Welcome to BCH Ltd.

Established in 1835, BCH has developed a world-wide reputation as a manufacturer of a large range of high quality process systems for the food and confectionery industries.

We offer a complete ‘in-house’ service for the design, manufacture, installation and commissioning of process systems, incorporating the most up-to-date process and control technology available.

Cook & Vacuum Cool

When combining one of our Cooking Kettles together with a Vacuum Cooling Vessel into one complete high performance system, you can guarantee foods are cooked and cooled rapidly with repeatability whilst benefiting from a smaller footprint with reduced labour and energy costs.

Pressure and vacuum cooking options can allow for faster processing times of certain product types. The addition of vacuum cooling ensures the fastest and most effective means of heat removal from a batch process.
Cooking

Our range of kettles have been designed to meet the stringent quality assurance and hygiene requirements of the food manufacturing industry. They cover a wide variety of cooking, mixing and blending applications across a whole range of products for the food, confectionery and pharmaceutical industries.

An impressive basic build specification is complemented by an extensive choice of optional features, adding yet further processing versatility.

• Fabricated throughout in stainless steel
• Steam jacket pressures of up to 7 bar G
• Working capacities range between 10 and 3000 litres
• Custom sizes available
• Engineered in line with the latest safety standards
• Atmospheric, Pressure & Vacuum versions available
Vacuum Cooling

Vacuum or ‘evaporative’ cooling is achieved through the evaporation of part of a product’s moisture under vacuum conditions. By the utilisation of vacuum, we are able to reduce the boiling point of a product – driving off the latent heat by boiling off vapour. This in turn causes the product to fall in temperature.

By continually reducing the pressure, we can continue to reduce the temperature of the product. This is achieved rapidly and therefore very fast cooling rates can be assured.

Although cooling rates can vary between differing product types, our systems maintain a high level of consistency, quality and repeatability.

- Process matched with the cooking kettle
- Cooling times are generally within 45 mins to cool from 95°C to 5°C
- Lower temperatures can be achieved
Specialist Applications

We are able to provide machines that can handle viscous and dry products by combining the cook and cool process in the same vessel.

Discharge is effected by way of the kettle tilting into storage solutions for downstream processing.

Key Advantages

- Rapid cooling - typically 45 minutes or less
- Low operating and maintenance costs
- Delicate, viscous or particulate sauce products handled easily and effectively
- Small footprint (vacuum set can be located outside)
- Reduced labour costs and increased production capacity
- Hygienic operation with CIP System
- PLC controlled with latest technology
- Faster product throughput
- Can be retrofitted to existing system
Products

- Chilled and frozen sauces
- Pie and savoury fillings
- Absorption cooked rice
- Spring roll fillings
- Ethnic meals
- Pasta sauces
- Béchamel sauce
- Chilli sauces
- Fruit compotes
- Soups
Innovation Centre

To assist our worldwide customers with meeting the many challenges faced in today’s fast changing food industry, our unique Innovation Centre is available for assistance with new product and process development, as well as equipment evaluation before initial investment proceeds.

The Centre houses a wide range of equipment, services and facilities, all of which are supported by in-house personnel with a wealth of knowledge to provide support in process design, food science, engineering and software.

BCH know-how enables all our clients to develop new and exciting products, to test feasibility, then up-scale production – ultimately enabling the end product to reach the wider market place at a much faster pace.