

# Elopak<sup>®</sup> E-PS120UC

The flexible high-speed filling machine



**250 ml – 1136 ml**  
**8 oz – 1 quart**

Pure-Pak<sup>®</sup>  
Pure-Pak Curve<sup>®</sup>  
Diamond<sup>®</sup>  
Diamond Curve<sup>®</sup>





## Fresh thinking

The days are over when consumers could be placed in a certain box that defined them and their needs. Instead there are many dimensions to how consumers act – they seek variety and convenience, they want natural, healthy products and they are environmentally responsible. At the same time, the choice and availability of liquid food products has never been more extensive than it is today. Consumers can find products to satisfy virtually every taste, need and occasion.

The Elopak® E-PS120UC machine is a perfect way to meet consumer needs. Besides being suitable for many different food products, the machine can run both various package sizes and types.

On the Elopak® E-PS120UC machine, you can run two of Elopak's carton-based packaging solutions: Pure-Pak® and Diamond®.

This way you can combine Pure-Pak's core values of freshness, naturalness and purity with the greater convenience of Diamond's larger screw cap. The Curve® is yet another communication tool that strengthens brand values and provides visual shelf impact.

This is packaging that offers more naturalness, more convenience and more premium possibilities.



### 1. Easy-to-use operator touch-screen

The user-friendly operator touch-screen.



### 3. Dual mandrels per station allow slower indexing speeds

Simple straight loading into mandrels.

Automatic size changeover – no carton stops to adjust. Four-post mandrel design – easier to clean.

Controls prevent carton loading if mandrel is not stripped. Turret has Kevlar drive belts for quiet and smooth operation.



### 2. Mechanical blanks feeding

Dual ergonomic blanks magazines with eight-minute refill intervals.

1. Easy-to-use operator touch-screen

2. Mechanical blanks feeding

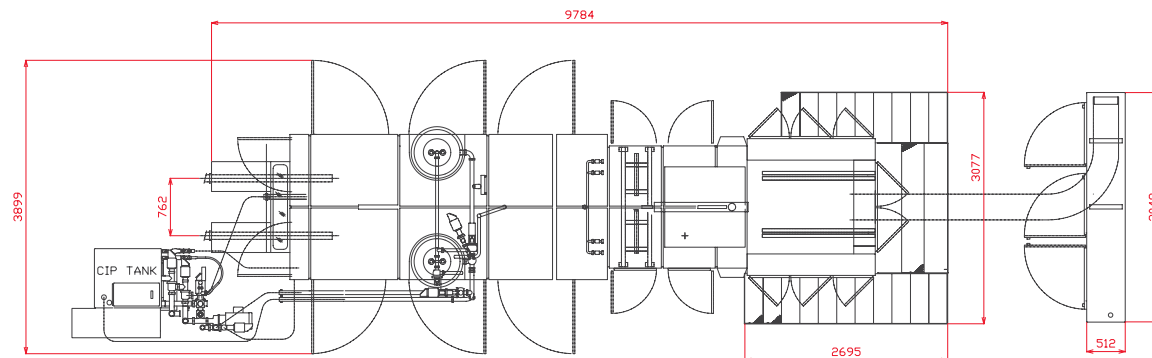
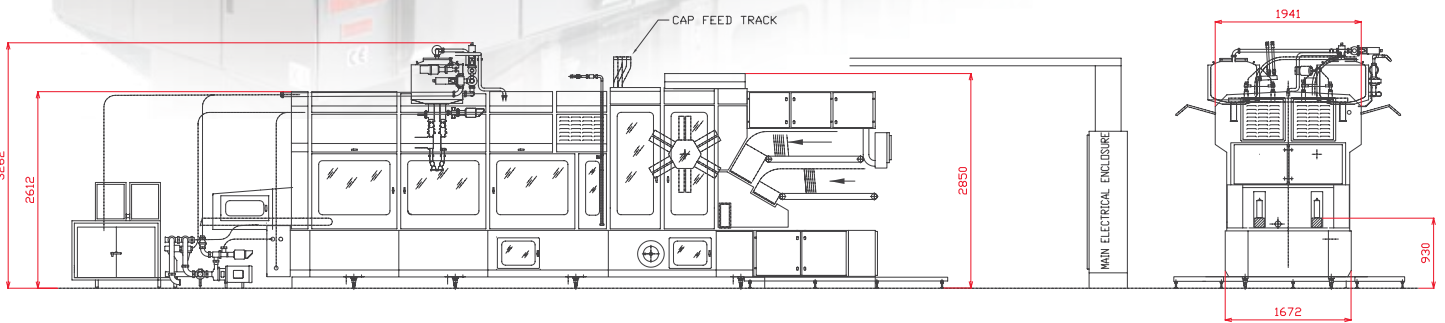
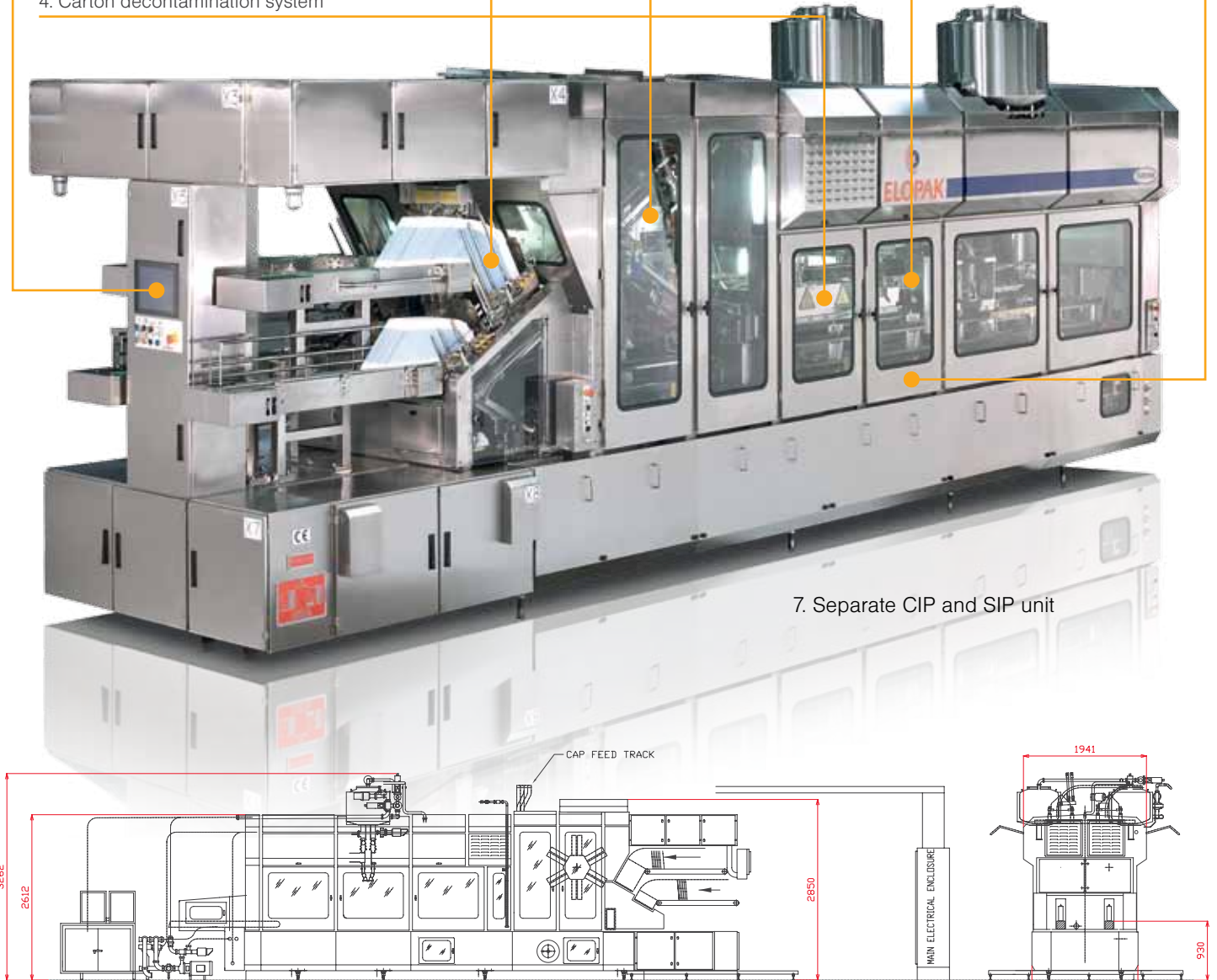
3. Dual mandrels per station allow slower indexing speeds

4. Carton decontamination system

5. Bottom-up filler for minimising foam during filling

6. Hygienic filling

7. Separate CIP and SIP unit



## Elopak® E-PS120UC

A flexible filling machine designed to break new ground in hygiene level. The Elopak® E-PS120UC machine offers the lowest recontamination rates available meaning maximised shelf life and in-store quality for pasteurised and ESL processed products.

A speed of 12000 cartons per hour is achieved by mechanically efficient production – accomplished by dual line and double indexing that allows different carton sizes and different products to be filled on each line at the same time. With automatic size change, the machine is capable of producing four preset sizes on each line.

The Elopak® E-PS120UC machine incorporates a low-concentration hydrogen peroxide spray (2%) system, followed by UV-light exposure and hot-air drying. These features, in addition to individual CIP station and hot-water sterilisation, are part of the standard equipment.

It is the extra features that give the Elopak® E-PS120UC machine its true competitive edge. Water-cooled temperature-controlled mandrels prevent condensation. Hermetic sealing of the double diaphragm fill maximises filling integrity.

### Machine standard equipment

- Integrated Cleaning In Place (CIP) system
- HEPA clean-air system
- Dual ergonomic blanks magazines
- Double diaphragm filler
- Sterilisable filling station
- Siemens PLC
- Frequency controlled variable speed drive
- CE conformity
- Automatic lubrication system
- Integrated Screwcap Applicator
- Spray Sanitizing system

### Optional equipment

- Cap feeder system.
- Spare part kit
- Dual product in-feed
- Tank stirrer
- Exterior foam cleaning system
- Separated magazine
- Special versions of the Elopak® E-PS120UC machine include Combi Filler, Triple Filler, HV.
- CIP/SIP Unit with Heat Exchanger



### 4. Carton decontamination system

Low concentration (2%) hydrogen peroxide (H<sub>2</sub>O<sub>2</sub>) is sprayed on the inside of the cartons, then exposed to UV light for activation and dried by hot air for maximum carton sterilisation.

### 5. Bottom-up filler for minimising foam during filling

Rubber nozzles for products with pulp or particles. Double diaphragm filler pistons mounted outside the machine filler area to avoid condensation.



### 6. Hygienic filling

HEPA clean-air system. Spray sanitising system. Clean operation – minimised need to enter the machine. No linkages or drives on top sealer. All fill pumps and drives outside the fill zone. The carton decontamination system gives a minimum of four log reduction, making it an excellent solution for ESL products.



### 7. Self-standing CIP and SIP unit

## Filling specifications

### Production speed

Machine capacity up to 12 000 cartons per hour Maximum speed depends on product to be filled Specified speed refers to filling of 3.5% homogenised milk at 2 – 4°C (35.6 – 39.2°F) with flexible nozzles.

### Liquid food products

Milk, 35% cream, liquid egg, fermented milk products, juice drinks, juices with/without smaller particles, water.

### Filling temperature

2 – 40°C (35.6 – 104°F)

### Filler accuracy

+/- 1 gram (+/- 0.035 oz)

### Magazine capacity

Approximately 2 000 cartons total

## Packaging specifications

### Package volumes and dimensions

Standard cross-section 70 x 70 mm (2.75 x 2.75 in) Pure-Pak® and Diamond® cartons with optional Curve™.

### Standard metric sizes

250 ml  
330 ml  
500 ml  
568 ml (1 UK pint)  
750 ml  
1 000 ml  
1 136 ml (2 UK pints)

### Usa-specific sizes

8 oz  
10 oz  
1 pint  
1.5 pint  
1 quart

### Board types

Aluminium, EVOH and PE Board

### Opening features

Elo-Cap UE, Elo-Cap UF, Elo-Cap UL,  
Elo-Cap UP, Elo-Cap XE

### Product supply pressure

0.02 – 0.10 MPa (3 – 15 psi) max pressure 0.23 MPa (33 psi)

## Machine specifications

### Machine dimensions (l x w x h)

9784 x 3077 x 3262 mm (385 x 121 x 128 in)

### Room height required

3375 Mm (133 in)

### Floor space required

9300 X 3100 mm (366 x 122 in)

### Shipping dimensions

40-Foot container

### Machine weight without options

15 000 Kg (33 000 lb)

### Noise level

< 81 DbA

### Carton discharge height

930 Mm (36.6 In)

## Electrical power requirements

400 V, 50 hz, 3 phase + pe  
Permissible voltage variation within +/- 10%.  
Electrical wiring is sized for 230 v  
Connecting load 150 amp.  
Power supply (without options)  
Total installed 150 amp.  
Average electrical consumption approx. 70 Kw

## Compressed air

Minimum supply pressure 0.6 Mpa (80 psi)  
Air consumption 1425 nl/min (55 cfm)  
Screw cap applicator 575 nl/min (20.3 Cfm)  
Screw cap sorting device 572 nl/min (20.1 Cfm)  
H2o2 spray-system consumption 300 ni/min (10.6 Cfm)

## Chilled water

Minimum flow 7.5 L/min (1.98 Gallons/min) (Recirculating)  
Maximum temperature +4°C (39.2°F)  
Minimum supply pressure 0.4 Mpa (58 psi)  
Maximum supply pressure 0.6 Mpa (87 psi)  
Heat dissipation approx. 12 000 – 15 000 Kj/h

## City water

Supply temperature ambient  
Minimum flow rate 2.3 L/min (0.60 Gallons/min)  
Minimum supply pressure 0.4 Mpa (58 psi)  
Maximum supply pressure 0.6 Mpa (87 psi)

## Steam, food quality (for SIP)

Consumption 160 kg (352 lb)  
Pressure 0.4 – 0.55 Mpa (58 – 80 psi)

## H2o2 consumption usage

2% H2o2 2.4 L/hour (0.63 Gallons/hour)

## CIP Unit

Cold-water supply temperature ambient  
Warm-water supply temperature 40 – 55°C (104 – 130°F)  
Flow rate recommended 150 l/m (39.62 Gallons/min)  
Pressure recommended 0.4 Mpa (58 psi)  
Steam supply 0.4 – 0.6 Mpa (58 – 87 psi)  
Consumption (cip) 50 kg (110 lb)  
Air-supply pressure 0.55 Mpa (80 psi)



## Pure-Pak®

Pure-Pak® is a registered trademark of the Elopak Group.

Version of July 2010

Elopak reserves the right to change specifications

## Diamond®

Diamond® is a registered trademark for the Elopak Group. Elopak reserves the right to change specifications.



Elopak Group Headquarters  
Tel +47 31 27 10 00 Fax +47 31 27 15 00  
[www.elopak.com](http://www.elopak.com)

