

# ESSEGI AUTOMATION

## SERIE ULTRAFLEX ISM 1800, ISM 3600, ISM 3900



PRODUCTION  
EMPOWERMENT



TIME SAVING



NO MISTAKE



SPACE SAVING



RH CONTROL



AUTO-DETECT  
CODES 1D/2D



MONEY SAVING  
FAST R.O.I.

## Who we are

We are an worldwide manufacturer of Intelligent Storage Management solutions for SMT/THT components.

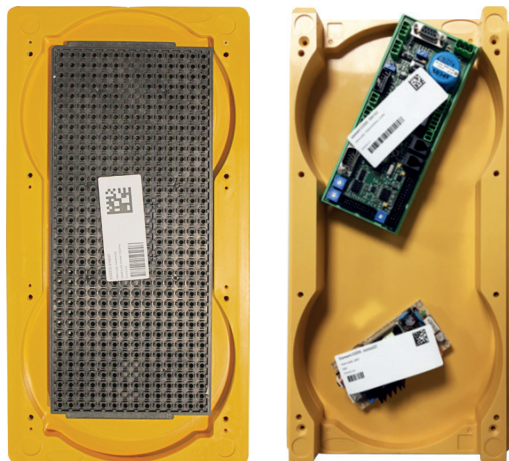
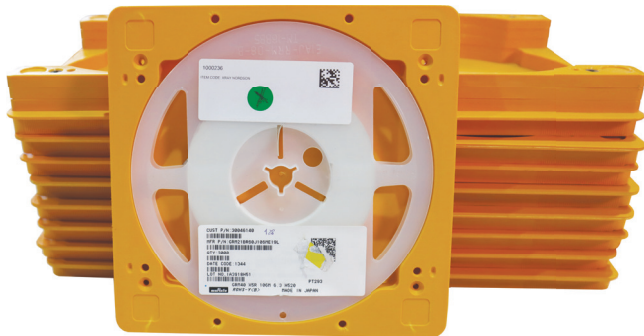
We design our ISM solutions to eliminate human errors, to reduce storage space, to decrease setup time, and to guarantee high quality, thanks to the traceability and MSL control.

Our aim is to share our experience and to suggest the best integration of our storage products into the PCB production lines.

All ISM products comply with Industry 4.0 – our Software can be integrated with any ERP system, MES system, or pick&place lines and other machines in your factory.

With our pre-sales and after-sales support and our responsiveness to custom integration, we work with customers to better understand their future technology requirements.

With our ISM storage solutions, you can STORE the FUTURE.



## Why choose our Ultraflex series?

### • Flexibility - patented technology

No pre-configuration required. No compromise on storage mix. With ism 1800, ISM 3600, ISM 3900 you don't need to pre-set the height of the inner positions to stock the components, because the system is able to dynamically adjust the internal subdivision of space to accommodate changing mixes of reel heights from 8 up to 88mm.

### • Time saving

The fastest material management system on the market.

The quickest kitting set up time.

Extraction: 27 reels in 60 sec operator time

Insertion: 54 reels in 60 sec operator time

### • Extraordinary capacity

The Ultraflex Series doubles the storage capacity, thanks to the special case that has two positions and to the system that is able to read two different reel codes at the same time.

### • Component mix

The Ultraflex stores not only reels and JEDEC trays, but also any other material and components that fit in our cases, both 7 and 15 inches wide and up to 88mm tall.

### • Integration

Fully automatic solution ready for industry 4.0. We can easily connect to the various P&P machines (Juki, Fuji, ASM, Yamaha, Panasonic, Universal, Europlacer, Hanwa, Micronic, Essemtec) and enterprise system (any ERP or MES). Thanks to an Internal Software team and to a strong partnership with Cogiscan, we can provide powerful integrated solutions to achieve any Industry 4.0 goal and become a real smart factory.

### • Space saving

No empty space.

Dynamic Positioning of the components

The dynamic management of the storage allows you to use all sectors of a unit, without leaving one empty. The components can be stored each time in a different position. We find a place for each item, and remember where it is. Super compact dimensions

Thanks to a design that offers high storage capacity in a more compact size.



#### • Humidity control

No more VACUUM BAGS.

The Ultraflex series stores components without vacuum bags, because it is able to adjust and monitor humidity, to maintain an internal environment below 5% RH.

With different hardware options (dehumidifiers or the FRU, Fast Recovery Unit) the Intelligent Storage Solution is able to take humidity down to optimal levels in very short time even under strong humidity conditions. Thanks to the software interface, the Floor Life of each component can be monitored: the expiration date and time is calculated and plotted with absolute precision. The software prevents the use of components whose period of exposure to humidity higher than 5% has expired. The expired components can be extracted quickly from the unit.

#### • Traceability

Thanks to the precision Camera Readers and Reels Picture Traceability software option the system is able to collect real-time Pictures and data of the components and issue powerful reports through which the products and process information can be traced. A comprehensive range of traceability queries are available: serial number, date code, location, product, supplier, time horizon and MSD status.

All pictures will be saved inside the database, and it will be possible to view them easily at any time (very useful for any complaint with suppliers).

#### • ESD set up

All areas are finished with antistatic paint. ESD certified cases ensure that sensitive electronic components remain safe and undamaged by static discharge.

### Technical Data ISM 3600

<b>Dimensions</b>	Width = 2,565 m/8,415ft
	Depth = 1,672 m / 5,485 ft
<b>Min Height</b> (for transport)	2,35 mt / 7,7 ft
<b>Operative Height</b>	2,480m/8.136ft with feet adjusted to 110 mm
<b>Weight</b>	1133 kg (empty) - 1685 kg (full cases) – 2047 (full cases and reels)
<b>Monitor</b>	Touch Screen 24"

### Technical Data ISM 3900

<b>Dimensions</b>	Width = 2,578 m/8,458 ft
	Depth = 1,379 m / 4,524 ft
<b>Min Height</b> (for transport)	2,35 mt / 7,7 ft
<b>Operative Height</b>	2,455m / 8.054ft with feet adjusted to 110 mm
<b>Weight</b>	1133 kg (empty) - 1685 kg (full cases) – 2047 (full cases and reels)

### Technical Data ISM 1800

<b>Dimensions</b>	Width = 1,749 m/5,738 ft
	Depth = 1,620 m / 5,314 ft
<b>Min Height</b> (for transport)	2,21 mt / 7,25 ft
<b>Operative Height</b>	2,280m/7,480ft with feet adjusted to 110 mm
<b>Weight</b>	826 kg (empty) - 1105 kg (full cases) – 1286 (full cases and reels)
<b>Monitor</b>	Touch Screen 24"

### Capacity

	ISM 3600	ISM 3900	ISM 1800
7" H= up to 88mm	3620 reels	3840 reels	1832 reels
13/15" H= up to 88mm	900 reels	950 reels	452 reels





## Our systems are engineered to be modular and scalable

In a constantly evolving market, modularity and scalability are essential characteristics to give continuity and maximum efficiency to production processes.

Our systems are engineered to be modular and scalable.

Our systems are designed to accommodate companies as they grow by allowing total freedom of configuration, modification, and expansion. They can also be transferred to other departments or sites easily.

ISM3600 can be used as a stand-alone or can be connected immediately, or at a later time, to one or more ISM 3900s.

The ISM 3900 can now operate without an ISM 3600, and can directly connect to an MIM.

Which not only increases storage capacity but is also prepared to work with an EEM and AMR's (Autonomous Mobile Robot), automatic counting via X-ray or with customized applications.

### Special Application

Two ISM 3600s can be connected one to the other in Back to Back configuration. This application is particularly useful when you want to separate the input and output flows of the material or when you want to put two rooms in communication. Back-to-backs can transfer material from one side to the other by shuttles.

### Automated X-ray counting station:

NEW :The MIM module can be used stand-alone, directly connected with an x-ray counting system and EEM.

In this way, the material that returns from the production lines is loaded, manually or via AMR(Autonomous Mobile Robot), into the MIM. Subsequently the material will be counted and automatically moved to the main warehouses.

### Advantages:

- There is no need for an operator, as the MIM directly loads components into the Xray for counting
- Components are stored in a secure, humidity-controlled system, tracked by the software. This is especially important for MSD components
- The components whose count is in error, can be kept inside the warehouse on standby, pending for operator intervention

