

TECHNICAL DESCRIPTION OF THE MACHINE

1) DUAL UNWIND SYSTEM

Two single shaft unwind systems stacked to unwind two separate reels of film at a constant tension.

Features

- System holds 2 reels film
- 32" (812mm) diameter x 37" (940mm) wide (note:36" max. sealing width)
- 3" (76mm) dia. air shafts (2)
- Safety chuck for unwind shafts
- A.C. center driven
- Ultrasonic diameter control and roll finish
- Start stop station
- Servo webguide unit with ultrasonic edge detector
- Stacked unwind
- 37" wide material
- Controls include: manual jog, dancer trim pot, roll rotation
- Edge guide controls on operator side of machine
- Two (2) mechanical Meter counters with PLC feedback

2) DUAL COMPENSATOR

The compensator systems are designed to take the film from the unwinds at a constant tension. The compensator allows the film to be processed intermittently at a constant tension.

Features

- Non-friction style roller brakes
- Low inertia carbon fibre rollers (3 1/4" dia.)
- Regulated air loaded dancer arm assembly

3) SERVO DRIVEN NOTCH STATION

The system uses a zero clearance die set with 4 punch sets. This unit has been designed to allow walk in access for easier punch setup.

Features

- Fast set up for 9 punches
- Punch sizes: (four of 5/8 x 3/8) – (four of 3/4 x 3/8) – (four of 5/8 x 5/8) – (four of 5/8 dia.) – (four of 1/4 dia.)
- ± 1" (25.4mm) side to side adjustment
- Repeat adjustment via hand wheel with pneumatic position locks

- Servo motor activation
- Walk in access
- Web stripper bars

GN PACKAGING – MACHINERY - TECHNOLOGY

- Safety lock out
- 1 7/16" min. centers on punches
- Vacuum draw off by customer

4) SERVO ENTRY DRAW ROLLER

System is driven via its own independent servo.

Features

- AC Servo
- Air loaded upper draw roller with separate LH, RH & center control
- Gear driven upper roller
- Accepts web tension change
- Gates timing belt drive
- Accepts 37" web width
- Note: GN standard draw rollers are 3.00" diameter
- Ability to enable or disable from operator interface

5) SERVO SEALING PRESS

The sealing press is the heart of the medical pouch machine. By utilizing AC servo control, combined with four pressure points, this system gives the converter absolute control of pressure and sealing dwell. The temperature is also very stable as the platen includes a single zone heat system with ISO bar technology, to insure uniform temperature profile. The system will be designed to accept your existing dies

Features

- A.C. servo drives for absolute control
 - Eccentrically driven four post design
 - Extra lift position
 - Repeat adjustment via handwheel with pneumatic position locks
 - Max. die 36" (914mm) x 36" (914mm)
 - Lower platen is 37" x 37"
 - Heat control via the PLC
 - Top heated platen- single with ISO bars
 - Bottom heated platen – single zone
 - Metal to rubber sealing
 - Linear rail mounts for smooth setup
-
- Safety lock out
 - Manual safety lockout pin
 - Solid structure mount system at floor level
 - One mother plate with customer bolting pattern
 - Mother plate held in place with threaded rods and hand knobs
 - Mother plate & die loading rails

6) CHILLING PLATE

System is a static device for cooling the seals that is adjacent to the sealing press.

Features

- Water cooled (water cooling device supplied by customer)
- Chill plate – 14" x 37"
- Deflection bars to maintain film against cooling plate
- Linked to sealing press for common adjustment
- Maximum allowable operating pressure – 45 psi.

7) HOLE PUNCH STATION

The system uses a zero clearance die set. No punch sets included. This unit has been designed to allow walk in access for easier punch setup.

Features

- No punch set included. Customer to supply
- Fast set up for 8 punches
- $\pm 1"$ (25.4mm) side to side adjustment
- Repeat adjustment via hand wheel with pneumatic position locks
- Pneumatic actuation
- Walk in access
- Web stripper bars
- Safety lock out
- 1 7/16" min. centers on punches
- Vacuum draw off by customer

8) REGISTRATION SYSTEM

The system is used to register the print to the guillotine cut off.

Features

- Easy side to side positioning
- Teach style mark sensor
- Web stabilizing bars

- Fully adjustable in transverse and longitudinal directions
- Pneumatic position locks
- Adjustable film support plate for under photo-electric eye
- Wiring protected in plastic cable track
- Mounted on linear rails
- Top & bottom sensor selectable
- Program uses averaging system (adjustable average count).

9 SLITTER SYSTEM

System utilizes fourteen (14) retractable safety blade units to trim or slit the web.

GN PACKAGING – MACHINERY - TECHNOLOGY

Features

- Common transverse adjustment +/- 1”
- Independent air control for each unit.
- Web support bars.
- Scale for easy set up.
- Mounted above the web for easy set up.
- 14 units included
- Trim system supplied by customer

10 SERVO EXIT DRAW ROLLERS

Driven via an independent A.C. servo the final draw roller accurately moves the film to the guillotine.

Features

- A.C. independent servo complete with brake
- Air loaded upper draw roller with separate LH, RH & center control
- Gear driven upper draw roller
- Web jam-up detector system
- Static eliminator package includes 3 high power bars

11 SERVO GUILLOTINE

The servo driven cut-off system is supplied to cut the pouches into their final size.

Features

- AC Servo eccentric drive
- Extra lift
- Efficient blade change (setup blocks)
- M2 blade material (one set included)
- 36” cutting

12 INDEXER DELIVERY

System allows pouches to be stacked on a pre-set count or shingled.

Features

- Cycling gate
- A.C. driven belt
- Independent timers via PLC
- Stack & shingle control

GN PACKAGING – MACHINERY - TECHNOLOGY

- Mounted on castors for easy removal
- Min draw 2 1/2”

13 CE GUARDING

Machine is interlocked with light curtain guarding full length of the sealing system.

Features

- CE guarding standard

14 CONTROL SYSTEM

The control interface utilizes a color touch screen with on the fly adjustment to all parameters.

Features

- PLC (GN standard configuration utilizes 95% Omron Electronics)
- Colour touch screen interface on control arm
- On the fly adjustment
- Custom skip with multi pouch draw up to 100” long pouches in six steps
- Multiple draw length input in skip mode
- Heat control via PLC
- Job storage/recall
- PLC control all parameters
- Message center
- Alarm & fault display
- Remote access and quick response troubleshooting via laptop (Existing)

15 MACHINE MONITORING SYSTEM

The system monitors machine repeatability. The system alarms the operator should any item be out of specification.

Features

- Independent sensors for each seal function
- Alarm conditions
- Seal press main & auxiliary sensors
- Analogue air pressure system with pressure changes via screen and job storage on seal systems
- Load cell feed back

16 MACHINE COLOUR

GN White – RAL # 9003

TECHNICAL SPECIFICATIONS:

MACHINE RANGE OF PRODUCT:

Max. web width: 37" (660mm) (max sealing 36)

Min. draw: 2 1/2"

PRODUCTION OUTPUT:

Actual production speed is dependent on type, quality and thickness of material used. It is expected that consistent, good quality, lay flat material will be supplied to achieve the maximum cycle rates achievable on this unit quoted. Samples of product and/or film expected to be produced/run on the configured machine must be supplied to GN prior to order confirmation.

ELECTRICAL SUPPLY:

A 3 phase isolation transformer is included with the machine. Primary voltage of the transformer is the customer supplied voltage.

Customer supplied voltage _____

GN machines are equipped with a non fused electrical disconnect. Any fused disconnects required by local electrical codes are the full responsibility of the purchaser and are not supplied by GN.

PRINT REGISTRATION:

Machinery operates more efficiently with tight tolerance, print variation 1/32" (.75mm) per 24" (600mm) is acceptable.

AIR CONSUMPTION:

Minimum 100 psi, 8 bar (Consumption is based on the final machine configuration).

WATER CONSUMPTION:

15 litres/minute. *NOTE: WATER MUST NOT BE BELOW DEW POINT*

TIME OF SHIPMENT:

Approximately 26 weeks - ex works