NANO
Pharm Tech Machinery
Equipment

Nano
Pharmatech

NANO PHARM TECH
MACHINERY EQUIPMENT CO., LTD.

NANO PHARM TECH
MACHINERY EQUIPMENT CO., LTD

Website：www.hrbnano.com
Address: No.1 Dianchi Road,
Daoli District, Harbin, China
Postal Code: 150078
Tel: +86-451-86677166
Fax: +86-451-86681582
E-mail: sales@hrbnano.com

YouTube

www.hrbnano.com

nano

SOLUTIONS FOR YOUR PHARMACEUTICAL
PRODUCTION IN BATCH AND CONTINUOUS MANUFACTURING

INNOVATION ENGINEERING PROCESS EQUIPMENT

Founded in 1991, NANO PHARM TECH is a comprehensive company focusing on the design, development, production and service of oral solid dosage equipment. We design and manufacture automatic machinery for processing and packaging of drugs, cosmetics, food, tea and coffee. We have served more than 3000 enterprises in different countries and industries, and have been striving to innovate and improve to become an international enterprise with international standards.

Our main equipment includes following modules: milling & sieving module, automatic weighing and dispensing module, CCS granulation module, blending module, washing module, coating module and product transfer module. We also have developed blending, washing and sterilizing machines for sterile products production. NANO can not only provide large equipment, but also provide small fluid bed, wet granulator, coating machine, etc. for laboratories. Lab machines are used for innovative development and batch production process of drugs. We can also assist customers in validation and qualification.

The company has a modern production and R&D base of 50000 square meters. Based on research and innovation ideas, it provides high-tech automatic equipment that meets FDA, cGMP and EU GMP standards for the pharmaceutical, cosmetics, food, chemical industries around the world. We have established regional branches in Europe and USA to serve global customers.

Granulating module | Product handling module | Blending module | Washing module | Coating module | Dispensing module

QUALITY AND COMPLIANCE

Our products are CE certified, demonstrating our commitment to quality and regulatory compliance. Our ISO certifications reflect our adherence to international quality management standards. These certifications validate our robust quality management systems, ensuring the safety and efficacy of our machines. We are dedicated to delivering high-quality products that meet regulatory requirements.

NANO DOCUMENTS SYSTEM

Design Qualification (DQ)
Functional Design Qualification(FDS)
Factory Acceptance Test (FAT)
Site Acceptance Test (SAT)
Installation Qualification (IQ)
Operational Qualification(OQ)
Performance Qualification(PO)
Installation, Operation and Maintenance Manual (USER Manual)

ENGINEERING CASE

Dispensing Module　Blending Module

CDZ Bag Dumping Station and CF Hammer Mill

CLFZ Automatic Weighing & Dispensing System

QLH Air Mixer

HF Blender with Vacuum Charging System

SGTH Double Column Bin Blender

SKRH Container Blender

Coating Module　Washing Module　Granulating Module

LXB Continuous Coating Machine

LDB Coating Machine with a Lifting Machine

Through the wall Coating Machine & Automatic Washing Station

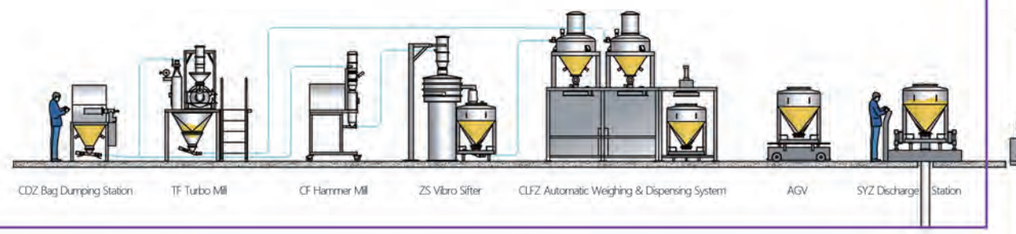
CCS Granulation Line

CCS Granulation Line

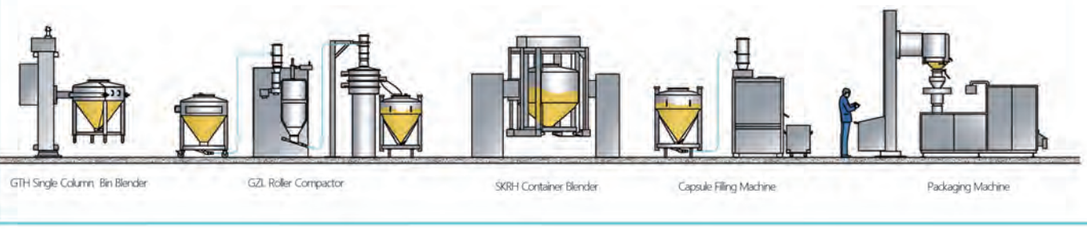
GZL Roller Compactor

ORAL SOLID DOSAGE PRODUCTION PROCESS

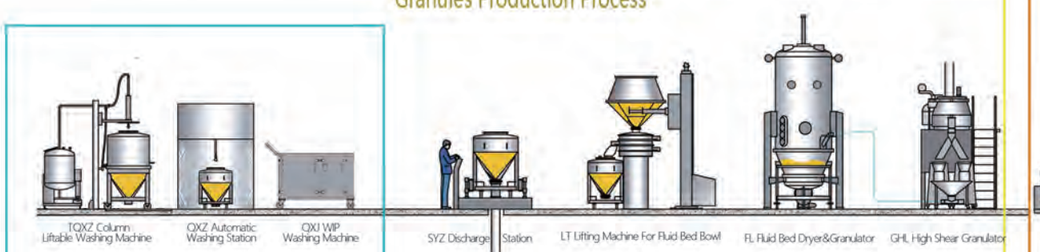
Weighing and Dispensing Process



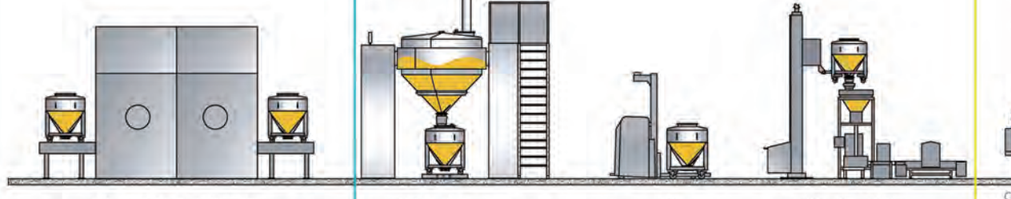
Capsules Production Process



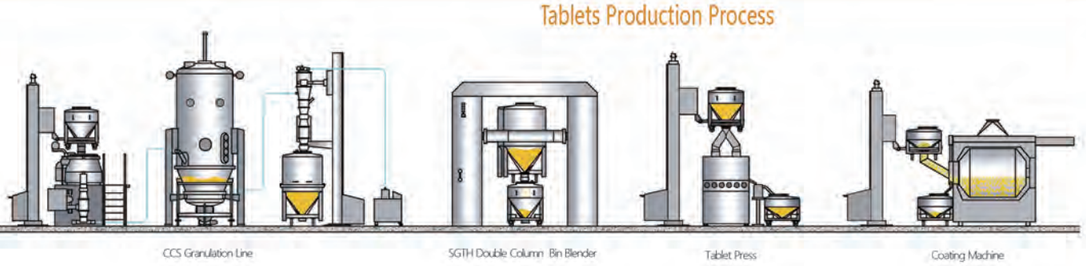
Granules Production Process



Washing Module

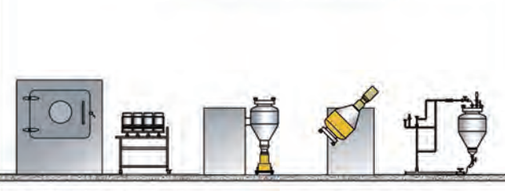


Tablets Production Process

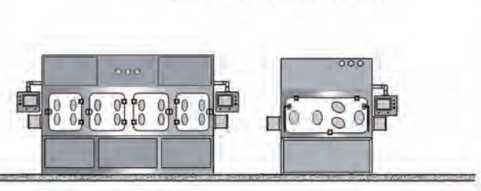


CGDT Lifting Machine Between Floors

Sterile Production Process



Isolation Production Process



ORAL SOLID DOSAGE PRODUCTION PROCESS

CONTENTS

GRANULATING MODULE

BLENDING MODULE

COATING MODULE

LAB EQUIPMENT

DISPENSING MODULE

WASHING MODULE

PRODUCT HANDLING MODULE

GHL HIGH SHEAR GRANULATOR

Introduction

High shear granulator is used for mixing and wet granulation in the oral solid dosage production procedure of pharmaceutical industry. It is also widely used in foodstuff and chemical industries.

Working Principle

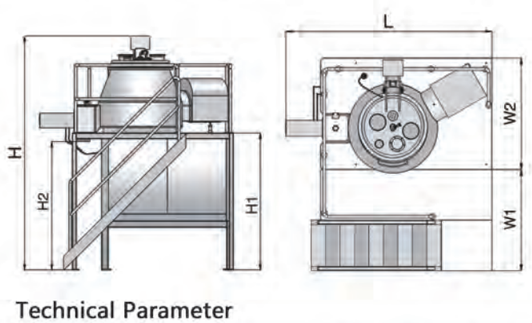
In wet granulation, powder is charged into the working vessel and the product is vigorously mixed by an impeller. Then it is wetted by spraying binder. Finally it becomes uniform wet granules by a chopper.

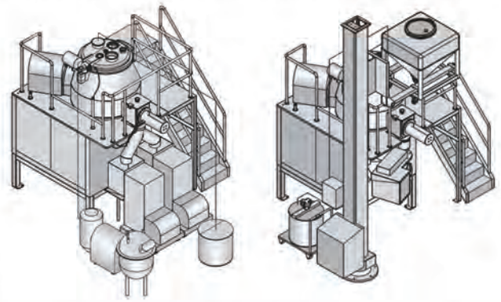
Features

- Reversed taper granulating bowl design, special shaped impeller and chopper to ensure uniform final products
- Granulating process is completed in a closed bowl system, dust free and complying with cGMP requirements
- Easy and safe operation, achieve mixing and granulating in one process
- HMI and PLC control system, motor speed is controlled by VFD, and all process parameters can be recorded
- Compressed air and water can be alternatively connected to the machine so as to ensure quick and efficient washing

Options

- Product charging by lifting machine or vacuum transfer system
- Jacket bowl wall design for heating or cooling
- Wet mill or oscillating granulator
- Automatic binder solution spraying system
- Printer
- WIP system
- Explosion proof design
- Operating platform, guardrail, stairs





Technical Parameter

Item \ Model		GHL-20	GHL-30	GHL-50	GHL-100	GHL-200	GHL-250	GHL-300	GHL-400	GHL-600	GHL-800	GHL-1000	GHL-1200
Total volume (L)		20	30	50	100	200	250	300	400	600	800	1000	1200
Useful volume (L)		14	21	35	70	140	175	210	280	420	560	700	840
Capacity (kg/batch)		7	10.5	17.5	35	70	87.5	105	140	210	280	350	420
Granulation time (min)		8-10	8-10	8-10	8-10	8-10	8-10	8-10	8-10	8-10	8-10	8-10	8-10
Total power (kw)		3.5	5.8	7.7	10.5	17	19	24	37.5	48	67	77	97.5
Compressed air pressure (Mpa)							0.4-0.6						
Compressed air consumption (m³/min)		0.4	0.4	0.4	0.6	0.9	0.9	0.9	1.0	1.0	1.2	1.2	1.5
Chopper speed(rpm)							0-2800						
Weight (kg)		500	500	600	1500	1850	2000	2500	3000	3500	3800	4500	5000
Outline dimension (mm)	H	1500	1500	1520	1700	1800	1800	1800	1900	2000	2200	2500	3300
	H1	800	800	850	900	950	1000	1050	1050	1500	1500	1600	1600
	H2	750	750	800	850	900	950	1000	1000	1380	1380	1480	1480
	L	1300	1300	1500	1900	2000	2000	2200	2200	2600	2600	2800	3150
	W1	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
	W2	740	740	740	980	1240	1150	1240	1240	1440	1440	1600	1600

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

GHLD ONE POT GRANULATOR

Introduction

One pot granulator offers a choice of mixing, granulation and drying options integrated into one processing vessel. Flexible technology for standard wet granulation, melt granulation or effervescent production is combined with vacuum or microwave drying.

Working Principle

The powdered material is mixed by an agitator in the working vessel. As mixing continues, it is then wetted or sprayed with a binder and cut into uniform wet granules by a chopper. Then drying and sizing of the granules is done in one machine.

Features

- Top driven agitator and chopper, which can completely prevent water and dust from coming into the transmission of the agitator and chopper
- Washing in place
- Jacket design for heating the pot
- Mixing, wet granulating and drying completed in a single pot combined with vacuum or micro wave drying
- Compact design, reduce space by incorporating several processing steps into one machine

Technical Parameter

Item \ Model	GHLD-150	GHLD-200	GHLD-400	GHLD-600
Total volume (L)	150	200	400	600
Useful volume (L)	40～105	80～180	100～320	150～480
Capacity (kg/batch)	20-53	35-65	50-95	100-165
Power(kw)	18	29	39	49
Voltage(V)	380	380	380	380
Frequency(HZ)	50	50	50	50
Compressed air consumption (m³/min)	1	1	1	1
Compressed air pressure (Mpa)	0.4-0.6	0.4-0.6	0.4-0.6	0.4-0.6

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

FL FLUID BED DRYER AND GRANULATOR

FL-A bag shaking type filter

FL-B pulse blow back bag filter

FL-C top plate up & down system

SS sintered cartridge filter

Introduction

Model FL fluid bed dryer and granulator has many functions such as drying, granulating and mixing. It is one of the important process equipment for solid dosage preparations. The wet granules obtained from high shear granulator can be dried in this equipment. It can also be used as a granulating machine.

Working Principle

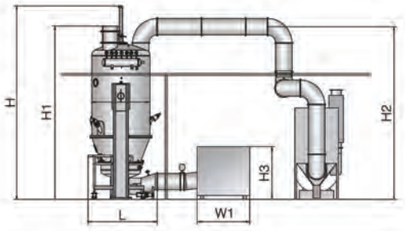
Fluid bed granulator makes use of fluid bed technology to realize mixing, granulation and drying in one container. The fluidized powder is wetted by spaying binder until agglomeration occurs. As soon as the desired grain size is reached, spray is stopped and the wet granules are dried and cooled.

Features

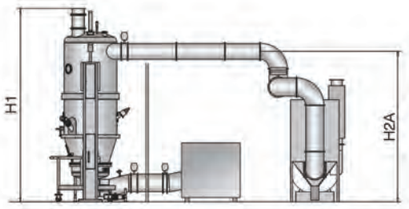
- Reduction in the amount of fines and improvement in the flowability
- Mixing, granulating and drying in one container
- Operation under the negative pressure to avoid dust and contamination
- No dead space, easy to disassemble and clean, complying with GMP standards
- Pulse blow back filter technology

Options

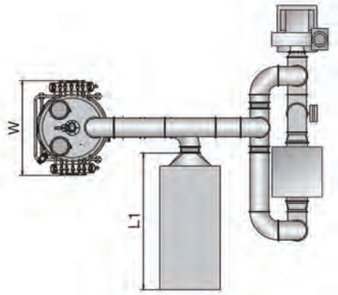
- Exhaust air dust detector and air flow rate monitoring
- Inlet air dehumidification
- Exhaust air secondary filtration
- Explosion proof design
- Top plate lifting &lowering system
- Product bowl with mixing function
- WIP system
- Solution spray system

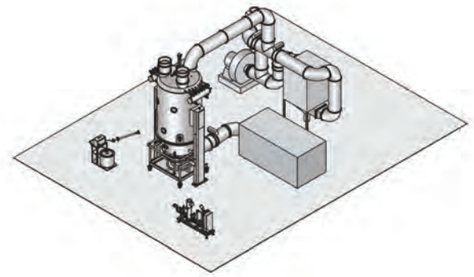


FL-C



FL-A





Technical Parameter

Item \ Model		FL-15	FL-20	FL-30	FL-60	FL-120	FL-200	FL-300	FL-500
Material bowl	Volume (L)	54	72	120	340	500	650	990	1400
	Minimum (kg/batch)	6	8	12	24	48	80	120	200
Capacity	Maximum (kg/batch)	15	20	30	60	120	200	300	500
Air fan power (kw)		7.5	11	11/15	15/18.5	18.5/22	30/37	37/45	55
Power supply (V、Hz)		380V, 50Hz,3P							
Steam pressure (Mpa)		0.2-0.6							
Steam consumption (kg/h)		40	45	70	85	190	280	320	485
Compressed air pressure (Mpa)		0.4-0.6							
Compressed air consumption	Pulse blow back	0.8	0.8	1	1	2	2.4	2.8	4.5
(m³/min)	Cylinder shaking bag	0.1	0.15	0.2	0.3	0.5	1.5	1.5	2.5
Temperature (℃)		Normal temperature -120℃ automatic adjustment							
Outline dimension (mm)	H	3450	3500	4000	4650	4800	5740	6600	7700
	H1	2650	2700	3320	3400	3650	4300	4700	5800
	H2	3300	3350	3500	3760	3920	4700	5140	5850
	H2A	1960	1960	2740	2850	3040	3800	3900	4940
	H3	810	810	700	1260	1460	1460	1460	1360
	W	980	1030	1400	1810	1890	2070	2270	2470
	W1	1040	750	800	1190	1530	1810	1810	1150
	L	1100	1100	1200	1910	1810	1820	1960	2430
	L1	1130	1500	1770	2980	3050	3050	3270	3000
	Φ	700	700	900	1110	1210	1410	1610	1810
Weight (kg)		1000	1000	1000	1200	1400	1900	2100	2500

•The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

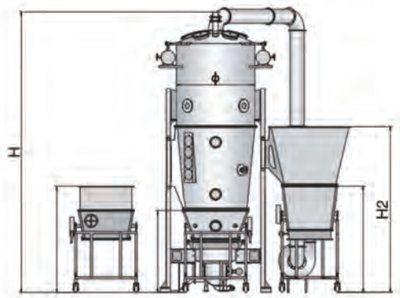
DFL FLUID BED PROCESSOR

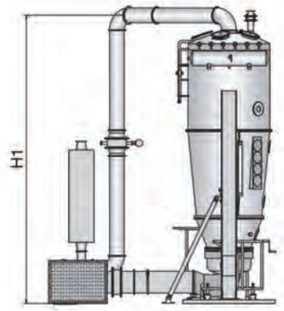
Introduction

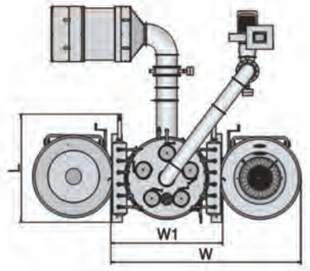
Model DFL Fluid Bed Processor is an equipment which combines drying, granulating, coating, pelletizing and blending functions. It is an important process equipment for the production of solid dosage in the pharmaceutical industry. It is widely used in pharmaceutical, foodstuff and chemical industries.

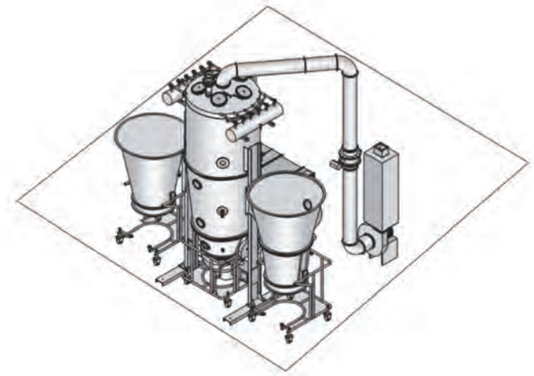
Working Principle

The system is equipped with inlet and exhaust system, filtration system, liquid supply system, top spray, bottom spray, and tangential spray system. The top spraying is for granulation; the bottom spraying is for coating; the tangential spraying is for making pellets. The above functions are all realized in one equipment. Users can select the required function according to the actual production process.









Features

- During the tangential spraying, vertical air inlet structure specially designed by NANO ensures that pellets are evenly distributed on the plate, and liquid is evenly distributed without being partially offset
- Top spray (one-step granulation) process with good stability and high yield rate
- The coating solution in the bottom spray process has good film formation and uniform coating
- Flexible configuration allows functional selection according to production requirements
- A variety of process parameters are controlled in one control center, with high process automation, and good stability
- High explosion-proof level and sealing level increase the production safety factor, reducing the dust contamination
- WIP cleaning nozzles meet the cleaning requirements

Functions

Drying Process
(Drying & Mixing)

Top Spray Process
(Granulation)

Bottom Spray Process
(Wurster, Coating)

Tangential Spray Process
(Pelletizing)

Technical Parameter

Item \ Model		DFL-10	DFL-15	DFL-30	DFL-60	DFL-120	DFL-200	DFL-300
Top spray capacity (kg/batch)		4-10	6-15	12-30	24-60	48-120	80-200	120-300
Bottom spray capacity (kg/batch)		2-5	3-8	6-15	12-30	24-60	40-100	60-150
Tangential spray capacity (kg/batch)		1.2-4	2-6	4-20	8-40	14-80	24-100	35-140
Air fan power (kw)		5.5	7.5	11	18.5	22	37	45
Steam consumption (kg/h)		20	60	160	160	300	380	570
Steam pressure (Mpa)		0.2-0.6						
Compressed air consumption (m³/min)		0.5	0.5	0.6	0.8	1.1	1.5	2.5
Compressed air pressure (Mpa)		0.4-0.6						
Temperature (℃)		Room temperature -120℃ automatic adjustment						
Outline dimension (mm)	H	3300	3500	3650	4210	5373	6492	6840
	H1	2650	2700	3320	4090	5340	6060	6560
	H2	1950	2000	2150	2580	2740	3367	4600
	L	1000	1010	1230	1450	1871	1946	2420
	W	1040	1100	2350	2640	3308	3870	3940
	W1	1040	1150	1250	1500	1879	2064	2350
	Φ	650	710	850	1110	1210	1410	1610

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

GZL ROLLER COMPACTOR

Introduction

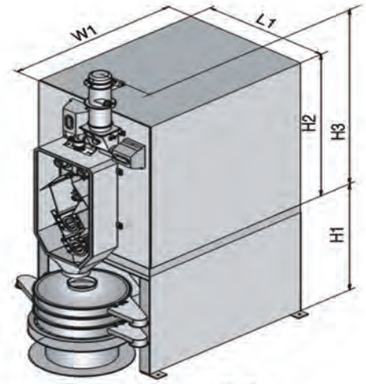
Model GZL Roller Compactor is an important part of solid preparation process equipment. Its excellent compatibility and air tightness can be flexibly matched with various types of pharmaceutical equipment and is widely used in the processing of various types of active pharmaceuticals, especially for dry granulation of heat-sensitive and moisture-sensitive materials.

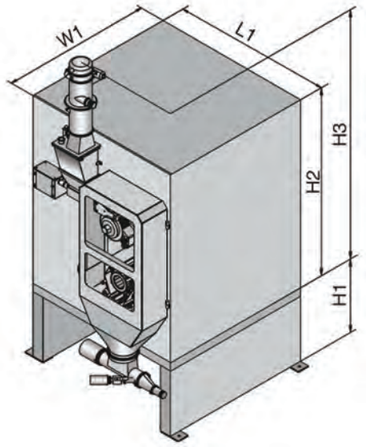
Working Principle

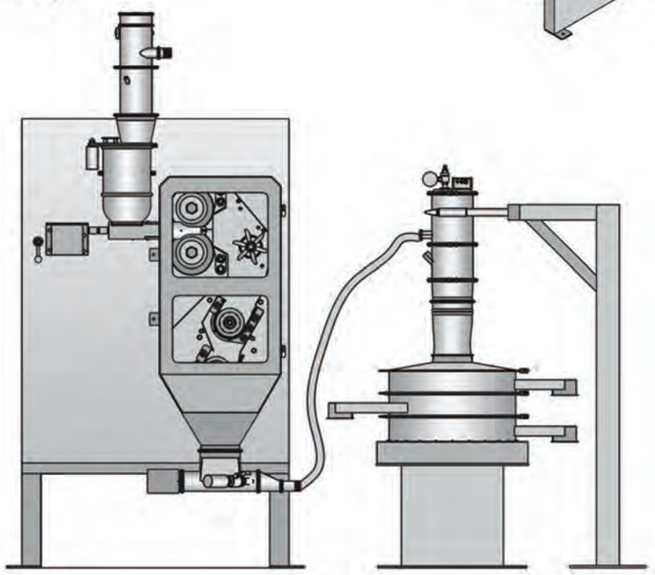
The machine consists of feeding system, compacting system, water cooling unit, and size reduction system. Feeding system are divided into pneumatic type and manual type. Material is added into the compactor through the feeding system. Two high pressure rollers press the material into flakes. The flakes then fall into one or two granulators and are reduced in size and sieved into granules with desired grain size.

Features

- Double-screw feeding system, high efficiency
- Rollers easy to replace and clean
- Adjustable motor speed, roller gap and pressure
- Different type rollers are available for different products
- Through-the-wall design is available
- Charging by lifting machine or vacuum transfer system







Roller compactor and vibro sifter closed vacuum transfer system

Technical Parameter

Item \ Model		GZL-40	GZL-100S	GZL-200S	GZL-250S
Roller Dimension (mm)		149X40	229X75	229X80	229X120
Granule fineness (Mesh)		10-60	10-60	10-60	10-60
Capacity (kg/h)		8-40	30-100	40-200	60-250
Roller speed (rpm)		3-16	6-37	6-33	6-33
Total power (kw)		11.5	19.5	25.5	25.5
Cooling water (℃)		7-15			
Weight (t)		1.9	2.4	2.6	2.7
Outline dimension (mm)	H1	500	According to customer´s requirements		
	H2	1700	1750	1800	1800
	H3	2350	2380	2380	2380
	L1	1300	1400	1400	1400
	W1	1380	1580	1580	1580

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

CCS GRANULATION SYSTEM

Introduction

CCS Closed Combined Granulation System is a patented technology product developed by NANO. With a modular design, it can effectively integrate the solid preparation process and realize intelligent and continuous production. Its excellent compatibility makes the production process more scientific and reasonable, and the output is more stable. It is widely used in the pharmaceutical industry.

Working Principle

The CCS (Closed Combined System) Granulation System consists of high shear granulator, wet mill, fluid bed dryer, dry mill and product handling system. We offer professional line concepts for batch production with well-designed solutions for vertical and horizontal product flow.

Features

- Integrated process system with improved productivity and increased yield
- Fully compatible with PAT process analyzers and highly intelligent control systems
- Highly integrated modular and fully closed granulation production technology, suitable for flexible processes
- High level of explosion-proof to ensure safe production
- Automatic WIP washing system
- Scientific and reasonable configuration increase equipment stability and reduce equipment energy consumption

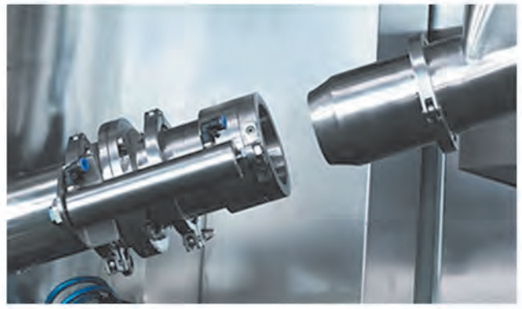
CCS LIFTING INTEGRATED GRANULATION SYSTEM

Introduction

CCS Lifting Integrated Granulation System is a patented technology product independently developed by our company. NANO innovatively adds lifting function for high shear granulator system, matching with fluid bed granulator.

Working Principle

The system consists of a high shear granulator and a fluid bed dryer, equipped with a liquid supply system and a filtration system. During the operation, the high shear granulator feeds and granulates in a low position. When product is discharged, the high shear granulator is lifted to a high position, and its retractable discharge conveying pipeline is automatically docked to the inlet of the fluid bed to realize gravity discharge.



Automatic docking

Features

- High shear granulation system can be raised and lowered.
- The product transfer is completely closed. The conveying pipeline automatically connects to achieve material transport, avoiding material accumulating and blocking.
- Compact installation, small footprint, reducing investment and operating costs.
- Granulating process is monitored digitally and process parameters are displayed on HMI and recorded, complying with cGMP requirement concerning process tracking and traceability.
- Intelligent and modular granulation system design concept enables the great feasibility of different products production.
- Cleaning time is reduced due to the application of automatic CIP system.

YK OSCILLATING GRANULATOR

Introduction

Oscillating granulator is used for the gentle milling and deagglomeration of heat sensitive and difficult to process products. Thanks to the continuous oscillatory or rotary rotor motion, the constant uniform speed and force application, the product is milled with very uniform grain size distribution.

Features

- Broad scope of application, suitable for all types of dry, wet and heat sensitive powders
- The screen is easy to replace and fix
- The clearance between rotor and screen is adjustable and displayed
- Both oscillatory and rotary modes are possible due to unique variable motor function

Options

- Control mode: button control or PLC control
- Screen: perforated plate or woven mesh
- Cleaning method: WIP washing in place

Working Principle

During working, the rotor rotates relative to the screen, and the material is squeezed between the rotor and the screen, so as to quickly make uniform particles. The screen is equipped with a patented mesh support structure, which can accurately adjust the gap between the rotor and the screen. At the same time, according to the different material properties, the rotation height, rotation speed and displacement offset of the rotor can be set online to meet various production process requirements.

Technical Parameter

Item \ Model		YK-160
Throughput (kg/h)		100-500
Rotor and screen gap(mm)		0-5
Power (kw)		3
Speed (rpm)		0-70
Outline dimension (mm)	L	1631
	W	1006
	H	900-1900

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

KZ/SKZ CONE MILL

Introduction

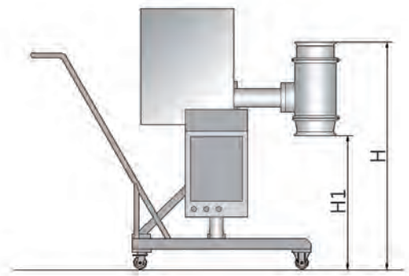
Cone mill is widely used for sizing reduction of dry and wet granules, as well as crushing/milling of agglomerates and lumps in pharmaceutical, chemical and foodstuff industries.

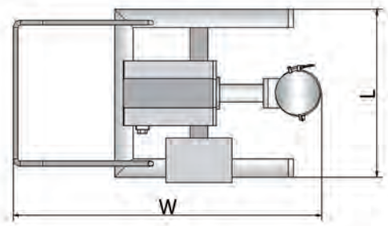
Working Principle

This machine makes use of the high speed relative movement between rotor and screen for quick size reduction of large lumps of granules under the rolling rotor to improve the uniformity of the particles.

Features

- Highly flexible, fixed or mobile design
- Suitalbe for both wet or dry granules
- Optimized design allowing adaptation to different process requirements





Technical Parameter

Item \ Model		KZ-100	KZ-180	KZ-300	SKZ-100	SKZ-180	SKZ-300
Production capacity (kg/h)		50-80	100-200	200-600	40-100	100-300	200-800
Power (kw)		1.5	2.2	4	1.5	2.2	4
Speed (rpm)		0-1300	0-1430	0-960	100-980	100-980	100-980
Outline dimension (mm)	H	877	1135	1327	877	1135	1327
	L	600	770	1264	600	770	1264
	W	714	1178	790	714	1178	790
	h1	493	600	600	493	600	600

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

KRH/GTH/SGTH BIN BLENDER

KRH single column bin blender
with automatic clamping

GTH single column bin blender
with manual clamping

SGTH double column
bin blender

Introduction

Bin blender is used for homogeneous blending of dry powders and granules in pharmaceutical, chemical, foodstuff and healthcare industries. It is easy to disassemble and replace different bins.

Features

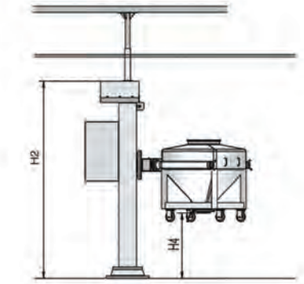
- Easy and quick to operate
- Space saving, free standing or ceiling/floor installed design
- Perfect safety system to ensure stable and reliable rotation of bin
- Various container clamping system, manual or automatic design
- Interchangeable bins design, one machine can be used for diefferent sizes of bins
- Standard inclination to the blending axis to ensure uniform mixing
- Lifting function. After mixing, product can be discharged online into smaller IBC bin for further transfer process

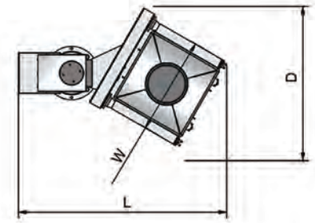
KRH/GTH Working Principle

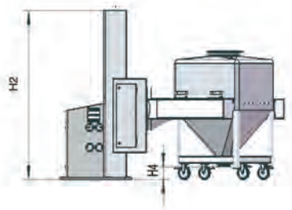
KRH/GTH Single column bin blender is composed of lifting system(hydraulic system or ball screw system), clamping system, drive system, brake system and control system. When running the machine, push the mixing bin into rotatry arm and clamp the bin, then starts the control system and lift the bin to the mixing height. Then the control system starts mixing automatically according to the setting parameters. When finish mixing, bin stops in vertical postiton and lowers down to the ground automatically.

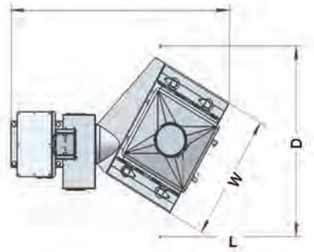
SGTH Working Principle

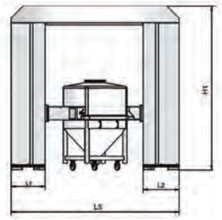
SGTH double column bin blender is composed of double column frame, clamping sytem, hydraulic lifting system, driving system, braking system and control system. When operting, load the bin on the blending cage, clamp the bin and then start the control sytem. The bin is automatically raised to the blending height and starts blending according to the set time and rotation speed. When finish mixing, bin stops and lowers down to the ground automatically.

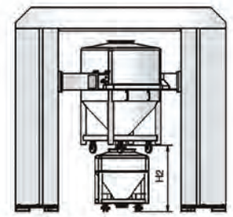


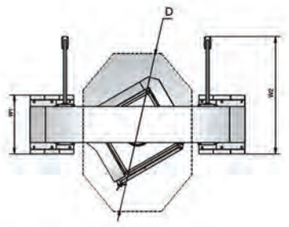


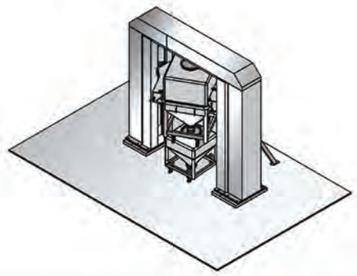










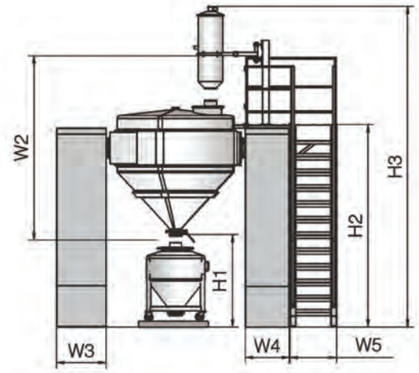


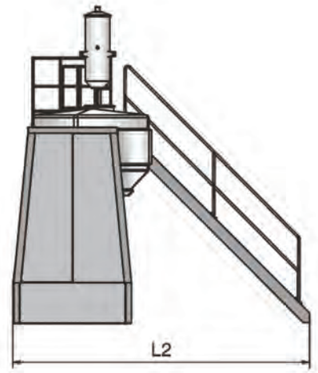
Technical Parameter

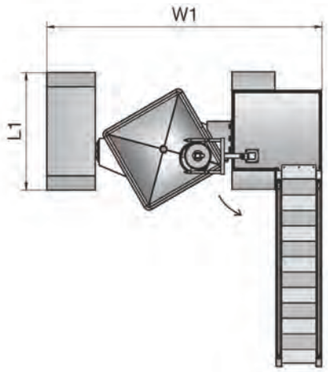
Item \ Model			GTH-200/300/400/600/800/1000					SGTH-1000/1200/1500/1800/2000					KRH-1500
Bin size (L)			200/300/400			600/800/1000		1000/1200/1500/1800/2000					600-1500
Maximum load factor (%)			80			80		80			80		80
Maximum load (kg)			80/120/160			240/320/400		400/480/600/720/800					600
Motor power (kw)			4.5			7		14			14		11
Mixing speed (mm/s)			2-13										
Weight (kg)			1200			1400		5000			5000		2500
			L	L1	L2	L3	W	W1	W2	H2	H4	D	
0utline dimension (mm)	GTH-400/1000	200/300/400	1050				1100			3600	1500	2360	
		600/800/1000	1300				1490			4000	1500	3170	
	SGTH-1000/2000	1000/1200/1500/1800/2000		850	900	4200		1150	2270	1500		3070	
	KRH-1500	600/800/1000/1200/1500					1950			4000	1500	2700	

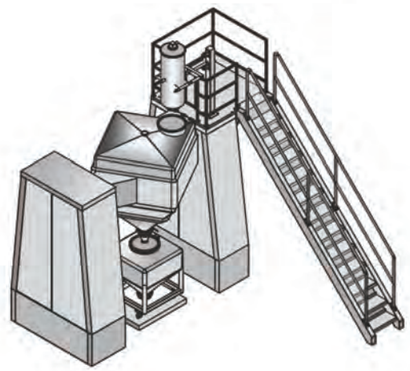
The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

HF SQUARE CONE BLENDER









Introduction

Model HF blender is widely used for blending of powders and granules in pharmaceutical, foodstuff and chemical industries. It complies with cGMP requirements and is suitable for large batch production.

Working Principle

HF blender is composed of control system, drive system, support frames and fixed mixing barrel. When operating, materials are charged into the mixing barrel. Set the mixing time and speed, start the control system to execute the operation. Standard inclination to the blending axis ensures uniform mixing. On reaching the set time, the mixing barrel stops automatically.

Features

- Reasonable design and easy operation
- Homogeneous batch blending
- Easy to maintain and clean, complying with cGMP requirements
- Suitable for big batch production

Options

- Product charging by a lifting machine
- Product charging by vacuum transfer system
- Volatile oil adding device
- Online iron removing device
- Automatic discharging and weighing system
- WIP system

Technical Parameter

Item \ Model		HF-1	HF-1.5	HF-2	HF-2.5	HF-3	HF-4	HF-5	HF-6	HF-8	HF-10	HF-13	HF-15
Volume (L)		1000	1500	2000	2500	3000	4000	5000	6000	8000	10000	13000	15000
Maximum load factor (%)		80											
Speed (rpm)		2-12	2-12	2-12	2-12	2-12	2-12	2-12	2-12	2-12	2-12	2-12	2-12
Power supply (V.Hz)		380 (50)											
Motor power (kw)		5.5	5.5	7.5	7.5	7.5	11	15	15	22	22	22	22
Weight (t)		1.2	1.5	2.2	2.5	3.5	3.9	4.35	4.5	5.2	6.5	7	8
Outline dimension (mm)	W1	4320	4320	4845	4845	4845	5000	5000	5000	6300	6300	7000	8000
	W2	3400	3400	3800	3800	3800	3800	3800	3800	4500	4500	5000	6000
	W3	380 (50)											
	W4	650	650	750	750	750	750	750	750	1000	1000	1000	1500
	W5	800											
	L1	3000											
	L2	4800 (According to customer's room layout)											
	H1	800	800	800	1500	1500	1500	1500	1500	1500	1500	1500	1500
	H2	2450	2450	2700	3300	3300	3400	3400	3400	3935	3935	4340	5335
	H3	3835	3835	4700	5100	5100	5200	5200	5200	5625	5625	6850	7950

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

SKRH CONTAINER BLENDER

Introduction

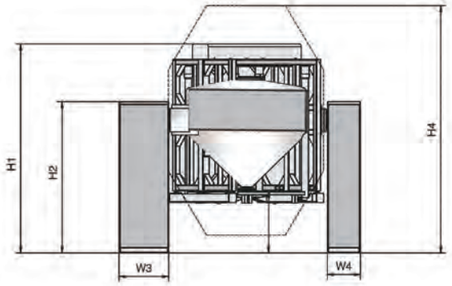
SKRH container blender is used for batch blending of granules or powdery products in large scale production. One blender can be equipped with different sizes of bins to meet different batch size needs. So cost is reduced and space is saved.

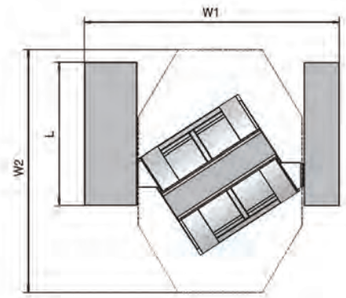
Working Principle

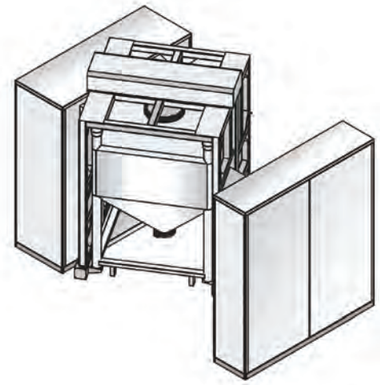
Container blender is composed of frame, rotating cage, driving, lifting, braking and control systems. Firstly, load the bin into the blending cage. After the pressure sensor detects the existence of the bin, the bin will be fixed safely by clamping arm and lifted into the blending position. Then the bin is rotated in its clamping arms for homogeneous mixing of materials according to process parameters.

Features

- Reasonable structure and stable running. Easy to operate and adjust technical parameters
- One blender with different sizes of bins
- The special inclination of the bin to the mixing axis ensures homogeneous mixing
- Interlock system to ensure the safety during operation and maintenance
- Simple structures, easy to maintain and clean, comply with GMP requirements
- Automatic fault self-diagnose system to detect fault and alarm
- Equipped with photoelectric sensor to guarantee the safety of personnel







Technical Parameter

Item \Model		SKRH-1000	SKRH-2000	SKRH-3000
Volume (L)		400-1000	800-2000	1500-3000
Maximum load factor (%)			≤80	
Maximum load (kg)		400	800	1100
Speed (rpm)		2-12	2-12	2-12
Power supply (V.Hz)			380，50	
Motor power (kw)		14	14	19
Weight (kg)		3000	3200	5800
Outline dimension (mm)	L	1600	1600	2450
	W1	3485	3485	4415
	W2	3960	3960	4580
	W3	600	600	900
	W4	600	600	600
	H1	3340	3340	3785
	H2	2050	2050	2740
	H3	950	950	950
	H4	3900	3900	4615

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

MODEL GH HIGH EFFICIENCY 3-DIMENSIONAL BLENDER

Model GH 3-Dimensional Blender

Model HGH 3-Dimensional Blender
with Interchangeable Drum

Introduction

Model GH blender widely applied in pharmaceutical, chemical, foodstuff, battery, plastics, metallurgy industries and research institutes for homogeneous mixing.

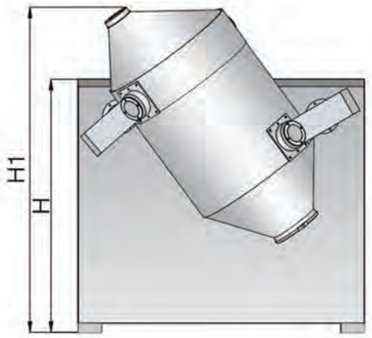
Model HGH Blender with interchangeable drum provides a solution for mixing powdered materials of different densities and particle sizes. Different size of drums can be used in one machine.

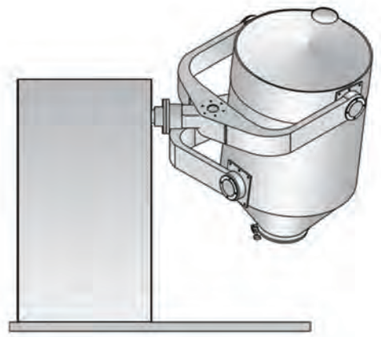
Working Principle

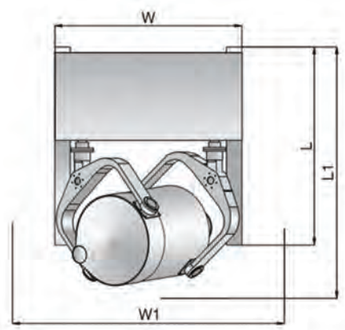
The blender provides homogeneous blending of materials by 3-dimensional movement of barrel. Various directions of rotation on the barrel speed up the product flow to ensure thorough mixing and avoid the dead space.

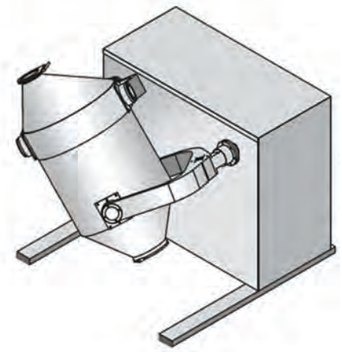
Features

- Ideal and thorough mixing due to 3-dimensional movement of container
- Quick mixing and high efficiency, with loading rate 80%
- Compact design and space saving
- Through-the-wall installation
- Various speeds of rotation
- Long lifetime and low noise
- Vacuum feeding system or lifter options for charging material









Technical Parameter

Item \Model	Container volume(L)	Maximum load factor(%)	Max. Load (Kg)	Voltage (V.Hz)	Total power(Kw)	Speed (rpm)	Weight (kg)	Outline dimension(mm)					
								H	W	L	H1	W1	L1
GH-2	2	80	0.8	380(50)	0.18	2-12	15	375	440	570	489	440	590
GH-17	17	80	6.8	380(50)	0.75	2-12	80	860	760	587	968	687	859
GH-30	30	80	12	380(50)	0.75	2-12	90	877	720	620	1150	1000	1150
GH-60	60	80	24	380(50)	1.1	2-12	150	1050	800	800	1200	1200	1300
GH-100	100	80	40	380(50)	1.5	2-12	220	1250	1000	1000	1524	1245	1386
GH-200	200	80	80	380(50)	2.2	2-8	400	1320	1150	1000	1697	1545	1586
GH-400	400	80	160	380(50)	4	2-8	500	1540	1500	1600	2070	2000	2100
GH-500	500	80	200	380(50)	5.5	2-8	750	1578	1600	1600	2045	1970	2261
GH-600	600	80	240	380(50)	5.5	2-8	900	1578	1600	1600	2057	2011	2281
GH-800	800	80	320	380(50)	7.5	2-8	1100	1717	1850	2000	2256	2260	2619
GH-1000	1000	80	400	380(50)	7.5	2-8	1200	1717	1900	2000	2363	2566	2688
GH-1500	1500	80	600	380(50)	11	2-8	1500	1862	2200	2320	2607	3015	3080
GH-2000	2000	80	800	380(50)	15	2-8	1700	1930	2350	2300	2710	3190	3148

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

QLH AIR MIXER

Introduction

QLH air mixer is used for mixing large batches of dry bulk materials. The material mixing of air mixer is based on the principle of high kinetic energy when the pressure of compressed air is rapidly released to normal pressure. Compressed air is pulsed into the material in an upward circular pattern. There is no need for mixing paddle or blade to participate in the mixing process. The smooth inner silo surfaces can also prevent buildup during mixing process. The mixing process can be controlled by the duration and frequency of air pulses, and by the pressure and volume of air.

Features

- Mass mixing
- Uniform mixing
- Easy to clean
- Easy to install
- No moving parts
- Low energy consumption
- Variable mixing control
- Random particle movement

Working Principle

■ Feeding cycle

The lower discharge cone valve is closed, the feed valve and exhaust valve are opened, and the material enters the mixer by gravity. During the feeding process, the material dust carried by the replaced air will be collected by collecting bags when passing through the filter, and will fall back into the mixer by gravity.

■ Mixing period

When the feed valve is closed, the compressed air flows through the mixing head from bottom to top to form a spiral pulse air flow, which lifts, moves and turns the material to achieve uniform mixing. The compressed air entering the mixer is discharged through the exhaust valve, and the attached materials or dust are effectively blocked when passing through the dust filter, and fall back into the mixer under the action of pneumatic pulse back blowing.

■ Discharge period

The vent valve is closed, the discharge cone valve is lifted, and the material is discharged by gravity or by pneumatic pressure.

Technical Parameter

Compressed air consumption	Compressed air consumption is related to silo volume and material bulk density
Compressed air pressure	0.4-0.6MPa
Power (kw)	0.5
Mixing Time	5-12
RSD	RSD<5%
Loading factor	20%-80%
Full volume	0.6-10m³
Outline dimension (mm)	1600X1600X4000

• The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

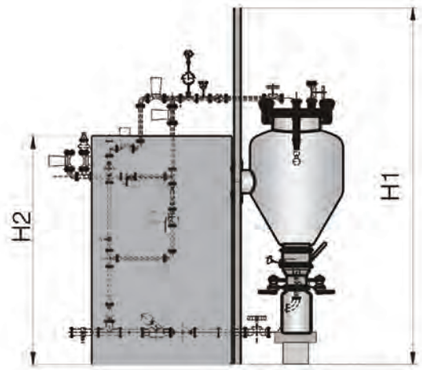
WGTH STERILIZED BLENDER

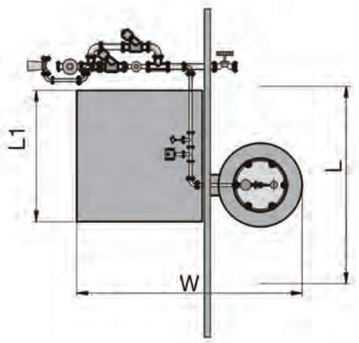
Introduction

Sterile blender could achieve blending, washing and sterilizing functions in one machine. In addition to blending system, it can be equipped with CIP, sterilization functions system in place, drying system and automatic control system. After blending, loading/unloading cover can be quickly replaced, and piping can be quickly mounted and automatic control system is run to achieve washing, sterilizing and drying in place. At the same time, control system can record, store and print dada according to customer's request, complying with validation requirements for sterile product production.

Features

This machine is a high-tech patented product developed by our company, adopt hot steam sterilization, realizing CIP(Cleaning in place)and sterilization process for blender in place. It offers the solution to sterilize blender in place by special design of structure so as to achieve the function for loading, blending, unloading, washing, sterilization in place, It provides reliable technical support for obtaining domestic or foreign certificates in pharmaceutical industry.





Technical Parameter

Item Model		WGTH-100	WGTH-150	WGTH-200	WGTH-250	WGTH-300	WGTH-400	WGTH-600	WGTH-800
Mixing speed (rpm)		18	18	18	18	18	11	11	11
Load factor (%)		80							
Total power (Kw)		2.2	3	3	4	4	5.5	5.5	7.5
Weight (t)		1.7	1.7	1.7	1.7	1.8	2	2.8	3.2
Pump flow rate (t/h)		3.6							
Pump pressure (Mpa)		0.6							
Steam consumption (Kg/h)		440							
Steam pressure (Mpa)		0.2-0.4	0.2-0.4	0.2-0.4	0.2-0.4	0.2-0.4	0.2-0.4	0.2-0.4	0.2-0.4
Sterilization temperature (℃)		121							
Sterilization time (min)		30							
Washing time (min)		30							
Water inlet diameter (mm)		50							
Water drain diameter (mm)		50							
Outline dimension (mm)	L	2400	2400	2400	2400	2400	2400	2650	2650
	L1	1100	1100	1100	1100	1100	1100	1550	1550
	W	1950	1950	2050	2050	2050	2200	2200	2200
	H1	2325	2325	2325	2725	2725	2950	2950	2950
	H2	1850							

• The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

HLDB/HGB COATING MACHINE WITH EXCHANGEABLE DRUMS

Model HLDB Coating Machine with Exchangeable Drums

Model HGB Coating Machine with Exchangeable Drums

Introduction

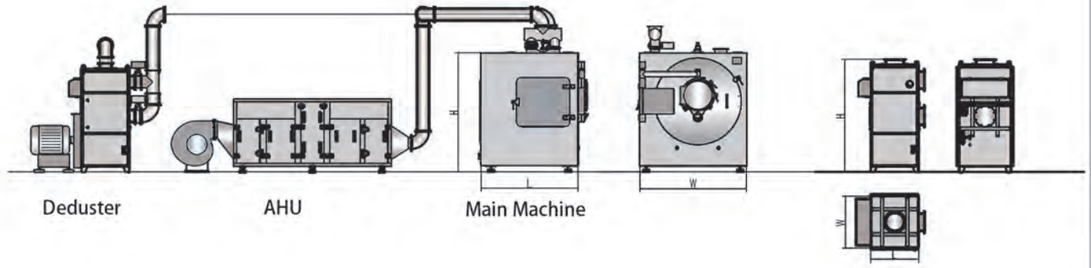
Model HLDB and HGB coating machine with exchangeable drums are widely used for processing tablets using film, sugar, functional, and drug layer coating in pharmaceutical and foodstuff industries. Featuring interchangeable coating drums, they help reduce down time for batch-to-batch change over and provide more process time for coating tablets.

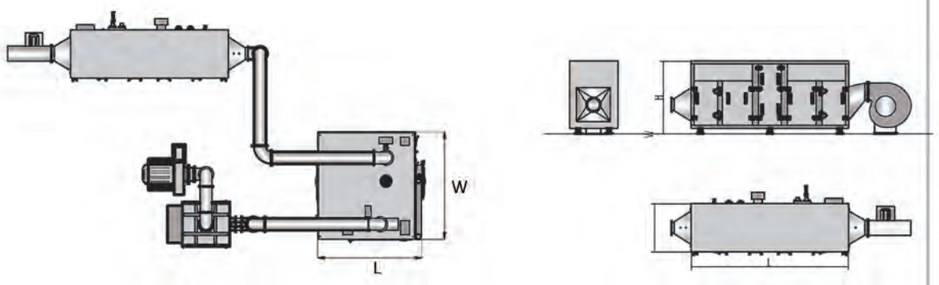
Working Principe

The tablets cores to be coated make continuous and complicated orbital motion within the coating drum under the action of mixing baffle. During the motion, coating medium is sprayed automatically onto the core tablets and at the same time hot air is supplied under negative pressure. The hot air penetrates through the tablet core layers, so that film coating medium on the surface of tablet cores is dried rapidly and evenly, forming a solid and smooth surface film.

Features

- Exchangeable drums for processing different tablets, reduce cross contamination
- Different size of drums for different batch size requirements
- Removable drum for inspection and cleaning
- Enhanced utilization, higher productivity
- Faster batch-to-batch changeover time
- Install through-the-wall, front or rear flush, or free standing
- WIP system
- Adjustable gun-to-bed angle and distance





Technical Parameter

Item / Model		HGB-20 (10)	HGB-40 (20)	HGB-50 (20)	HGB-100 (75)	HLDB-75 (40)	HLDB-150 (75)	HLDB-350 (150)	HLDB-600 (350)
Capacity (kg/batch)		20/10	40/20	50/20	100/75	75/40	150/75	350/150	600/350
Drum speed (rpm)		2-16	2-16	2-16	2-16	2-16	2-16	2-12	2-9
Hot air temperature (℃)		room temperature-90℃							
Clean compressed air	Pressure (Mpa)	0.4 - 0.6							
	Consumption (m³/min)	1.5-3.5	1.5-3.5	1.5-3.5	2-4.5	1.5-3.5	2-4.5	2.5-5.5	3-7.5
Steam	Pressure (Mpa)	0.2 - 0.4							
	Consumption (kg/h)	30	30	40	50	83	138	250	350
Water pump pressure (Mpa)		0.6 - 0.8							
Total power (kw)		4	8.75	8.75	13.8	8.57	13.87	28.37	33.37
Main machine weight (kg)		750	841	879	1900	1500	2200	2500	3000
Main machine (mm)	L	1020	1155	1275	1482	1400	1890	2350	2700
	W	976	1100	1100	1634	1400	1400	2050	2440
	H	1658	1662	1662	2054	1900	1930	2310	2630
Inlet AHU (mm)	L	2100	2100	2100	2100	2100	2100	2130	2530
	W	830	830	830	830	830	830	1250	1450
	H	1255	1255	1255	1255	1255	1255	1458	1458
Exhaust air deduster (mm)	L	1200	1200	1200	1200	1200	1200	1700	1700
	W	1200	1200	1200	1200	1200	1200	1200	1700
	H	2588	2588	2588	2588	2588	2588	2988	3420
Reference dimension (mm)	L	≤7600	≤7600	≤7600	≤7600	≤7600	≤7800	≤9000	≤9800
	W	≤3800	≤3800	≤3800	≤3800	≤3800	≤3800	≤4800	≤5800
	H	≤2900	≤2900	≤2900	≤2900	≤2900	≤3000	≤3200	≤3530

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

LDB COATING MACHINE

Introduction

Model LDB coating machine adopts double helix baffle to realize homogeneous mixing of tablets. Coating time is shortened and coating efficiency is improved due to special drum length design. It is specially designed for film or sugar coating processes using aqueous or organic solvent solutions in pharmaceutical and foodstuff industries.

Working Principle

Model LDB coating machines adopts double helix baffle design to realize homogeneous mixing of tablets. The reciprocating movement of tablets in the drum and rolling movement along with the rotation of drum make the tablets realize 3-D movement. As a result, surface flatness and smoothness of tablets are improved and good coating quality is achieved.

Features

- The increased drum length of this machine makes it possible to process large batch size of products.
- WIP cleaning system guarantees efficient cleaning and validation after each batch.
- Unique baffle design realizes positive rotation for coating operation and negative rotation for products discharging.
- The spray system adopts the most advanced imported spray gun and the spraying process becomes more reliable and stable.
- Sensors for detecting negative pressure, humidity and product temperature are equipped. Air flap, air volume and steam close/open are adjusted automatically via PLC, realizing automatic process control.
- Patented guiding plate adopts double helix baffle structure. Along with the rotation of drum, the tablets in the drum achieve 3-D movement. As a result, product bed is mixed homogeneously and coating quality is improved.
- Coating time is shortened due to specially designed heat exchange system. Transfer of hot air is completed inside of tablet cores, no influence on atomization angle of spraying, so coating medium is saved.

Technical Parameter

Item \ Model			LDB-75	LDB-150	LDB-200	LDB-350	LDB-600	LDB-900
Capacity (kg/batch)			75	150	200	350	650	850
Drum speed (rpm)			2-16	2-16	2-16	2-12	2-9	2-9
Hot air temperature (℃)			room temperature-80℃					
Clean compressed air	Pressure (Mpa)		0.4 - 0.6					
	Consumption (m³/min)		1.5-3.5	2-4.5	2.5-3.5	2.5-5.5	3-7.5	3-7.5
Steam	Pressure (Mpa)		0.2 - 0.4					
	Consumption (kg/h)		83	138	200	250	350	400
Water pump pressure (Mpa)			0.6 - 0.8					
Total power (kw)			8.57	13.87	28.37	28.37	33.37	62.37
Main machine weight (kg)			1500	2200	2400	2500	3000	3200
Power supply(V.Hz)			380 (50)	380 (50)	380 (50)	380 (50)	380 (50)	380(50)
Main machine (mm)		L	1400	1890	2200	2350	2700	2700
		W	1400	1400	1800	2050	2440	2440
		H	1900	1930	2200	2310	2630	2630

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

GB FLEXIBLE COATING MACHINE

Introduction

Coating machine is widely used in the pharmaceutical, foodstuffs industries for the organic, water-soluble film and sugar coating of tablets, pills and sweets. One machine can realize different batch size coating purpose. This machine can meet a loading capacity of 10% -100%, fully realizing flexible batch production of drugs.

Working Principle

- Batch sizes from 100% down to 10% brim volume without changing baffles
- Gentle and better mixing as a result of the increased number of baffles
- Uniform tablet bed motion in the spray zone
- Higher spray rate causes shorter process time

Features

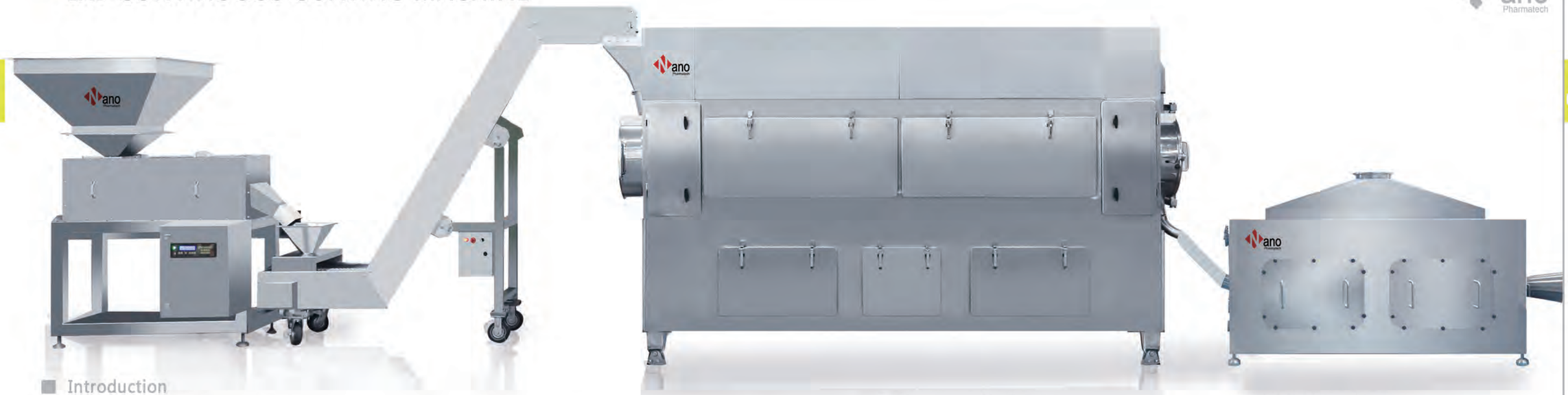
- Product quality: defined and reproducible
- Process times: as short as possible
- Process types: Film and sugar coating
- Excellent cleanability
- Easy operation of the machine
- Simple product discharging system
- Easy to use process controls
- Professional design

Technical Parameter

Item \ Model			GB-125	GB-175	GB-250	GB-300
Volume (L)			125	175	250	300
Drum speed (rpm)			1.5-15	1.5-15	1.5-13	1.5-13
Max. inlet air temperature (℃)			room temperature-—80℃			
Clean compressed air	Pressure (Mpa)		0.2 - 0.6			
	Consumption (m³/h)		95	95	120	120
Steam	Pressure (Mpa)		0.2 - 0.4			
	Consumption (kg/h)		200	200	300	300
Water pump pressure (Mpa)			0.6 - 0.8			
Total power (kw)			28.5	28.5	30.5	30.5
Main machine weight (kg)			1850	1850	2000	2000
Power supply			380 (50)			
Main machine (mm)		L1	2360	2360	2490	2490
		W1	1640	1640	1920	1920
		H1	1850	1850	2100	2100

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

LXB CONTINUOUS COATING MACHINE



Introduction

Model LXB Continuous Coating Machine is used for continuous feeding, coating and discharging of tablets according to the required output. It has the ability to vary batch sizes according to product requirements and demand, which can effectively save production cost and time, reduce energy consumption, and increase production efficiency.

Working Principle

LXB continuous coating machine adopts continuous tablets feeding and discharging. Using a precision weighing and conveying device, the tablets continuously produced by the tablet press are fed into the inlet of the coating machine. The tablets in the drum continuously and orderly flow from the front end of the drum to the rear end of the drum under the control of the drum rotation speed and axial baffle. The tablets gradually form a uniform film and dry to gain weight under the cover of the atomized coating liquid sprayed by multiple sets of spray guns. After passing through the last set of spray guns, the target weight gain is achieved, making the film of the tablets uniform and firm. The completely dried coated tablets are discharged from the outlet to the collection drum or bag. The tablets are then cooled by a tunnel cooler or directly transported to a packaging machine for continuous packaging production. It realizes the continuous production in pharmaceutical coating process, and is particularly suitable for large batch size coating.

Features

- Continuous production, especially for large batch size
- Switch between batch production mode and continuous production mode
- Flexible product volumes
- Reduce material handling
- Washing in place
- Fully automatic process
- Better coating uniformity
- Shorten production cycle times and improve productivity
- Less floor space and utilities

Spray gun features

- Anti-bearding design
- Uniform spray rate to ensure uniform tablet weight gain and tablet thickness
- Easy to maintain
- Alloy spray gun rod, light and tough

Tunnel Cooler

- The temperature of coated tablets is greatly reduced in a short time by cold air passing through the material layer
- The tunnel cooler is provided with cold air from the air inlet cabinet
- This machine can prevent the influence of high core temperature on tablets
- CIP cleaning in place

WIP

The continuous coating machine has a simple internal structure. The reasonable washing design makes the washing effect of coating machine in place very significant, which can fully meet the standard of cleaning validation.

Technical Parameter

Item \ Model	LXB-500	LXB-1200
Capacity (kg/h)	150-500	600-1200
Drum motor power (kw)	2.2	3
Peristaltic pump power(kw)	0.74	0.74
Motor power of inlet and exhaust air fans(kw)	15/45	30/55
Steam consumption(Kg/h)	400	685
Compressed air consumption(m^3/min)	4	6.5
Voltage(V)	380	380
Tap water(t/h)	4	8
Purified water(t/h)	4	8
Hot water(t/h)	4	8
Compressed air pressure (Mpa)	0.2-0.6	0.2-0.6
Inlet air temperature(℃)	80-100	80-100

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

FL/DFL LAB FLUID BED PROCESSOR

Introduction

Model DFL fluid bed processor is a lab multi function fluidized bed system integrating drying, top spraying, bottom spraying and side spraying processes. It has a variety of functions such as mixing, drying, granulating, coating, and pelletizing. It is widely used in pharmaceutical, food, chemical industries.

Working Principle

The machine is composed of filter system, liquid supply system, inlet air handling system, fluid bed system, top spray system, bottom spray system, side spray system, exhaust air system and control system. The top spraying is for granulation; the bottom spraying is for coating; the side spraying is for making pellets. The above functions are all realized in one multi-functional fluid bed. Customers can select the required function according to the production process.

Features

- Multi fluid bed functions including top, bottom and side spraying
- Realize drying, granulating, coating, pelletizing processes in one machine
- PLC automatic control integrated with PAT
- Fully comply with GMP requirements for pharmaceutical production
- Explosion proof design as option

Technical Parameter

Item \ Model	FL/DFL-1	FL/DFL-3	FL/DFL-5
Top spray capacity (kg/batch)	0.5-1	1.5-3	2.5-5
Bottom spray capacity (kg/batch)	0.3-0.5	0.8-1.5	1.3-2.5
Tangential spray capacity (kg/batch)	0.2-0.4	0.4-0.8	0.6-1
Air fan power (kw)	4	5.5	5.5
Steam consumption (kg/h)	9	15	18
Compressed air consumption (m³/min)	0.15	0.3	0.4
Compressed air pressure (Mpa)	0.2-0.4		
Temperature (℃)	Room temperature-120℃		
Main machine (mm)	L/W/H(1800*900*2000)		

GZL LAB ROLLER COMPACTOR

Introduction

Model GZL roller compactor is widely used in the processing of various types of active pharmaceutical ingredients, especially for dry granulation of heat-sensitive and moisture-sensitive materials. This small machine is for lab use.

Working Principle

GZL roller compactor is composed of feeding system, compacting system and crushing system. The material is added into the compacting rollers through the feeding system. Two high pressure rollers press the material into high-density flakes, which enter the crushing system to form granules.

Features

- Screw feeder system, stable feeding and high efficiency
- Roller design, easy to replace and clean
- Adjustable motor speed, roller clearance and compacting pressure
- Multiple roller surface selections according to material properties

Technical Parameter

Item \ Model	GZL-8
Roller Dimension (mm)	119X25
Capacity (kg/h)	8
Roller speed (r/min)	15
Total power (kw)	5
Weight (t)	0.3
Outline dimension (mm)	930*800*750
Compressed air pressure (Mpa)	1.0

OEB CCS GRANULATION LINE FOR LAB

Introduction

CCS lab granulator adopts modular design, which can effectively combine the solid preparation process and realize intelligent and closed production. The excellent compatibility of CCS makes the production process more scientific and reasonable and is widely used in the industry.

Features

- Fully compatible with PAT process analyzer and highly intelligent control system
- Highly integrated modular and fully closed granulation production technology, flexible processing
- High explosion-proof grade to ensure production safety

Working Principle

During the integrated granulation process of CCS experimental granulation, the wet particles are fed through the feed system, and the wet particles are fed into the boiling granulator through the discharge system for drying. In this process, the granulation and sequencing are carried out through fully compatible and matched connecting element auxiliary equipment.

Technical Parameter

Item \ Model		CCS-10	CCS-30
Material bowl	Volume (L)	10	30
	Minimum (kg/batch)	1.2	5
Capacity	Maximum (kg/batch)	3	10
Air fan power (kw)		4	5.5
Power supply (V、Hz)		380V, 50Hz, 3P	
Steam pressure (Mpa)		0.2-0.4	
Steam consumption (kg/h)		20	55
Compressed air pressure (Mpa)		0.4-0.6	
(m³/min)	Pulse blow back	0.5	0.8
Compressed air consumption	Cylinder shaking bag	0.3	0.4
Temperature (℃)		Room temperature -120℃	

GHL HIGH SHEAR GRANULATOR WITH INTERCHANGEABLE BOWL

Introduction

GHL high shear granulator with interchangeable bowls is used for the preparation of wet granules in laboratory. It is widely used in pharmaceutical, food, chemical and cosmetic industries. After the material is added into the granulation bowl, the binder solution is added by the spray gun system to make the material form a soft material in the bowl, and then the material is mixed and chopped by the mixing impeller and the chopper to prepare uniform wet particles. One machine can be used with interchangeable bowls of different volumes to meet the experimental requirements for different batch production.

Technical Parameter

Item \ Model	GHL-2	GHL-4	GHL-6	GHL-8	GHL-10
Useful volume (L)	0.8-1.4	1.6-2.8	2.4-4.2	3.2-5.6	4-7
Capacity (kg/batch)	0.2-3.5				
Motor power (kw)	2.25				
Voltage(V)	380				
Frequency(HZ)	50				

SRH LAB BLENDER

Introduction

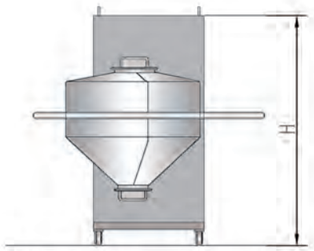
SRH lab blender can realize the mixing of materials by rotating the bin installed on the body. By replacing different sizes of bins, it can meet the experimental requirements of various batch sizes. It is widely used in the pharmaceutical, food, chemical industries.

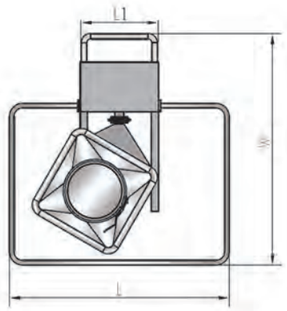
Working Principle

SRH lab blender is composed of bin, control system, drive system, base frame and safety barrier. When operating, open the safety barrier and charge product into the bin. Set the mixing time and speed according to the process requirements, and start the mixer. During the mixing process, the materials move tangentially along the bin wall, and then flips and moves tangentially at high speed. After reaching the preset time, the bin will automatically stop in the vertical state for discharging purpose. The bin can also be removed for discharging, and another bin can be installed at the same time to mix the next batch material, saving time.

Features

■Different bins can be used in one main machine to meet the experimental requirements of multiple varieties.
■Mobile design, small footprint, low energy consumption
■Easy to operate, clean and maintain
■Good mixing effect





Technical Parameter

Item \ Model		SRH
Bin size (L)		1-150
Maximum load factor (%)		80
Maximum load (kg)		60
Speed (rpm)		5-16
Power supply (V.Hz)		380 (50)
Motor power (kw)		1.1-1.5
Weight (kg)		250
0utline dimension (mm)	L	1150
	W	1335
	L1	550
	H	1230

PM/GH LAB 3-DIMENSIONAL BLENDER

Model PM-6L

Model GH-2L

Introduction
When the machine is working, the mixer moves in three-dimensional space and rotates on its own axis. On one hand, the mixer has strong turbulence effect, which accelerates the flow and diffusion of materials. On the other hand, it does overturning and translational movement, which overcomes the influence of centrifugal force, so that the materials will not produce segregation and agglomeration. There is no dead angle in the mixing process, and the mixing is uniform.
Features
During the mixing process, materials are gathered to disperse state and mixed under the action of flow, shearing, translation and diffusion, ensuring the uniform mixing of materials, and the mixing uniformity can reach more than 99%.

Movement Simulation

SGB LAB COATER

Introduction

SGB coating machine is a laboratory scale equipment used for film coating or sugar coating of tablets. It is an ideal choice for laboratory research and development, and also for small scale production.

Working Principle

Tablets core constantly moves in a complex track in a clean and closed drum. The film medium is evenly sprayed onto the surface of the tablet core through the spray gun. The filtered clean hot air passes through the preloaded tablet bed and coating film on the surface can be quickly dried.

Features

- Interchangeable pans for coating of different batches of tablets
- Adjustable position and angle of the spray gun to meet different coating requirements
- Complete isolation during coating to avoid contamination
- Film coating can be carried out continuously, spraying and drying processes can be completed in the same closed pan to improve work efficiency.
- WIP washing in place
- Specially designed spray gun to improve coating quality

Technical Parameter

Item \ Model	SGB-5
Maximum load (L)	2~6
Capacity (kg/batch)	1~5
Drum speed (rpm)	2~30
Hot air temperature (℃)	10-80℃
Motor power (kw)	15
Water pump pressure (Mpa)	0.6~0.8
Power supply (V.Hz)	380(50)
Compresse air pressure (Mpa)	0.4~0.6
Compresse air Consumption (m^3/min)	0.5~1.5
Main machine weight (t)	0.7
Outline dimension (mm)	1700*900*1100(H*W*L)out air channel 140mm

SOLID PREPARATION CONTAINMENT ISOLATION SYSTEM

Containment Isolation System

The role of the solid preparation containment isolation system:

- Protect the drug from cross-contamination or external environment influence during the production process;
- Protect personnel from occupational hazards of high activity, high sensitization and toxic substances (e.g. penicillin, cytotoxins, hormones, anti-tumor, radiopharmaceuticals, etc.);
- Protect the environment from highly active, highly sensitizing and toxic substances that are transmitted under uncontrolled conditions.

System Features

- Occupational Exposure Band (OEB) 3-5
- Purification Level C\D
- Fully customized, equipment selection according to process

Features of oral solid dosage containment isolation system

The high containment isolation system by Nano is specially designed to meet user's process and isolation protection level requirements It includes high shear granulator, cone mill, fluid bed granulator, lab blender, and high-efficiency coating machine. The system is used for production and processing of highly toxic and active drugs. It provides reliable protection for the safety and health of operators.

The system includes air filtration system, and material transfer devices, an isolation chamber, processing machines gloves for personnel operation, and a control system. The chamber also has positive or negative pressure options and can be integrated with cleaning and disinfection systems. The system has a remote control function and allows for RTP transmission for fast isolated transmission. Sampling is performed by the operator with gloves at each operation step, and the sample is sealed and transferred through RTP.

Containment Isolation Granulation System
The system consists of Model GHL high shear granulator, Model FL fluid bed granulator, Model KZ\SKZ mill and Model SRH lab blender.

Containment Isolation Coating System
The system consists of Model GB high-efficiency coater.

Typical operation process of solid dosage preparation containment isolation system

1. Start the filtration device to conduct self-cleaning and sealing performance tests on the internal environment of the isolation chamber.

2. The material is transferred into the isolation chamber via RTP.

3. The material can be transferred under negative pressure or fed into the granulation system by operator with gloves for granulation, drying and milling.

4. The granules after being milled are mixed by the operator with gloves into the mixing device. After the mixing is completed, the granules are discharged to the designated closed container.

5. Transfer the mixed material to the tablet or capsule filling compartment through RTP for tableting or capsule filling.

6. Transfer the tablets through RTP to the coating isolation chamber for coating.

7. Transfer the coated tablets or capsules to the packaging equipment isolation chamber through RTP for packaging.

8. After the production is finished, the equipment and the isolation chamber are cleaned and disinfected, and the cleaning solution is discharged into the designated device.

The sampling of each operation step is performed by the operator with gloves, and the sample is sealed and transferred through RTP.

CLFZ AUTOMATIC WEIGHING & DISPENSING SYSTEM

Introduction

Model CLFZ Automatic weighing & dispensing system is a patented technology product. The system can achieve automatic control of material feeding, closed transfer, fine weighing and dust free dispensing

Working Principle

CLFZ automatic weighing and dispensing system consists of main frame support, feeding system, buffer bins, IBC bins, air sealing system, weighing system and control system. The feeding system is divided into several types, such as screw feeder, conical feeder, servo proportional feeder, rotary feeder and electromagnetic vibration feeder. When the system is working, various materials are respectively added to the buffer bins through multiple vacuum transfer machines. The control system starts the air sealing and controls the feeders to proportionally add materials into the IBC bin. The weighed bin with materials are then transferred to next process.

Features

- Various types of feeders available for selection
- Select single station or multi stations depending on different process requirements
- Automatic weighing and dispensing, labor and cost saving
- Easy to operate and clean
- Closed transfer system, complying with FDA and GMP requirements
- WIP washing system available
- Ensure the consistency and reliability of products

FEEDER SELECTION OF MULTI-STATION DISPENSING AND WEIGHING SYSTEM

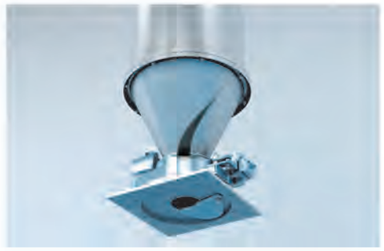
Model J Screw Feeder

Application

Model J Screw Feeder is suitable for powder and particles with various characteristics. It can weigh with high precision and dispense in a continuous and medium-speed.

Working Principle

Its electric drive screw is used to move materials. Variable pitch blades prevent materials extrusion. It is the most widely applicable and most accurate feeder.



Model K Servo Proportional Feeding Valve

Application

Model K Servo Proportional Feeding Valve is suitable for powder and particles with general flowing. It can weigh with high precision and dispense in a continuous and fast speed.

Working Principle

The opening and closing degree of the valve door can regulate the flow. When the valve is opened to the maximum, the material can be quickly dispensed. When precise dispensing required, the valve door can feed materials little by little according to the electronic scale data to realize high precision weighing.

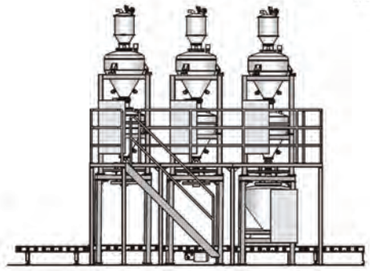
Model D Electromagnetic Vibrating Feeder

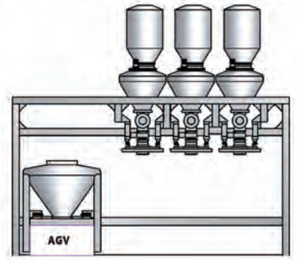
Application

Model D Electromagnetic Vibrating Feeder is suitable for powder and particles with good flowing, no matter small dosage or high dosage. It can dispense with high precision and feed in a slow speed.

Working Principle

Its control system controls the vibration frequency of the electromagnetic pole and uses a specific tilting angle to slide the material along the vibration chamber plate into the drum. The accuracy of dispensing is high.





Technical Parameter

Item	Unit	Parameter					
Dosing tank volume	L	200; 400; 600; 800; 1000					
Dosing tank structure		Square; Round					
Dosing tank sealing		Yes; No					
Vacuum feeding		Storage or dosing tank vacuum feeding; Vacuum feeder					
Vacuum feeder type		QVC-1	QVC-2	QVC-3	QVC-4	QVC-5	QVC-6
Feeding rate	Kg/h	180	360	720	1440	2880	4320
Compressed air consumption	L/min	50~300	100~700	300~1500	600~3000	6000	9000
Compressed air pressure	Mpa	0.6	0.6	0.6	0.6	0.6	0.6
Feeding method		J Model J Screw Feeder; Model K Servo Proportional feeder ;Model X Rotary Valve; Model Z Conical Valve; Model D Electromagnetic Vibrating Feeder					
Measurement method		Weight reduction and weight gain method					
Measuring tools		Weighing sensor; Scale					
Workstation	Number	2; 3; 4; 5; 6; 7; 8; 9					
Receiving bin volume	L	200; 400; 600; 800; 1200					
Receiving bin installing method		Fixed; Movable					
Controlling type		Automatically; Manually					
Second weighing		Yes					
Accuracy level	‰	≤3					

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

TF TURBO MILL

Introduction

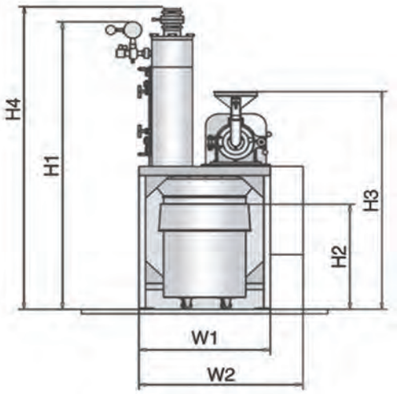
Turbo mill is a newly adopts turbo structure and has self cooling function to avoid heat generation. So it can grind heat-sensitive materials besides common materials. It has high efficiency with the fineness reaching 60 to 120 mesh.It is widely used for milling and pulverizing of dry materials in pharmaceutical, chemical and foodstuff industries.

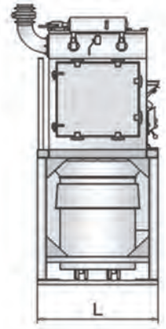
Working Principle

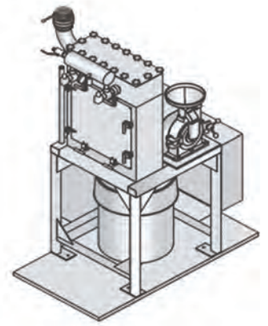
The machine is made of stainless steel and has good corrosion resisting capability, complying with GMP standards. The rotor of turbo mill rotates at high speed to create high airflow in the milling chamber. The materials are sucked into the chamber by the negative pressure. Then they are cut and ground between rotors and stators by the high speed air flow. The heat created during the operation is also blown out by the air flow. So there is no heat accumulation when working. Blow back filters are installed for exhaust air. The final products are discharged through the screen into the bin.

Features

- High efficiency: The turbo self-cooling pulverizer has the characteristics of high speed and high crushing efficiency, which can quickly crush the material into the required particle size.
- Self-cooling: The pulverizer adopts the design of turbo self-cooling, which does not require external cooling device, can maintain stable operation of the equipment, and extend the service life of the equipment.
- Easy maintenance: The structure of the turbo self-cooling pulverizer is simple, easy to disassemble and clean, and easy to maintain.
- Wide applicability: The equipment is suitable for materials of various hardness, viscosity and humidity, including various chemical raw materials, medicines, foods, rubbers, etc.
- Easy operation: The turbo self-cooling pulverizer adopts an automatic control system, which is easy to operate and can realize the control of the automatic production line.







Technical Parameter

Item \ Model		TF-160	TF-260	TF-350	TF-450
Rotor diameter (mm)		150	200	300	400
Speed (rpm)		2900	2900	2900	1500
Fineness of fed material (mesh)		≤10-50	≤10-50	≤10-50	≤10-50
Fineness of finished product (mesh)		60-120 Mesh			
Power (kw)		4.12	5.4	7.7	9.7
Output (kg/h)		30-75	60-120	80-200	120-390
Compressed air pressure (Mpa)		0.4 - 0.6			
Compressed air consumption (m³/min)		0.2			
Weight (kg)		120	160	200	350
Outline dimension (mm)	H1	1890	2022	2189	2400
	H2	690	730	740	905
	H3	1430	1664	1950	2352
	H4	2625	2700	2900	3219
	H5	460	518	583	682
	W1	800	950	1018	1200
	W2	1000	1230	1300	1488
	L	806	850	846	1096

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

CDZ BAG DUMPING STATION

Introduction

Model CDZ bag dumping station is suitable for dumping bags filled with dry powdery materials. It can effectively solve the problem of dust in the process of materials feeding, and various options are available to meet different process requirements. With excellence performance, it is widely used in pharmaceutical, foodstuff and chemical industries.

Working Principle

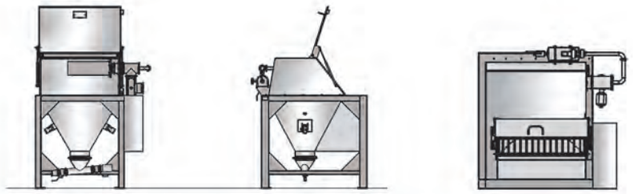
Model CDZ bag dumping station consists of filter blow back system, exhaust system, main frame, discharge system and control system. When operating, start the exhaust air system, set the blowback interval through control system, and then put bags in the station chamber to unload bags, then products enter the next process.

Features

- Closed structure, dust free
- Equipped with centrifugal fan for collecting dust or connected to the outer dust collector
- Bag compactor for collecting empty bags
- Filter blow back system for automatically cleaning dust
- Easy to disassemble and clean the filter
- Easy to operate

Options

- Bag compactor for collecting empty bags
- Double doors for feeding material easily from a higher position
- Forklift and lifting rack for material transfer and lifting
- Prescreening for filtering broken bag debris, foreign objects and large clumps of materials
- Lump breaker for crushing of lumpy materials
- Sifter machine for sieving powders



Technical Parameter

Item \ Model	CDZ400
Compressed air pressure(Mpa)	0.4-0.6
Outline dimension (mm)	957x1140x1962
Power(kw)	2.2
Exhaust air pressure (pa)	3584-3597
Weight(t)	0.3
Material bag load(kg)	5~25

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

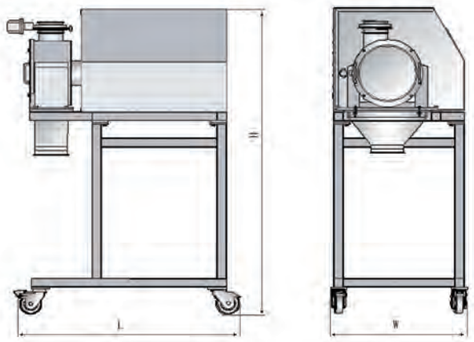
CF HAMMER MILL

Introduction

Model CF hammer mill is particularly suitable for milling of hard, crystalline and fibrous products. It mainly obtains materials with different crushing fineness by rotating the knife at high speed and changing the specification of the screen. This product mainly obtains materials with different crushing fineness by rotating the knife at high speed and changing the specifications of the screen. It is widely used in pharmaceutical, food and chemical industries.

Working Principle

The machine uses a motor to drive the spindle to rotate at a high speed, and the spindle drives the cutter sleeve to rotate. Under the action of the high speed rotating pulverizing knife, the materials collide with each other, the collision between the particles and the cutter body, and the collision between the particles and the cavity. These high speed collisions cause large particles to become small particles that can pass through the screen when a certain number of meshes are reached. The output and fineness of the product can be adjusted according to the speed of the spindle and the aperture size of the screen.



Features

- Very broad scope of application
- Easy and quick cleaning
- Mechanical disassembly and assembly is convenient and easy to clean;
- Rapid milling ensures low energy input and minimum temperature increase
- Diverse usage possibilities ranging from stand alone to integrate with any process flow.
- According to different material production requirements, replace different screen specifications to meet the required fineness requirements for production.

Technical Parameter

Item \ Model	CF
Outline dimension (mm)	L860xW1400xH2000
Rotor diameter (mm)	390
Power(kw)	7.5
Weight(kg)	420
Output (kg/h)	> 400
Speed (rpm)	2900-4600
Fineness of finished product (mesh)	60-120

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

ZM SUPERFINE VIBRATING MILL

Introduction

ZM superfine vibrating mill is the most advanced equipment for powders in the world. Energy saving, good sealing performance and stable quality of final products. It can replace the traditional ball pulverizer machine, being the ideal superfine pulverizer.

Application

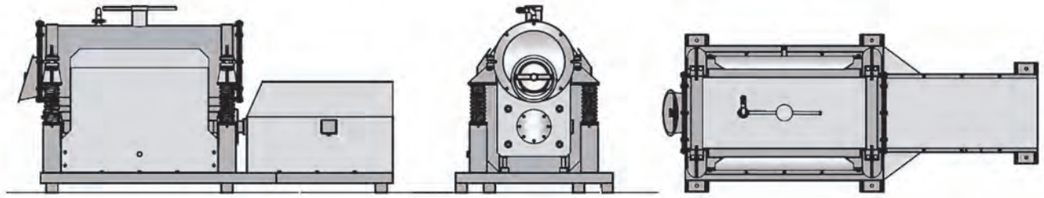
It can be widely used for powders preparation and production in the pharmaceutical, mine, metallurgical, chemical, building material, rare metal industries and research institutes. It can also be used in the laboratory.

Working Principle

By using of vibration, the mill container can get 6-12 times impact accelerated speed(G)of that of ball pulverizer machine, then the milling medium effect an eccentric force on the milling charge, so can get superfine pulverizing. Methods of pulverizing: Dry, wet, inert type (inert gases) Mediums: Balls, sticks

Advantages

- Superfine pulverizing, high productivity. The fineness can reach 1μm which is 10-30 times of traditional machines.
- Multi-purpose, both inorganic and organic materials can be pulverized in wet or dry process;
- No heat generation which may cause changes of the physical and chemical characters of raw materials;
- Compact structure, small floor space, easy to install;
- Improved working environment due to the operation in a contained way.



Technical Parameter

Item \ Model	Non-continuous		Semi-continuous			Continuous			
	ZM-1	ZM-2	ZM-40	ZM-80	ZM-100	ZM-200	ZM-400	ZM-600	ZM-800
Volume (L)	1.1X2	2X2	40	80	100	200	400	600	1200
Power (kw)	0.75	1.5	4.0	5.5	7.5	15	18.5	22	37
Fineness of fed material (mesh)	80-100 Mesh								
Fineness of finished product (mesh)	300-500 Mesh								
Medium weight (kg)	4	8	100	250	350	450	600	800	1000
Swing (mm)	0.7	4.5	9-14	9-14	9-14	9-14	9-14	8-11	7-9
Frequency (c/s)	24	24				16.3			
Exciting force (kg)	250	320	320	320	320	320	320	320	320
Weight (kg)	45	100	500	800	1000	1000	2000	2500	4000
Output (kg/h)	2	5	20-40	30-60	50-100	80-160	100-200	100-300	200-500
Outline dimension (mm)	570X410X235	800X650X500	1460X680X870	1629X730X920	2800X800X1500	2900X1000X1800	3100X1000X2200		

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

ZS VIBRO SIFTER

Introduction

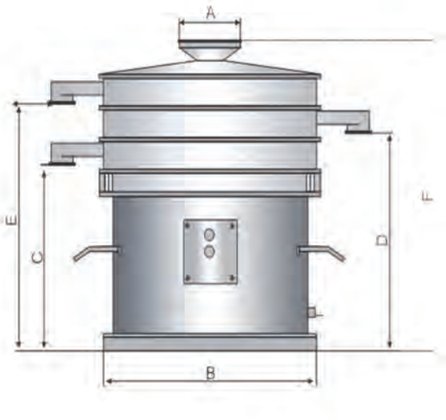
Model ZS vibro sifter is used in pharmaceutical, chemical, foodstuff, cosmetic and construction field for sieving of powder or granules to form desired sizing.

Working Principle

Vibro sifter is composed of screen box, vibrator, bracket, motor and screen mesh. When the vibrator starts working, it will generate vibration force. Through the action of the vibration force, the material will be screened on the sieve to achieve the purpose of separation.

Features

- Continuous producing, automatic sieving;
- Closed structure, dust free;
- Low noise and auto cleaning device;
- Fast start-up and stable stop;
- Space saving, easy to install, operate and maintain;
- The screen with high usage rate is easy to replace.



Technical Parameter

Item Model	Layer quantity	Diameter (mm)	Power (kw)	Vibration frequency (c/min)	Output (kg/h)	Screen mesh	Weight	Outline dimension (mm)					F
								A	B	C	D	E	
ZS-600	1.2.3	600	0.25	1400	150-300		175	200	530	405	510	690	910
ZS-800	1.2.3	800	0.55	1450	200-400	6-200	200	200	600	400	610	745	1000
ZS-1000	1.2.3	1000	1.1	1450	300-600		230	200	800	440	600	750	1015

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

QXZ AUTOMATIC WASHING STATION

Introduction

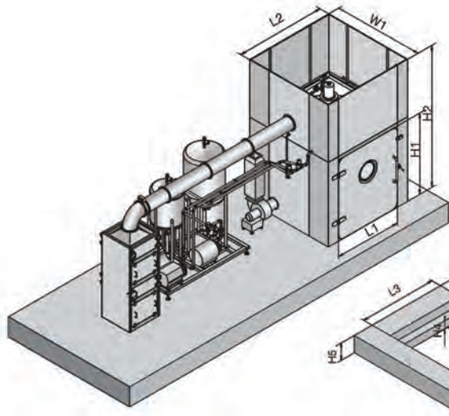
QXZ automatic washing station is widely used for washing various bins in the pharmaceutical, chemical and foodstuff industries. Both inside and outside of the bin can be washed, dried and cooled automatically.

Working Principle

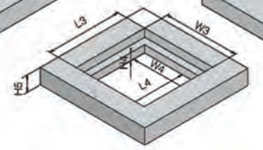
Automatic washing station is composed of main chamber, water pump station, inlet air handling unit, exhaust air system and control system. When operating, push the bin to be washed into the washing chamber. Then set the washing parameters to start washing process. The bottom chassis will rotate the bin slowly, the nozzles mounted on the washing chamber walls will spray washing liquids to wash the outer surface of bin, the top spray ball shall be lowered down inside the bin to wash internal surface. After washing cycle is finished, drying cycle starts to dry the bins.

Features

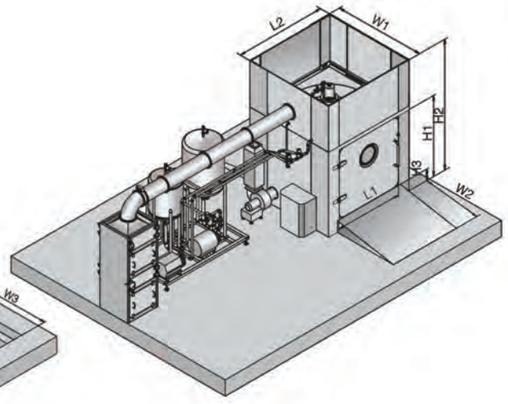
- The machine is controlled by PLC and can be equipped with printing system;
- Patented rotatable bottom chassis, 360° spray ball and spray nozzles to ensure thorough cleaning;
- Inflatable door seal to prevent water leakage;
- High efficiency cleaning and cost saving;
- Quick drying after cleaning, with adjustable hot air temperature and airflow;
- Customized design to meet different process requirements.



QXZ-A



QXZ-A Foundation Drawing



QXZ-B

Technical Parameter

Item \Model		QXZ-800	QXZ-1000	QXZ-A/B QXZ-1500	QXZ-2000	QXZ-3000
Bin volume (L)		800/600/400/200	1000	1500	2000	3000
Bin section (㎜²)		1000x1000	1200x1200	1200x1200	1200x1200	1650x1650
Total power (kw)				12.2		
Water pump flow rate (t/h)		5	5	7	8.5	9.5
Water pump pressure (Mpa)				0.6-0.8		
Steam consumption (Kg/h)				320		560
Steam pressure (Mpa)				0.4		
Power supply (V.Hz)				380 (50)		
Compressed air pressure (Mpa)				0.4-0.6		
Machine weight (t)		1.5	2	2.2	2.5	3
Outline dimension (mm)	H1	1660	1840	2020	2440	2890
	H2	3050	3350		3550	4550
	H3			288		
	H4			265		
	H5			>500		
	L1	1390		1690		2090
	L2	2050		2290		2890
	L3	2130		2350		2950
	L4	1600		1800		2400
	W1	2003		2253		2853
	W2			1600		
	W3	2100		2300		2900
	W4	1600		1800		2400

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

QXJ WIP WASHING MACHINE

Introduction

WIP washing machine is mainly used for washing in place of solid dosage production equipment. One machine can wash various equipment such as high shear granulator, fluid bed granulator, coating machine. It is widely used in pharmaceutical, foodstuff and chemical industries.

Working Principle

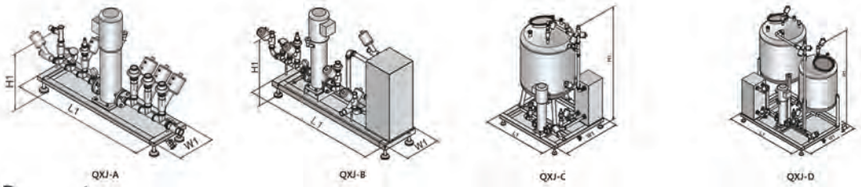
It is composed of pump station, piping and control system. When operating, connect WIP washing machine to the equipment to be cleaned. Then start washing procedure to clean inside of the equipment or container. Outer surfaces of the equipment can be washed manually. Different washing medium can be applied such as deter- gent, tap water and purified water.

Features

- Convenient and fast cleaning process
- Washing in place for large equipment
- Integrated control
- High cleaning flexibility
- Various configurations are available

Option

- Plate heat exchanger
- One or Two water buffer tanks
- Purified water tank and/or tap water tank
- Detergent pump and tank



Technical Parameter

Item \ Model		QXJ-A	QXJ-B	QXJ-C	QXJ-D
Heat exchange area (㎡)				3	
Steam pressure (Mpa)				0.2-0.4	
Steam consumption (kg/h)				660	
Water pump pressure (Mpa)				0.6-0.8	
Water pump flow rate (t/h)				5	
Tap water tank (L)				500	
Purified water tank (L)					300
Detergent tank (L)				20(Optional)	
Detergent pump motor (Kw)				2.2	
Power supply (V.Hz)				380 (50)	
Compressed air pressure (Mpa)				0.4-0.6	
Machine weight (t)		0.5	0.8	1.3	1.5
Outline dimension (mm)	H1	608	520	2122	2416
	L1	1390	1500	1220	1600
	W1	380	400	1100	1150

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

DQXZ MULTI CHAMBER WASHING STATION

Introduction

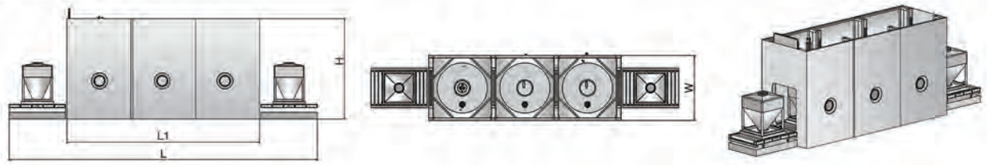
Model DQXZ multi chamber washing station can achieve rapid washing and drying of bins. Two or more bins or containers can be simultaneously washed in one cleaning cycle, greatly improving cleaning efficiency. It can realize all cleaning processes such as automatic bin in and out, continuous washing, cold and hot air purging and drying, and cooling. It is widely used in pharmaceutical, food, chemical and other industries.

Working Principle

The cleaning process for containers involves several steps. Firstly, an AGV places the container to be cleaned onto an automatic conveying track. This track then transports the container to a washing cabinet, where tap water washing and purified water rinsing are automatically carried out. After the cleaning process, a high pressure purging system can be used to blow away any water droplets attached to the container before it is dried. Once the cleaning is complete, the conveying track automatically delivers the clean container out of the washing cabinet. Finally, the clean container is transported by AGV into a clean storage room where it can be used for the next production cycle.

Features

- The full coverage washing of the container is achieved without dead corners through the relative movement between the container and the cleaning rack.
- Small space for washing chamber effectively reduces overall system footprint.
- After the container is washed, an optional high pressure purging system can be used to blow away the water droplets attached to the container before drying to effectively reduce energy consumption.
- Containers are transferred by AGV. Containers are transferred, transported and cleaned using fully automatic control to achieve unmanned production.



Technical Parameter

Item \ Model		DQXZ-100	DQXZ-800	DQXZ-2000
Bin volume (L)		100	800/600/400/200	20-2000
Bin section (mm)		500 X500	1200 X1200	1000x1000 / 1200x1200
Total power (Kw)		12.36	17.3	14.3
Water pump pressure (Mpa)		7	10	0.6-0.8
Water pump flow rate (t/h)		6	6	5-10
Steam pressure (Mpa)		320	320	320-480
Steam consumption (Kg/h)		0.4	0.4	0.2-0.4
Power supply (V.Hz)		380	380	380 (50)
Compressed air pressure (Mpa)		0.4-0.6	0.4-0.6	0.4-0.6
Machine weight (t)		1.3	4	5
Outline dimension (mm)	H	1656	3860	4000
	L1	2078	4078	7680
	L	1106	1806	12280
	W			2600

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

TQXZ COLUMN LIFTABLE WASHING MACHINE

Introduction

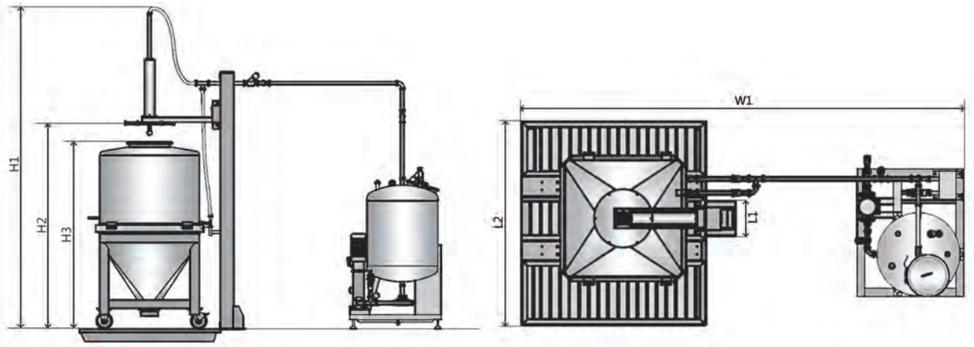
TQXZ column liftable washing machine is mainly used for automatic washing the inside of various bins and containers. The outer surfaces of the bins or containers are washed manually. It is widely used in pharmaceutical, foodstuff and chemical industries.

Working Principle

When operating, the washing cover is raised to the desired height automatically by a lifting system to connect with the bin or container. After that, start washing procedure to automatically wash the inside of the bin or container.Outer surfaces are washed manually. After washing, push the washed bin or container in a buffer room for drying.

Features

- Compact structure and space saving
- Suitable for cleaning bins and containers of various sizes
- Optional drying function
- Easy to install and operate, low cost
- PLC and HMI control



Technical Parameter

Item \ Model		TQXJ					
Bin volume (L)		30/100/200/400/600/800/1000/1200/1500/1800/2000/3000					
Total power (Kw)		3					
Water pump flow rate (t/h)		5-8					
Water pump pressure (Mpa)		0.6-0.8					
Power supply (V.Hz)		380 (50)					
Compressed air pressure (Mpa)		0.4-0.6					
Machine weight (t)		1.5					
0utline dimension (mm)	H1	H2	H3	L1	L2	W1	
	3840	2580	918	380	1560	≤3200	

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

WQXZ STERILE DRUM WASHING STATION

Introduction

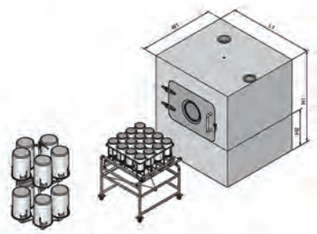
WQXJ sterile drum washing station is mainly used for cleaning sterile drums in the pharmaceutical industry by cleaning drums placed on the mobile trolley through cleaning nozzles and spray balls inside the machine chamber.

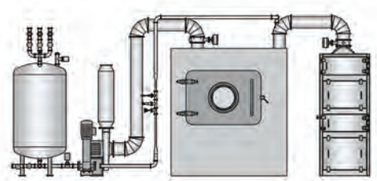
Working Principle

This machine adopts airtight washing chamber. When operating, put the used drums on the bracket which can be flexibly designed for different sizes and shapes of drums, and then push the bracket with drums into the washing chamber. The pump station system then pumps the washing water into cleaning nozzles and spray ball to automatically wash the inside and outside of the drums. After washing, pull the bracket out and push it into the sterilizing cabinet for sterilizing.

Features

- Comprehensive cleaning to ensure cleaning effect
- Suitable for cleaning drums with different specifications and quantities
- Special movable drum bracket is designed to ensure safe and easy operation.
- Drum drying and sterilization method can use dry heating and sterilizing or H_2O_2 sterilization.





Technical Parameter

Item \ Model		WQXJ
Drum volume (L)		15-30
Drum section (mm)		Φ230-Φ300
Drum quantity per batch		9-16
Total power (Kw)		11.5
Water pump flow rate (t/h)		12
Water pump pressure (Mpa)		0.4-0.6
Steam consumption (Kg/h)		620
Steam pressure (Mpa)		0.2-0.4
Power supply (V.Hz)		380 (50)
Compressed air pressure (Mpa)		0.4-0.6
Machine weight (t)		3
0utline dimension (mm)	H1	2200
	H2	880
	L1	2000
	W1	1800

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

LT LIFTING MACHINE FOR FLUID BED BOWL

Introduction

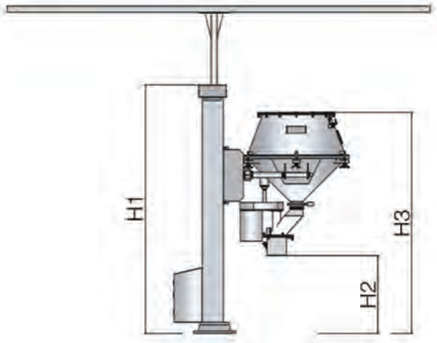
Model LT lifting machine for fluid bed bowl adopts hydraulic system. It is used for lifting and discharging product from fluid bed bowl. It is widely used in pharmaceutical, chemical and foodstuff fields.

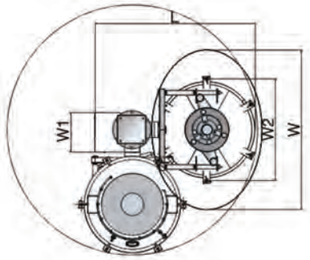
Work Principle

When operating, lock the fluid bed bowl with the cone adaptor first. Then lift up the bowl by hydraulic system to the desired height, invert it 180 degrees to connect with next processing equipment.

Features

- The machine can be fixed with fluid bed bowl, locating precisely;
- Material transfer in a contained way. Dust free and no product contamination;
- It reduces the labor intensity and the material can achieve 100% transfer;
- Comply with GMP standards. After overturning, the hopper outlet can joint with the inlet of dry mill or vibro-sifter to achieve closed operation;
- Safe and reliable hydraulic device is used;
- Limit device to ensure the safety and reliability.





Technical Parameter

Item \ Model		LT-60	LT-120	LT-150	LT-200	LT-300	LT-400	LT-500
Max. load (kg)		60	120	150	200	300	400	500
Total power (kw)		1.97	1.97	1.97	1.97	1.97	1.97	1.97
Voltage (V*Hz)		380 (50)						
Weight (kg)		1300	1700	1800	1900	2100	2200	2400
Outline dimension (mm)	W	2420	2550	2650	2700	2835	2900	3000
	W1				700			
	W2	1225	1400	1500	1600	1800	1900	2000
	H1	4590	4700	4700	4900	5100	5300	5400
	H2	1100	1200	1300	1400	1600	1700	1800
	H3	2100	2250	2350	2750	3150	3350	3500
	L	1900	2300	2350	2450	2550	2600	2700

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

RTX BIN LIFTING MACHINE

Introduction

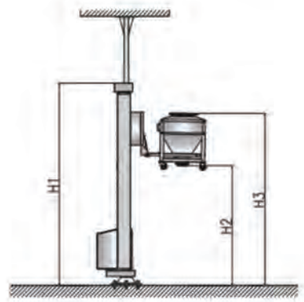
Model RTX lifting machine is mainly used for lifting and discharging of IBC bin with materials. It can be used together with coating machine, high shear granulator, capsule filling machine or tablet press machine. Optimum solution for material transfer.

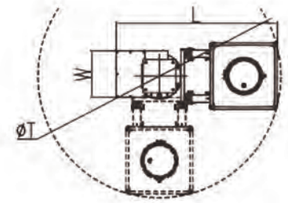
Work Principle

The machine is composed of base, pillar, lifting system, rotation mechanism and braking mechanism. When operating, first turn on the lifting control lever. When the bin is lifted to the desired height, rotate the machine base to make the bin outlet towards the inlet of the machine to be fed, and then brake. After that, open the discharge butterfly valve on the bin to discharge the materials to the machine planned for the next process (tablet press or capsule filler).

Features

- Made of stainless steel
- Space saving due to foldable fork design
- Stable and reliable performance
- Easy and flexible operation
- Special butterfly valve without dead space, easy to clean.
- Lifting system can use hydraulic system or ball screw system





Technical Parameter

Item \ Model		RTX-150	RTX-200	RTX-400	RTX-600	RTX-800	RTX-1000	RTX-1500	RTX-2000
Container volume (L)		150	200	400	600	800	1000	1500	2000
Max.load (kg)		53	70	140	210	280	350	525	700
Maximum lifting height (mm)		2450							
Column height (mm)		3700-4000							
Motor power(kw)	Hydraulic lifting	1.1	1.1	1.1	1.1	1.1	3	3	3
Weight (kg)		950	1000	1100	1200	1300	1400	1650	1900
Outline dimension (mm)	L	2200	2200	2350	2350	2350	2500	2650	2800
	W	700							
	H1	According to customer's room height							
	H2	2400							
	H3	3420	3470	3520	3570	3620	3670	3720	3750
	ΦT	1500	1500	1560	1700	1790	1950	2110	2200

The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

DT MOBILE LIFTING MACHINE

Introduction

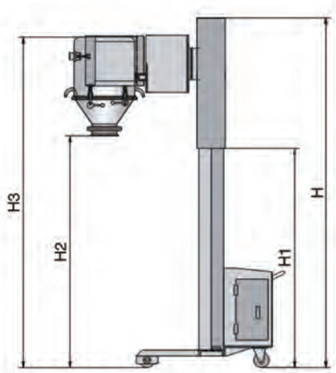
Model DT lifting machine can be used as lifting, feeding device for pressing machine, capsule filling machine, blender, high shear granulator. It is widely used for conveying of powders and granules in pharmaceutical, chemical, cosmetic, foodstuff fields.

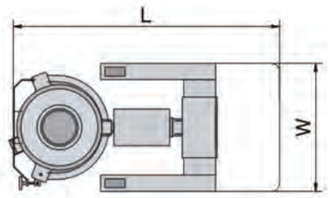
Working Principle

DT lifting machine is mobile. When the hopper is lifted to the desired position, the clamping arm holding the hopper can rotate at any angle. There are limit devices to detect lifting and lowering height of hopper to ensure correct positioning. After desired position is reached, open the butterfly valve to discharge.

Features

- Mobile design， easy to move
- Space saving
- Easy to operate





Technical Parameter

Item \ Model		DT-50	DT-100	DT-150	DT-200
Maximum load (L)		50	100	150	200
Total power (kw)		1.97	1.97	1.97	1.97
Outline dimension (mm)	H	⩽3500			
	H1	⩽1950			
	H2	⩽2400			
	H3	3115	3215	3350	3300
	L	1330	1580	1800	1800
	W	800			

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

CGDT LIFTING MACHINE BETWEEN FLOORS

Introduction

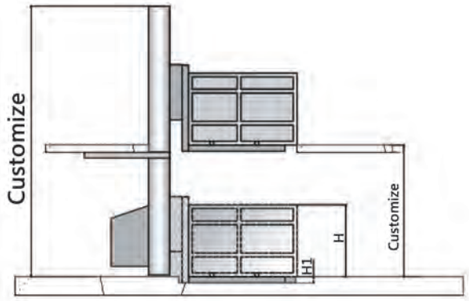
CGDT lifting machine is mainly used in the solid dosage production procedure for lifting drums, IBCs and materials between floors. It is widely used in pharmaceutical, chemical and foodstuff industries.

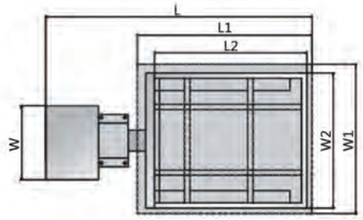
Working Principle

This equipment is composed of column, base and lifting system. When operating, put bin on the lifting platform, and then start raising. When it is raised to the desired position, move the bin out.

Features

- Optimized production process,
- Reduced labor intensity and reliable operation, fully meeting with the requirements of cGMP.
- High safety performance, with upper limit switch for lifting.
- The upper and lower parking sensor with self-locking protection limit mechanism.
- With anti-falling lock mechanism.





Technical Parameter

Item \ Model		CGDT
Load weight (kg)		＜1000
Power (kw)	Mechanical lifting	5.5
Outline dimension (mm)	L	2650
	L1	1700
	L2	1600
	W	1000
	W1	1700
	W2	1600
	H	1200
	H1	100

- The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.

SYZ DISCHARGE STATION

Introduction

SYZ discharge station system is suitable for vertical conveying of powder and granular materials. Dust-free operation to realize the pipeline transportation of materials between floors. The equipment mainly includes PPL dust-free feeding station, support, inlet end, hose, pipeline, joint and exhaust end.

Working Principle

When working, connect the silo containing materials with this discharge station. First open the control valve at the inlet end to inject compressed air into the device, exhaust the air in the hose and PE pipe, open the discharge valve, and gradually fill the material into the PE pipe under the action of gravity. At this time, the inlet valve and exhaust valve adjust the inlet and exhaust air flow and pressure under the control of the program. The materials in the PE pipe are gradually and uniformly transported downward to the receiving container under the double action of its own gravity and the air pressure outside the PE pipe (hose), so as to avoid the phenomenon of material layering and pouring impact caused by the acceleration of material falling under the separate action of gravity.

Features

- Dust-free operation, realizing material pipeline transportation between floors
- uniform material transportation, avoiding layering and reducing damage
- Simple structure, safe and convenient operation, easy maintenance and cleaning

Technical Parameter

Item \ Model	SYZ-200
Pipe ID (mm)	213
Compressed air pressure (MPa)	0.4-0.6
Power (kw)	0.5
Power supply (V、Hz)	380V, 50Hz, 3P
Compressed air consumption (L/Cycle)	400-500
Temperature (℃)	Room temperature
Docked machine port dimension (mm)	200-400
Automatic docking compressed air consumption (m^3/min)	1.1

■The above technical data is only for reference during model selection.
Our company reserves the right to change the above data without further notice.

IBC SERIES BIN

RL

RLD

RLS

RLK

IBC Bins of different sizes and volume can be provided for product transfer and blending purpose.
Product contact part are made of stainless steel 316L.

Technical Parameter

Item \ Model		RL IBC Bin					RLS SGTH Bin					RLD GTH Bin					RLK SKRH Bin					
Bin volume (L)		200	400	600	800	1000	300	800	1000	1500	2000	200	400	600	800	1000	800	1000	1500	2000	2500	3000
Bin weight (t)		0.108	0.126	0.145	0.178	0.198	0.2	0.28	0.3	0.342	0.38	0.12	0.13	0.16	0.19	0.2	0.35	0.39	0.42	0.48	0.54	0.61
Outline dimension (mm)	H	900	1115	1270	1250	1626	1600	1600	1600	1900	2250	1050	1250	1296	1500	1410	2250				1700	3300
	W	800	1000	1000	1200	1200	1360					600	860	1000	1000	1200	1200				1710	1600
	L	870	1070	1070	1270	1270	1298					778	1070	1210	1210	1459	1270				1780	1670
	δ	2	2	2	2.5	2.5	2.5	3	3	3	3	2	2.5	2.5	3	3	3				4	4

■The above technical data is only for reference during model selection. Our company reserves the right to change the above data without further notice.