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Precise / Efficient / Stable / Intelligent

**IECHO LASER DIE CUTTING MACHINE**

**LCT**



A PROVIDER OF INTELLIGENT CUTTING

INTEGRATED SOLUTIONS FOR THE NON-METAL INDUSTRY

IECHO was established in 1992 and went public in March 2021. Over the past 30 years, IECHO has always adhered to independent innovation, a "professional" R&D team, continuous technological innovation, "fast" industry insight, and continuous injection of new blood, completing every growth and transformation, and improving the full coverage of the non-metal industry. Reach high-quality cooperation with many industry leaders.

1 National standard 3 Industry standard 30+ Invention patent 130+ Patent 81+ Software copyright

110+ R & D personnel 8%+ R&D investment 3000+ Annual capacity 2000+ Process standard 400+ Staff

20000+ Customer 100+ Sales countries and regions 60+ Industry coverage 30+ National outlets 300+ Global outlets

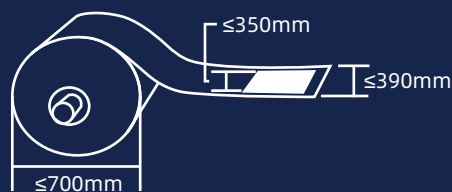
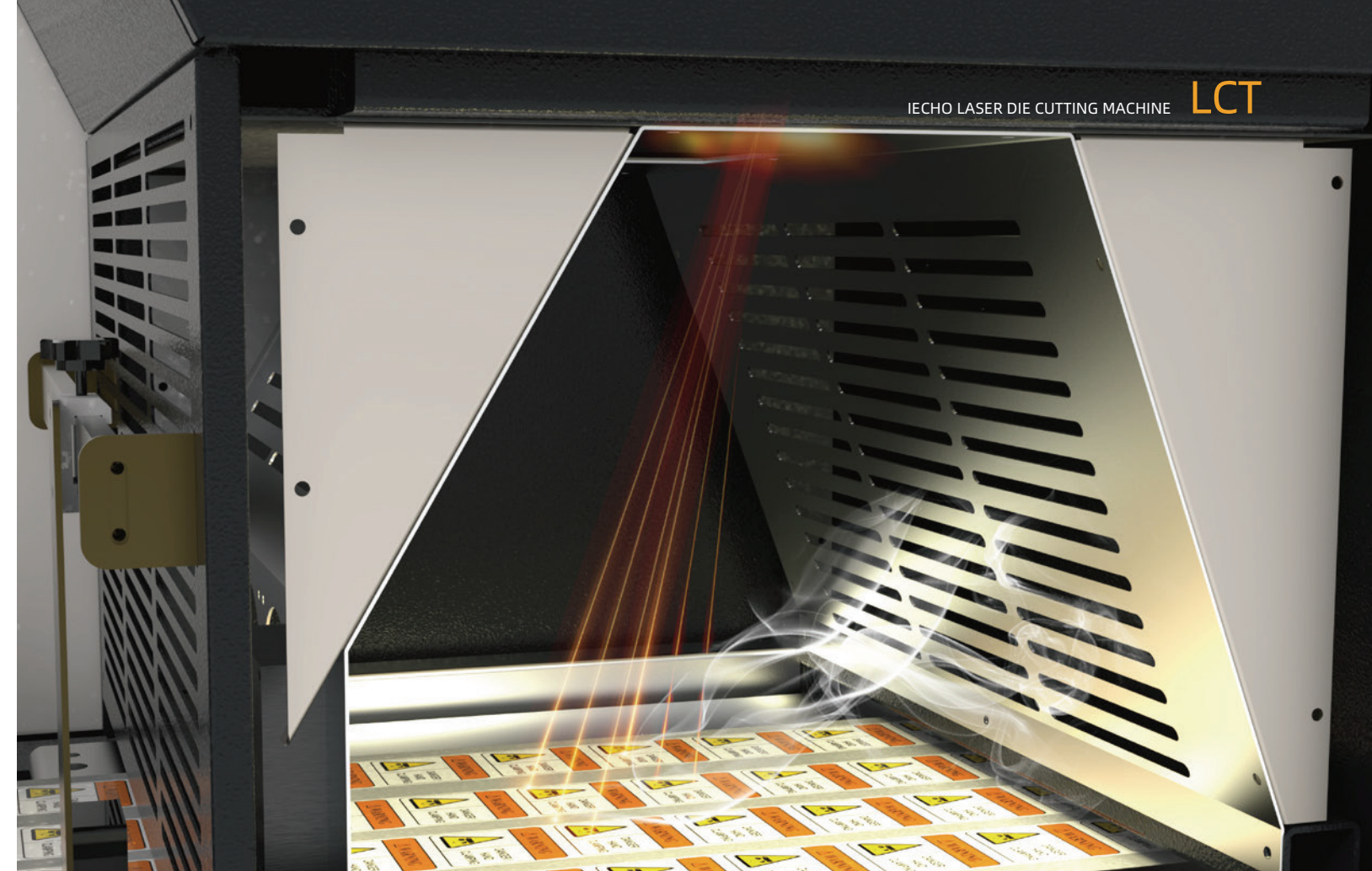
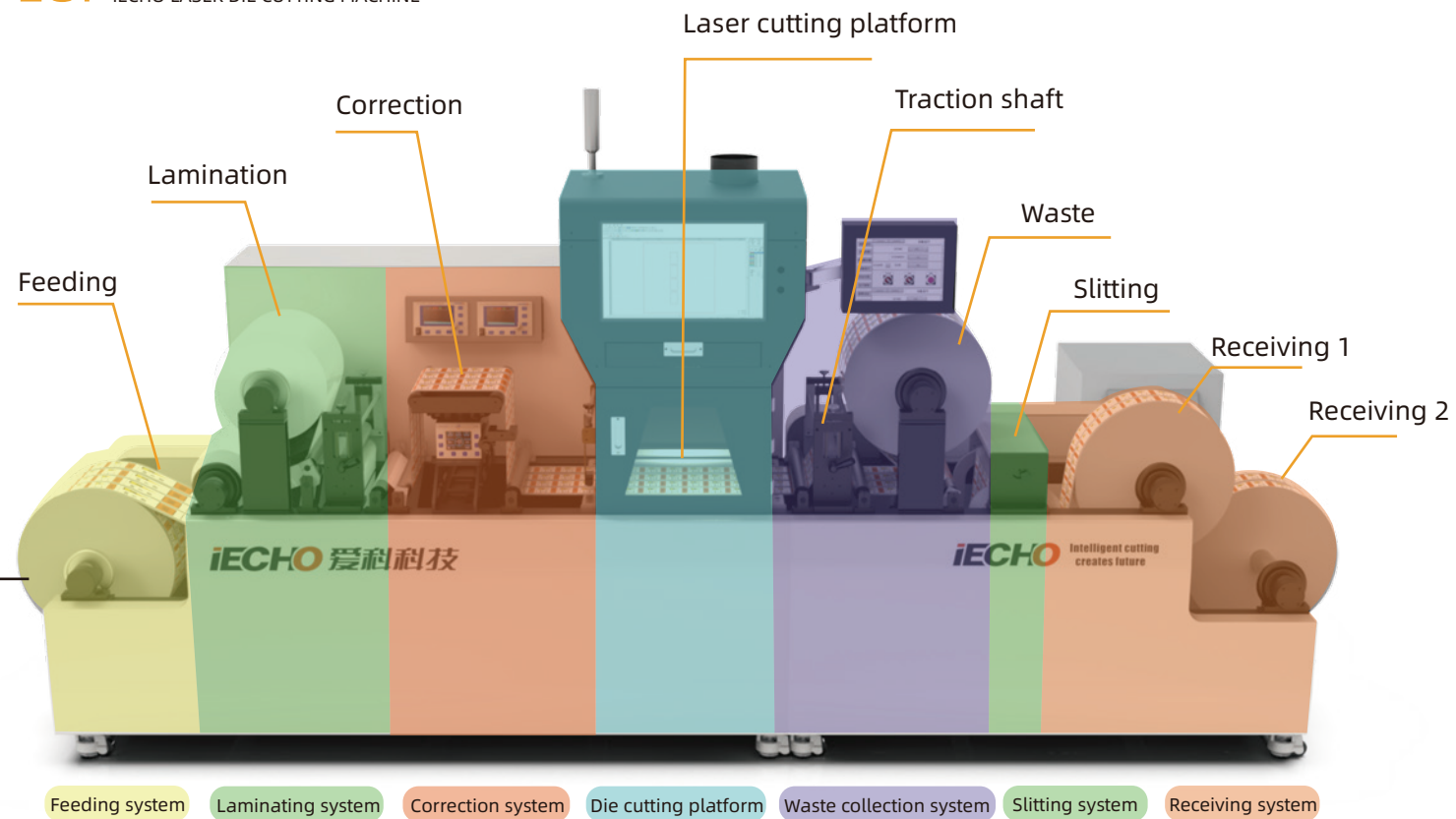
IECHO LASER DIE CUTTING MACHINE



IECHO LCT350 laser die-cutting machine is a high-performance digital laser processing platform integrating automatic feeding, automatic deviation correction, laser flying cutting, and automatic waste removal. The platform is suitable for different processing modes such as roll-to-roll, roll-to-sheet, sheet-to-sheet, etc. It is mainly used in the process of full cutting, half cutting, flying line, punching and waste removal of non-metallic materials such as sticker, PP, PVC, cardboard and coated paper. The platform does not require cutting die, and uses electronic files import to cut, providing a better and faster solution for small orders and shorter lead times.

LCT Laser die cutting machine core technology

- No need cutting die
- Fly-cutting
- Ultrasonic correction
- Metal RF Laser
- QR dynamic image changer
- Cutting database
- Remote diagnosis
- Intelligent monitoring
- Mobile Internet
- Unattended



Max cutting width **350mm**  
Max material width **390mm**  
Max outer diameter **700mm**

#### Convection smoke removal system

- Using source bottom blowing side row technology.
- The surface of the smoke removal channel is mirror-finished, easy to clean.
- Intelligent smoke alarm system to effectively protect optical components.

## Mechanical structure

### Machine body frame

- It adopts pure steel integral welded structure, and is processed by a large five-axis gantry milling machine. After anti-aging treatment, it ensures the precision and stability of the mechanical structure for long-term operation.

### Moving parts

- Adopt servo motor and encoder closed-loop motion control system to ensure the system is accurate, stable and reliable.

## Laser Processing System

- The photoelectric sensor is linked to realize the automatic positioning of the processing data.
- The control system automatically calculates the working time according to the processing data, and adjusts the feeding speed in real time.
- The flying cutting speed up to 8 m/s.

### Feeding system

- The high-precision CNC machine tool is used for one-time processing and molding, and is processed by the deviation correction system to ensure the installation surface accuracy of various types of reels.

### Laser cutting platforms

- Adopt high-precision aluminum alloy platform to ensure the consistency of laser die-cutting depth.

## Laser box Photonic Integrated Circuit system

- Extend optical component life by 50%.
- Protection class IP44.



## Intelligent Tension Control System

The feeding mechanism and the receiving mechanism adopt magnetic powder brake and tension controller, the tension adjustment is accurate, the start is smooth, and the stop is stable, which ensures the stability and accuracy of the material tension during the feeding process.



## Ultrasonic Intelligent Correction System

- Real-time monitoring of working status.
- High dynamic response level and accurate positioning.
- Brushless DC servo motor drive, precision ball screw drive.

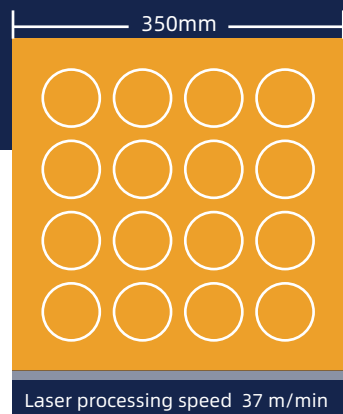
# LCT

laser die cutting actually measured speed

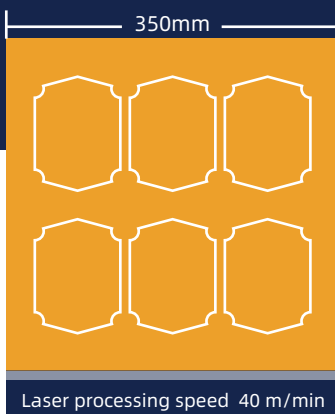
Discharge speed  
**46** m/min  
(Laser cutting speed of 8 m/s)



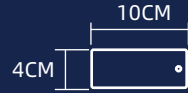
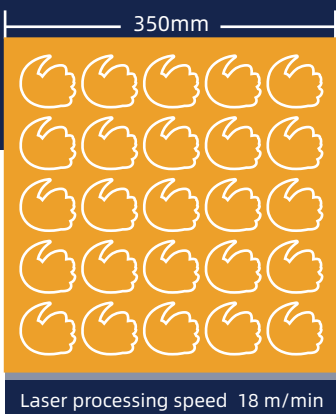
|                       |             |
|-----------------------|-------------|
| Test material         | PET sticker |
| Material thickness    | 45μm        |
| Length of cut line    | 188mm       |
| Die-cut size          | 6cm×6cm     |
| 1000 processing speed | 36s         |



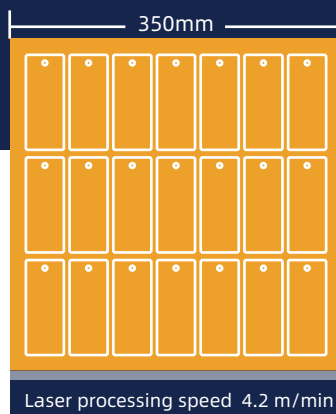
|                       |                       |
|-----------------------|-----------------------|
| Test material         | Coated paper stickers |
| Material thickness    | 85μm                  |
| Length of cut line    | 372mm                 |
| Die-cut size          | 12cm×9cm              |
| 1000 processing speed | 92s                   |



|                       |             |
|-----------------------|-------------|
| Test material         | PET sticker |
| Material thickness    | 45μm        |
| Length of cut line    | 227mm       |
| Die-cut size          | 6cm×5.7cm   |
| 1000 processing speed | 43s         |

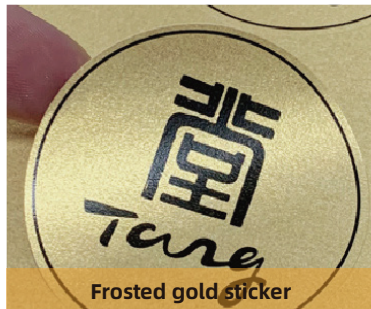


|                       |              |
|-----------------------|--------------|
| Test material         | Coated paper |
| Material weight       | 280g         |
| Length of cut line    | 291mm        |
| Die-cut size          | 10cm×4cm     |
| 1000 processing speed | 252s         |



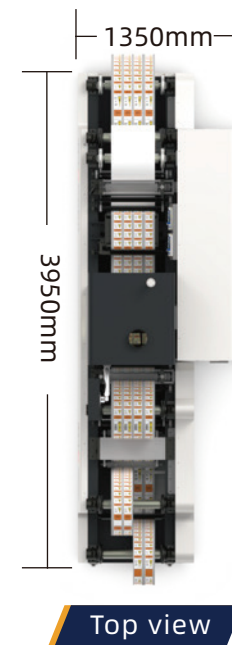
## LCT

Applicable materials



## LCT

Parameters



|                                        |                                 |
|----------------------------------------|---------------------------------|
| Machine type                           | LCT350                          |
| Maximum feeding speed                  | 1500mm/s                        |
| Die cutting accuracy                   | ±0.1mm                          |
| Maximum cutting width                  | 350mm                           |
| Maximum cutting length                 | Unlimited                       |
| Maximum material width                 | 390mm                           |
| Maximum outer diameter                 | 700mm                           |
| Graphic format supported               | AI / BMP / PLT / DXF / DS / PDF |
| Working environment                    | 15-40℃                          |
| Appearance size(L×W×H)                 | 3950mm×1350mm×2100mm            |
| Equipment weight                       | 2000kg                          |
| Power supply                           | 380V 3P 50HZ                    |
| Air pressure                           | 0.4Mpa                          |
| Dimensions of the chiller              | 550mm*500mm*970mm               |
| Laser power                            | 300W                            |
| Chiller power                          | 5.48KW                          |
| Negative pressure suction system power | 0.4KW                           |

\*The product parameters and functions mentioned on this page are subject to change without prior notice.