

# SMART PACKAGING MACHINES

# Dairy products in cups



# Experience : over 90 years in dairy packaging

- Expert in volumetric filling and dosing units for over 90 years
- Recognised expertise in the filling of elaborated products
- Over 400 cup filling machines and dosing stations sold over the last 20 years
- Mastering of cup decontamination for Extended Shelf Life products
- Complete range of cup filling machines up to 40,000 cups per hour

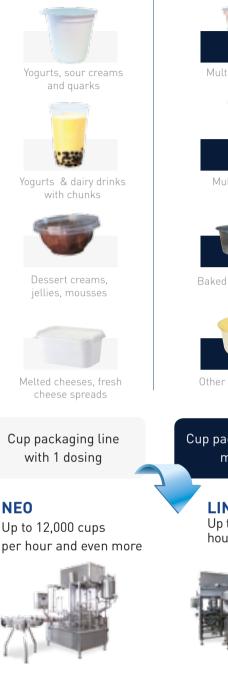


# Our hygienic and safe design for dairy cup fillers

- Our filling systems are built according to Hygienic Design Guidelines
- The product circuit is made of stainless steel AISI 316. It resists to cleaning solutions
- We supply machines with automatic cleaning of the product circuit
- In case of H<sub>2</sub>O<sub>2</sub> packaging treatment :
  - $H_2O_2$  residual in the cup < 0,5 ppm
  - H<sub>2</sub>O<sub>2</sub> emission in the environment is : < 1 ppm with quick degradation (in water and oxygen in the air)



# Know-how and expertise for dairy products



#### Dairy cup filling

Multilayer Yogurts



Multilayer dairy desserts



Baked dairy desserts



Cup packaging line with multi-dosing

> LINEA Up to 40, 000 cups per hour and even more





Liquids



Viscous products



Pasty products



Expanding products



Creamy products





Up to 24 filling heads

We offer filling, heatsealing and lidding solutions for all types of material for pre-formed cups (PET, PP, PS, glass, aluminium, carton...), with various properties (viscous, pasty, expanding...with fruit pieces...).

#### Dairy packaging line

We offer dosing units to fill liquid or pasty products in all types of containers in linear or indexed rotary machines (pouches, preformed cups, form-fill-seal cups, bottles, cartons...).

# Our technologies in dairy cup filling

# THE ADVANTAGES OF VOLUMETRIC

- Reliable, easy and efficient thanks to our mechanical solutions
- Up to 5 different fillings (linear) in the same cup for a wide variety of recipes
- Accurate and adapted to all product textures
- Clean, splash-free filling thanks to the nozzle up & down movement
- Efficient cleaning of the filling circuit thanks to automatic CIP



Volumetric filling at high speed with different flavours

# A COMPREHENSIVE RANGE OF SOLUTIONS



Nozzle for caramel



Nozzle for liquids



Nozzle for products with pieces

➔ Perfect control of all product textures thanks to a complete range of nozzle solutions



## OUR QUALITATIVE HEAT-SEALING



Great care is taken with the heat-sealing operation and easy opening of the lid.

 Avoid bacteriological contaminations and returns from the trade



# OUR CUP TRANSFER TECHNOLOGIES



For indexed rotary machine

Cups are transferred thanks to a rotary table, with removable pockets.

- → Simple and compact solution
- ➔ Quick format changeover system





For linear machine

Cups are transferred in a linear motion. Lifting of the plates when precision is necessary.

- → Clean and accurate filling
- Perfect positioning of the lids
- ➔ Quick format changeover system



# Dairy cup filling machines specialist

## WITH INDEXED ROTARY MACHINE

The dairy filler design is dependent on the specificities of the containers.

#### **NEO RI for de-stackable containers**

AUTOMATIC FILLING OF CUPS

Up to 12,000 cups/hour and even more

AUTOMATIC FILLING OF CUPS + SEMI-AUTOMATIC FILLING OF BOTTLES

Up to 12,000 cups/hour and even more

#### NEO RI for non de-stackable containers / cups

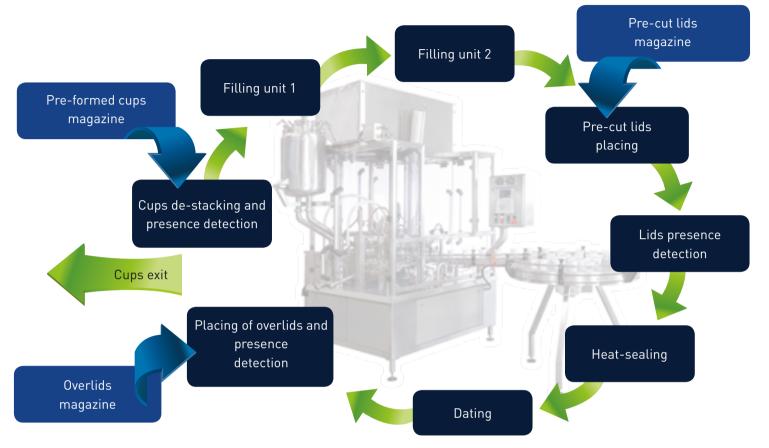
AUTOMATIC FILLING OF CUPS

Up to 2,000 cups/ hour and even more





#### Operating principle of a NEO indexed rotary machine



#### General design



- All stainless steel (frame,outer surfaces and product circuit)
- No painted steel, no aluminium, no plastic parts
- Entirely mechanical, no customised electronic equipment
- ➔ High maintenance autonomy



Controlled H<sub>2</sub>O<sub>2</sub> decontamination (optional)



Up to 3 layers



# Dairy cup filling machines specialist

# WITH LINEAR MACHINE



#### **General design**

Uncluttered volumes for easy cleaning and long term maintaining of cleanliness

- → Good production visibility and supervision
- Easy accessibility for maintenance
- ➔ Quick installation (3 weeks)

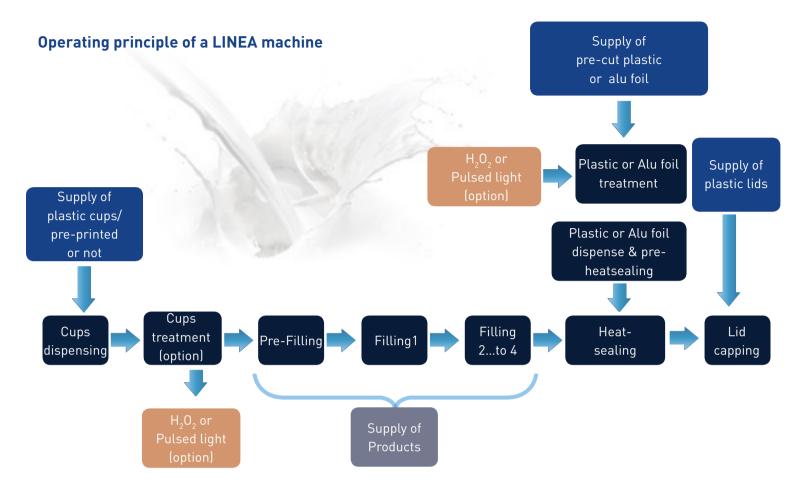
#### Flexible solution

No change over for several cups volumes sharing a common head diameter.









#### Dosing unit system and recipe switch



Only 5 minutes to change the product and the recipe on the line

#### ➔ Very modular solution

- Functions are adapted to the customer's specifications
- Until 5 filling stations
- Easy upgrade at a later date



# Mastering the dosing technology

We have dedicated Nova Dosing Systems (NDS) for main packaging lines of elaborated products.



Pre-formed cup

#### Pouch

Form Fill Seal cup

# OUR NOVA DOSING SYSTEMS



Filling Technology	<ul><li>Volumetric filling</li><li>Flow metering</li></ul>	
Valve	<ul> <li>Rotary conical valve</li> <li>Spool valve</li> <li>Rotary cylinder valve</li> </ul>	
Nozzle	<ul> <li>Nozzle for products with chunks</li> <li>Nozzle for liquids</li> <li>Multi-product nozzles</li> <li>Nozzle for caramels</li> </ul>	<ul> <li>Nozzle for spreads</li> <li>Nozzle for aerated products</li> <li>Controlled valve nozzle</li> </ul>

➔ More flexibility in your packaging lines

→ Easy to integrate in existing lines

# UNEQUALLED DOSING KNOW-HOW AT YOUR SERVICE

#### With a variety of properties



During product dosing, the specificity of each product must be taken into account and the appropriate solution adapted e.g.:

- Clean and splash-free filling of liquid products
- Optimized filling of thick, laden products (rice puddings, custards, ganache, puff-pastry mix, margarine, products containing fruit pieces ...)
- An efficient system enabling the filling of viscous and "thick-flowing" products (honey, caramel, chocolate sauce, processed cheese...)
- A filling system which guarantees product homogeneity and consistency for expanding products (foams, whipped egg white, whipped cream...)

#### With various cup filling methods



Helical filling



Placing of product on other products



Layered filling of various products



Layered and crowned multi-product filling



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