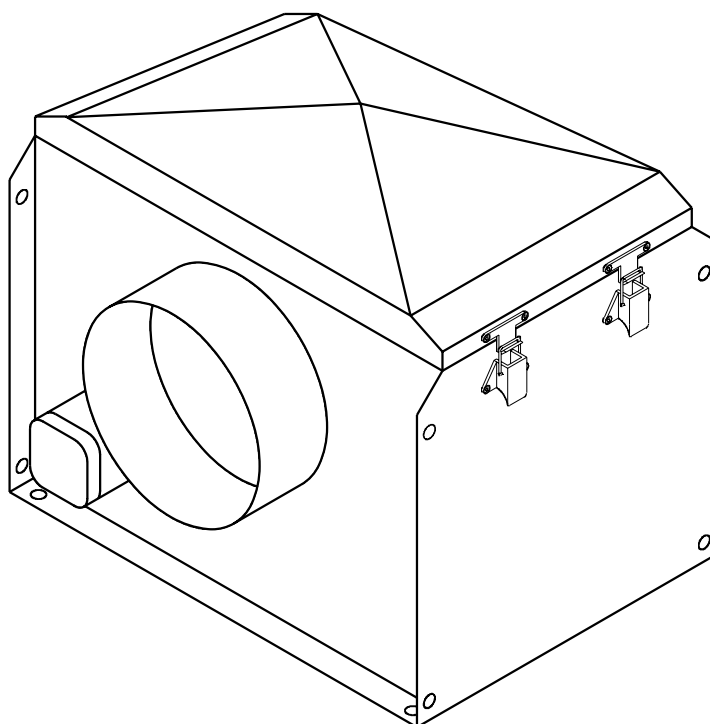


Vent-Axia®

ACOUSTIC FANS

Installation, Set-up and Operating Instructions



CE

Stock Ref. No.

ACQ 100-12C

ACQ 200-12C

ACQ 400-14C

ACQ 125-12C

ACQ 250-12C

ACQ 500-14C

ACQ 150-12C

ACQ 315-12LC

ACQ 500-34C

ACQ 160-12C

ACQ 315-14HC

**READ INSTRUCTIONS IN CONJUNCTION WITH ILLUSTRATIONS
PLEASE LEAVE THESE INSTRUCTIONS WITH END USER**

INSTALLATION AND WIRING INSTRUCTIONS FOR ACQ ACOUSTIC FAN

IMPORTANT – READ THESE INSTRUCTIONS FULLY BEFORE COMMENCING THE INSTALLATION

DO NOT install this product in areas where the following may be present or occur: -

- Excessive oil or a grease laden atmosphere.
- Corrosive or flammable gases, liquids or vapours.
- Ambient temperatures higher than 50°C or less than –15°C.
- Relative humidity above 95%.
- Possible obstructions which would hinder the access or removal of the fan.
- Sudden ductwork bends or transformations close to the fan.

SAFETY GUIDANCE NOTES

- A. All wiring must be in accordance with current I.E.E. Regulations, or the appropriate standards of your country. The equipment should be provided with a local double pole isolator switch having a contact separation of at least 3mm.
- B. Ensure that the mains supply (Voltage, Frequency and Phase) complies with the rating label.
- C. The fan should only be used in conjunction with the appropriate Vent-Axia products.
- D. It is recommended that the connection to the terminal box is made in flexible cable or conduit for easy maintenance.
- E. The fan should not be sited within 600mm of/or 2250mm above a bath/shower tray, in accordance with the current I.E.E Regulations for bathrooms.
- F. When the fan is used to remove air from a room containing a fuel-burning appliance, ensure that air replacement is adequate for both the fan and the fuel-burning appliance.
- G. Where a fan is used to supply air into a room, ensure that the fan intake is located a minimum of 600mm from any flue outlet.
- H. This fan is designed as an inline duct fan to be positioned between lengths of ducting. Short duct runs terminating within 1.5m must incorporate suitable guards unless the fan is mounted higher than 2.3m.
- I. This fan should not be used where it is liable to be subject to direct water spray from hoses etc.
- J. Where ducted fans are used to handle moisture-laden air, a condensation trap should be fitted. Horizontal ducts should be arranged to slope slightly downwards away from the fan.
- K. Certain applications may require the installation of sound attenuation material to achieve the sound levels required. An auto transformer speed controller is also recommended.

INSTALLATION

FAN MOUNTING

1. The fan is suitable for mounting at any angle.
2. Securely mount the fan using the appropriate holes in the flanges, drop rods, bolts, anti-vibration mounts etc.
3. Flexible connectors should be used at the fan inlet and outlet.
4. Ensure that there is an adequate clearance for accessing the fan and the removal of the access panel if appropriate.

WIRING

WARNING: - THE FAN AND ANCILLARY CONTROL EQUIPMENT MUST BE ISOLATED FROM THE POWER SUPPLY DURING INSTALLATION AND / OR MAINTENANCE. THE EQUIPMENT MUST BE EARTHED.

1. Select and follow the appropriate wiring diagram (*Figs. 1-6*)
2. Check that all connections have been made correctly. Ensure that all terminal screws and cable clamps are securely fastened.
3. The cable entry must be by a suitable grommet or cable gland.
4. Switch the mains supply on and check the system is operating correctly.

ROUTINE INSPECTION AND MAINTENANCE

ISOLATE UNIT FROM ELECTRICAL SUPPLY AND ENSURE THAT IT CANNOT BE ACCIDENTALLY TURNED BACK ON

1. At intervals appropriate to the installation, the fan should be inspected and cleaned to ensure there is no build up of dirt or other deposits on the impeller or the motor (Caution - take care not to dislodge any balance weights which may be fitted to the impeller). If the fan is handling dust laden air, it is recommended that a filter is installed.
2. All Vent-Axia acoustic fan motors are fitted with sealed for life bearings and therefore do not require lubrication.

OVERHEATING PROTECTION

The fan motor is fitted with Standard Thermal Overload Protection. This will automatically switch the fan Off in the event of a fault condition. If this occurs, isolate the fan, check for any obstruction, leave the fan for a short time for the motor to cool before reconnecting the power supply. If the fault reoccurs, isolate the power supply and call a service engineer.

Fig. 1.

SINGLE PHASE FAN CONTROLLED BY D.O.L. STARTER

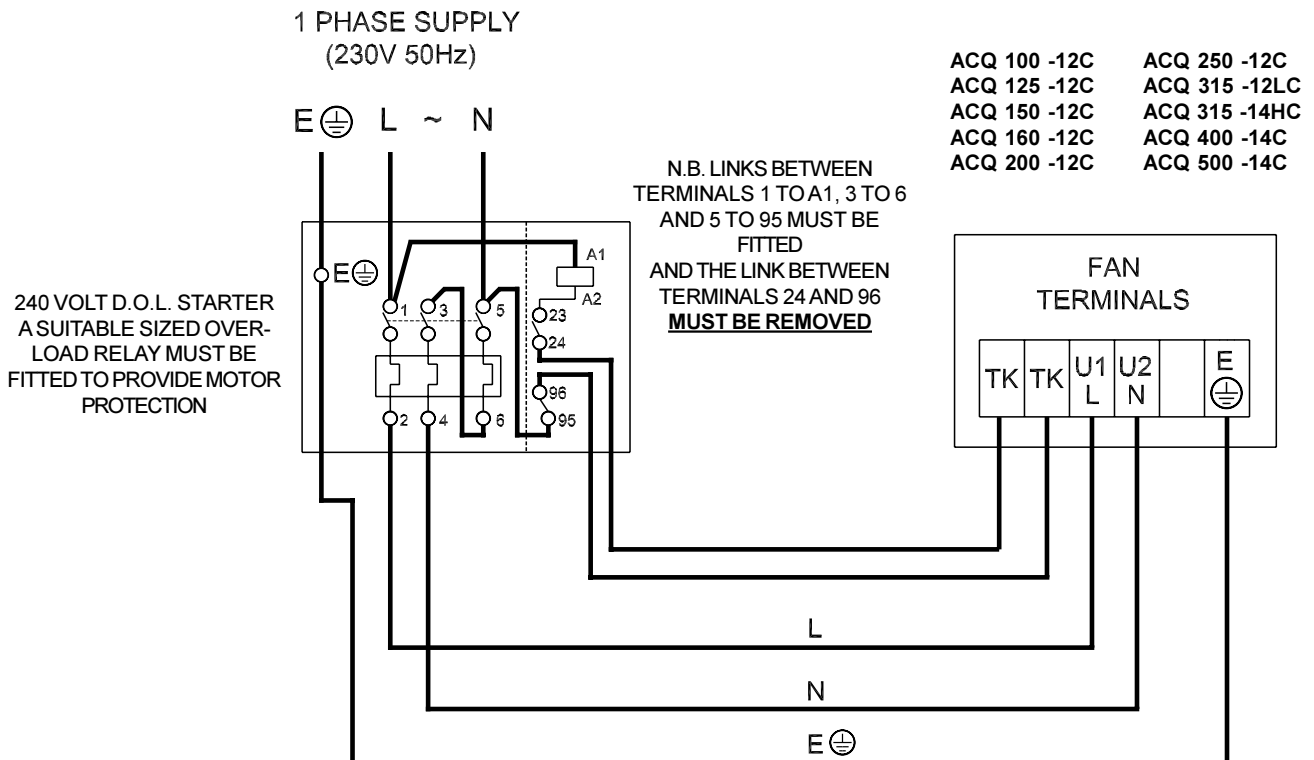


Fig. 2.

**SINGLE PHASE
FAN CONTROLLED BY A 2.5 AMP ELECTRONIC SPEED CONTROLLER**

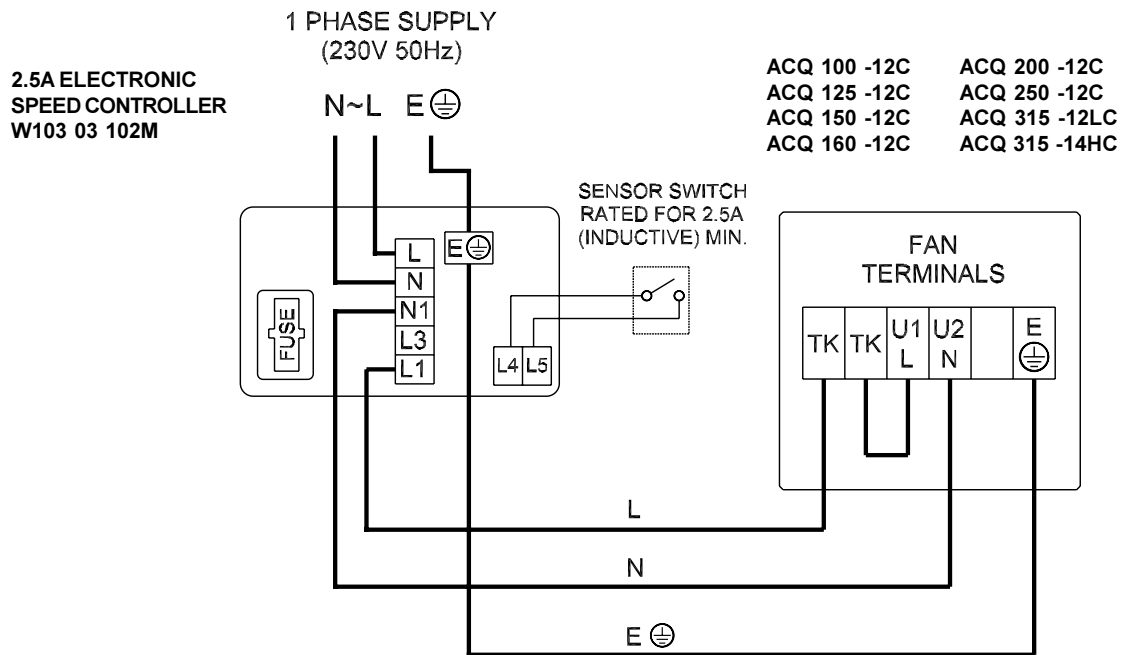


Fig. 3.

**SINGLE PHASE
FAN CONTROLLED BY 3A, 6A OR 10A ELECTRONIC SPEED CONTROLLER**

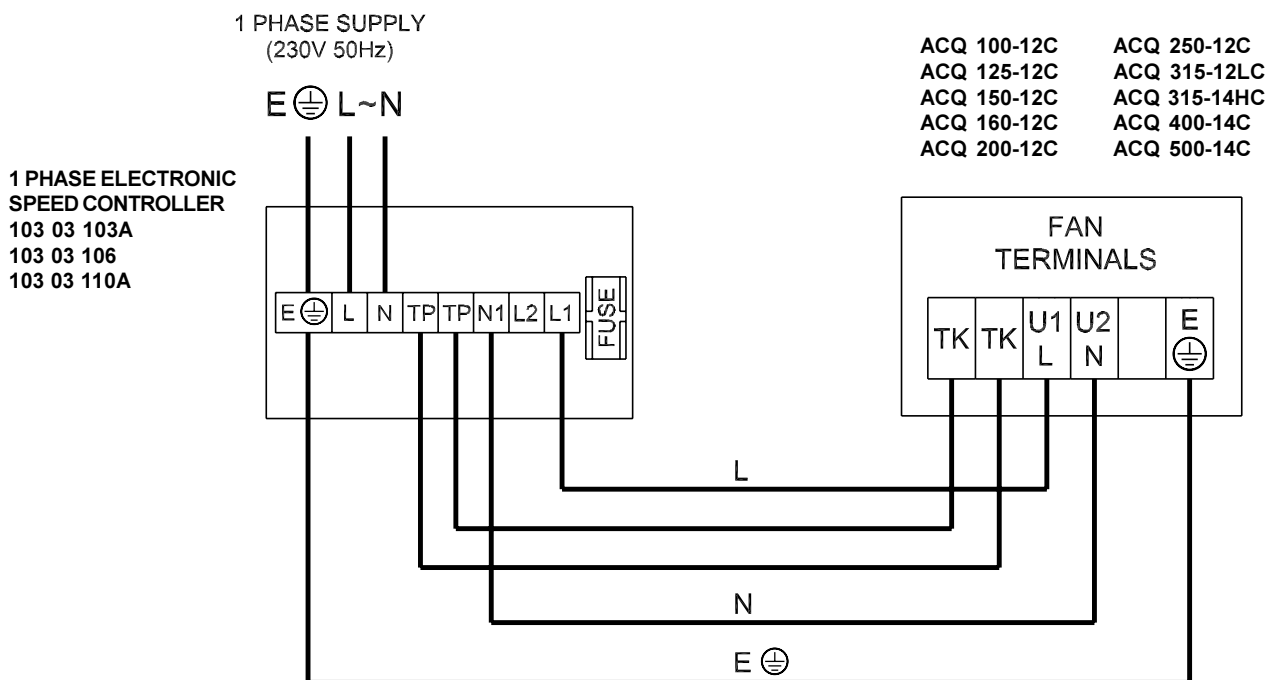


Fig. 4.

**SINGLE PHASE
FAN CONTROLLED BY AN AUTO-TRANSFORMER SPEED CONTROLLER**

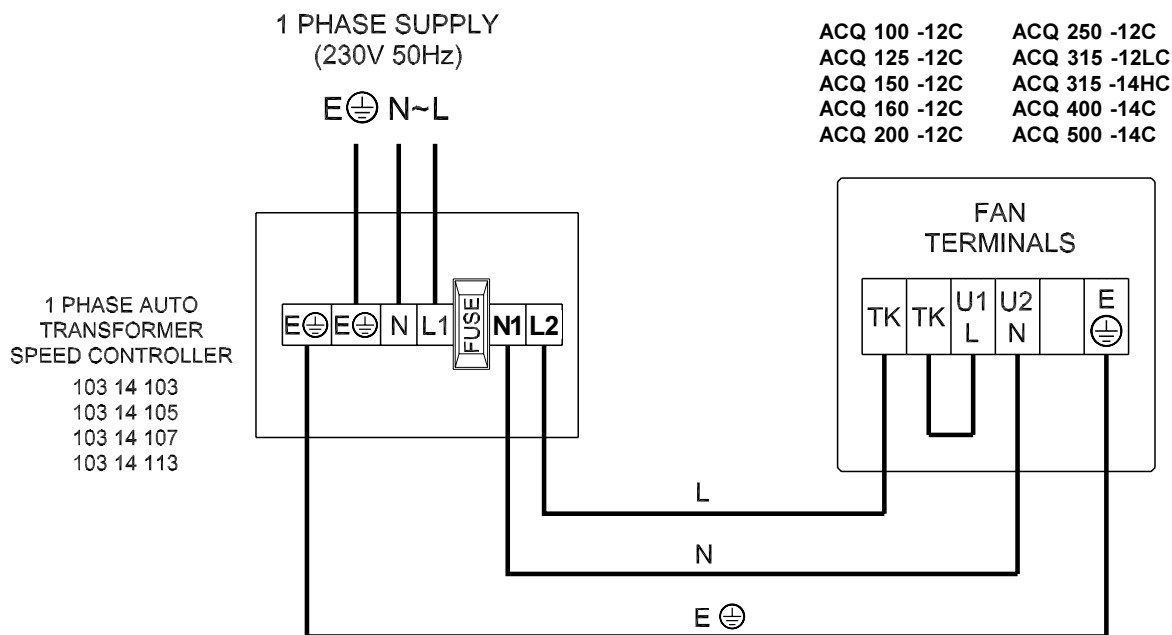


Fig. 5.

**THREE PHASE
FAN CONTROLLED BY D.O.L. STARTER**

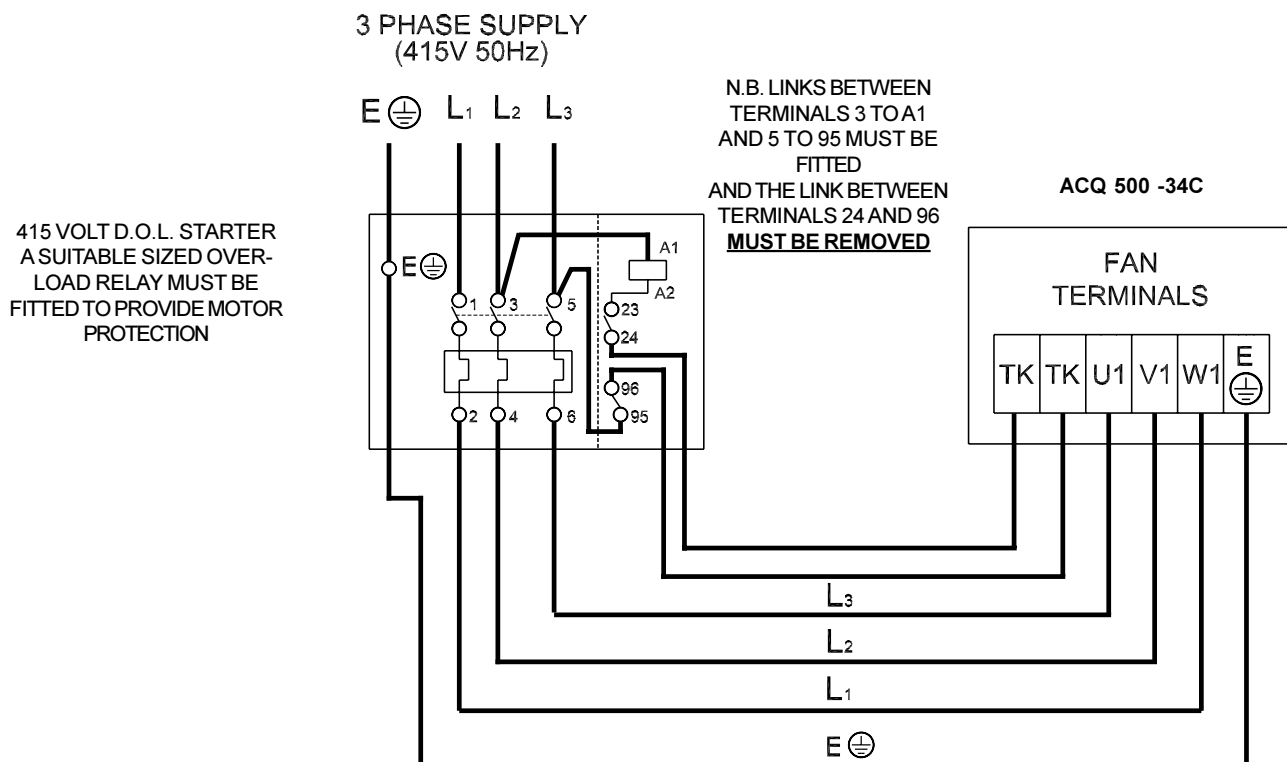
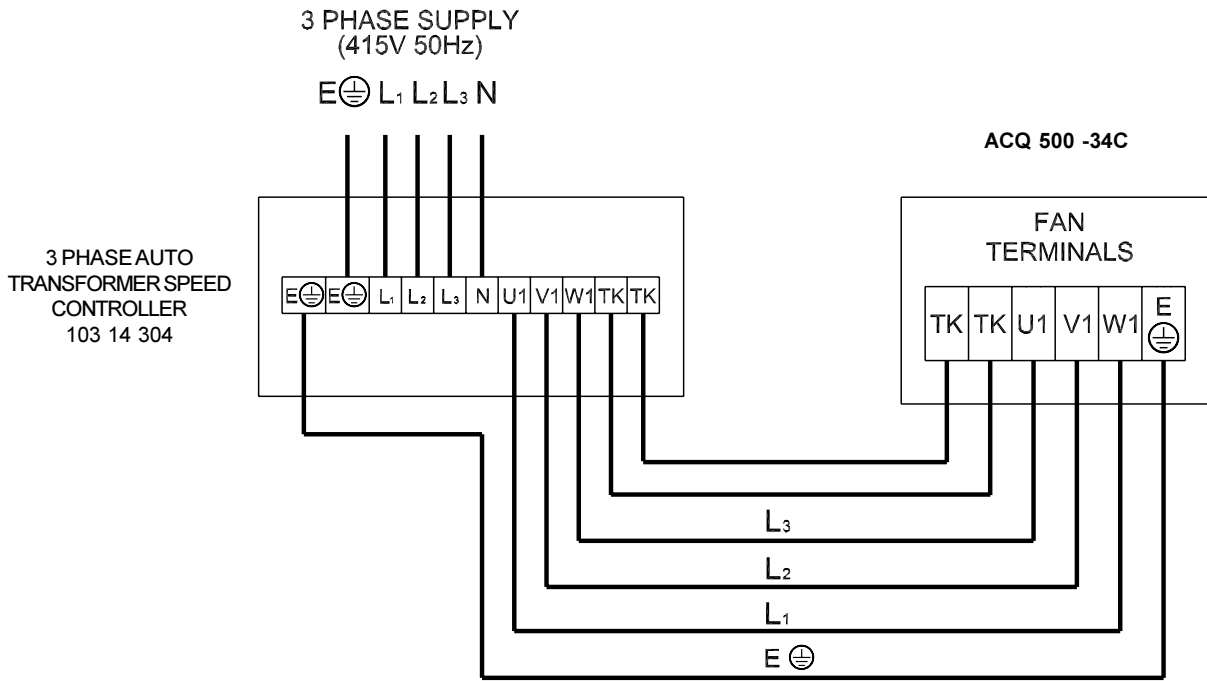
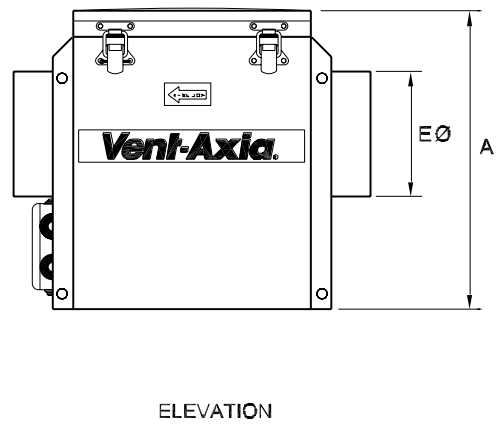
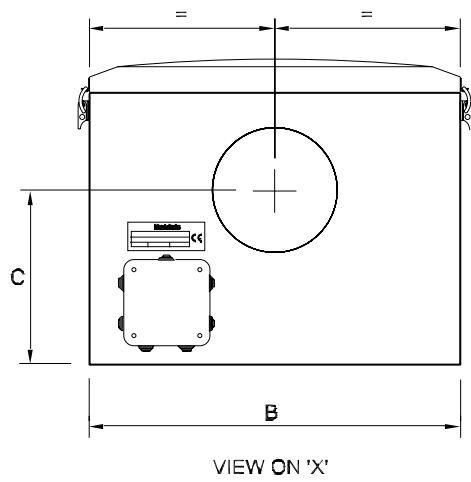
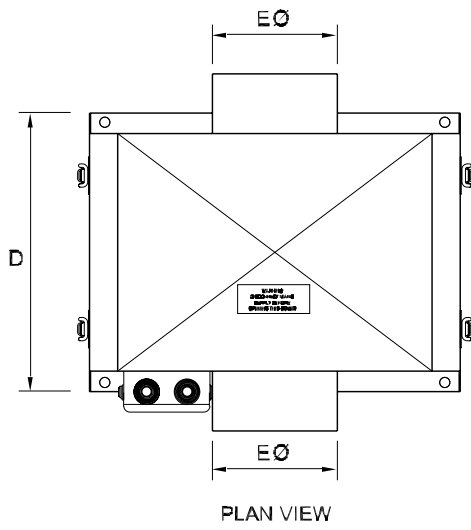


Fig. 6.

**THREE PHASE
FAN CONTROLLED BY 5 STEP AUTO TRANSFORMER**



DIMENSIONS (mm)



	A	B	C	D	E	Kg (approx)
ACQ100-12C	291	363	171	272	97	14
ACQ125-12C	291	363	171	272	122	14
ACQ150-12C	291	363	171	272	147	14
ACQ160-12C	291	363	171	272	157	14
ACQ200-12C	345	400	203	336	197	20
ACQ250-12C	400	489	233	336	247	25
ACQ315-12LC	458	537	258	446	312	35
ACQ315-14HC	495	614	295	499	312	45
ACQ400-14C	495	660	253	499	397	50
ACQ500-14C	649	732	357	670	497	75

