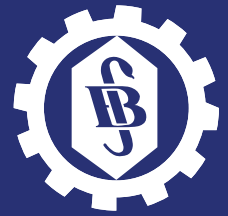


Since 1946

DOTT. BONAPACE & C.

Pharmaceutical Equipment



 **IN-CAP**[®]

Automatic Bench Top Capsule Filling Machine
for Powders with tamping and dosator system, Pellets,
Tablets, Mini-Tablets, Capsule in Capsule and Liquids



Dott. Bonapace: pharmaceutical R&D and lab scale equipment

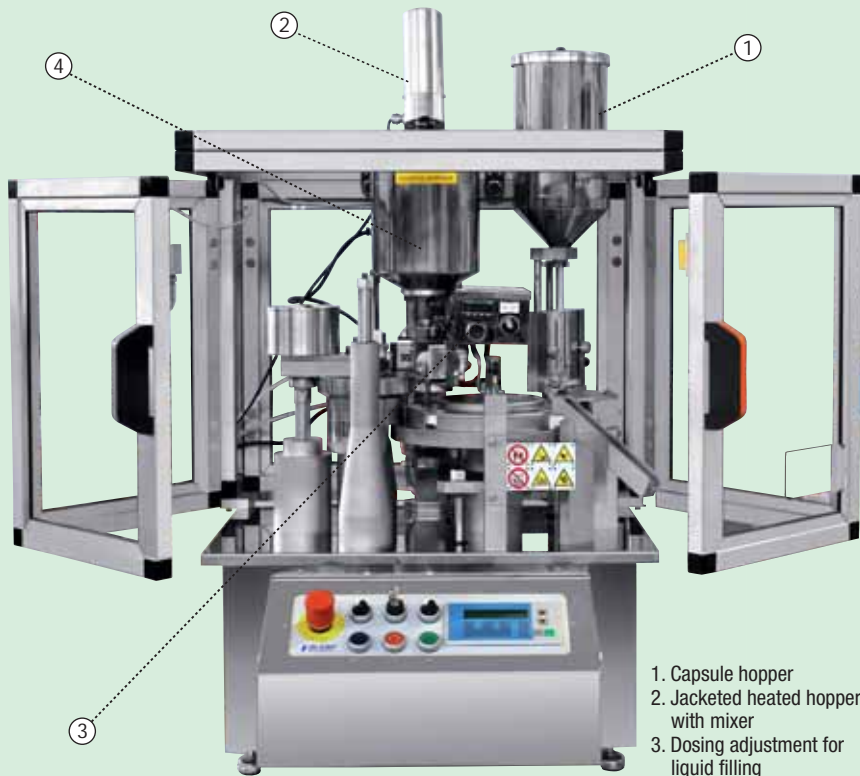
WHAT IS IN-CAP?

IN-CAP: the first bench top capsule filling machine fully automatic.

In a few years, it has become rather popular all over the world among R&D laboratories, pharmacies, hospitals, etc. for trials research, batch productions, and in laboratories for full production utilisation. Now available with predisposal of liquids or semi-dense products filling station, pellets, tablets and mini-tablets. The machine can be supplied either with tamping or dosator system.

Machine manufactured according to CE and GMP rules. IQ/OQ validation package available upon request.

IN-CAP MACHINE EQUIPPED WITH POWDER AND LIQUIDS DOSING STATIONS

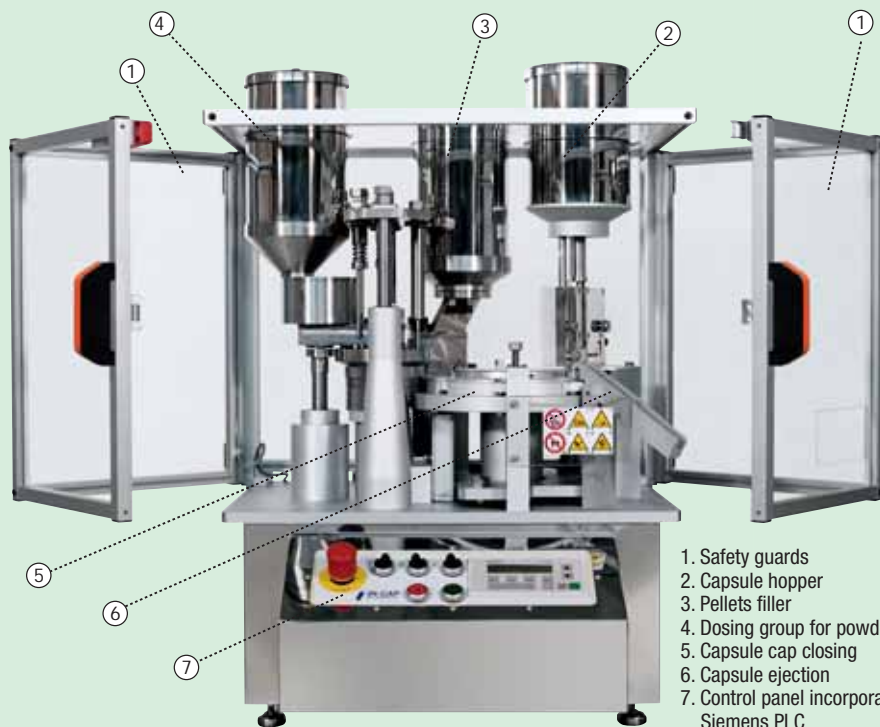


IN-CAP® LIQUID VERSION

1. Capsule hopper
2. Jacketed heated hopper with mixer
3. Dosing adjustment for liquid filling
4. Heated hopper for liquid filler

FOR LIQUID FILLED CAPSULES BANDING MACHINE ALSO AVAILABLE

IN-CAP MACHINE EQUIPPED WITH POWDER AND PELLETS DOSING STATIONS



1. Safety guards
2. Capsule hopper
3. Pellets filler
4. Dosing group for powder
5. Capsule cap closing
6. Capsule ejection
7. Control panel incorporating Siemens PLC



Pellets filler



Liquid filler



Liquid filling nozzle
from 0,15 to 1000 mg



Tablet Filler and Capsule in Capsule

DOSATOR SYSTEM

A new dosator powder filling system has been developed to compliment the existing dosing disc filling system currently available

This new system will enable powders to be developed for all types of production equipment, as well as allowing different types of product to be handled in the way best suited to their characteristics.

The system consists of a ring of dosator tubes, each with an internal pin which forms the chamber. The length of this chamber is centrally adjustable, to suit the filling requirements. The dosators are raised and lowered each cycle, while being rotated as the machine indexes.



The tubes are lowered in the powder bed of the hopper, with an adjustable tamping facility if required for forming a slug of product. They continue to rotate until located over the open body of the capsule when the dosator pin is used to push the powder out of the chamber and into the capsule. The hopper consists of an annular ring, minimising the amount of product needed to allow the unit to run. The depth of the powder bed is adjustable while the residual product is agitated after the dosing station. A bulk hopper feeds powder to this device and has been designed to minimise the problems of bridging experienced with some products

STAINLESS STEEL VERSION

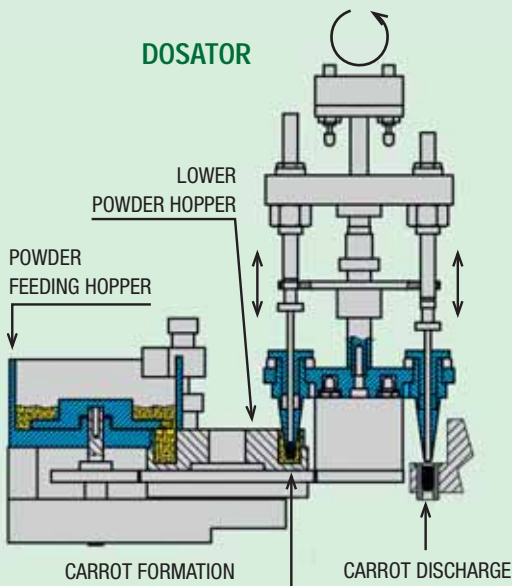


s.s AISI 316 for all parts in contact with product
s.s AISI 304 for all the other parts

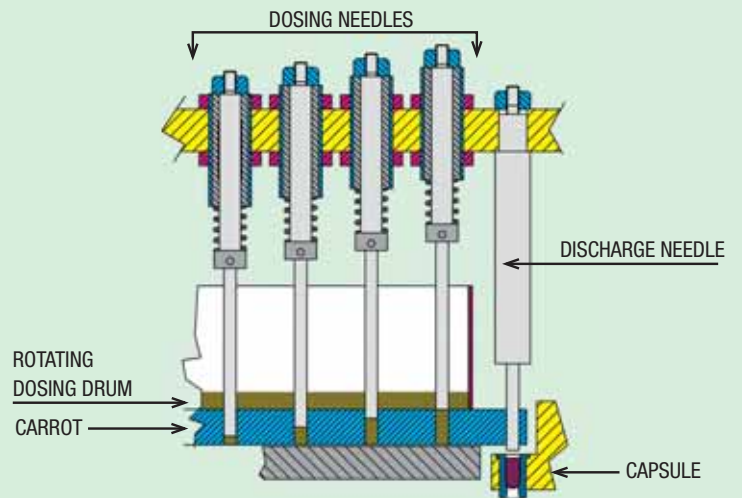


Double Powder Station

DOSATOR



TAMPING PROCESS



WIP In-Cap

SUITABLE FOR ISOLATOR
WITH IP 65,
DETACHABLE CONTROL PANEL

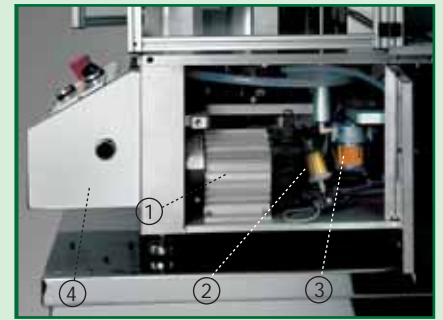
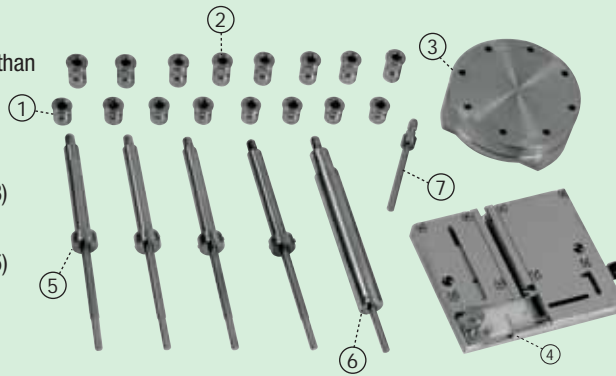
WIP In-Cap into isolator



Change size Kit

Change size operation takes less than 10 minutes. No tool required.

- 8 upper bushings (1)
- 8 lower bushings (2)
- 1 dosing disc with counter disc (3)
- 1 capsule orientating group (4)
- 4 pins for powder compression (5)
- 1 pin for powder transfer into the capsule body (6)
- 1 pin for capsule closing (7)



1. Vacuum pump for capsule opening
2. Vacuum switch with filter
3. Filter for vacuum pump
4. Manual switches (on both sides)

Possible dosing combinations for our IN-CAP machine

- Powder
- Powder + liquids
- Powder + powder
- Pellets (microgranules)
- Pellets + powder
- Liquid or jelly
- Liquid or jelly + powder
- Mini-tablets + powder or pellets
- Tablet + powder or pellets
- Capsule in capsule + powder or pellets

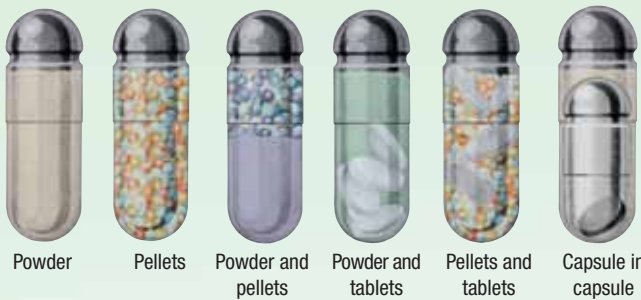
Special applications:

- Use of DB capsules
- Special dosing discs for minimal powder dosages (starting from 8 mg)
- Pellets + tablet + pellets
- Pellets + pellets + powder
- Pellets + powder + powder
- Pellets + pellets + pellets
- Special execution in stainless steel
- Tablets + powder + minitables
- Other applications upon request



Double pellets station + powder station

Some filling examples

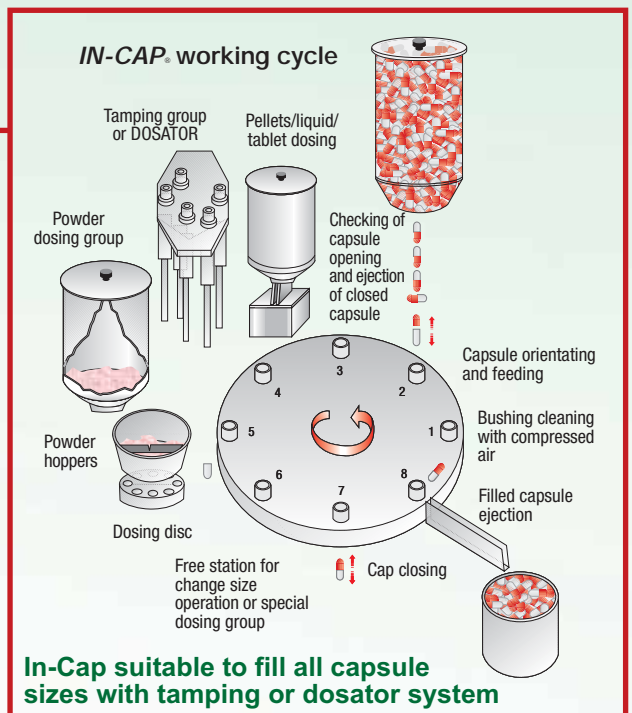


Technical data

- Capsule sizes: 000 - 00 - 00el - 0 - 0el - 1 - 1el - 2 - 3 - 4 - 5 - all DBCaps
- Electric voltage: 230-110 Volts - 50- 60 cycles - single phase
- DC Motor: 160 Watt - 24 Volts
- Vacuum pump for capsule opening: capacity 6 m³/hour
- Aspirating vacuum pump: capacity 90 m³/hour Delta P. 120 Millibar
- Air compressor: capacity 50.l/minute - working pressure 6 Bar
- Electric absorption: 0,5 kW (including the vacuum pump)
- Net weight of the standard machine: 150 kg (approx.)

Shipping details

IN-CAP[®]: gross weight 200 kg - case dimensions: 107 x 87 x 116 cm
 Carriage: gross weight 165 kg - case dimensions: 107 x 87 x 116 cm



In-Cap suitable to fill all capsule sizes with tamping or dosator system

Please consult our Web Site www.dottbonapace.com to get the complete sale program of our machines.



DOTT. BONAPACE & C. s.r.l.

Via Isonzo, 12 - 20812 - Limbiate (MB) • Italy
 Tel. +39 02 331 221 - Fax +39 02 349 0005
 E-mail: dottbonapace@dottbonapace.com
 Web site: www.dottbonapace.com

Local representative: