Revealing the secret of big-capacity instant noodle production lin

In the fast-paced modern society, instant noodles, as a convenient and low-cost food, have been integrated into people's daily lives. Whether it is busy office workers, students, or sudden meals, instant noodles have become the preferred solution for many people. Since its invention in Japan in 1958, instant noodles have quickly gone global and are deeply rooted in different cultures, becoming the "fast food" representative of hundreds of millions of people around the world.

The biggest feature of instant noodles is undoubtedly its speed and convenience. It usually only takes a few minutes for consumers to enjoy a bowl of hot noodles. For modern people with an increasingly fast pace of life, instant noodles provide a time-saving and labor-saving dietary choice. Especially when you are busy at work and have no time to cook, instant noodles have become an ideal substitute. It is simple to make, the ingredients are easy to obtain, and it does not require superb cooking skills or complex equipment, which makes it an ideal choice for quickly solving hunger problems.

In addition to convenience, instant noodles also have a wide range of adaptability and diversity. Different countries

and regions around the world have launched a wide variety of instant noodles according to their own culture and tastes. For example, the spicy instant noodles in Korea, the hot and sour flavors in Thailand, and the rich and diverse local flavors in the Chinese market all reflect the important position of instant noodles in globalization. Its diverse flavors meet the needs of different groups of people, and also make instant noodles not just a kind of food, but a kind of cultural dissemination and integration.

Advantages of fried instant noodles (from the perspectives of consumers and producers)

1. For consumers: extremely convenient experience

(1) "Delicious in seconds": The porous structure formed by frying allows the noodles to absorb water quickly like a sponge, and the elastic and smooth taste can be restored in 3 minutes, meeting the modern people's demand for "instant satisfaction".

(2) "The fragrance in memory": High-temperature frying locks in the wheat aroma, and the rich flavor produced by oil penetration, the aroma is fragrant when brewing, forming a strong appetite stimulation (refer to the "late-night instant noodles temptation" phenomenon).

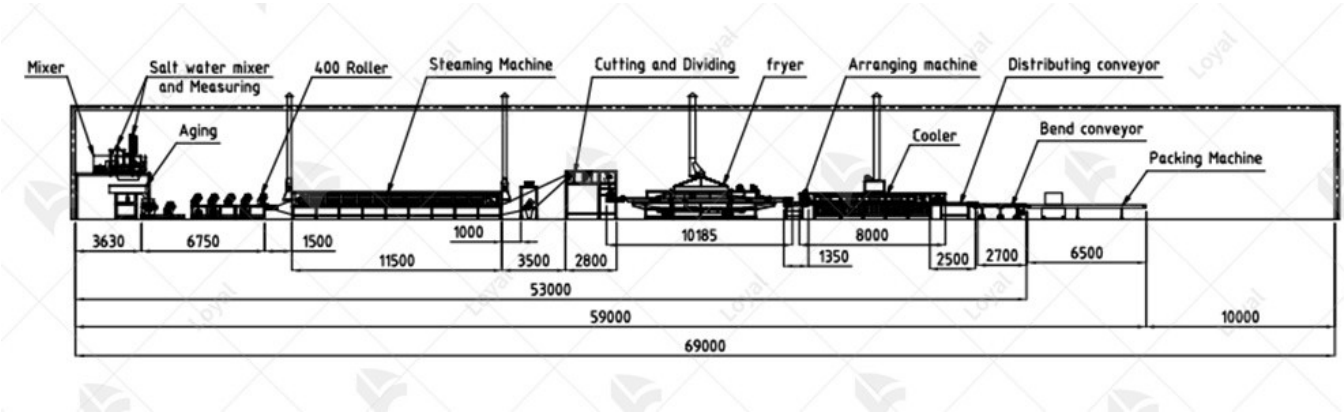
(3) "Lazy-friendly": No need to turn on the fire to cook, it can be enjoyed at any time in the office, on the road or even in the wild, and it is a top choice for emergency food.

2. For producers: Maximization of commercial value

(1) "Time is money": The dehydration efficiency of frying is far higher than that of hot air drying. The average daily production capacity of a production line can reach hundreds of thousands of packs, which spreads the cost per pack and makes the profit margin more controllable.

(2) “Tricks on the tongue”: Oil not only prolongs shelf life, but also increases the addictive taste, indirectly increasing the repurchase rate (refer to the golden combination of “fat + carbon water” in the snack industry).

(3) “Global universal language”: From the spicy flavors of Southeast Asia to the design of European and American cup noodles, the frying process is adapted to different seasoning systems, becoming the underlying support for the localization strategy of multinational food giants.



3. Hidden bonus points: scene adaptability

(1) “Resistant to extreme environments”: The completely dehydrated noodles are resistant to high and low

temperatures, and can be stably stored from deserts to polar research stations, making them a frequent source of disaster relief supplies.

(2) “DIY freedom”: The strong structural support of fried noodles allows them to be soaked, fried, or even crushed as snacks, leaving a lot of creative space for eating (such as the Korean turkey noodle challenge and the crisp noodle crushing culture).

Another way to put it: Why can’t humans quit fried instant noodles?

(1) Physiological level: The combination of oil and carbon water activates the brain’s reward mechanism and forms taste memory.

(2) Technical level: The frying process has not yet been completely replaced in terms of cost, efficiency and taste.

The status of instant noodles in the international market cannot be ignored. According to data from the World Instant Noodles Association (WINA), global instant noodles consumption will exceed 120 billion servings in 2023,

mainly concentrated in China, India, Indonesia, Japan and the United States. As the largest consumer of instant noodles, China consumes more than 40 servings per person per year, and instant noodles have become one of the important food processing categories.

However, instant noodles are not without controversy. Due to the large amount of additives such as salt, oil and preservatives used in its production process, instant noodles are often considered "unhealthy" food. Long-term consumption of high-salt and high-fat instant noodles may have a negative impact on human health, especially for people with hypertension, cardiovascular diseases, etc. In order to meet this challenge, some manufacturers have begun to develop low-salt, low-fat or healthier instant noodle products, striving to find a balance between taste and health.

In general, instant noodles are undoubtedly one of the convenient and economical foods in modern society. It not only solves the dining problem of busy people, but also becomes a part of global cultural exchanges. With the continuous advancement of the food industry, instant noodles will continue to play an important role globally, bringing more choices and convenience to consumers in different countries and regions.

Instant noodles are a kind of food that not only meets the needs of modern people's fast life, but also faces health challenges. It has undoubtedly changed people's eating habits worldwide and continues to innovate in its rapid development. While enjoying the benefits of its convenience, consumers should also eat in moderation and pay attention to the nutritional content of the product to maintain a healthy eating habit.

As for the characteristics of instant noodles, I will not go into details here. There is detailed information in the previous article about small-capacity instant noodles production line. Please go to that article to view it. Now I will continue to talk about large-capacity instant noodles production line. Please note that the instant noodles making machines mentioned in the article are all based on 30,000 pieces/h.

Instant noodle production line flow chart

ALKALI WATER MIXING TANK---ALKALI WATER MEASURING DEVICE---FLOUR MIXER---ROUND DISK AGING MACHINE---ROLLING &SHPAING MACHINE---3 LAYER STEAMING MACHINE---NOODLE CUTTING AND DIVIDING MACHINE---FRYING MACHINE---HEATING

EXCHANGER---OIL FILTER---OIL CIRCULATING PIPELINE---OIL TANK---ARRANGING MACHINE---COOLING MACHINE---CONVEYING MACHINE

Because the cutting machines for round noodles and square noodles are different, if you want to make round noodles, you need to add a round noodle cutting machine and a round noodle forming machine. If you want it to be smoother, you need to add an airflow shaping machine.

The function of **instant noodle production line**

1.ALKALI WATER MIXING TANK: Mixing saline water, additives, etc. Body made of stainless steel316.

2.ALKALI WATER MEASURING DEVICE: Automatic metering of salt water. Body made of stainless steel316.

3.FLOUR MIXER: Mixing the raw material uniform.

4.ROUND DISK AGING MACHINE: Storage and maturation of dough.

5.ROLLING MACHINE: After heat treatment, increases the hardness of the roll, the noodles that are pressed out are lighter and stronger.

6.3 LAYER STEAMING MACHINE: Using the electrical to heating the water to have steam, then Boiling the noodles by steam. If steam heating is required, a boiler will need to be prepared.

7.NOODLE CUTTING AND DIVIDING MACHINE: It is used to cut noodles and adjust the frequency by controlling the size of noodles.

8.FRYING MACHINE: Fried instant noodles. Streamlined design, effectively control the oil level, with oil drain function, effectively reduce the oil content of the oil block by 5%, save the customer's raw material cost.

9.HEARING EXCHANGER: Working with the frying machine

10.OIL TANK: To storage the oil.

11.ARRANGING MACHINE: Arrange the dough

12.COOLING MACHINE: Cool to room temperature.

Technical specifications of instant noodles equipment

Yield	Steam consumption kg/h	Sheet width	Installed capacity
30000 pieces/8	1000-1200	216-260	42kw

h			
60000 pieces/8 h	1200-1400	300-330	56kw
80000 pieces/8 h	1300-1500	420-450	68kw
100000 pieces/8 h	1400-1600	420-450	80kw
120000 pieces/8 h	1800-2000	510-550	83kw
160000 pieces/8 h	2000-2400	630-650	106kw
180000 pieces/8 h	2400-2600	720-730	114kw
200000 pieces/8 h	2600-2800	765-800	125kw
2500000 pieces/8 h	3000-3200	870-900	140kw

Layout of the instant noodle production line

Regarding large-volume instant noodle production lines, no turns are allowed from pressing to cooling, please note this.

Sample of instant noodles production line

The instant noodle samples mainly differ in weight and shape (round, square).

The advantages of instant noodle production lines mainly include efficient automation, large-scale production, cost control, and standardized quality. The following is a specific analysis:

1. Efficient automation to increase production capacity

(1) Continuous production: From dough mixing, rolling, steaming, frying/non-frying drying to packaging, the entire process is automated and reduces manual intervention.

(2) 24-hour operation capability: The equipment has high stability and is suitable for large-scale order needs.

2. Large-scale production to reduce costs

(1) High raw material utilization: Accurately control the amount of flour, oil, and seasoning to reduce waste.

(2) Low labor cost: A standard production line only requires 5 to 10 people to operate, and the labor demand is far lower than that of traditional food processing.

3. Quality standardization to ensure food safety

(1) Controllable process parameters: Automatic adjustment of temperature, time, humidity, etc. to ensure the consistent taste of each package of noodles.

(2) Reduce pollution risks: Closed production environment + automated packaging to reduce the probability of human pollution.

4. Flexible adaptation to market demand

(1) Multi-category compatibility: The same production line can adjust parameters to produce fried noodles, non-fried (hot air drying) noodles, udon noodles, etc.

(2) Customized packaging: Supports multiple forms such as bag packaging, cup packaging, and barrel packaging to adapt to different consumption scenarios.

(3) Quick introduction of new products: The seasoning package formula can be easily changed, making it easy to

launch new flavors.

Recommended Company

Shandong Loyal Industrial Co.,Ltd. Is a Manufacturer Of Snacks Extruder Machine , Industrial Microwave Oven ,

Corn Flakes Production Line , And a Standing Director Of China Food And Drying Equipment Industry Association.

The Self-developed Twin-screw Extruder And Single-screw Equipment of Shandong Loyal Machinery Have Been Used In Production: Puffed Snack Food, Breakfast Cereal Corn Flakes, Fried Pasta, Bread Crumbs, Fruit Chips, Baby Food, Textured Soy Protein (tsp) Food, Fish Feed And Pet Food. a Variety of Snack Production Line Supporting Products.at The Same Time, The Batching, Drying, Flaking, Baking, Frying And Spraying Equipment Matching The Twin-screw Extrusion System Have All Achieved Independent Design And Production.

Our Extrusion System Is Widely Used In: Puffed Snack Foods, Breakfast Cereals, Vegetable Protein Meat Products, Soy Based Nutrition Bars, Reconstituted Rice, Grain Nutrition Powder, Modified Starch, Starch-based Sticky Music Children's Educational Toys, Degradable Starch-based Packaging Filling Materials, Bread Crumbs And Other Food Additives, Pet Food, Aquatic Feed, Biology And Chemical Industries.

Customer-specific Food Processing Plant Project Solutions

As one of the leading manufacturers of food processing

equipment, we are always searching for new solutions that benefit our snack food customers. Our experienced frying engineers always find the optimal solution for your industrial batch and continuous frying system line application. That's why we also develop, design and produce custom fried snack production line.

Instant noodles, a fast-food miracle born in the mid-20th century, have long surpassed the simple function of satisfying hunger and become an indispensable part of modern people's lives. It can be a warm comfort for late-night overtime work, or a convenient companion on the road; it can be transformed into a "life-extending artifact" in student dormitories, and it can also become a place of homesickness in foreign countries.

Perhaps it is not a fine delicacy, but it is this simple and unpretentious convenience that makes it transcend regions, ages and classes and become a common dietary symbol in the world. In the future, no matter how technology changes our way of eating, instant noodles will continue to warm every moment when we need to fill our stomachs quickly in its own way - because it is not only food, but also a cultural symbol of efficiency, memories and fireworks.

So if you have any ideas about instant noodles production

line, please feel free to contact us.

For more information, please visit the Facebook page:

https://www.facebook.com/Foodextruderfactory