INDUSTRIAL COOK CHILL SYSTEMS



WWW.DCNORRISNA.COM

# COOK CHILL THE SYSTEM BEHIND THE GRAB & GO FOOD REVOLUTION

The DC Norris cook chill system has become an industry benchmark, with food companies around the world using our ground breaking technology to create meals of the highest quality, with a safe extended shelf life of up to 45 days.



# DC Norris manufactured and sold its first cook chill system in 1985.

The cook chill system was developed as an economical alternative to traditional cook-and-serve methods. Food produced using the cook chill system retains the taste, texture and aroma of freshly prepared ingredients, yet may have been produced in large volumes up to 45 days in advance.

#### THE KEY TO SAFE EXTENDED STORAGE IS TO RAPIDLY CHILL COOKED PRODUCT THROUGH THE 'DANGER ZONE' OF 145 - 40°F, TO RETARD BACTERIAL GROWTH.

Products are safely pasteurized as heating to a high temperature then rapidly cooling slows spoilage caused by microbial growth. The key to retaining food quality, taste, texture and aroma is controlled refrigerated storage.

### OVERVIEW

- Cooking, packaging and cooling can be done for both small and large volumes with the minimum number of operators.
- The combination of specially formulated bags and tumble chillers accelerate chilling for safe refrigerated shelf life of up to 45 days.
- Production can be scheduled to meet sell-bydate requirements, allowing advance ordering or just-in-time delivery.
- User friendly control systems monitor production and product status at all stages of the cook chill process.

### **BENEFITS**:

- Savings of 5-10%
- Build up a stock of quality food for future use
- Consistent quality of finished product
- Large and small particulates can be processed without damage
- Products are packaged at pasteurization temperatures
- No direct human or utensil contact during the cooking or packaging process
- Production can be centralized for operations where food is distributed to off-site locations



### COOK CHILL: THE PROCESS

### COOK:

Using any of the range of DC Norris steam jacketed kettles which can be fully recipe driven or manually controlled, the system ensures that all times, temperatures and quality parameters are constantly monitored.

### PACKAGE:

When the cooking cycle is complete, a DC Norris pump fill station or fully automated form fill seal machine transfers food at 185 - 203°F from low to high-risk areas. This avoids particulate damage and allows metered delivery into cook chill bags. The bags can be filled with different volumes subject to requirements and are then sealed, dated and labelled.

### CHILL:

Bags are conveyed into a DC Norris tumble chiller. They are then gently circulated in chilled water to rapidly drop the temperature from 203°F to below 40°F in under an hour (product dependent), with cooling times and temperatures fully logged. The sealed bags are then placed in chilled storage at 35 - 39°F and can be stored for up to 45 days.

### HEAT & SERVE:

If the product is required for immediate consumption (e.g restaurant/hotel) the bags can be transported to various locations, reheated and served. Foods will retain the quality and taste of a fresh meal. If destined for a supermarket shelf, bags will be emptied into a depositor and product portioned on a filling line into packaging such as ready meal trays. It can then be delivered to the outlet and is ready for presentation to the consumer.

# SAMPLE COOK CHILL SYSTEM

### **KETTLE SIZES RANGE FROM 80-400 GALLONS.**

#### **ACCESSORIES INCLUDE:**

- Homogenizers
- Mixers
- **Blenders**
- **Full Controls**
- CIP
- Steam Injectors Valve Packages
- Gantries



C

### **STEAM JACKETED KETTLE** 80 gallon ready-2-cook kettle shown suitable for smaller quantities / foodservice

### **PUMP FILL STATION**

В

**TUMBLE CHILLER** 



## THE DEVELOPMENT KITCHEN

### TESTING AND PRODUCT DEVELOPMENT IS CRUCIAL TO THE SUCCESS OF YOUR BUSINESS.

To demonstrate our commitment to you, DC Norris has invested heavily in an on-site development kitchen facility.

Fully equipped with a range of DC Norris equipment for cook chill and Jet Cook™ trials along with a kitchen/leisure area that can be used for tasting, training and discussion. Here we can rigorously test equipment and cook and cool customer products in a food factory environment.

#### SERVICES AVAILABLE INCLUDE:

- steam
- chilled water
- air
- refrigeration
- electrical power.

Our experienced team are always on hand to assist in recipe development and to give customers the opportunity to fully assess equipment before they decide to order. Once an order has been placed and completed, n we can also use the test kitchen to conduct full pre-delivery trials to ensure the equipment is running to its full potential. Customers can also use this as a great opportunity to be fully trained on their equipment in advance of delivery and installation.

### WE'RE HERE TO DELIVER WORLD-CLASS FOOD PROCESSING SOLUTIONS & EQUIPMENT

#### OUR GOAL IS YOURS: TO SAFELY AND EFFICIENTLY GROW YOUR PRODUCTION CAPACITY WHILE IMPROVING THE QUALITY OF YOUR PRODUCTS AND THE OVERALL HEALTH AND SUSTAINABILITY OF YOUR BUSINESS.

Feeding the globe is never boring. DC Norris and its leaders have been helping clients from Dubai to Denver for more than 45 years.

### WE CAN'T WAIT TO HELP YOU.



5

### WE'RE HERE TO HELP YOU LEAD THE EVOLVING NORTH AMERICAN FOOD MARKET

The processing equipment manufactured by DC Norris leads the global food production industry. So too, do our teams. Our committment to partnership with our clients is what truly drives global food cultures forward. Together, we innovate to feed the world the best foods possible and to make continual strides in convenience and accessibility by improving efficiency, lowering cost, and minimizing environmental impact.

### **DC Norris North America**

#### WWW.DCNORRISNA.COM

231.935.1519 mail@dcnorrisna.com

