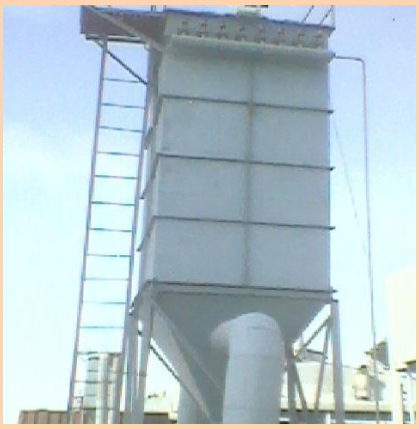
ENVIRO INTERNATIONAL CORPORATION

Air Pollution Control System ,Ventilation System and Dust Suppression System,

Enviro International is a project based company with a prime interest in Air pollution Equipment, Ventilation Systems and Dust Suppression System. Enviro International Corporation is promoted to provide one shop solution for Air Pollution and Air Ventilation System. Enviro has developed bag filter, ESP, and dust suppression system for filtering or suppressing dust in gases from all industrial areas through a bag-shaped fiber filter, ESP or spraying system so that the dust should not spread out with the gases.The use of pollution control equipment is increasingly being extended to dedusting of material preparation plants in the various industry.



Air Pollution Equipment

ENVIRO INTERNATIONAL CORPORATION

Product range

PULSE JET BAG FILTER

Dust Laden air enters the dust collector through the hopper or high –entry inlet housing section An internal baffle distributes the dirty air within, the housing ,so as to reduce air velocity and allow heavier particles drop into hopper, while lighter particle collects on the outside surface of the bags

The bag-filter shall be of pulse jet type having tubular sleeves and bags is arranged in a rectangular matrix. These sleeves contain cylinder cages inside to prevent them from collapsing. The dust laden air is drawn through sleeves by an externally connected centrifugal fan and during this process dust gets accumulated on the outside surface of the sleeves . These sleeves are periodically cleaned by short blast of compressed air (Pulse- Jet) directed downwards through ventures at the top of sleeves. These blast are in direction opposite to the flow of dust laden air. This reverse flow of compressed air flows the fabric bags away from the cages and loosens the dust collected on the bags . This process is initiated for each rows of bags.

For operation of bag filters, suction hoods shall be connected to suction take off points. These suction take off points shall be connected to the main ducting by branch ducting and the other end of main ducting shall culminate into bag filters. The outlet of bag filter to inlet duct of blower and the same will exhaust clean air to atmosphere vide a stack.

We have supplied DE System on various application like Induction furnace, heat treatment plant, banburry Mixture, rolling mill, Furnace, coal handling plant,Crusher and Screen house, bunker house,sponge iron plants, Rice mill, cement plants etc. In nos. of power plant,we have installation an a few of them has range from 60000 to 92,000m3/hr cap.

Cartridge dust collectors , cassette type bag filter

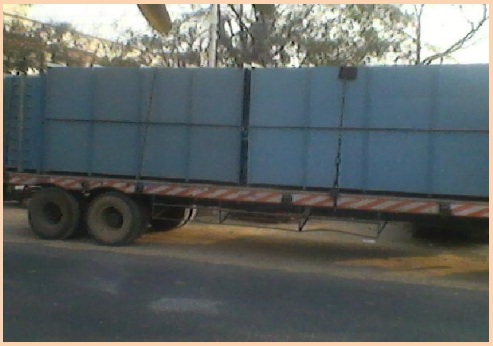
Cartridge collectors use perforated metal cartridges that contain a pleated, nonwoven filtering media. The pleated design allows for a greater total filtering surface area than in a conventional bag of the same diameter, The greater filtering area results in a reduced air to media ratio, pressure drop and also overall collector size.

Cartridge collectors are available in single use or continuous duty designs. In single-use collectors, the dirty cartridges are changed and collected dirt is removed while the collector is off. In the continuous duty design, the cartridges are cleaned by the conventional pulse-jet cleaning system. In cassete type rectangular filter bags are used.

Insertable bag filter

Insertable Bag Filters are suitable for direct mounting for bin vent, belt transfer point, bag-dump, mixer ventilation applications etc. The dust laden air is drawn on to the rectangular filter pads where dust is retained on the outside of the fabric. The pad is cleaned by reverse compressed air pulse.

The Insertable Bag Filter offered by us does not require any hoppers, ducting, structural supports, etc. The Insertable Bag Filter that we deal in helps easy discharge of dust on the bin, silo and conveyor etc.



Cyclonic bag filter

Cyclonic bag filter designed for collection of all kinds of dry dust, especially fibrous dust. The combination of cyclone and bag filter enables them to handle a very large dust burden, hence they are also well suited for pneumatic conveying and industrial vacuum cleaning Plants. The cylindrical design also makes them suitable for very dusty material like flour from roller flour mills, coal handling plants etc.

Reverse air bag filter, Manual shaking Bag Filter, etc is also manufactured by us.

Scrubber

Packed bed scrubber

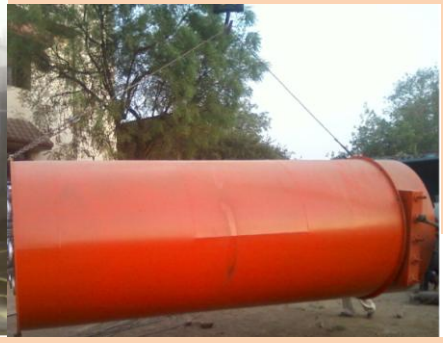
EIC packed beds are available in fiberglass reinforced polyester, stainless steel, high nickel alloys, mild steel, rubber lined steel and ceramics. The counter flow scrubbers are normally used for large air pollution control sources. The cross flow scrubbers are used in applications such as laboratory hood exhausts, small electroplating operations and other small emission sources. They are also used in odor control applications where a low profile is necessary. Fans can be provided which are integral with the packed bed. A variety of packing materials is available, Including PVC, polyethylene, polypropylene, ceramics, MS and various metals.

Ventury scrubber

EIC build the most durable and efficient venturi scrubbers available in the world. Venturi scrubbers are used to collect extremely fine particulate matter from industrial emission sources. They are commonly used to remove particulate matter from exhaust gas streams which are corrosive, flammable, or which contain difficult-to-handle solids. The particulate collection efficiency of a venturi scrubber is comparable to that of an electrostatic precipitator or a fabric filter bag house.

Cyclones and Multi Cyclone,

We offer high efficiency cyclone in robust construction,
We design and manufacture customized cyclone for every application,
Very low pressure drop as there is a optimized dimensional selection of cyclone
Multi cyclone for boiler and other application is also individually designed and manufactured,



Air Pollution Equipment

Ventilation and Cooling Systems

We are leading manufacturer of various types of ventilation system. We have executed a no Ventilation Systems projects .Ventilation System in power plants etc has already been commissioned and running successfully. Ventilation system has been supplied to APSEB,RSEB Prakash Indutries Ltd, Usha Martin etc and few more plants Thermal Power Plant Projects of 25MW to 500 MW cap..

Air Washers,

We are leading manufacturer and exporter of Evaporative Air Cooling globally. . The products which come under this category are Evaporative Air Cooling- Single Skin and Evaporative Air Cooling-Double Skin.

We offer superior quality , Industrial Air Washer Unit that work on the principle of cooling the air by passing it over water-saturated pads, water evaporates and results in cooling of air,. The cool air is then directed into the ventilated area, . Air Washer Unit is a very energy-efficient means of cooling. Air Washer System with cellulose paper pads, cross sectional, specially treated fluid media capable of absorbing and retaining water to provide the maximum cooling efficiencies. The cooling pad is cross-corrugated to maximize the mixing of air and water and eliminate water carryover.

Air Washer are available from 2000 m3/hr to 3,00,000 m3/hr capacity and can be supplied for various applications namely, MCC rooms, ventilation for works, tunnel ventilation, ventilation for basement, crusher house, exhaust fan system, ventilation system for complete thermal power station Etc.

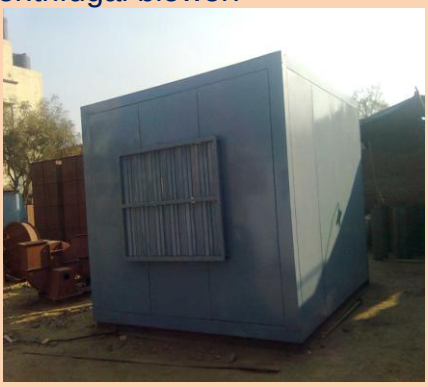
Two Stage Direct / Indirect Evaporative Cooling,

We are leading manufacturer of the equipment, Two-stage evaporative coolers do not produce humidity levels as high as that produced by traditional single-stage evaporative coolers. In the first stage of a two-stage cooler, warm air is pre-cooled indirectly without adding humidity (by passing inside a heat exchanger that is cooled by evaporation on the outside). . The result, according to the manufacturer, is cool air with a relative humidity between 50 and 70 percent, depending on the climate, compared to a traditional system that produces about 80 percent relative humidity air.

Dry ventilation system / Tunnel ventilation system,

We are leading manufacturer of the equipment and have supplied a nos of dry ventilation system for tunnel to so many power plants. Dry ventilation system unit is provided in cabinet type construction and comprises of wire mesh type HDPE filters, centrifugal blower with driving / installation accessories, house in GI fabricated housing.

The fresh air is drawn in the unit through filters where the same gets filtered down to 5-20 micron level. The fresh filtered is then supplied to the connected department with the help of supply air centrifugal blower.



Dust Suppression System

We offer Dust Suppression system for Stock Yard, Belt Conveyor line for power plant & other industries, Wagon Tippler , Belt transfer points, Reclaimer Hopper, Screen, crusher, etc.

We offer
Plain Water system
Dry Fog System,
Stock yard Sprinkling System etc - Sprinkling System is used for Sock Yard Area or Raw Material Storage Area.

We are executing 2x600 MW project DS System along with its tunnel ventilation system for CHP Plant and also at the moment working at design and drawing stages for DS system and ventilation system for NTPC Plant CHP lineage project.. For further details of DS system, please request for individual catalogue of DS System.

Industrial Fan

Centrifugal fan manufactured is from 500 m3/hr to 2,00,000 m3/hr, having pressure rating as high as 1200mm wg. Centrifugal Blowers are available in single inlet single width design with backward curve, forward curve, straight radial impeller for low, medium and high pressure applications,
High Volume Limit Load Blowers*(SISW Type)
High Volume Limit Load Blowers*(DIDW Type)
Induced and Forced Draft Fans
Backward Curved Blades Fans

Exhaust Fan, Roof extractors Axial fan Fans for ventilation Systems

Electrostatic Precipitator

We offer Electrostatic Precipitator ESP for removing the dust from the fumes or exhaust gases before it goes out to stack. ESP is used for removing fine particulates from air streams and widely used in Industry like Steel, Sponge, Cement, Bio Gas Power Plant, Power Plan., Gases enters ESP and comes out with a cleanliness up to 99.9%.

The flue gas leaving from FD Cooler / GCT/ WHRB at a temperature 160 -220Deg C will be through an insulated mild steel duct to a horizontal three electric field electrostatic precipitator. The dust laden flue gases flow through a system of gas passage consisting of strip type collecting electrodes (400 pitch) between which rigid mast are positioned to act as discharge electrodes. The discharge electrodes are connected to negative terminal of high voltage direct current supply while the collecting electrodes are terminated to positive supply and earthed. Due to high field strength in the vicinity of discharge electrodes a corona discharge is created. Gas ions are produced which attached themselves to the dust particles. An ID Fan is installed with Electro Static Precipitator for the suction of gases.

Forced Draft Cooler

We supply FD Cooler / Air Recuperator and is basically gas to air heat exchanger. It is used to cool the exhaust gases from the Kiln, boilers etc. The hot gas passes through vertical tubes and ambient air is blown over the tube in number of modules for cooling the gas. There are two to four passes in the hot gas side depending upon the quantity of flue gas and its temperature, Dry type forced draught cooler does not require water. There are number of FD Fans for cooling. Hence there is more flexibility in regulating air flow to maintain accurate exit temperature. Cooling tube banks are of vertical design with no chance of dust accumulation. All three modes of heat transfer i.e. radiation, conduction and convection are used simultaneously to dissipate heat thereby reducing less power consumption.

Pneumatic Conveying System

Pneumatic Conveying System is a widely used for transporting dry bulk material either by Vacuum or by Pressure of Air. Depending on the material to be conveyed, system is designed to carry the material to the final destination with the air stream.

Belt conveyor and accessories, Belt conveyor spares – We supply belt conveyor and its accessories like crusher ,screen on turnkey basis. We also supply belt conveyor spares like idler, pulley, belts etc

Company profile

Our philosophy is to treat our business partners with respect and integrity, honoring commitments and taking the long term perspective and obtain the long-term commitment from our employees to produce quality and profit through the Partners in Profit program. The company is committed to produce quality products to ensure customer satisfaction.

EIC products are based on the latest international standard method of design and quality. Company continuously innovate its designing and quality capability to meet the client requirement . It believe in assisting your company by providing committed, competent and dedicated professional services to your projects and your requirement of air pollution control equipment. EIC has team of experienced and highly skilled engineers, who has expertise in carry out international design standard norms to meet the specific requirement.

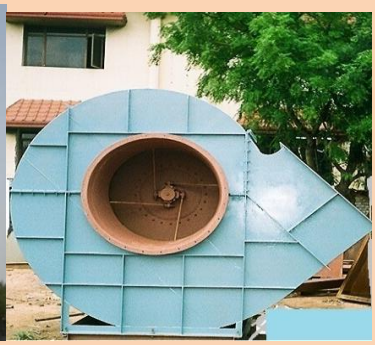
Typical Application of Bag Filter

- Material transfer points of belt conveyors in cements industry, power industry, sponge industry
- Coal Handling Plants, Crusher House, Screen house,
- Kiln exhaust, feeding and injection points , Bunker house
- Bag filter for Fly Ash Handling Plants
- Soda Ash, Lime, Clay, Calcium Oxide Industry
- Auto Industry and Wood Industry
- Welding/Soldering fumes exhaust systems

A few References

M/sJindal Steel & Power Ltd
RSEB BARMER,
MSEB, MAHAGENCO
RSEB, SURATGARH,
APGENCO, BGR,
CM, Oman,
Rayalseema Alkalies,
Kesoram Industries Ltd

Note – For more details of various equipment, please request for individual catalogue,


Air Pollution Equipment

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