

The RVD SmartFibre TF range of tube laser cutting machines are especially applicable for round, square, rectangular, oval and waist round tubes.

Manufactured with the world's leading fibre laser resonator and electronic components to ensure superior stability. The high clamping bed feature provides outstanding rigidity whilst performing at high speed and acceleration, taking your tube laser cutting to the next level.





# SUPERIOR TUBE CUTTING QUALITY



## OPTIONAL MAGAZINE LOADING SYSTEM



### CNC CONTROL AT YOUR FINGER TIPS

- Equipped with new multi-touch CNC Controller
- 5000mm-8000mm unrestricted mixed row automatic intelligent processing
- Seamlessly docked with the intelligent manufacturing factory
- MESS cloud data management system

#### **LANTEK FLEX3D**

- Easy, Flexible Design
- Accurate, suitable for a wide range of pipe types
- Optimising and Cutting of Tubes
- CNC Simulation and Generation



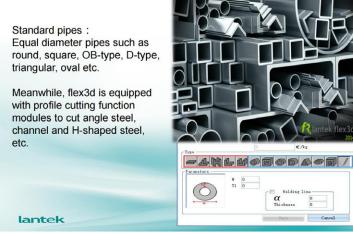
#### **Machine Features**

- High performance Max Photonics Laser Source
- Fibre optic beam delivery system
- RayTools Autofocus Laser Cutting Head
- High strength, rigid gantry design to ensure high accuracy and allow high acceleration
- High precision class alpha rack and pinion drive motion system
- Applicable tube types: Round tube, square tube, rectangular tube, oval tube, D-shaped steel, T-shaped steel, H-shaped steel, channel steel, angle steel, etc.
- CE compliant complete machine enclosure and light barrier system
- Lantek Flex3d CNC Laser Control and Software

### **Optional Equipment**

- Outfeed Support 4m / 6m
- Precitec ProCutter Head
- 3D Bevel Cutting Torch
- Optional Magazine Loading system
- Conveyor outfeed
- Weld Seam Detection
- UPS: Uninterruptible Power Supply
- Filtration & Extraction

#### Lantek Flex3d Supporting Various Pipes





# HIGH SPEED FULL STROKE CHUCK - UP TO 130 RPM

Tube Range Up to 235mm / 350mm



#### **FULL SERVO DYNAMIC SUPPORT**

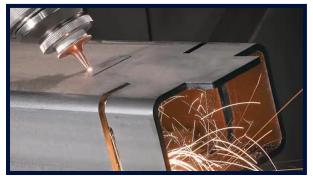
Tube Range Up to 235mm / 350mm



#### **INTELLIGENT AUTO LOADER**

2.5T Ø20-200mm; 800 x 800 x 6200mm

3,500 - 6,200mm, unrestriced mixed-row automatic intelligent processing



#### **AUTOMATED LASER CUTTING HEAD**

2D (3D Laser Cutting Optional)

Auto Focus

High degree of automation and good performance



#### **FLY CUTTING OF TUBE**

Ultra-fast fly cutting, high precision and time saving.



#### **SLAG REMOVAL**

Ensures the inner wall of the pipe is clean, eliminating secondary cleaning processess.



#### **DUST REMOVAL**

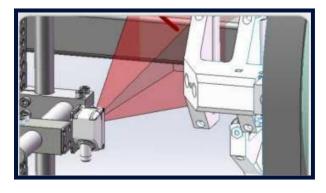
Tail chuck dust removal function to reduce environmental pollution and dust.



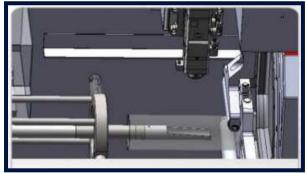
**LONG PIPES & TUBES** 

Floating support specially designed for cutting long finished workpieces.

### **OPTIONAL EXTRAS**



KEYENCE VISUAL WELDING SEAM DETECTION



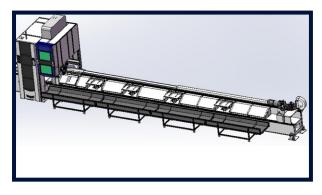
**AUTOMATICAL DESLAGGING** 



**3D BEVEL CUTTING (+45°)** 



MES PRODUCTION MONITOR SOFTWARE



C3 CHUCK

LASER SOURCE	kW	1.5	2.5	3	4	6
Cutting Capacity - Mild Steel	mm	14	20	22	25	25
Cutting Capacity - Stainless Steel	mm	6	10	12	12	20
Cutting Capacity - Aluminium	mm	5	8	10	12	16
Cutting Capacity - Brass	mm	5	8	8	12	14
Cutting Capacity - Copper	mm	4	6	6	6	10
Cutting Capacity - Galvanised Steel	mm	5	6	8	10	14

## **TECHNICAL SPECIFICATIONS**

TABLE STOCK CO	DE	TF6025 / TF6025A	TF8025 / TF8025A	TF6035 / TF6035A	TF8035 / TF8035A			
Laser Power	kW	1.5/2/3/4/6						
Tube Length	mm	6,000	8,000	6,000	8,000			
Tube Diameter	mm		: 20 - 235 20 - 235 x 235	Round Ø : 20 - 350 Square : 20 x 20 - 245 x 245				
Cutting Profiles (Standard)		Round, Square, Rectangular						
Cutting Profiles (Optional)		Angle, Channel, H-Shape, L-Shape, Steel Band, etc						
Weight of Single Tube	kg	2!	50	530				
Positioning Speed	m/min	120		72				
Chuck Rotation Speed	rpm	13	30	75				
Axis Acceleration	G	1.	.2	0.6				
Positioning Accuracy	mm	±0	.05	±0.05				
Repeat Positioning Accuracy	mm	±0.03		±0.03				
Length	mm	12,070	13,400	12,070	13,400			
Width	mm	2,700		2,700				
Width (with Optional Magazine Loader)	mm	5,000		5,000				
Height	mm	2,300		2,300				
Weight	kg	8,0	000	9,000				
Weight (with Optional Magazine Loader)	kg	15,0	000	17,000				
OPTIONAL BUNDLE LOADING SYSTEM								
Bundle Size (Optional Bundle Loader)	mm	800 x 80	00 x 800	800 x 800 x 800				
Bundle Loading Weight	kg	2,500		2,500				

## KEY COMPONENTS

COMPONENT	BRAND		
Fibre Laser Source	Max Photonics		
CNC Controller	Power Automation Higerman		
CAM/CAD software Flex3D	Lantek		
Servo motor and driver	Yaskawa		
Rack and Pinion	YYC/J&T		
Linear Guide	Hiwin		
Laser Head	Raytools		
Gas Proportional Valve	SMC		
Reduction Gear Box	Innowelle		
Chiller	Tong Fei		
Rotate Chuck System	RVD		
Automatic Support	RVD		
Automatic Bundle Loader	RVD		
Automatic Unloading	RVD		
Electrical Components	Schneider		
Welding Seam Visual Detection	Keyence		
C3 Chuck (Optional)	RVD		