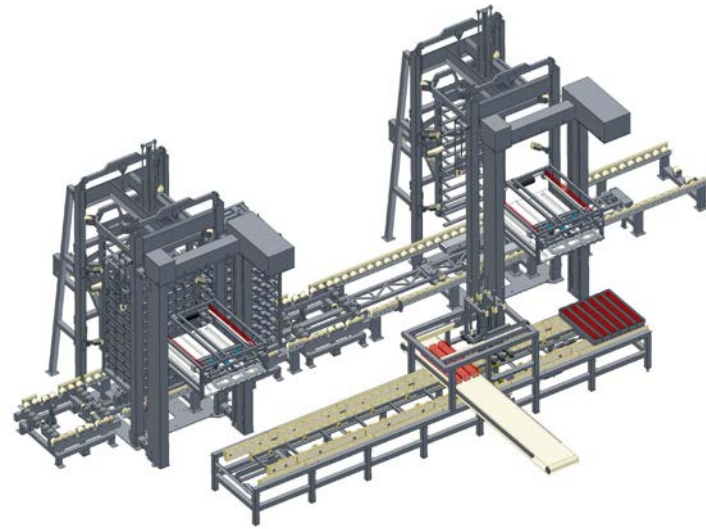
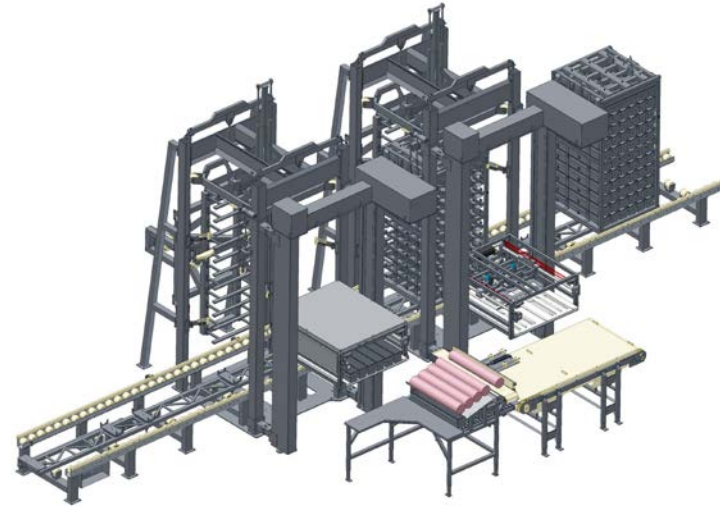


## Fully Automatic Press Tower System

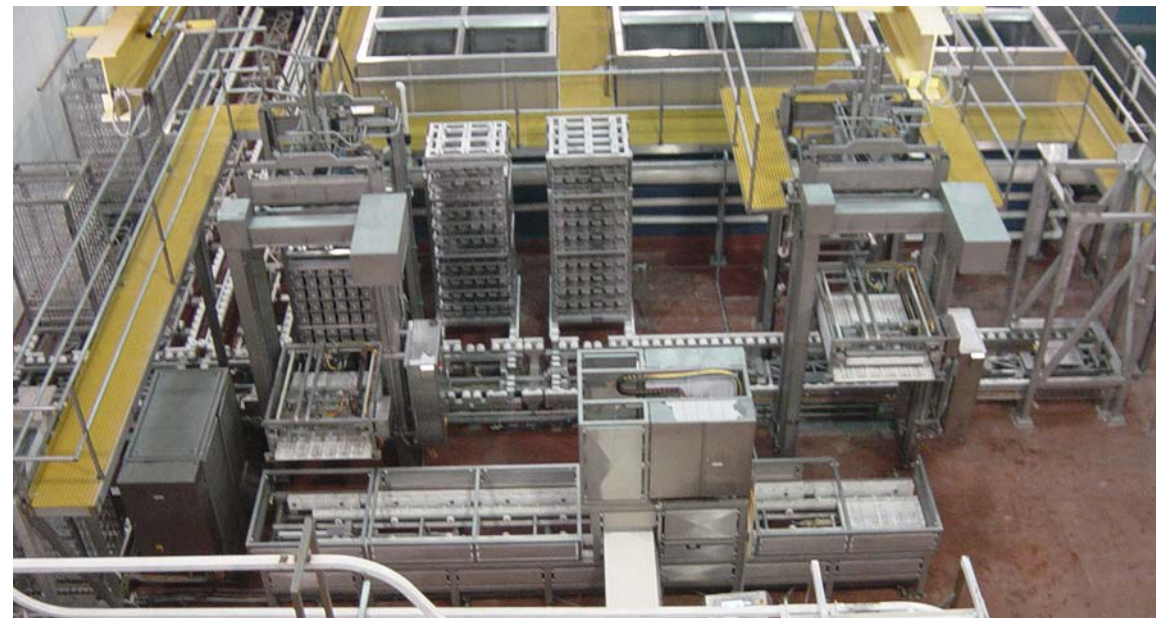
In the demolding station, the tower empties the layers of molds it contains. A layer of molds is automatically left on the lifting table and enters the demolder where the molds are emptied using vacuum and compressed air. Once removed from their molds, hams carried along a conveyor to a cooling area. The empty molds are rinsed and re-used for the next batch of product.



Demolding



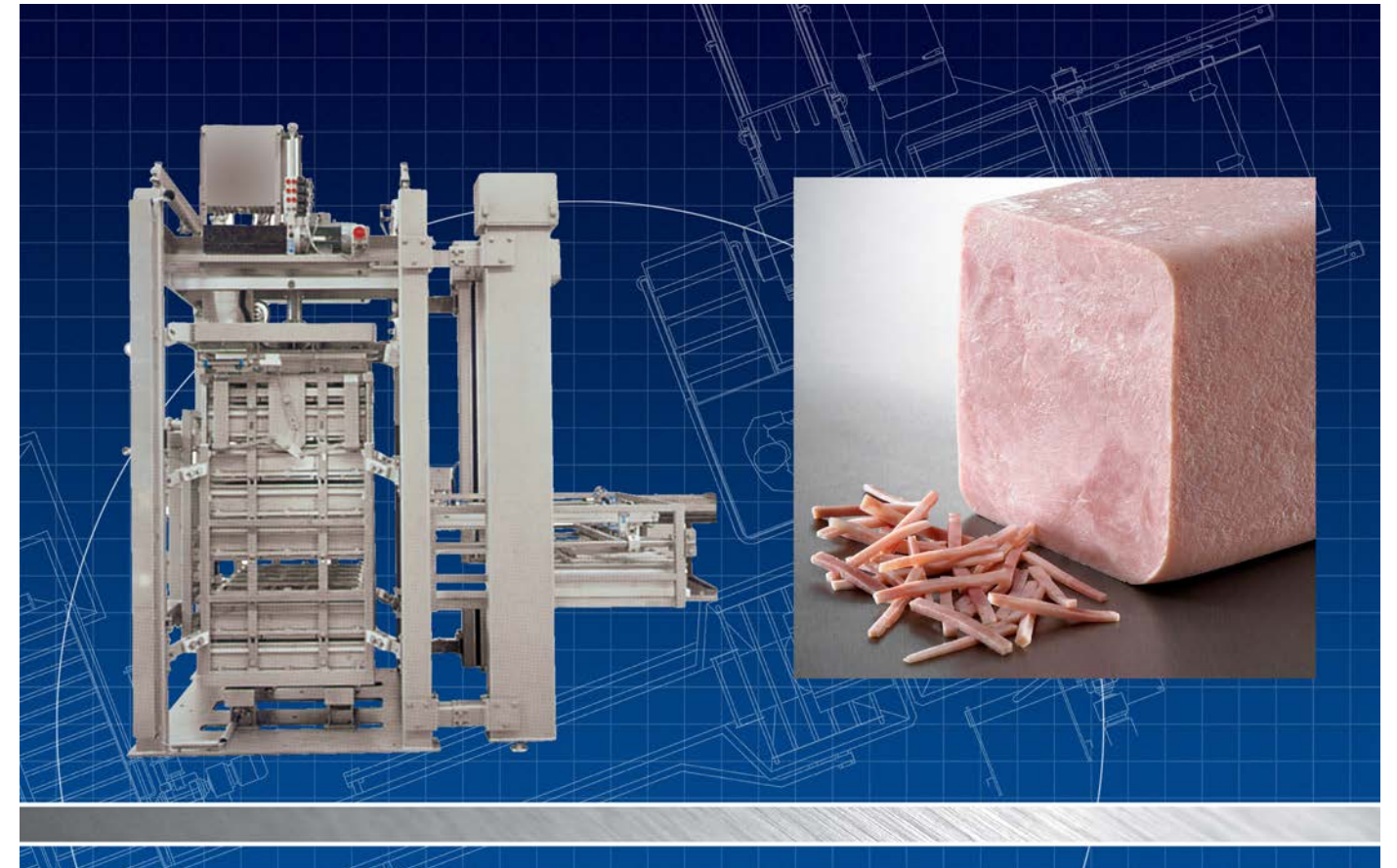
Stuffing



In the system photo above, two press towers with multiple layers of molds wait to be opened. Once opened, these molds go along the conveyor to the elevator on the right to be emptied of cooked product and rinsed.

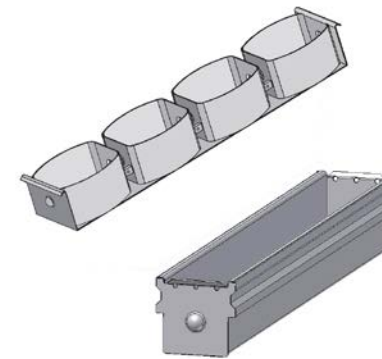
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## Fully Automatic Press Tower System



### Fully Automatic Press Tower System

- Fully automated process
- Highest degree of uniform product with high yield
- Applies pressure during both cooking and cooling
- Low labor rate
- Reduced space requirements
- Large throughput
- Compatible with water or steam cooking.
- Built in conformity with AMI sanitary equipment design principles. USDA accepted and CE approved.



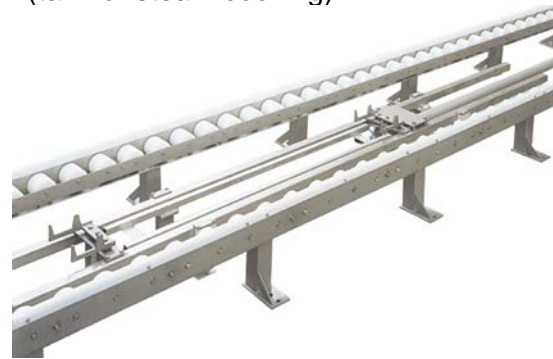
Molds available in various shapes and sizes to meet your needs.

# Fully Automatic Press Tower System

Fully automatic press tower system is designed to handle products before and after cooking. The system is based on many years of extensive technical experience of handling cooked products around the world. From stand-alone components, such as the demolder and the hydraulic press, to fully automatic production lines with capacities exceeding 250 tons per day, Danfotech can meet the most demanding production goals. The strength of the fully automatic press tower system for ham production is automation with full process control. In this flexible production system, meat in calibrated molds is exposed to constant and yet flexible pressure during cooking and cooling. This results in products with high slicing yields. The system offers high product flexibility together with the possibility of various product sizes and shapes. The press towers work in conjunction with water or steam cooking systems.

## How It Works

1. Massaged meat is pumped to a vacuum filling system and from here dosed into cooking film and clipped.
2. From the filling system, the meat passes through a flattening unit.
3. An operator transfers a lock to the mold and ensures a clip at each end.
4. The filled mold goes onto an elevator.
5. When one layer of molds is filled, the elevator deposits it into the press tower.
6. When the tower is filled, the hydraulic press closes and locks the tower. At this time each piece of meat is subjected to a pressure of about 6.4 psi (4,500 kg/square meter).
7. After the tower closes, the walking beam automatically transports it to the cooking area (tank or steam cooking).



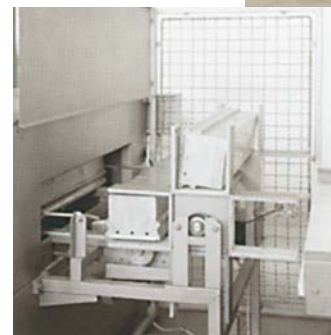
**Walking Beam**

8. After cooking, the meat cools in the tower.
9. After cooling, the tower is transported on the walking beam to the demolding area.
10. A layer of molds is automatically left on the lifting table and enters the demolder where the molds are emptied using vacuum and compressed air.
11. The cooked meat is conveyed to a cooling facility.
12. After rinsing, the molds return to the system and the cycle can repeat with filling product.

**Open Tower**



**Closed Tower**



**Mold inverting module**



**Rinsing machine and demolder**

## Press Tower Features

### Spring-Loaded Towers

Each tower is spring-loaded. This creates a constant and yet flexible pressure during cooking/chilling. The 9 to 12 springs installed in the press towers, each exerting 1100 lb force (500 kg), to produce consistent pressure of approximately 6.4 psi (0.44 bars) at the top as well as at the bottom. The expansion and reduction of the meat during cooking and cooling is absorbed by the springs.

### Product Tracking

The SCADA system option comes with a transducer built into each press tower or mold if required. This offers the possibility of tracking product data such as batch number, production period as well as cooking and cooling temperatures and times. In conjunction with the demolding process, it is possible to print product data and affix labels to the individual hams or containers.

### Advantages

- The highest degree of product uniformity is achieved with constant spring force from the upper frame applied during cooking/cooling.
- Give-aways caused by lack of meat uniformity are avoided as calibrated reinforced molds are used.

### Sanitation

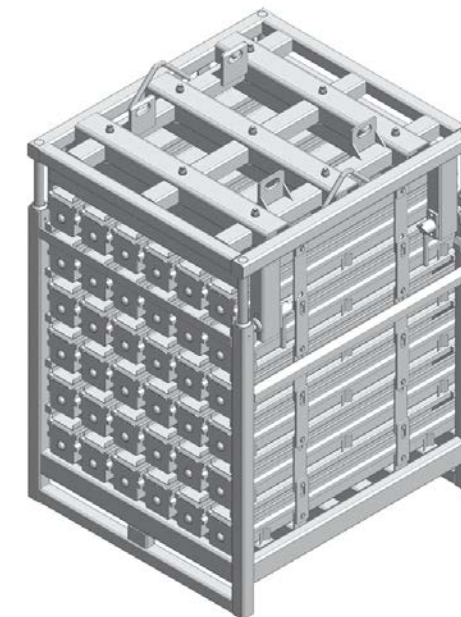
- A separate mold rinsing machine rinses out the molds and turns them upside down to drain any water automatically.

### Safety

- The equipment conforms to the strictest rules for a safe working environment.
- The equipment is CE-marked and complies with HACCP regulations.

### Hydraulic press type HP 120

- Adjustable hydraulic pressure from 20 to 120 bar
- AISI 304 stainless steel, glass bead blasted surface.
- IP65 electrical enclosure protection rating



**Press tower and springs**

