# **Mobile Suction Unit**

mounted on trailer empties dust free into BIG BAGS



# 1 Mobile Suction unit, Type TE-3-37:

# **Technical description:**

The suction unit TE-3-37 is a complete vacuum conveyor, which consists of

- a drive unit with motor, vacuum pump and safety filter and all necessary control valves,
- the receiver for the material with main filters
- and integrated pre separator.

The whole unit is mounted on a tandem axle trailer.

The filter separator is lifted hydraulically to empty the absorbed materials into a BIG BAG.

For the transport of the unit the supporting legs of the trailer are lifted into drive position, the filter-receiver lowered down and the trailer attached to the towing vehicle.

A hydraulic power unit and the control cabinet with all necessary controls are installed in front of the drive unit on the trailer.

The power unit is sound insulated and complies with the standards requested by industries and service providers.

### Vacuum unit

The vacuum unit is a compact built powerhouse with drive motor, vacuum pump, control valves, safety filter and the necessary sensors.

It is connected to a separator with integrated main filters.

The plant is used for cleaning, material transport and recycling.

The drive unit is mounted in a sound protected power house made from steel with doors on each side for maintenance.

The maintenance is very little and consist of weekly check up of belt tension and every six month of oil change in the vacuum pump. (depending on the hours running).

## **Spezification**

# Vacuum pump:

Roots-Pump made by Aerzener, for high working stress with and changing loads, with vacuum overload relieve valve, vacuum gauge, temperature gauge with alarm when overheating, safety filter and silencers at suction and blow out side.

Maximum air volume with pressure of 100 mbar = 2.100 m<sup>3</sup>/h. Maximum vacuum pressure 500 mbar.

#### **Electric motor**

IEC-norm 3 phase electric 3 phase short circuit motor 400 V, 50Hz, IP 55, ISO Kl F, with automatic overload switch.

Maximum power consumption with full vacuum pressure (500 mbar) 37 kW

#### **Transmission:**

Fan belt driven, easy tensioning of the belts.

### **Machine foundation:**

One frame for motor and pump, isolated mounted on main foundation and above the silencer.

## Safety and control filter:

Standard filter cartridge 10 m², for protection of the vacuum pump and if the main filters are faulty. Classes U,S,G, C. Supply with specification K1 (for asbestos etc.) possible.

# **Temperature switches:**

Set to the maximum temperature permissible to the pump. When exceeded, the unit will stop automatically and the fault will be shown on the control panel.

Automatic Stop: - E-motor protection and pump temperature.

#### Finish:

Protected against rust with primer and finishing surface according to manufacturers standard , colour: RAL 5001

**Maximum sound emission:** 75 dB (A) in 1 m distance.