

General Specifications

EDI500

Exposure unit	Max. image size	620 x 690 mm (24.4" x 27.2")	•	
	Compatible panel sizes	Any size up to 620 x 720 mm (24.4" x 27.6")	•	
	Panel thickness	0.1 to 10 mm (0.004" to 0.4")	•	
	Substrate type	Most common Etch Resists	•	
	Panel holding	First EIE vacuum table First EIE Panel clamping system	• Option	
	Minimum Line Width	30 µm (1.2 mil)	•	
Optical Engine	Technology	DMD with advanced UV Lens	•	
	Light source type	Very high pressure mercury arc lamp	•	
	Light spectrum	365 to 450 nm (UV-A)	•	
	Exposed energy	4 to 900 mJ/cm ²	•	
Photoimable Substrate	Type	Compatible with commonly used etch resists Compatible with commonly used solder masks UV-sensitive silver halide films	• • •	
	Built-in Raster Image Processor	Data input formats	RS274D, RS274X, DPF and EIE RPL	•
		Optional input formats	ODB++, PostScript, TIFF-PACKBITS, PDF	•
Via third party software		DXF, DWG, other upon request	•	
Network compatibility		Network File System TCP-IP	•	
User Interface	Operator-friendly user interface with touch panel including First EIE MPS and Remote Queue Manager Software		•	
Panel Pack	CAM Software to EDI500 data automatisaton for minimal operator interaction		Option	
Wizards	For equipment easy calibration and adjustment		•	
Panel Alignment and Registration	Automatic registration and side alignment with on-board CCD camera Or manually with locating pins Unique rotation table		• • •	
	Serialization Dynamic Data	Serial numbers, time-code, barcodes 1D or 2D (QR-Code, DataMatrix and others) by D-code mapping	Option	
	Exposure Time (20" x 16")	Less than 90 seconds	Varies on resist sensitivity and exposure energy	•
Overall Accuracy	± 15 µm		•	
Repeatability	± 5 µm		•	
Operating Conditions	Temperature relative humidity	20 ± 2°C 50% ± 10% (non-condensing)	•	
	Power requirements	Single phase : 230 VAC ± 10%, 2000 Watts	•	
	Compressed air	Minimum : 6 bars, 56L/min (90 psi, 2 cfm)	•	
	Dry and oil free		•	
Size and Weight	Width x depth x height	1560 x 1890 x 1470 mm	•	
	Weight	850 kg	•	

© 10 2016 First EIE SA SPECIFICATIONS SUBJECT TO CHANGE WITHOUT NOTICE

■ Flexibility ■ Simplicity ■ High quality ■ Reliability ■ Easy maintenance ■ Optimized investment

The Latest Imager Technology

EDI500

Cost-Effective



SWISS QUALITY
720 x 620 mm 27.6" x 24.4"



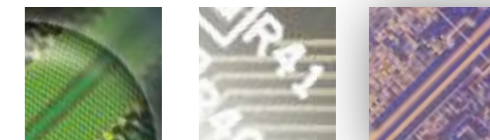
First EIE SA • Ch. de la Gravière 2 • CH-1227 Geneva • Switzerland
Tel. +41 22 307 0630 • sales@FirstEIE.com • www.FirstEIE.com



The True Figures



The True Figures



- Affordable ■ Flexibility ■ Simplicity ■ Data Processing Experience ■ High quality ■ Reliability ■ Easy maintenance ■ Optimized investment

Direct Imager

First EIE SA

using Latest proven Technology



The EDI500 benefits from **the wide expertise** of First EIE, a leading supplier of Photoplotting and Ink Jet Printing solutions.

An equipment that will address most requirements of production shops that provides Quick-Turn PCBs at an **affordable price**.

Swiss Quality With smart design and First EIE qualified components. **Designed to protect** your investment, our machines will always be upgradable to the next level.

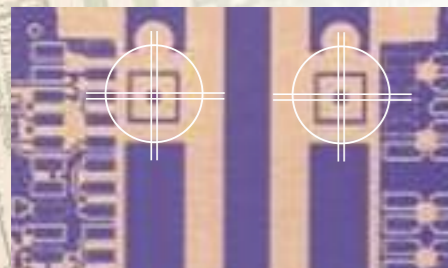
Accessible



This new Direct Imager has been designed to provide even **more operational and maintenance simplicity** with a high level of reliability.

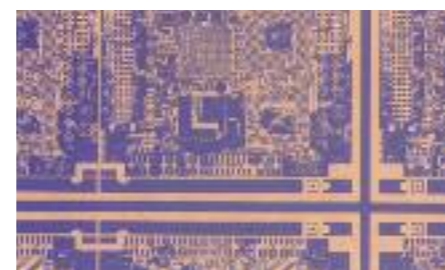
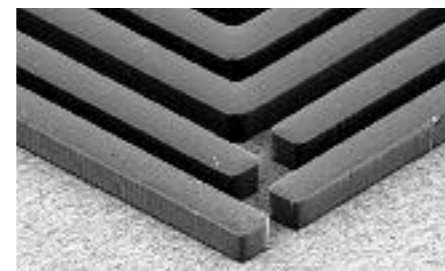
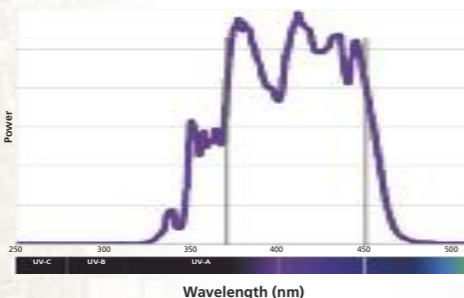
Optimized Cost The EDI500 Direct Imager **is compact** with a small foot-print, low power consumption, and minimal maintenance requirements. Optimized Light Source Unit designed for easy lamp replacement. Enhanced **thermal management** is embedded in the machine, there is no need of an external cooling unit.

Registration and Alignment



Automated A/B sides registration and scaling using image recognition or locating pins.

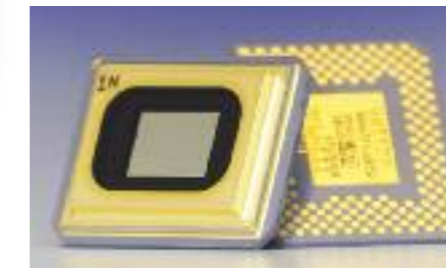
Established UV source



Broad UV spectrum, **from 365 nm to 450 nm** makes it compatible with most industry standard Etch Resists and Solder Masks.

State-of-the-Art Optical Engine Developed in **close collaboration** with **our partners**, our new EDI500 Direct Imager integrates an industry proven DMD Optical Head, which is based on **TI's DLP chip** with a dedicated active thermal management to improve **DMD life time**. The specifically designed optical lens is optimized to offer the highest image accuracy.

DMD Technology



State of the Art Direct Image Projection, using TI's DLP® chip, our EDI500 Direct Imager brings to the market a compact and simple direct exposure equipment that is equipped with **DMD technology**.

Main features

- Smart design for **simple head adjustment**
- Modular design for **easy maintenance**
- Laser auto-focus system
- Integrated registration camera
- Rotation table for improved file to panel adjustment.



MPS Software and User Interface



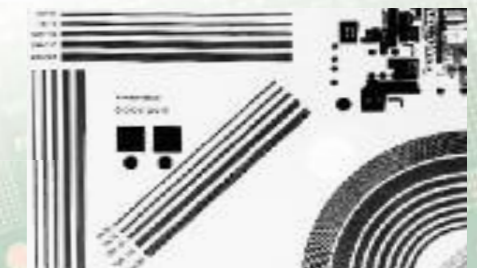
Panel Pack :
From CAM to Panel in two clicks.



The EDI500 software offers a very operator friendly interface and superior flexibility in your language.

It brings to the system **the vast experience** of First EIE in file management and data processing.

Photoplotter Backup



The EDI500, thanks to his optical engine, is able to plot films.

- Line width down to **30µm**
- Black density **>4.5**

Ask for the reference of the recommended UV-sensitive **silver halide film**.