•
	High-speed MicroJoint	•	•	•
	Capacitor Auto edge detection	•	•	•
	Edge detection with 6-point (thin sheet)	•	•	•
Other Information	Floating Coordinate	•	•	•
	Workpiece Coordinate	•	•	•
	Parallel Exchange	•	•	•
	Hydraulic Exchange	•	•	•
Batch Processing (multi-files)	Motor Lifting	•	•	•
	Batch Processing (multi-files)	-	-	•
	Maintenance Module	•	•	•
	Segment Process	•	•	•
Segment Stitching	Segment Stitching	-	-	•
	Cutting Online	•	•	•
	Nozzle Cleaning	•	•	•
	Jog Cutting	•	•	•
Arc Detection	Arc Detection	•	•	•
	Partition dust removal	•	•	•
	Processing Tasks	•	•	•
	Verticality correction	•	•	•
Quick Cutoff	Production Report	•	•	•
	Travel Obstacle Avoidance	•	•	•
	Drive Monitoring(Busfield)	•	•	•
	CCD Vision Detection	•	•	•
Simulation Processing Check	Simulation Processing Check	•	•	•
	Frame Check	•	•	•
	Third-party CAM Software	•	•	•
	Multi-task Processing	•	•	•
Custom Input / Output	Custom Input / Output	•	•	•
	Custom Function Button	•	•	•
	Precitec Cutting Head	•	•	•
	Backup	•	•	•
Process Mark	Process Mark	•	•	•