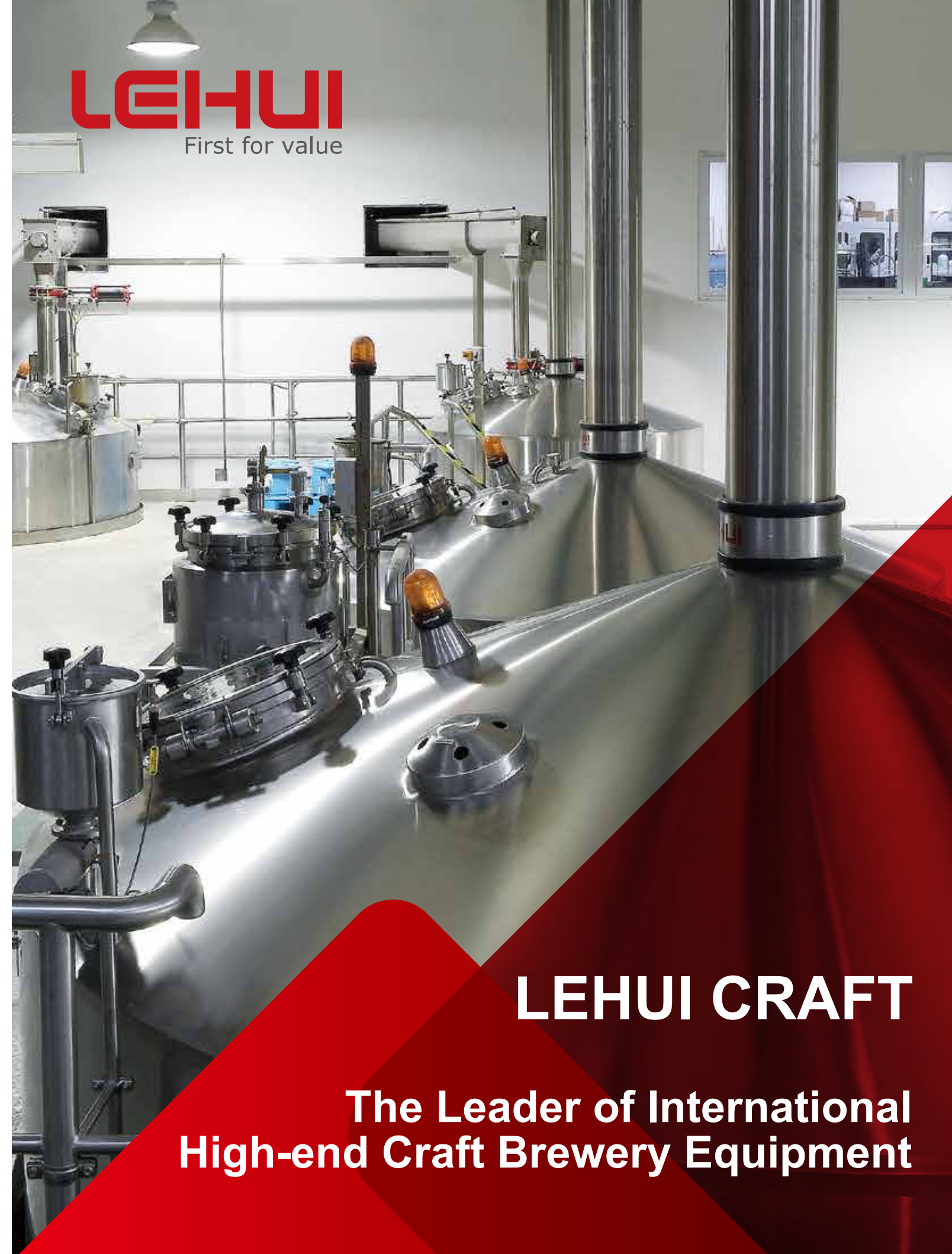




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LEHUI CRAFT

**The Leader of International
High-end Craft Brewery Equipment**



Quality to Brew Your Craft



Business Background

During the past 29 years, LEHUI has fulfilled more than 130 turn-key projects throughout the world for AB-Inbev, HEINEKEN, SAB Miller, CARLSBERG, TSINGTAO, SNOW, YANJING, LION, KIRIN, ASAHI, etc, becoming the grandest beer equipment supplier in Asian-Pacific region. With the world's rapid development of craft beer, taking advantage of years' experiences of breweries solution, LEHUI has developed turn-key services for craft beer projects and is capable of providing services such as designing, manufacturing, installation, commissioning and training for bars and large, medium and small craft breweries. LEHUI has already completed some turn-key projects such as Ireland C&C, UK KIRKSTALL, Timor Leste HEINEKEN, America CAB, China YANJING, PEARL RIVER, PANDA CRAFT, etc. A craft plant with a capacity of 100 sets of craft brewing equipment per year and 1000 craft FSTs is available in LEHUI Ningbo factory, while Craftbottle packaging line for bottles, craftcan packaging line for cans, Keg&Cask barrel line are being manufactured in LEHUI Nanjing factory, altogether dispatched to the whole world.

LEHUI Craft Beer Team

There have been more than 20 craft engineers from at home and abroad, including those from Technical University of Munich, The Durmens Beer Academy, Sino-German Beer Academy, Zhejiang University, Jiangnan University and TUST. They learned and remedied craft process and equipment technology from American and Europe to form LEHUI'S own product advantages. They have obtained 15 patents for crucial technology and equipment. They have developed smart craft equipment which can be customized to meet different requirements.

LEHUI Principles

LEHUI aims to build an international high-end craft equipment brand. So as to achieve the

principle "First for value", LEHUI persisted, persists and will persist the direction "quality of Europe, price of China" to supply equipment and services with high cost performance for customers all over the world.

QC of LEHUI Craft

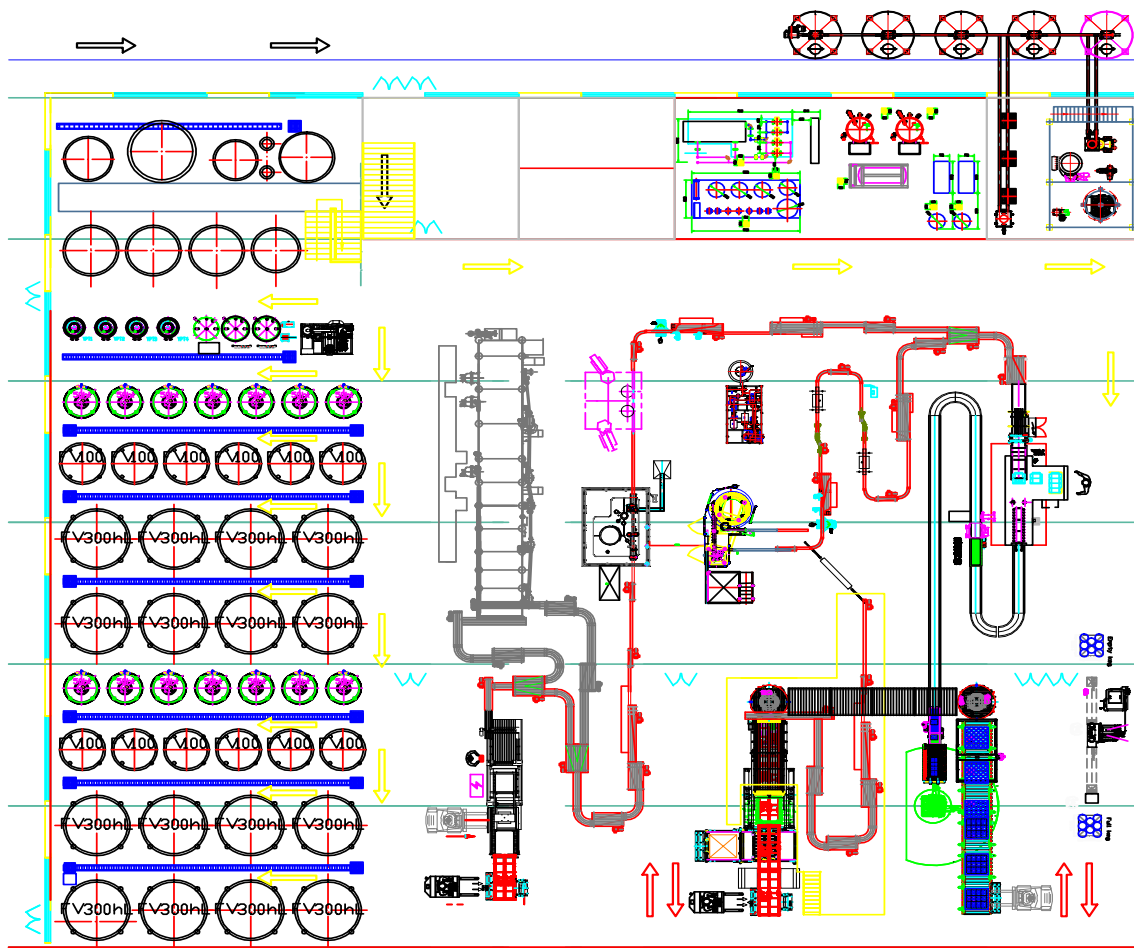
With certificates from ASME, PED, AS1210, GOST and ISO9001, LEHUI has much confidence in providing equipment of high quality. X-ray and profile testing instrument are applied to ensure the quality of welding and polishing, and material analyzer and thickness tester are used to make sure the materials meet the pressure requirements and other requirements of customers.



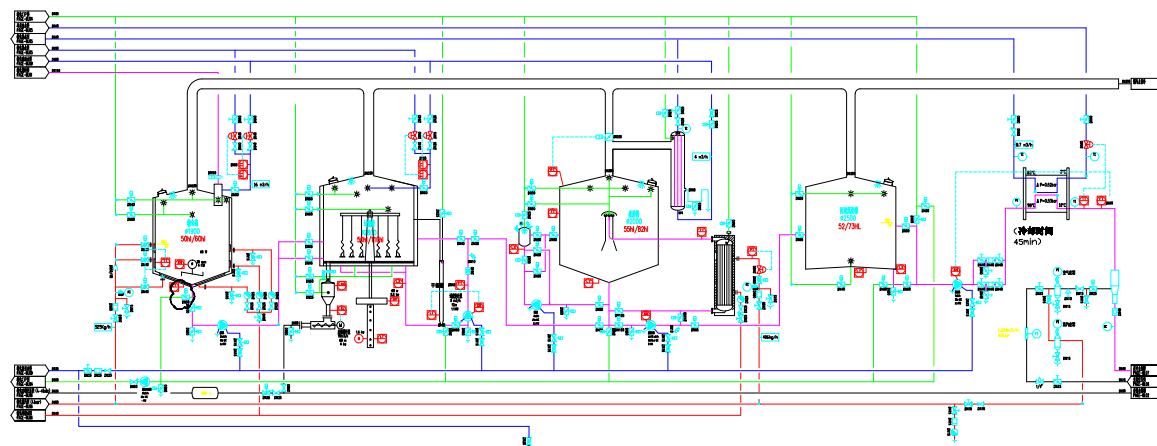
Modularization of LEHUI Craft

Lehui craft equipment is divided into several modularizations including raw material, brewhouse, fermentation, packaging and corresponding utilities with an experiencing modularization in experiencing factory. All of them are with 3D design and can be customized in accordance with customers' requirements. All equipment will be pre-assembled and tested before delivery to customers, after which the site installation and commissioning can be finished within one week according to the pre-assembly code, saving loads of time and money.

Master plan of turn-key project



PID & HMI

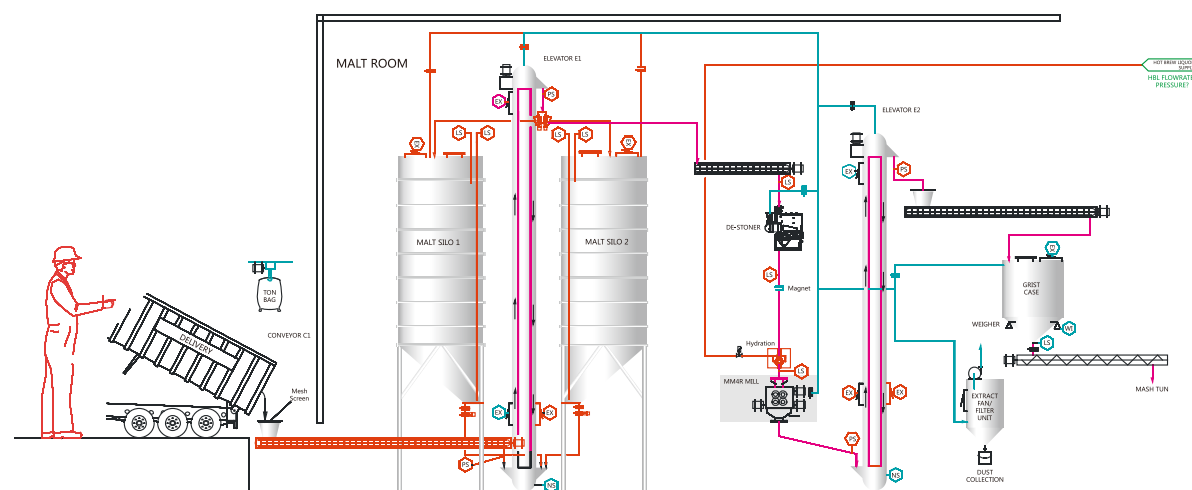


LEHUI Brewtech automatic process control system

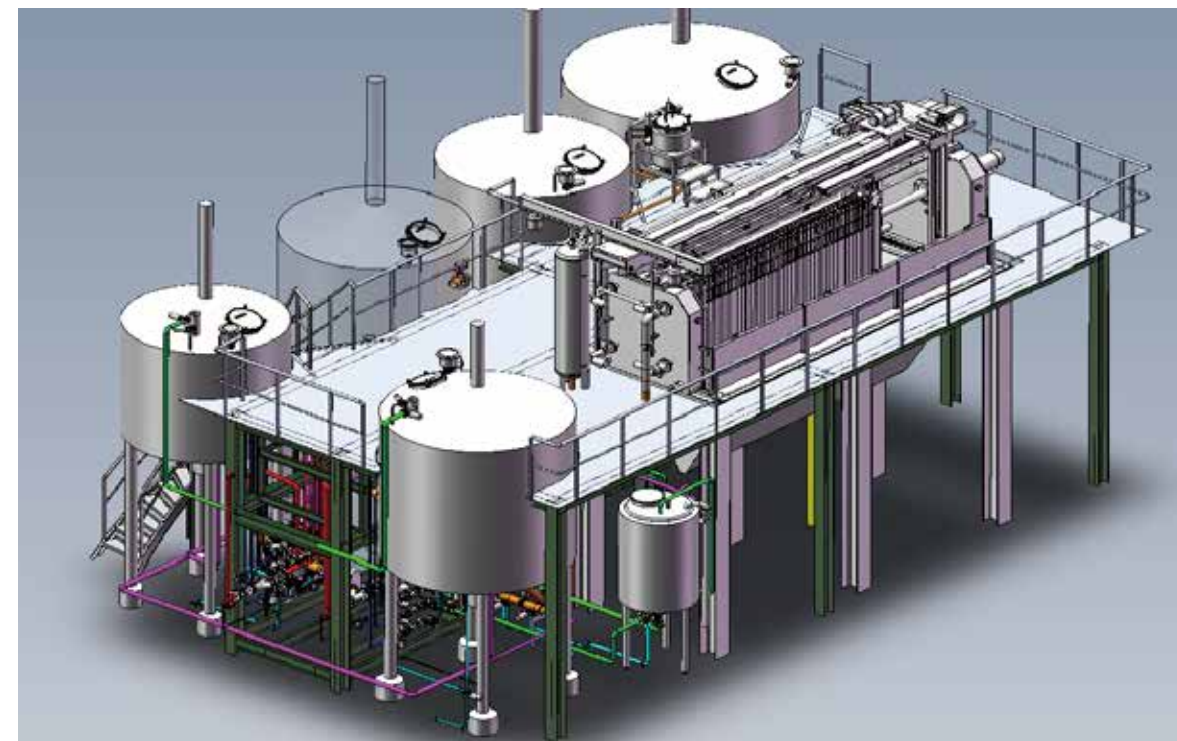
According to the requirements of brew process and referring to overseas advanced systems, Lehui has developed the Brewtech system which comply with the ISA-S88 standards. Among many brilliant functions, the drawing recipes can help with a rapid development of new products for users to catch every single chance in market, and the detailed reports can help to the trace of products' quality. The system has been successfully applied to domestic and foreign breweries such as Pearl River, CRB, Heineken and Ab-inbev.



Modular design of RMH

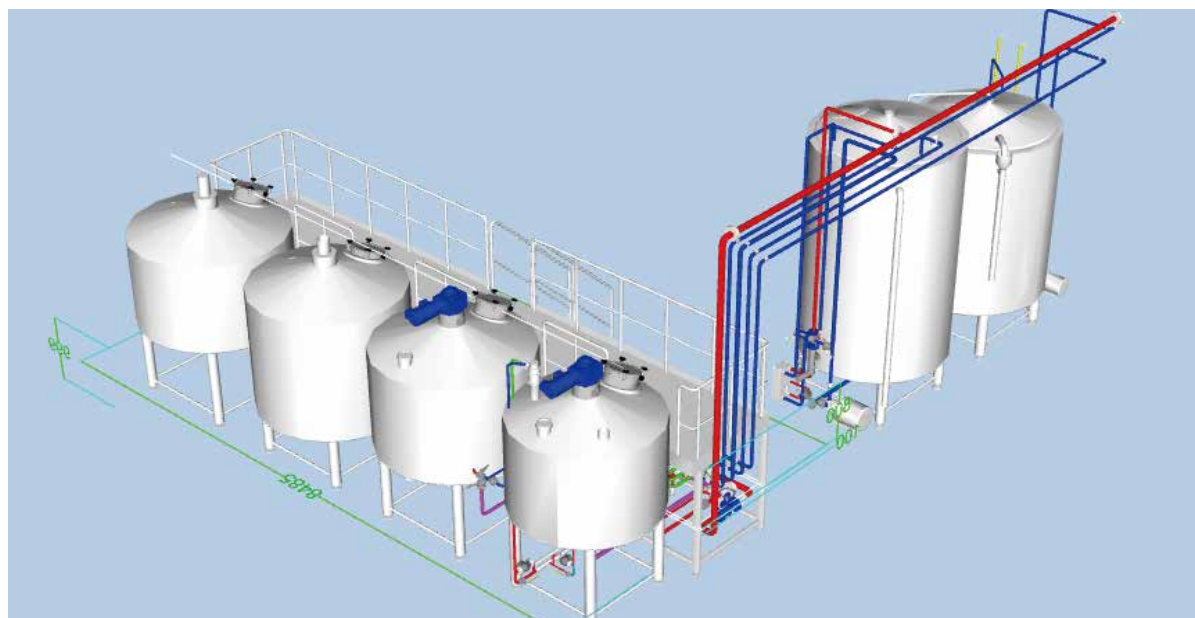


Brewhouse With Mash Filter

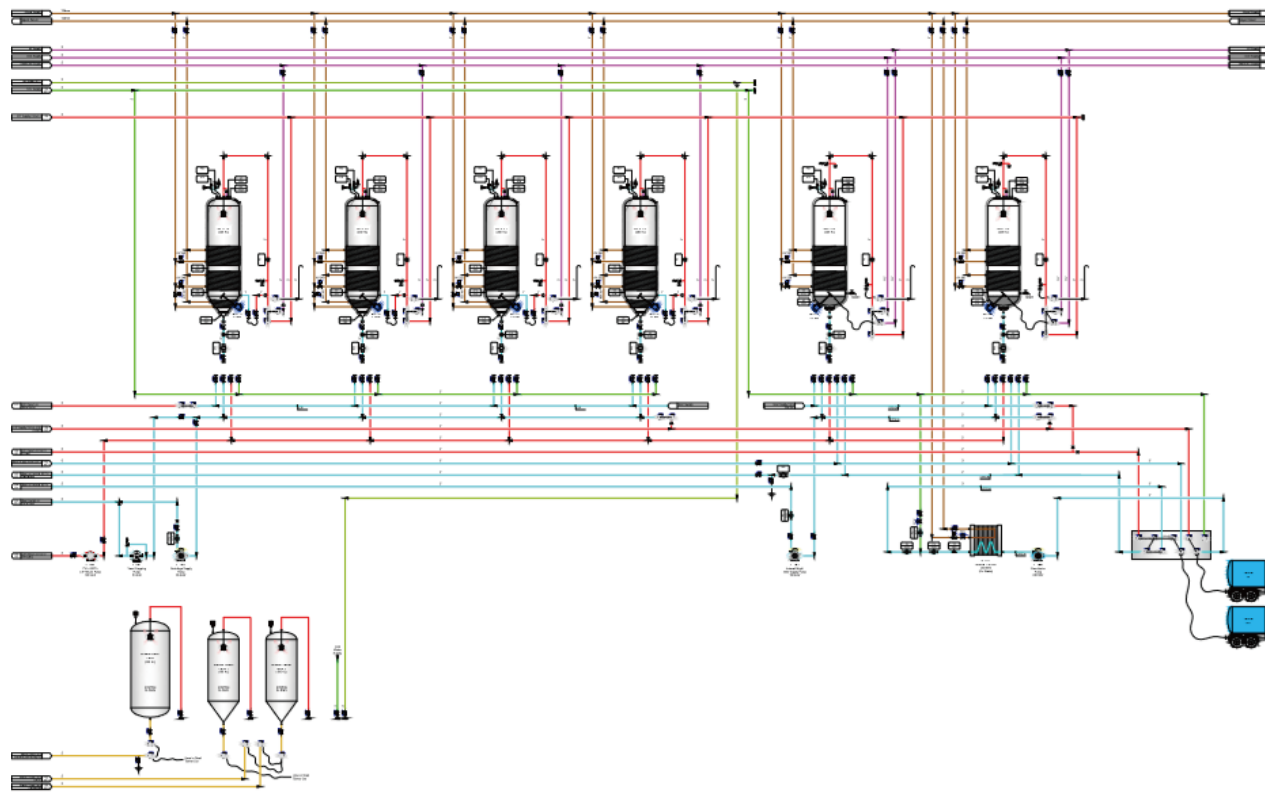


Modular design of brewhouse

Brewhouse With Lauter Tun



Modular design of cellar



Lehui craft has adopted Smart design from standalone equipment to the whole factory. The key brewing system can be used for data collection and analysis. Pre-selected storage of craft beer brewing technology allows customers to choose the type of beer that needs to be brewed in the "fool" interface and then produce high-quality craft beer under full automatic control. Mandatory CIP program can guarantee that the whole brewing process is free from miscellaneous bacteria, and customers can control the brewing process remotely. From semi-automatic to fully automatic customization, the beer recipe and type can be pre-set parameters, as well as provide custom control. The full data feedback and food safety management system can guarantee high quality, and guarantee the control from brewmaster to novices. At the same time, the flexible production of "black lamp factory" is realized with the target of made in China 2025.



High-efficiency Internal Jacke

Increase heat exchange surface and improve greatly in the temperature rising speed



Raker for a Variety of Brewing Processes

Raker for British filtration technology and raker with lifting or reversing



False Bottom & Multi-aerating-pipe Gathering System

Fan shape nozzle ensures the cleaning and sanitation of false bottom,Docking with the most uniform wort collection loop



Anti-vacuum Balance Tank

The specially designed balance tank prevents the filtration layer from being sucked and the pump idling to increase the extract yield.



Economical Energy-saving Wort Boil

Internal heater and external circulation heater save energy and reduce evaporation rates as low as 2.5 - 4%.



Hop Dosing Tank

The hop soaking pool offers more possibilities for beer flavor
The hop soaking pool with the sieve plate can effectively and continuously leaching the hop oil and aroma in the hop.



Condensate Water Recovery Unit

Condensate water recovery unit with spary ball washing, more environmentally friendly, reach zero discharge



Wort Aeration

Venturi-type wort aeration pipeline prepares for yeast reproduction



Membrane Filtration

Using cross-flow filtration technology, no DE, no change in beer flavor

Raw Material Handling System

Main Product, Malt Milling Machine and Pipe Chain Conveying Equipment



Miller

The 500kg/h miller uses European motors and special feeding roller device to ensure high speed operation and breakage of wheat husks, thus forming natural filter media to reduce filtration time, simple operation process and installation for customers to own good brewing experience

Product Features

- Special designed feeding device, not only evenly distributes dry malt to milling rolls, but also manually adjust spaces between base plates and feeding rolls to ensure the flexibility of feeding.
- Magnetic cylinder included, which can remove metal from raw materials to ensure the operational safety of equipment.
- Space of milling rolls (grooved rolls) on top is adjustable to make sure ideal milling quality, i.e. broken malt grains with intact husks.



- A pair of smooth milling rolls at the bottom can crush husk-free coarse grits to reach ideal milling quality and ensure its maximum extracting rate.
- Easy to analyze sample feature when necessary for quality control during the milling process. The close-ended sampler keeps dust from spreading.



Pipe Chain Conveyor

- Conveying materials: malt
- Capacity: 0.01~5m³/h.
- Good sealing performance, no environmental dust pollution.
- 3D transportation - include horizontal, inclined, vertical, turning and other combined conveying methods.

Two-vessel Brewhouse



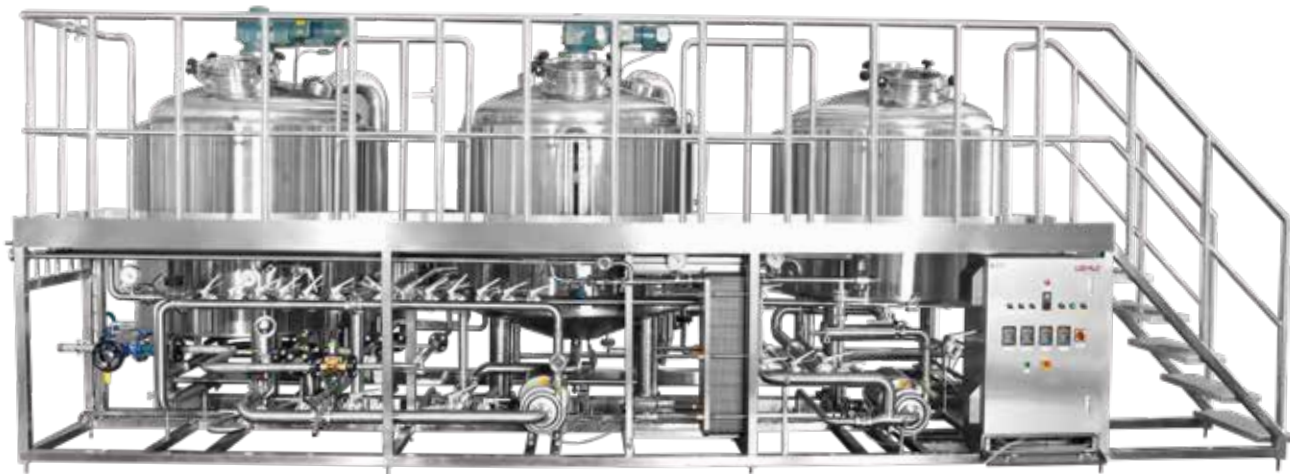
The two-vessel brewhouse adopts saccharification/filtration integration and wort kettle/whirlpool integration, high-quality manufacturing level, and creates both a brewhouse system that is in line with traditional craftsmanship and innovative. Compact design and shiny copper or silver stainless steel exterior makes your brewing system the most eye-catching backdrop in the bar.



Product Features

- High level stainless steel cladding and copper cladding for choose.
- Side door for spent grains removal.
- FDV control for wort pump and motor.
- Anti-vacuum stainless steel balance vessel with sight glass.
- Standard removable VED lighting.
- PLC touch screen.

Three-vessel Brewhouse



Modular design, 10hl, 20hl, 30hl /brew, max 5 batches/day. Three main vessels (Mash Tun, Lauter Tun, Wort Kettle/Whirlpool) including piping, valves, pumps, plate exchanger, platform etc. are pre-assembled as one module in our factory.

Product Features

- The temperature and flow of mixed water can be adjusted and accurately measured.
- Dedicated raw materials & water mixing device. Milled malt and water can be fully mixed before mash-in.
- Specially designed to eliminate water hammer to protect laser welded jackets.



- More uniform distribution of spent grains.
- Balance column structure, smoother filtration.
- Simplified & combined grain-raking and discharge unit (FDW to rake the grain bed and REV to discharge spent grains).
- Large flow & low pressure CIP system for efficient cleaning of trub.
- Modularized design for easy dismount, transportation and installation.
- Semi-automatic or automatic control system utilizes Siemens interface and PLC allowing for visualization of processes with information tips and failure warning functions to integrate smart operation and recipe management.

**Brewhouse System
of Lehiu Craft**

Four-vessel Brewhouse

Modular design, 20hl, 30hl, 50hl, 80hl, 100hl per brew, max 7 batches per day.

Lehui' s modular brewhouse is mainly designed for craft brewing processe.

Four main vessels (Mash Tun, Lauter Tun, Wort Kettle, Whirlpool) including piping, valves, pumps, plate exchanger, platform,etc. will be pre-assembled as one module at our factory.

Product Features

- The temperature and flow of mixed water can be adjusted and accurately measured.
- Dedicated raw material & water mixing device. Milled malt and water can be fully mixed before mash-in.
- High quality laser-welded jackets.
- More uniform distribution of spent grains.
- Balance column structure, smoother filtration.
- Simplified combined grain-raking and discharge unit (FDW to rake the grain bed and REV to discharge spent grains).
- Large flow & low pressure rinsing device eases cleaning of Trub.
- Modularized design for easy dismount, transport and installation.
- By utilizing Brewtech Brewing Control System, visualization of processes can be realized with information tips and failure warning functions to integrate smart operation and recipe management.



**Brewhouse System
of Lehiu Craft**

Fermenter and Brite Beer Tank, Vessels, Etc

Lehui is able to manufacture fermentation tanks and brite tanks that meet international standards for pressure vessels including ASME, PED, AS1210, GOST etc. All tanks can be designed and manufactured according to customer's requirements.

Using laser welding technology, the service life of Lehui fermentation tanks and brite tanks can be extended as long as twenty years.



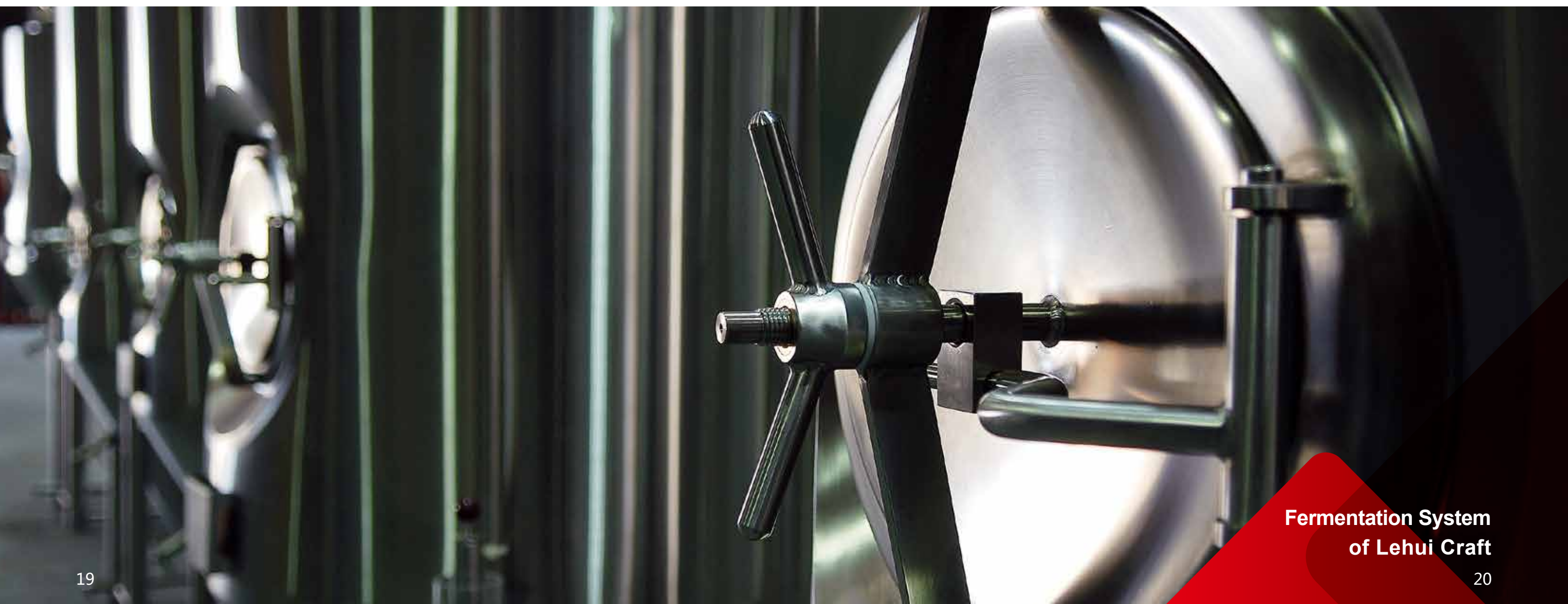
(Fermenter Tank)



(Brite Tank)

Product Features

- Specially designed to eliminate water hammer to protect laser welded jackets, 10 years warranty for leakage.
- Traceable manufacture process documents for quality.
- International certificates including ASME, PED, AS1210, GOST etc. are available.
- Fast delivery for standard products.



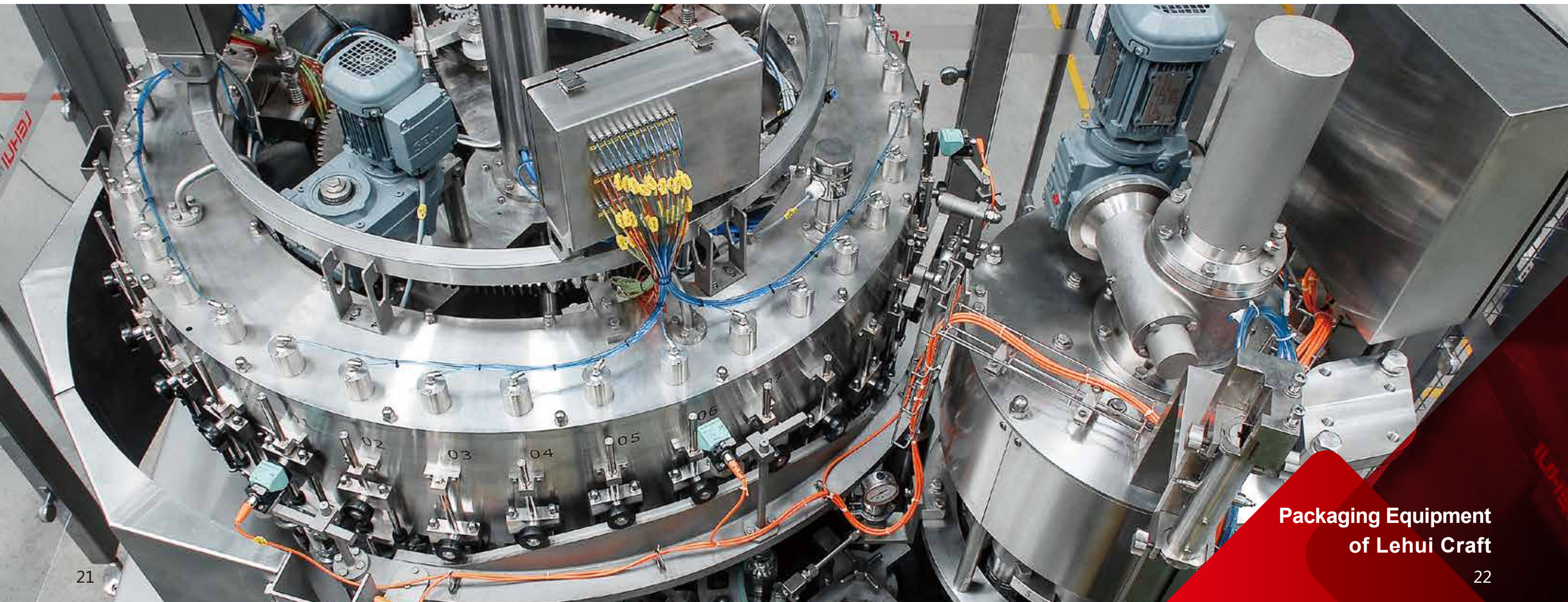
Craftbottle

It's Craft Beer Glass Bottle Packaging Line Key Equipment

EP (Electro-pneumatic) filler is a Lehui new generation product, which is able to individually control the filling valves, vacuum valves and pressure relief valves by solenoid valve. The process of pre-evacuation, CO₂ replacement & back pressure, filling and pressure relief will be finished precisely within the pre-determined time in program. The vent tube ensures the accurate control of filling level, and ensures further consistency in the filling results of each bottle.

Product Features

- High Filling Accuracy, Stable and Reliable : The filling accuracy is high, stable and reliable, and the filling process is precisely controlled by PLC to ensure that each bottle is accurately vacuuming, CO₂ purging, CO₂ back pressure, filling, pressure decompressed and other operations within the set time.
- Fully Automatic Control : The touch-screen interface is totally in accordance with OMAC/WS standards, which guarantees a simple adjustment of filling process parameters (only to modify the parameters on the touch-screen) .
- Sanitary Design, Safe and Healthy : The filler is equipped with complete CIP system, which enables a thorough cleaning of all internal parts of the filling system. The filling valves can be opened or closed at any time without running the machine.



Craftcan

Craft Beer Cans Packaging Line Key Equipment



Lehui developed the all in one can filler and seaming machine "CraftCan", cooperated with Swiss Ferrum company, specifically for production of craft beer and low-speed carbonated beverage. The perfect out-of-the-box design will be fully tested at the factory before delivery, allows CraftCan to be loaded directly into a standard container and delivered to anywhere around the world, just like an elaborated Swiss watch, the users can put it into use once out of the box.

The perfect integration design of no dead corners is applied to the CraftCan, which is in accordance with the harsh food safety standard around the Europe and America. The simplified integrated structure of CraftCan is always featured with high quality and stability that are maintained by Lehui and Ferrum.

Product Features

- Using high precision electronic flow-meter valve for isobaric filling, suitable for beer and carbonated beverage filling.
- The whole machine with compact integrated design can be placed in a standard container, saving space and transportation costs.
- CraftCan can optionally be fitted on the top with a laminar air purification device, with 2pcs FFU units. It is suitable for draft beer and beverage aseptic filling.
- Filling valve, filling cylinder and other materials in contact with the products adopt stainless steel and sterile design.
- Sealing cover of filling valve is pre-compacted with spring to prevent dead corners inside pneumatic compression device.
- Complete super clean platform and drip free integrated common plate ensure the sanitation operation.

Keg Cleaning and Filling Machine

Lehui KWF35 has the most advanced keg cleaning and filling technology. Cleaning, disinfection and filling functions is integrated in this machine. It is consisting of cleaning & filling combined workstation, pre-rinsing/ recovery water tank, CIP chemical tank, top pressing device, CIP self-cleaning device. The entire production process is fast, efficient, safe and reliable, fully meeting the production needs of small and medium-sized breweries.

It is the first choice for craft beer manufacturers to pursue cost-effective equipment.

Product Features

- Stable and high accuracy filling.
- All stainless steel design.
- Compact structure.
- Verifiable sealing performance of beer keg pressure.
- Fully in compliance with international safety and environmental standards.
- High performance, sanitary filling.
- High precision flow-meter accurately controls filling volume, reducing the loss of beer.
- The filling process is automatically controlled by the beer pressure and flow rate.
- Clean and sanitary design and no dead corners.



Cask Filler and Cask Washer



Lehui's CF55+ single-head filler and CW60 double-head cask washer are especially designed for those small and medium-sized cask breweries which pursue high quality beer. With a maximum capacity of 60 casks per hour, compared with similar products, our combination of scheme will better meet the breweries' requirements of capacity and performance.

The sanitary peristaltic pump (HHP) is especially developed and manufactured by Lehui, combined with automatic control of online flow meter, gentle and accurate filling of foamless beer can be realized.



Product Features

- Extra sanitary design, healthy and safe.
- The whole machine is manufactured from SS304, and it is fully sanitary by using food-grade hose pipe for connecting.
- Stable and high accuracy filling efficient and low energy consumption cleaning.
- Efficient, high pressure cleaning and rinsing, no dead corners, no residues, complete coverage of cleaning range.
- Low water consumption, with no need for draining and pre-rinsing, 6-8 Liters of water per cask on average. More than 75% water is recycled for pre-rinsing.
- Integrated design of water tank, for pre-rinsing and cleaning.
- Satisfy the cleaning of different cask sizes (depend on requirements)

Yeast Propagation System

Yeast is an important part of the process of converting wort into beer. Numerous different yeasts bring different flavors to beer, so Lehui provides customers with nearly ideal and stable yeast dosing, propagation and storage systems.

Product Features

Adopting the bioengineering concept of pure seed culture, the tank design has no dead angle, high cleanliness and easy cleaning, and has very reliable sterilization performance. It can guarantee the cleaning and sterilization effect of the whole system through CIP cleaning.

Reasonable control procedures, from CIP cleaning to wort sterilization, cooling, and propagation, maintain a positive air pressure of 0.5 bar in the tank to ensure pure culture of yeast.

Smooth pipe design, the pipeline is completely closed loop design, ensuring no dead angle for cleaning.



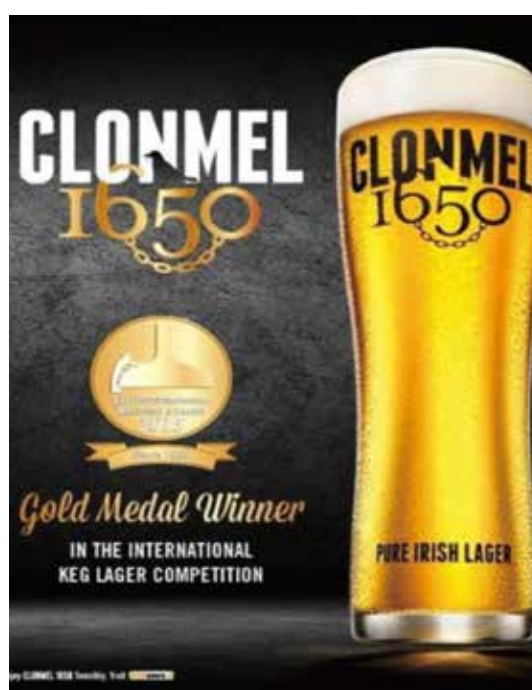


50HL/Kirkstall Brewery in UK



Reference Project
of Lehui Craft

100HL/C&C in Ireland



Reference Project
of Lehui Craft

30BBL/Tucker Brewery in USA



Reference Project
of Lehui Craft



30BBL/Heineken in UK



Reference Project
of Lehui Craft



5HL/Heineken in The Netherlands



Reference Project
of Lehui Craft

20HL/IMB-RICWLAB in Guyana



Reference Project
of Lehui Craft



5-15HL/Lion in New Zealand



Reference Project
of Lehui Craft



20HL/KOTOBUKITECHRE,LTD in Janpan



Reference Project
of Lehui Craft



80HL/Heineken in East Timor



Reference Project
of Lehui Craft



50HL/Pearl River in China



Reference Project
of Lehui Craft



20HL/Yanjing Brewery in China



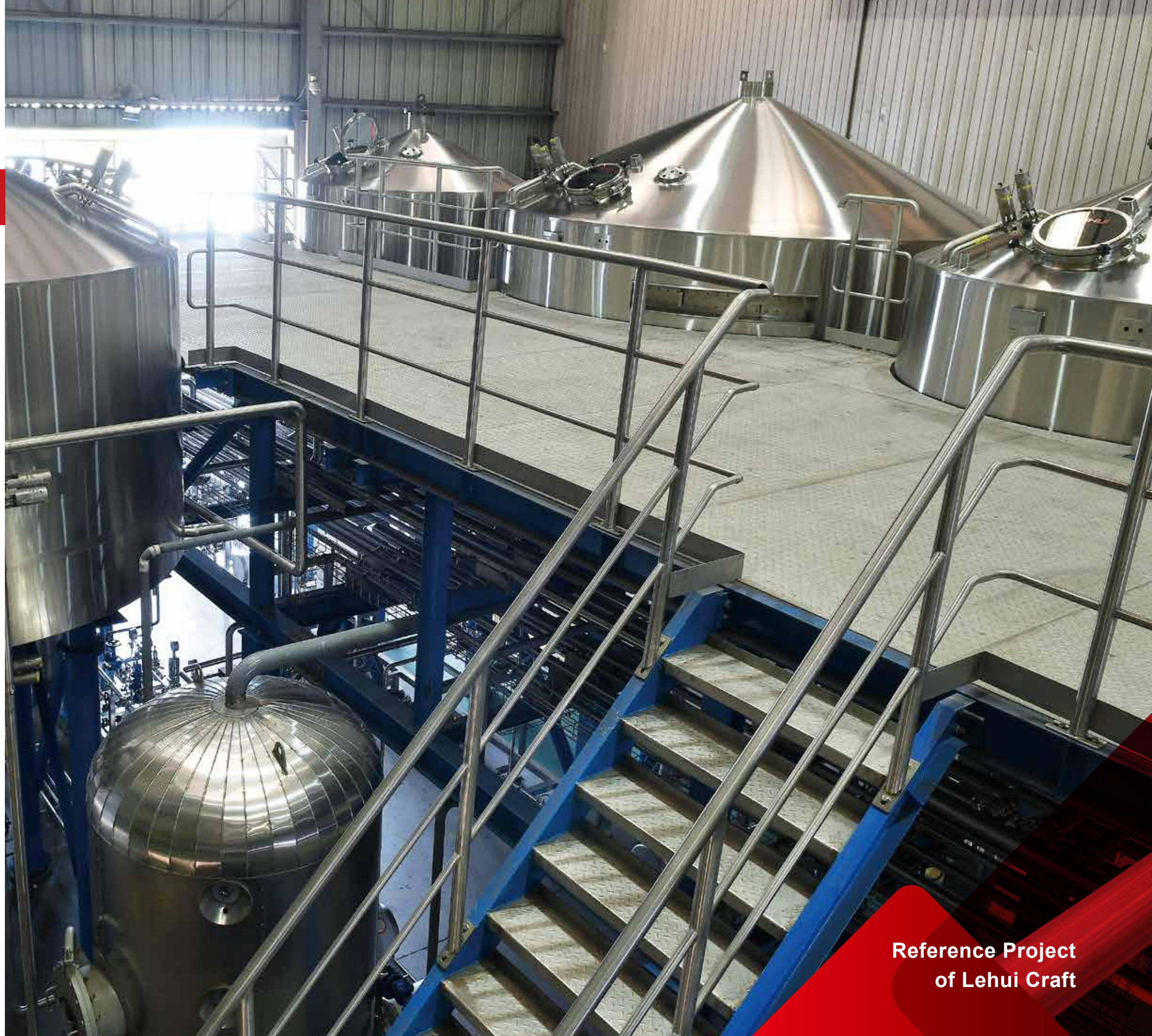
Reference Project
of Lehui Craft

20HL/ABInbev Brewery in Chian



Reference Project
of Lehui Craft

100HL/Heineken in Burundi



Reference Project
of Lehui Craft

60BBL/Aviator Brewery in USA



Reference Project
of Lehui Craft

10BBL/Hawkshead Brewery in UK



Reference Project
of Lehui Craft

20BBL/By the River Brewery in UK



Reference Project
of Lehui Craft

20HL/Salt Beer Factory in UK



Reference Project
of Lehui Craft



50-100HL/Panda Brewery in China



Reference Project
of Lehui Craft

24HL/Bowness Bay in UK



Reference Project
of Lehui Craft



30BBL/Heineken in UK



Reference Project
of Lehui Craft

30HL/Signature Brewery in UK



Reference Project
of Lehui Craft

50HL/Brains Brewery in UK



Reference Project
of Lehui Craft

65HL/Leeds Brewery in UK



Reference Project
of Lehui Craft

100HL/Tiny Rebel Brewery in UK



Reference Project
of Lehui Craft

250HL/Freedom Brewery in UK



**Reference Project
of Lehui Craft**

250BBL/Fermenter in Hawaii



**Reference Project
of Lehui Craft**

Lehui Craft Brewing Platform Service Introduction

In order to serve better the emerging Chinese craft beer industry, Lehui International plans to build a craft beer service platform in Ningbo Damuwan by leveraging the talent and technical advantages of the craft equipment industry. Relying on the flexible intelligent craft beer manufacturing center to do technology development, product development, beer brewing, customers can order products through C2M e-commerce platform, and it can also accept OEM processing of large-scale craft beer company, and help craft entrepreneurs to create a craft beer business at same time. The platform will cooperate with well-known European and American craft beer companies to introduce the world's craft beer brands and crafts culture, guide the rapid development of China's craft beer, and provide more varieties of craft beer to meet the growing needs of the people.



**Service Platform
of Lehui Craft**