

## High-performance wave soldering system



### A compact and universal system with frame conveyor

The EWS 330 is a fully automatic double wave soldering system for the professional soldering of through-hole components and mixed boards. It can be operated with lead-free solders and VOC-free fluxes. With a modern and future-oriented control system, space-saving design and extremely user-friendly maintenance and operation, the machine assures state-of-the-art production processes.

When developing the EWS line, the main goals were obtaining lowest error rates, economic processing of different components, minimum process material consumption and realization of ISO 9000 standards. The EWS soldering systems are mainly used for medium scale and large scale production which demands highest throughputs and quality.

The EWS 330 can be equipped with both foam fluxer and intelligent spray fluxer. Both fluxers can of course be operated with low-solid and water-based fluxes. As the preheating of the EWS is of modular design, it

can be optimally adapted to throughputs and production volumes. The preheating unit consists of two medium wave ceramic heaters and a short wave emitter and can be complemented by a dynamic preheater and an additional top-side heater.

The EWS 330 is equipped with a wear-resisting chain conveyor which is guided on both sides and designed for solder pallets. Even when processing very heavy boards the extremely heat-resisting aluminum transport profiles ensure safe and precise transport.

The EWS 330 can be operated inline and consequently, it can be supplied fully equipped for an automatic production line. Processing of mixed boards is possible due to a barcode or synchronous code reader.

99 solder programs can be stored in the microprocessor control. When connecting a PC this number can be increased. The Windows™-based ERSAsoft provides increased user-friendliness and enables complete visualization and documentation of all process parameters.

### Features EWS 330

	● Standard	○ Option
Constant level foam fluxer	●	
Spray fluxer	○	
Blow-off feature / maintenance unit for compressed air	●	
Medium wave preheaters (2, option 4)	●	
Short wave ceramic heaters (3)	●	
Dynamic preheater / convection heater	○	
N <sub>2</sub> -solder bath cover	○	
Lead-free double wave solder module	●	
Pre-solder nozzle (SMD wave) / PowerWave	○	
Final solder nozzle	●	
Automatic solder bath retraction	●	
Solder level monitoring / automatic solder bar feeder	○	
Manual conveyor angle adjustment	●	
Motorized conveyor angle adjustment	○	
Cooler after solder module (compressed air)	○	
Sensor Shuttle	○	
Extension module / exhaust control	○	
Intervall mode	●	
Synchronous code / barcode reader	○	
Interior hood lighting / machine status control	○	
PC interface with ERSAsoft, PC swing arm	○	
Microprocessor control	●	
Infeed and outfeed extension	●	
Frame conveyor (chain conveyor)	●	



### ERSA product range

#### Soldering tools

- NEW DIMENSION
- PROFI-LINE
- IR-Rework
- CLEAN-AIR

#### Soldering systems

##### Wave soldering

- ETS-line
- EWS-line
- N-Wave-line

##### Reflow soldering

- HOTFLOW 2/14
- HOTFLOW 2/20
- HOTFLOW 2/24
- Hotflow line
- ERS 250
- ERS 260

##### Selective soldering

- VERSAFLOW
- VERSAFLOW line
- Highspeed
- Multiwave
- ECOSELECT 250
- ECOSELECT 350
- Place & Solder
- EAS-line

##### Process optimization

- EPOS 1

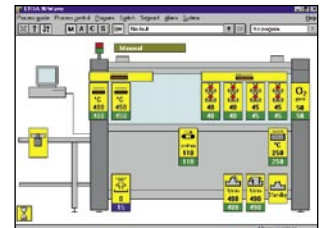
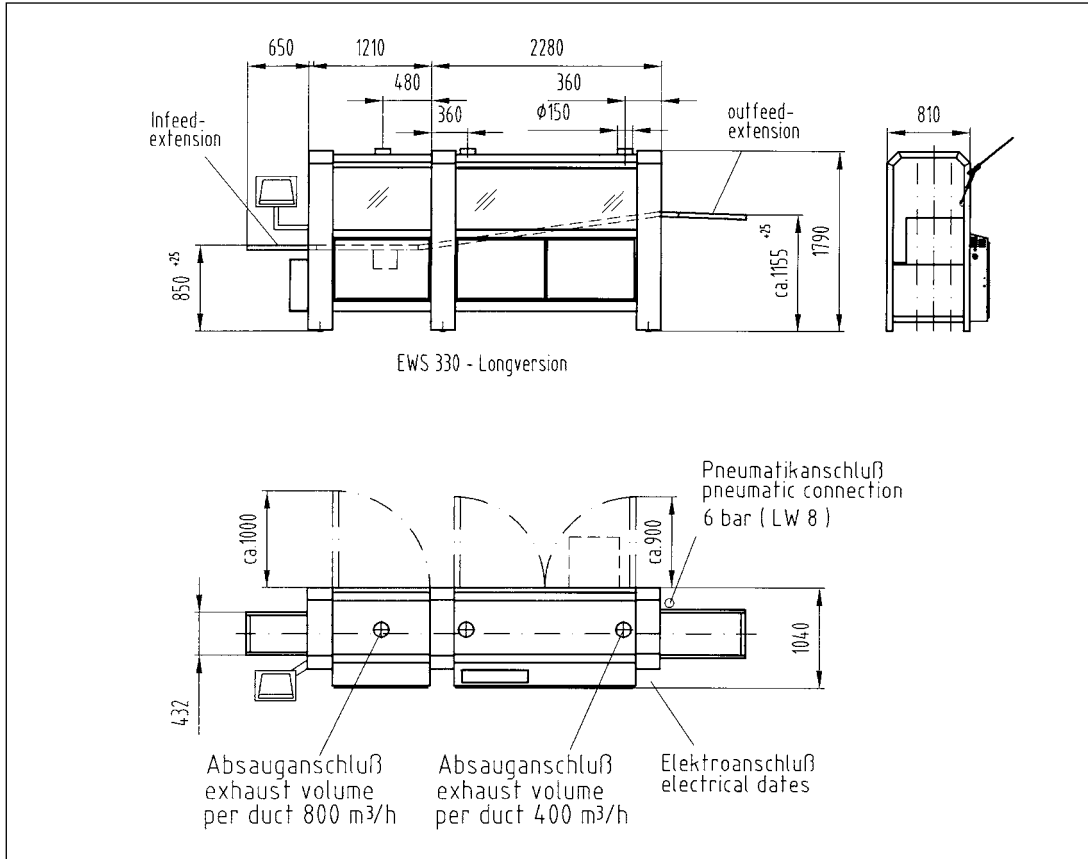
#### Inspection systems

- ERSASCOPE
- ImageDoc Software

#### Other services

- Know-how seminars
- In-House trainings
- Test soldering
- Installation and maintenance assistance
- Process support

## High-performance wave soldering system

**Working width:**

330 mm (13")

**Solder module:**

Type: lead-free double wave solder module  
 Solder volume: approx. 390 kg (860 lb.) PbSn 64/36  
 approx. 335 kg (739 lb.) lead-free alloy  
 Warm-up time: approx. 2.5 h

**Preheating length:**

1,100 mm (43.3")

**Flux module:**

Type: foam fluxer  
 Flux storage tank: 10 l

**Compressed air:**

Required pressure: min. 6 bar (87 PSI)  
 Connecting hose: 8 mm (0.3") inner diameter

**Dimensions:**

Length: 3,620 mm (142.5")  
 Width: 1,040 mm (41")  
 Height: 1,790 mm (17.5")  
 Weight: 500 kg (1,102 lb.)

**Paint:**

RAL 7035 / RAL 7016

**Exhaust rating:**

Exhaust stack:  $\varnothing$  150 mm (6")  
 Exhaust volume: 800 m<sup>3</sup>/h (28,251.5 ft<sup>3</sup>/h) (spray fluxer)  
 400 m<sup>3</sup>/h (14,121.7 ft<sup>3</sup>/h) (solder bath /  
 pre-heater / cooling system)

**Electrical data:**

Voltage: 5-wire-system, 3 x 230 / 400 V, N, PE  
 Power tolerance range: +6 %, -10 %  
 Frequency: 50 or 60 Hz  
 Nominal rating: max. 55 kW  
 Max. fuse rating: 3 x 80 A (slow blow)

**Control:**

Microprocessor  
 99 solder programs  
 Clear text display  
 Parameter monitoring  
 Interval operation  
 7-day time clock  
 Machine status control

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