



LARGE OZONE GENERATOR

Adding a certain amount of nitrogen gas can improve the operating efficiency of ozone generator and extend the life of dielectric tube when pure oxygen is used as feed gas.



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(1-50 kg/h)

TECHNICAL PARAMETER OF AIR SOURCE OZONE GENERATOR

Type	Ozone Capacity	Feed Gas Flow	Ozone Concentration	Cooling Water Flow	Power Consumption	Dimension mm		
	kg/h	Nm ³ /h	wt%	m ³ /h	Kwh/kgO ³	W	D	H
POZBA-1K	1	26-39	2-3	3-4	14-17	1800	800	1800
POZBA-2K	2	52-77	2-3	6-8	14-17	1800	1600	1800
POZBA-3K	3	77-115	2-3	9-12	14-17	2400	1800	2000
POZBA-4K	4	105-155	2-3	12-16	14-17	2800	2000	2100
POZBA-5K	5	130-190	2-3	15-20	14-17	3000	2400	2100
POZBA-6K	6	155-230	2-3	18-24	14-17	3000	2600	2100
POZBA-8K	8	205-310	2-3	24-32	14-17	3600	2600	2100
POZBA-10K	10	260-390	2-3	30-40	14-17	3600	2800	2200
POZBA-15K	15	390-580	2-3	45-60	14-17	4500	3200	2600
POZBA-20K	20	515-775	2-3	60-80	14-17	4500	3600	2600
POZBA-30K	30	775-1160	2-3	100-120	14-17	6000	3800	2600
POZBA-40K	40	1030-1550	2-3	120-160	14-17	6000	4000	2800
POZBA-50K	50	1290-2320	2-3	150-200	14-17	7200	4800	2900



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(1-100 kg/h)

Oxygen-Source Large Ozone Generator Technology Parameter

Type	Ozone Capacity	Feed Gas Flow	Ozone Concentration	Cooling Water Flow	Power Consumption	Dimension mm		
	kg/h	Nm ³ /h	wt%	m ³ /h	Kwh/kgO ³	W	D	H
POZBO-1K	1	7-9	8-10	1.5-2	6-8	1400	800	1800
POZBO-2K	2	14-17	8-10	3-4	6-8	2000	800	1800
POZBO-3K	3	20-26	8-10	4.5-6	6-8	2000	1200	1800
POZBO-4K	4	28-39	8-10	6-8	6-8	2200	1600	1800
POZBO-5K	5	34-43	8-10	7.5-10	6-8	2800	1800	1900
POZBO-6K	6	41-52	8-10	9-12	6-8	2800	1800	1900
POZBO-8K	8	55-69	8-10	12-16	6-8	3000	2000	2100
POZBO-10K	10	68-86	8-10	15-20	6-8	3000	2400	2100
POZBO-15K	15	102-128	8-10	17.5-30	6-8	3400	2400	2100
POZBO-20K	20	136-171	8-10	30-40	6-8	3600	2800	2200
POZBO-30K	30	203-256	8-10	45-60	6-8	5200	3200	2600
POZBO-40K	40	271-341	8-10	60-80	6-8	5400	3400	2600
POZBO-50K	50	339-426	8-10	75-100	6-8	6000	3800	2800
POZBO-60K	60	406-511	8-10	80-120	6-8	6000	4200	2800
POZBO-80K	80	542-681	8-10	120-160	6-8	7200	4500	2800
POZBO-100K	100	677-852	8-10	150-200	6-8	7200	4800	3000

Power Consumption Depends On Different Ozone Concentration And Cooling Water Temperature.



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PROJECT CASE

Industrial Sewage Treatment



Petroleum And Petrochemical Industry



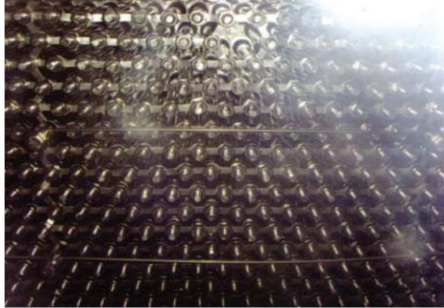
Flue Gas Denitrification





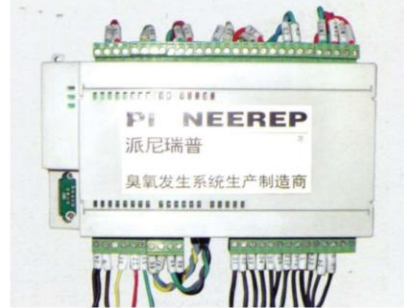
Ozone

CORE TECHNOLOGY



Discharge Chamber

Special glass tube discharge chamber (patent No. ZL2011 20385785.0). The double air gap discharge technology, high quality import glass tube, which can give full play to the discharge efficiency and guarantee the big output high concentration and low power consumption.



Control circuit board

The Ozone generator control board system is research and design by Pioneer Co.,Ltd. It control the normal work of the ozone generator power supply, and it can anti-interference, protect the electric circuit and the components. Output and concentration of ozone can be smooth adjustment according to actual needs.



Transformer

High voltage transformer converts the output of the inverter circuit to the high voltage power which is suitable for the dielectric barrier discharge to produce ozone. In order to match the capacity of the load of the chamber, the requirement of the parameters is different from that of the common transformer. Due to the load capacitance of discharge chamber is change in the running process, it require transformer has a certain leakage to balance the change to protect the electronic components.

SUPPORTING EQUIPMENTS



High Efficiency Non-block Ozone Aeration Device

Carmen effect and boundary layer separation, resulting in high efficiency of mixing jet water, while the micron scale bubble can be highly dissolved in water. No blocking and lower maintenance cost.



Ozone Oxidation Tower / Aeration Plate

The titanium ceramic / metal aeration plate can produce uniform of small bubbles, in order to obtain larger bubbles and water interface, to ensure the maximum rate of material transfer.



Ozone destructor

Ozone destructor system characteristics: high efficiency, Low energy consumption, long life, small size, no need to maintain.



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SUPPORTING EQUIPMENTS



Ozone pre-treatment system

Ozone will be inhaled into water by negative pressure caused by high velocity flow of injector based on venture principal, which is a better way to improve ozone and water mixing efficiency.



Close circulation cooling water system

Includes plate heat exchanger, circulating water pump, expansion tank, pressure switch, etc.



OXYGEN GENERATOR ADSORPTION AIR DRYER

It can guarantee the quality of feed gas, improve the operating efficiency of ozone generator and economical benefit



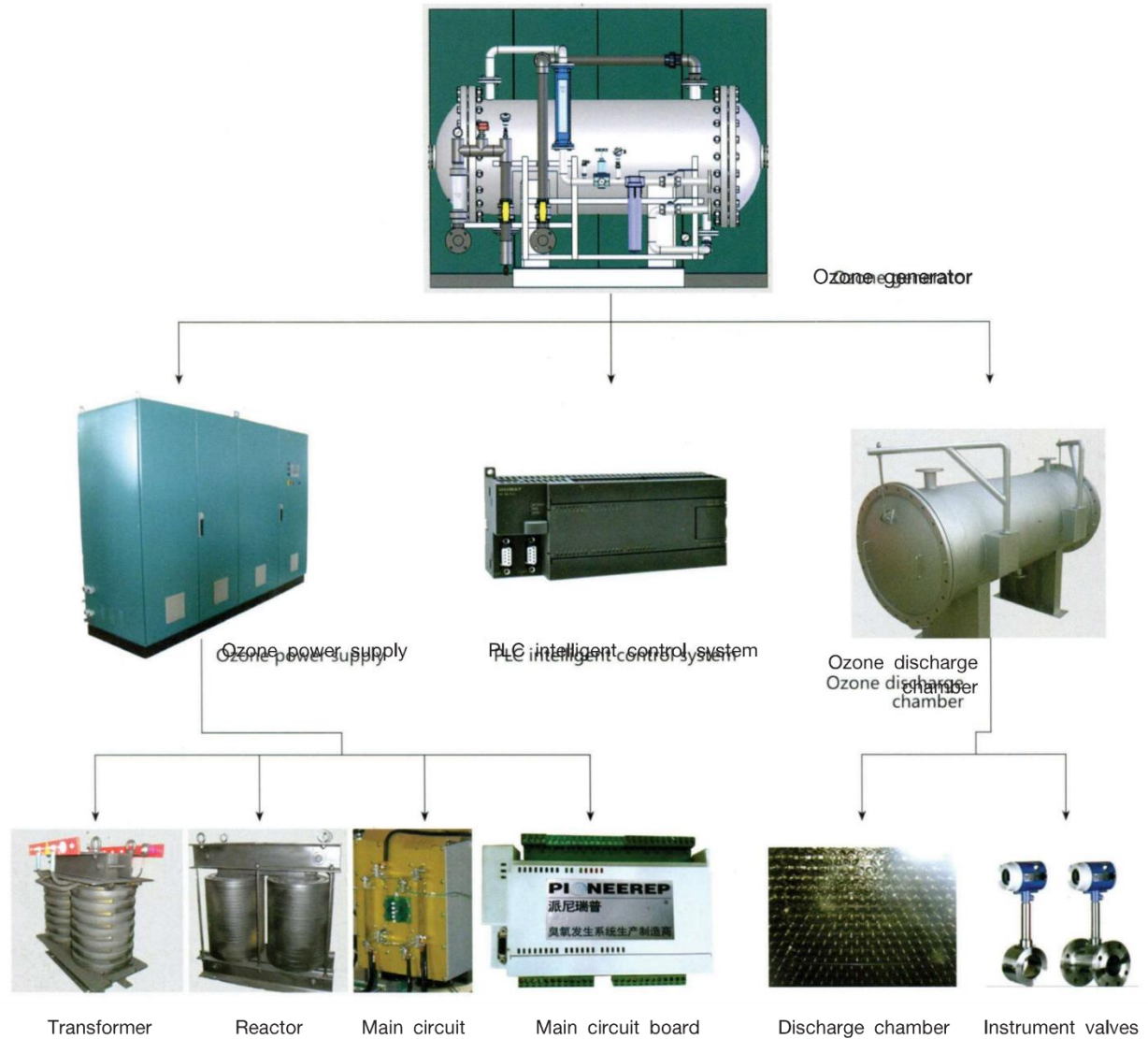
NITROGEN SUPPLEMENT SYSTEM

Adding a certain amount of nitrogen gas can improve the operating efficiency of ozone generator and extend the life of dielectric tube when pure oxygen is used as feed gas.



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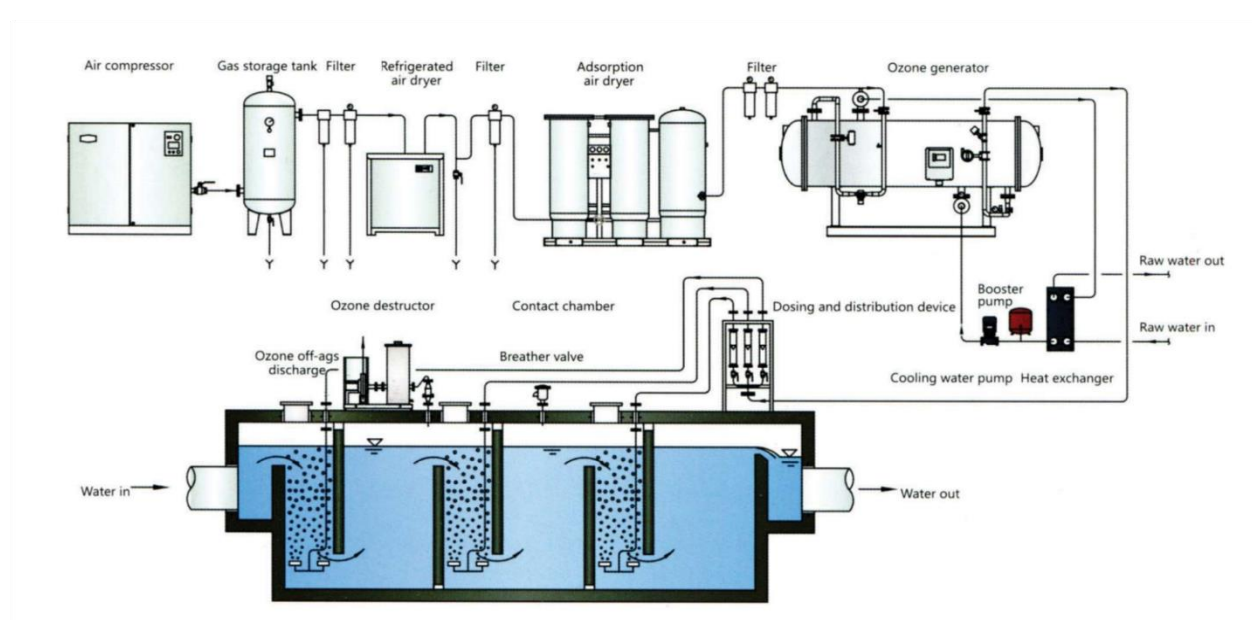
COMPOSITION OF OZONE GENERATOR



SYSTEM TECHNICAL PROCESS

Ozone generator with air source

Air Compressor → gas storage tank → water separator → refrigerated air dryer → oil elimination filter → adsorption air dryer → dust elimination filter → pressure reducing valve → ozone generator



Ozone generator with liquid oxygen source

Liquid oxygen storage tank → carburetor → pressure reducing device → dust elimination filter → ozone generator

