



# NOMIA MACHINERY

WUXI NOMIA MACHINERY CO.,LTD.

无锡诺美机械有限公司

集设计、制造、安装及调试为一体



## 无锡诺美机械有限公司 张泾压力容器制造有限公司

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## Company Profile

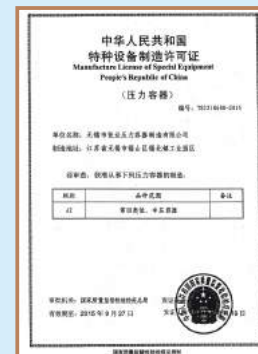
### 集团简介

诺美机械有限公司是集设计、制造、安装及调试为一体的专业工程公司。公司通过国家高新技术企业认证，具有压力容器制造资质，通过了ISO9001质量管理体系认证及欧洲CE认证。

诺美机械有限公司拥有一流的专业技术人才、先进的制造手段、严格的品控体系，致力于开发运用蒸发浓缩、连续蒸发结晶、工业废水“零排放”等先进技术，为客户提供更为高效、节能、可靠的蒸发设备和系统解决方案。

NuoMei Machinery Co.,Ltd is a highly specialized of engineering services process design,manufacturing ,installation and commissioning.NuoMei go through the national high-tech enterprise certification,whit the qualification for pressure vessel manufacturing, won Iso9001 quality man-agement system and CE certification for Europe.

NuoMei evaporating engineering own the first-class highly professional team,technical team,techni-cally advanced manufacturing facilities and a meticulous quality control system,committed to be the respected leading enter prise in evaporation & concentration ,continuous evaporation& crista lization, no emissions of industrial effluents etc, and provide more efficient, energy saving.



## Manufacturing Facilities

### 加工实力

公司拥有先进的精加工设备 & 高精度的检测设备，为先进技术方案迅速实现提供有力保障，公司注重过程控制，强化工艺管理，不断优化生产流程、提高生产效率，实现精益生产，增强企业竞争力。

The company possesses advanced precise machining equipments and high-accuracy detecting equipments, providing powerful guarantee for quick realization of advanced technical schemes, the company emphasizes on process control,strengthens technological management optimizes production flow continuously and improves production efficiency to fulfill lean production and enhance enterprise competitiveness.



1. 12米刨边机  
12 m planing machine
2. 100吨拉力试验机  
100 tons tensile testing machine
3. 数控全自动激光切割机  
CNC automatic laser cutting machine
4. 工件进入CO-60射线探伤室检测焊缝  
CO-60 into the workpiece-ray flaw detection of weld chamber
5. 带极堆焊（林肯电源）  
Strip cladding (Lincoln Power)
6. 生产现场使用光谱分析仪检测焊缝  
The production site using a spectrum analyzer to detect welds
7. 管板自动焊机  
The tube sheet automatic welding machine
8. 数控精细等离子切割机  
CNC plasma cutting machine





Application

蒸发工程的运用范围

食品及饮料行业/Food & beverage Industries



糖 Sugar	液体糖、白糖、甜水 Liquid sugar,white sugar,sweet water
淀粉产品 Starch products	葡萄糖、果糖、麦芽糖、淀粉糖浆 Glucose,fructoes,maltose syrup.starch syrup
蔬菜汁 Vegetable juice	甜菜根汁、番茄汁、胡萝卜汁 Beetroot juice,tomato juice,carrot juice
果汁 Fruit juice	橙汁、苹果汁、红浆果汁 Orange juice,apple juice,red berry juice
蛋白汁 Protein syrup	大豆乳清、营养酵母 Soybean whey,nutritonal yeast
乳制品 Dairy products	全脂和脱脂奶、炼乳、乳清、乳酸、乳糖等 Whole milk and skim milk,condensed milk,whey,lactic acid,lactose,etc
提取物 Extractive	咖啡和茶提取物、啤酒花提取物、麦芽提取物 Coffee and tea extractive,hops extractive,malt extractive
水解物 Hydrolysate	乳清水解物、调味料液、蛋白水解物 Whey hydrolysate,seasoning liquid,protein hydrolysate
啤酒 Beer	脱醇啤酒、麦芽汁 Dealcoholized beer,wort



化工和制药行业/Chemical&Pharmaceutical Industries

废水 Waste water	工业废水、漂洗废水、油状乳液等 Process waste water,rinse water and oil emulsion,etc
制药溶液 Pharmaceutical solution	酶、抗生素、药品萃取物、山梨醇、山梨糖 Enzyme,antibiotics,medicines extracts,sorbitol,sorbose
有机产品 Organic products	芳香化合物、丙酮、香料 Aromatic compounds,acetone,spices
醇 Alcohol	甲醇、乙醇、甘油、乙二醇、异丙醇 Methanol,ethanol,glycerol,ethylene glycol,isopropyl alcohol
胺 Amine	尿素、二乙胺 Urea,diethy lamine
盐溶液 Salt salution	氯化钠、硫酸钠、氯化铵、硫酸铵 Sodium chloride,glycerol,ethylene glycol,isopropyl alcohol
无机酸 Inorganic acid	磷酸、硝酸 Phosphoric,nitric acid
有机酸 Organic acid	维生素C、柠檬酸 Vitamin C,citric acid

有机产品/Organic Products

浸渍液 Steeping liquor	玉米浸渍液、高粱浸渍液 Corn steeping liquor,sorghum steeping liquor
乳剂 Emulsion	油和溶剂混合物 Oil and solvent mixture
发酵液 Fermented	谷氨酸、赖氨酸、甜菜碱 Glutamic acid,lysine,betaine
粘稠液 Viscous fluid	屠宰场废水、渔业加工废水、果皮压榨水 Slaughterhouse,fish Processing waste water,squeeze the water the skin
有机废水 Organic wastewater	洗涤水、畜牧粪污、小麦和马铃薯淀粉废水 Wash water,livestock excrement,wheat,and potato starch wastewater





# Evaporator Category

## 蒸发器类别

### 降膜蒸发器/Falling film Evaporator

#### 工作原理/Working principle

需浓缩的料液由泵送入加热管顶部，沿着加热管内壁形成液膜向下流动。在这个过程中，由于管外的加热，管内液膜开始沸腾并部分蒸发。在列管下部分及其下游的分离器中，剩余的液体和蒸汽得以分离。

合理确定换热管内的料液流量，可避免换热管底部干管，同时保证液膜厚度，获得最佳的换热效果和最小的动力消耗。

降膜蒸发器即可进行循环蒸发，又可进行单程蒸发。

First,the material will be pumped into the top of the tube,then fall along the tube's inwall and forming a liquid film,In this process,the liquid film begin boling as the tube's heating,The residual liquid and steam will be separated in the bottom of the tube.

The flow of material in the exchange tube will be determined reasonably to avoid drying tube in the bottom,at the same time,it can ensure the thickness of the film and rech the best heat exchange efficiency and the lowest power consumption.

The filling film evaporator can be used cycle evaporation and single way evaporation

#### 适用范围/Application

单套处理量最高可达200T/H

适用于热敏性物料

适用于浓度低、含固量少，结垢倾向性低的物料。

The highest capacity can reach 200T/h per unit.  
Suitable for heat sensitivity material.  
Suitable for low concentration,low solid content,low scaling material.

#### 产品特点/Product characteristics

传热系数高，温差小，真空蒸发。

保证物料在换热管内处于适宜的沸腾状态，避免因剧烈气化导致的干壁，结垢现象。

无液柱引起的沸点温差损失、循环量少、动力消耗少。

Highheat transfer coefficient,low temperature difference,vacuum evaporation.  
Ensure the material keep boiling in the heat exchange tube,avoid drying wall and scaling caused by intense evaporation.  
Low circulation volume,low power consumption.



### MVR蒸发系统/MVR Evaporation system

#### 系统简介/System introduction

利用MVR(机械蒸汽再压缩技术)可大幅减少蒸发系统的能耗，利用蒸汽压缩机亚索蒸发产生的二次蒸汽，压力，温度升高，热焓增加，然后再进入蒸发系统的加热室作为热原使用，以此不断循环。

该类蒸发系统消耗电能进行蒸发操作，根据物料特性不同，压缩风机能耗略有波动。

MVR ( Mechanical vapor recompression) evaporation, the operation theory is similar to heat pump,the 2nd stage steam come from the evaporation system,through the steam compression to increase the pressure and temperature,enthalpy incered,then goes into the heating room of the evaporation system to use as the heat resource.

This kind of evaporation system will use electricity to do the evaporation, Based on the difference of material characters,the energy cost by the compression will be different.

#### 产品特点/Prducts Feature

无需生蒸汽或补充少量生蒸汽；

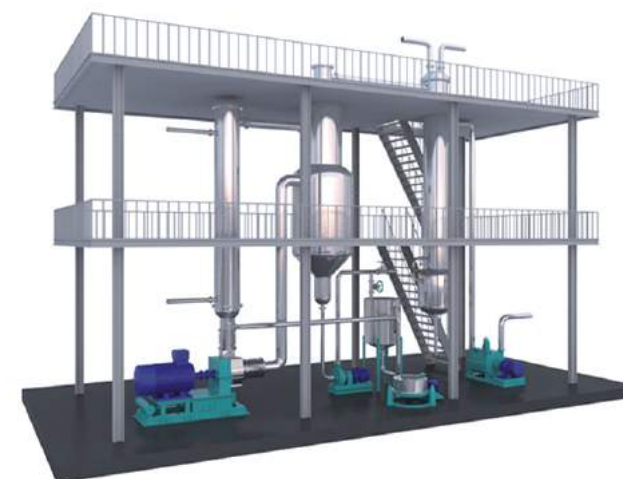
低能耗、低运行费用；

与不同类型的结晶器耦合，进行连续蒸发结晶操作；

无需冷凝器或只需很小面积的冷凝器

No or few live steam required.  
Low energy cost,low operation cost.  
Could combine with crystallizer to form the continue and crystallization system.  
Condenser is not needed or just need a small one.

#### MVR蒸发工艺流程图/MVR evaporation process diagram





# Evaporator Category

## 蒸发器类别

### 强制循环蒸发结晶器/Forced Circulation Evaporation Crystallizer

#### 系统简介/System Introduction

强制循环形式的蒸发结晶系统应用广泛，原料液与循环母液一起经循环泵输送至加热器进行加热，而后进入FC结晶器，部分晶浆由结晶器的锥形底部排出，未排走的母液经循环管靠循环泵重新返回至结晶室，循环往复，实现连续结晶过程。

该类结晶器能够强化传热效果，对于高密度、高粘度的溶液有效，生产量大，适用于成分复杂，对出盐粒度要求不高的高盐废水蒸发结晶处理。

Forced Circulation Evaporation Crystallization System are widely used. Raw material liquid and circular mother liquor are pumped to heater for heating, and then enter into the FC crystallization system. Part of the crystal slurry discharged from the conical bottom of the crystallizer, and others are pumped to the crystal room through circulating pump again, recycle and continuous crystallization process.

This crystallizer can improve heat transfer effect, which have effective for high density and high viscosity solutions; High capacity; Suitable for high salt waste water evaporator crystallization process, which the composition is complicated and have low requirement for the salt particle.

#### 产品特点/Products Feature

对物料性质的要求宽松，系统操作弹性大；  
结晶器采用轴向进料的方式，改善结晶效果；  
换热管内流速高，改善管壁结垢的现象；

Low requirements for the material properties, flexible for the operation  
Axial type feeding, to improve crystallization effect  
Flow velocity in heating tubes, to improve tube wall scaling



### Oslo 蒸发结晶器/Oslo evaporation crystallizer

#### 系统简介/System introduction

Oslo蒸发结晶器的结构设计能区分过饱和度生成区域与晶体生长区域，晶体在生长区域内在循环母液的作用下形成晶体粒度分级的流化效果，使粒度较大的晶体腹肌在结晶器的底部排出。

该类结晶器能够实现晶体粒度的筛选，对于晶体成分简单、流动性好、对出盐品质有较高要求的物料适用。

The design of the Oslo evaporation crystallizer can distinguish the supersaturation generate area with crystal growth area. Under the action of circular mother liquor, the crystals can form the crystal granularity classification of fluidization effect in the growth area and can make the larger size crystal abdominal muscle discharging from the bottom of the crystallizer.

This kind of crystallizer can screening crystal particle size, suitable for material of simple crystal component, good liquidity and the materials which have high requirements of salt quality.

#### 产品特点/Products Feature

溶液循环量较大，溶液的过饱和度较小，不易产生二次晶核有利于结晶操作；  
清液循环使得晶体不受破碎；  
Oslo结晶器产生的晶体大而均匀。

Large circulation flow rate, low degree supersaturated solutions, not easy to produce secondary crystal nucleus which helpful for crystallization operation.  
Crystals will not be broken through clear liquid circulation.  
The crystals produced by the Oslo Crystallizer are large and homogeneous.





# Energy Saving Evaporator

## 节能蒸发

### 废热蒸发系统/Waste heat evaporation system

#### 系统简介/System Introduction

废热蒸发器是利用废热提供有效传热温差的蒸发系统。在化工、轻工、食品等工厂，生产工艺过程中总会产生一定量的低品质废热，例如淀粉厂副产品（纤维、蛋白、胚芽）和酒精厂DDGS干燥产生的二次蒸汽和冷凝水，酒精蒸馏所得的酒精蒸汽和废醪液，糖厂液糖化所得的液化液和糖化液，以及其它中间制品携带的显热或潜热，通过合理的设计均可再次利用于蒸发系统。液态废热可以对物料进行预热利用其显热，也可通过闪蒸得到闪蒸气利用其潜热；汽态废热可直接利用其潜热。

A waste heat evaporator uses low grade water vapor that normally would be wasted as the heat source for the evaporator system. In the starch industry there are dryers for fiber, gluten, and germ. In the ethanol industry there are dryers for DDGS. In the dryer exhaust gas, the ratio of water vapor to air is high enough that a meaningful amount of water vapor can be used as a replacement for steam in the evaporator. Also, during the saccharification process when starch is converted to glucose, low pressure water vapor is generated. This water vapor can also be the heat source in a multiple effect evaporator operating under vacuum.

#### 产品特点/Product Features

废热蒸发器可以设计成多种废热一起利用，也可以设计成废热和生蒸汽混合利用；可以让不同品质的废热源进入不同温度的加热器；废热可以一次利用，也可以多次利用。根据废热的利用程度，废热蒸发器可以少用甚至不用产生蒸汽，可以极大的降低蒸发器运行费用和工厂的能源消耗，极大地降低工厂的碳、粉尘和废气排放量。

The evaporator can be designed to use multiple sources of waste heat in one system. The waste heat can be supplemented with steam to increase the capacity. The dryer exhaust gas that passes through the evaporator and is vented to atmosphere will have considerably less dust and VOC than the original dryer gas. A scrubber can be integrated with the system to reduce SO<sub>2</sub> emissions.



### 换热器/Heat Exchanger

#### 系统简介/System introduction

换热器是一种实现物料之间热量传递的节能设备，是在石油化工、冶金、电力、轻工、食品、制药等行业普遍应用的一种换热设备。在炼油、化工装置中换热器占总设备数量的40%左右，占总投资的30%-45%。近年来随着节能技术的发展，应用领域不断扩大，利用换热器进行高温和低温热能回收带来了显著的经济效益。目前，在换热设备中，使用量最大的是管壳式换热器。

Heat is energy-saving equipment heat transfer material between one implementation, a heat exchange equipment in petrochemical, metallurgical, power, light industry, food, pharmaceutical and other industries universal application. In the oil refining, chemical plant in the heat exchanger of the total number of devices about 40%, 30%-45% of the total investment. In recent years, with the development of energy-saving technology, applications continue to expand, the use of high temperature and low temperature heat exchanger heat recovery has brought significant economic benefits. Currently, heat transfer equipment, the largest use of shell and tube heat exchanger.





# Short Path Evaporator

## 节能蒸发

### 短程蒸馏器/Waste heat evaporation system

#### 系统简介/System Introduction

许多如石油重渣油、化学药品、药物及天然食品、保健品、脂肪酸等，常常是热敏性的、粘滞的及/或具有高沸点的物料。要把这些物料从它们的其它组分分离出来，而保持产品的质量，只能在低的沸腾温度甚至是不到沸腾温度下精馏，且只能在很短的时间里，把热分解作用或聚合作用减到最小，以消除对产品的破坏。

短的停留时间 刮膜器的作用，使得液膜在加热面停留时间极短。

低的蒸馏温度 由于冷凝器直接位于加热面的对面，减少了压差，所以具有极高的真空度，物料可在极低的温度下甚至于无需到沸点即蒸馏。

粘性物和产品中含有固体物 刮片的深深浸入，靠一个相当可观的边缘，料膜引起一个强烈的剪切及混合效应，减轻了待处理液的粘性，适合处理粘度到50Pas,并防止加热面结垢，特别适合于含固体料液。

极薄的蒸馏液面 刮膜器的作用将料液刮成极薄的液膜。分离更彻底。

热敏感物料

高分离比 精密的刮板使用得极薄的液膜均匀地分布在加热面上，导致整个加热面湿润。这样允许操作单元高沸分离比。这意味着在案例中进入的90%以上被蒸发，恒量残留物质中水平能被完成。

Many heavy oil such as oil, chemicals, drugs and natural food, health products, fatty acids, etc., are often heat-sensitive, viscous and / or a material having a high boiling point. These materials should be separated from the other components of their out while maintaining the quality of the product, only in the low boiling temperature or even less than the boiling temperature of distillation, and only in a very short period of time, the thermal decomposition or minimize polymerization, to eliminate damage to the product.

Short residence time wiped film's role in making the film in a very short residence time of the heating surface.

Due to the low distillation temperature of the condenser is located directly opposite the heating surface, reducing the pressure, and therefore have a high degree of vacuum, the material may be at a very low temperature to the boiling point that is even without distillation.

Stickies and products deeply immersed in a solid blade, by a considerable edge, the membrane material causes a strong shearing and mixing effect, thereby reducing the viscosity of the liquid to be treated, suitable for handling viscous degrees to 50Pas, and prevent fouling of the heating surface, especially suitable for liquid-containing solids.

Distilling the liquid thin film scraping the role will be expected to scrape into thin liquid film. Separating more thorough.

Heat-sensitive material

High separation precision than using a blade thin film was evenly distributed on the heated surface, causing the entire heating surface moist. This allows a high boiling separation unit operating ratio. This means that the column into the documented more than 90% is evaporated, the residue material constant level can be completed.



### 离心式蒸发器/Centrifugal Evaporator

#### 系统简介/System introduction

刮板式薄膜蒸发器是利用高速旋转将液体分布成均匀薄膜而进行蒸发或蒸馏的一种高效蒸发、蒸馏设备，也可进行脱臭、脱泡反应及加热、冷却等单元操作，可广泛适用于中、西制药、食品、轻工、石油、化工、环保等行业。

Wiped film evaporator is the use of high-speed rotation into a uniform distribution of the liquid film is performed or an evaporative distillation efficient evaporation, distillation equipment, but also for deodorization, defoaming reaction and heating and cooling unit operation can be widely applied in Western pharmaceutical, food, light industry, petroleum, chemical, environmental protection and other industries.



#### 产品特点/Product Features

传热系数高、蒸发能力大，蒸发强度可达到200kg/m<sup>2</sup>/h，热效率高。

物料加热时间短，约5秒至10秒之间，且在真空条件下工作，对热敏性物料更为有利，保持各种成份不产生任何分解，保证产品质量。

适应粘度变化范围广,高低粘度物料均可以处理,物料粘度可高达10万CP。

改变刮板沟槽旋转方向，可以调节物料在蒸发器的蒸发时间。

蒸发段筒体内壁经过精密镗削并抛光处理，表面不易产生结焦、结垢。

The heat transfer coefficient is high, large evaporation capacity, evaporation strength can reach 200kg / m<sup>2</sup> / h, high thermal efficiency.

The material heating time is short, between about 5-10 seconds, and work under vacuum conditions, more favorable heat-sensitive materials, holding a variety of ingredients does not produce any decomposition, and ensure product quality.

To adapt to a wide range of viscosity, low viscosity materials can handle the material viscosity of up to 100,000 CP.

Changing the direction of rotation groove scraper, you can adjust the time the material was evaporated in the evaporator.

The cylinder wall evaporator after precision boring and polishing treatment, the surface is not easy to produce coke, fouling.





# Short Path Evaporator

## 节能蒸发

### 不锈钢反应釜/Stainless steel reactor

#### 系统简介/System Introduction

反应容器指主要用来完成物理、化学反应的压力容器，例如反应釜、氧化釜、分解釜、聚合釜、结晶釜等。我公司可制造容积80m<sup>3</sup>、压力10Mpa、单台重量100T的大型反应釜。加热方式有电、蒸汽、导热油、红外线等；冷却方式为夹套、外盘管和釜内盘管冷却，转数0~1000r/min变频调速。搅拌桨叶的形式可根据用户的要求任意选配。材料可为碳钢、不锈钢、钛、铝合金、双相钢及其复合材料。

根据反应釜的密封形式不同可分为:填料密封、机械密封和磁力密封。

根据反应釜的制造结构可分为开式平盖反应釜、开式对焊大法兰反应釜和闭式反应釜三大类，每一种结构都有它的适用范围和优缺点。

The reaction vessel used mainly to the pressure vessel to complete the physical, chemical reaction, such as reactor, the oxidation reactor, the decomposition reactor, the polymerization reactor, crystallizer like. Our company can manufacture the volume of 80m<sup>3</sup>, pressure 10Mpa, a single large reactor weight of 100T. Heating electric, steam, oil, infrared rays; a jacket cooling, the outer coil and the inner coil cooling the autoclave, the number of revolutions 0 ~ 1000r / min Frequency Control. Stirring blade form can be arbitrarily selected according to user requirements. Material can be carbon steel, stainless steel, titanium, aluminum, dual-phase steel and composite materials.

The seal in the form of reactor can be divided into: packing, mechanical seal and magnetic seal.

According to the production structure of the reactor can be divided into open flat cover reactor, open butt Dharma Blue reactor and closed reactor into three categories, each structure has its advantages and disadvantages and scope of application.



# Wastewater Reuse Water

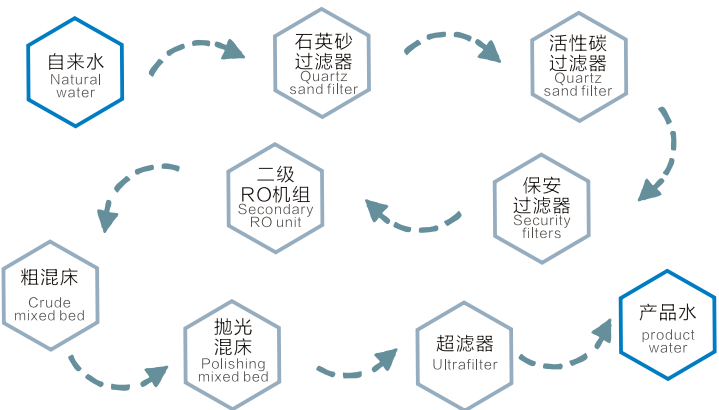
## 纯水废水回用

### 纯水项目/Water Project

处理规模(Treatment scale): 12m<sup>3</sup>/d

出水水质(Water quality): ≥18MΩ · cm(25℃)

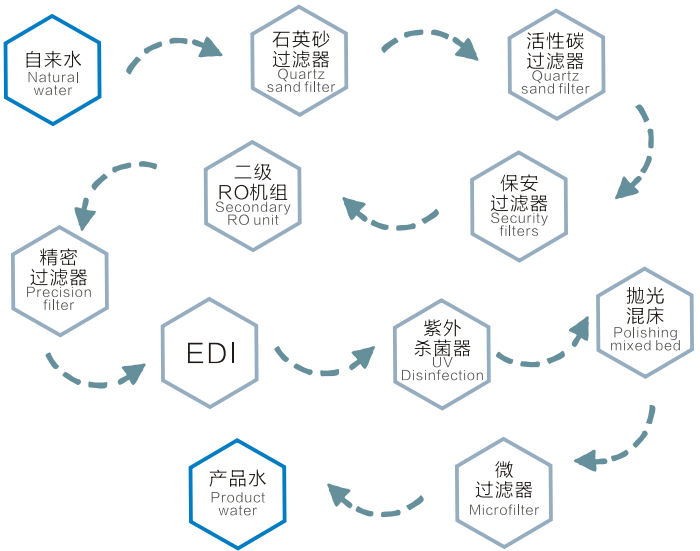
主体工艺(Main process): 如下 (as follows)



处理规模(Treatment scale) : 20m<sup>3</sup>/h

出水水质(Water quality) : ≥18MΩ · cm (25℃)

主体工艺(Main process) : 如下as follows)



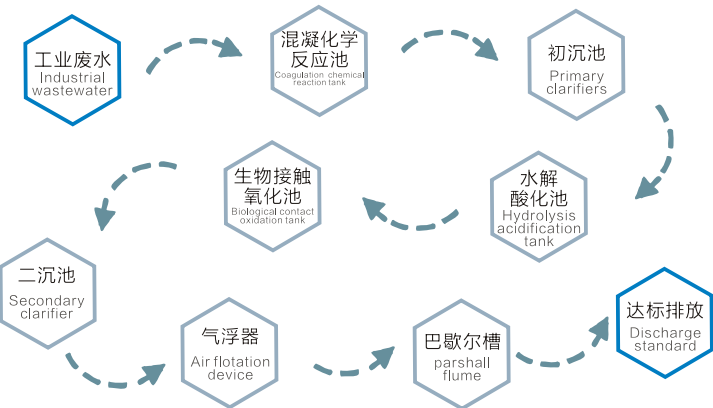


# Wastewater Reuse Water

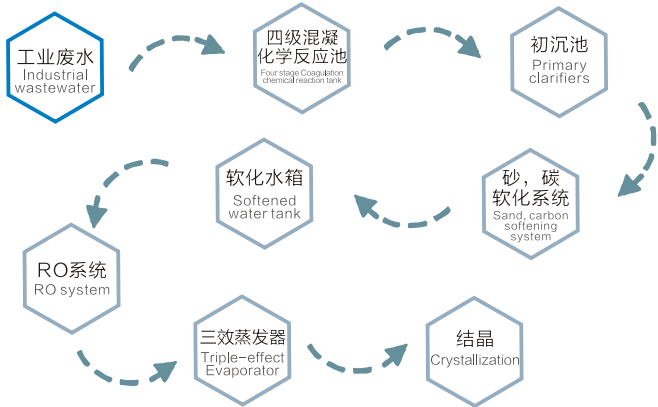
## 纯水废水回用

### 废水项目/ Wastewater Project

处理规模(Treatment scale) : 400m³/d (一期one) , 440m³/d (二期two)  
出水标准(Water standard): GB 8979-1996  
《污水综合排放标准一级标准》  
主体工艺(Main process) : 如下(as follows)



处理规模(Treatment scale) : 10m³/d  
出水标准(Water standard) : 废水零排放  
(Zero discharge of wastewater)  
主体工艺(Main process) : 如下(as follows)



### 化工和制药行业/Chemical&Pharmaceutical Industries

上海烨燃化工有限公司	云南生物制药有限公司
上海瑞母化工科技有限公司	海正生物制药有限公司
上海吉化化工有限公司	方大锦化化工科技股份有限公司
上海亘杨科技有限公司	湖北三才堂化工科技有限公司
上海竹日化工科技有限公司	江苏久泰化工科技有限公司
河南濮阳远东化工有限公司	山西佳宇化工科技有限公司
孟州农达生化制品有限公司	山东恒丰化工科技有限公司
江苏宇兆能源科技有限公司	贵州温福化工科技有限公司
江苏水世界环境工程有限公司	贵州同富化工科技有限公司
江苏南通科本制药集团	兰州金润石油科技有限公司
苏州安泰空气科技有限公司	甘肃双博化工科技有限公司
苏州化联陶瓷有限公司	兰州德宙化工科技有限公司
江西夏氏春秋环境投资有限公司	河北高尔化工科技有限公司
湖北随州霖星化工有限公司	察右中旗奥胜源科技化工冶炼有限公司
山东潍坊同兴化工有限公司	赤峰泰康医药化工科技有限责任公司
山东鑫业化工有限公司	宁夏宏川源化工科技有限公司
浙江辰格生物制药科技有限公司	四川成都国药集团
安徽芜湖化工有限公司	四川牛气化工科技有限公司
山西夏县运力化工有限公司	杭州九度化工科技有限公司
依文达菲色化纤有限公司	上海纺织建筑设计研究院
江苏神羊化纤有限公司	江苏申久化纤有限公司
恒力集团	海南兴业聚酯有限公司
浙江赐福集团	南亚电子材料有限公司
河北梅花生物科技有限公司	通辽梅花生物科技有限公司
山东信乐味精有限公司	徐州丰成盐化工有限公司
江苏天鸿化工有限公司	浙江永在化工有限公司
上海牡丹油墨有限公司	上海金山石化
大庆油田	胜利油田
常州全球化工有限公司	上海华德化工有限公司
无锡山禾集团	合肥制药有限公司
上海先锋药业有限公司	浙江贝得药业有限公司
福建三明化工总厂	山西河曲化工厂
苏州福田金属有限公司	徐州中兴化工有限公司
北京高盟化工有限公司	上海制皂有限公司
中国重工七一一所	徐州化工设计研究院





## Myande Evaporator Auto Control System

### 自动化控制系统

#### 系统简介/System Introduction

利用全自动控制系统可将整个蒸发系统的运行情况实时反映到中央控制室，接收到传感器采集的信号后，控制系统可根据预编程序，对系统内相应执行器进行调节，保证蒸发系统正常，稳定运行，同时对生产过程中的温度、压力、液位、流量、电流等参数，进行归档记录。

配备全自动控制系统的蒸发单元，现场无需人工操作，实现启动、停车、清洗的自动化，真正为您做到“一键启停、无人值守、自动清洗”。

诺美机械可依据客户需求，为客户量身定制全自动、半自动或手动控制系统。

Use the auto-control system can reply the operation to the central control room,after receive the signal from the transducer,control system can based on the preliminary cataloging program,to adjust the relevant equipments in the system,to make sure the evaporation system stable operation,And record the temperature,pressure,liquid level,flow,electricity at the same time.

The evaporation units use the auto-control system,no human operation at the site,can realize start,stop and clean automatically.Truly realize One key start and stop,auto clean ,no duty man.

NuoMei can based on customs requirements,give customs automatic,semi-automatic and hand control system.



#### 产品特点/Products Feature

动态显示操作平台，操作方便简单，安全可靠；

工艺设备联动，自动化控制；

系统运行状态实时监控；

系统程序自动备份，对工艺运行数据有效存储，实时打印各种生产数据报表。

Dynamic display control platform,easy to control,safe and stable.

Technical equipments are linked,automatic control.

System operation situation can be real time monitoring.

The system software automatically backup,effectively store process data,real-time print production data report.



## Manufacture,Transportation,Installation,Commissioning and After-sale Service

### 制造、运输、安装、安装调试及售后服务

蒸发设备均由诺美设计、制造、并送往用户现场进行安装就位，超大型设备交付可在工程现场进行组装，诺美将安排具有经验丰富的工程师进行指导。

蒸发系统的运行较为复杂，诺美会安排经验丰富的工程师前往参加首次试机，并对客户相关工作人员进行专业培训。

蒸发装置想要持久的达到最佳性能，就必须得到专业的维护保养，在保修期一年内，设备使用如出现本身质量问题，诺美负责免费维修，如因操作不当或其他人为因素造成的设备故障或损坏，用户不能自己解决的，诺美免费派人上门协助维修解决，更换的零部件只收取成本费。

All evaporation equipment are designed and manufactured by NeiMei and will be ste in position on site,Equipment are too large will be assembled on site.Nuomei will send experienced engineers for supervision. Evaporation system is complicated,Nuomei will send experienced engineers for supervision trialrunning and training the employess of customers.

Evaporation system should be under professional maintenance to guarantee the best performance.

During the 1 year guarantee period,if there is any quality problem,we will repair it freely,If there is any human factor lead to the equipment fault or broken,adn customers cannot solve by their self,we will send engineer to the site for assistance freely,the broken parts will be only chargde the costprice.

