Product Data Sheet Horizontal A.C. Motors Unimount 125® Totally Enclosed Fan Cooled



- Totally Enclosed Fan Cooled
- Energy, NEMA and Inverter Duty Types FUT, UTE, UTI
- 1.25 Service Factor
- 1/4 through 30 horsepower 3600, 1800, 1200 rpm 200, 208-230/460 & 575 volt
- Removable Feet on 182 frame and up
- ALLGUARD[®] Motor Quality System





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U.S. Motor's **Unimount 125**® is a totally enclosed fan cooled motor with a 1.25 service factor. These TEFC motors meet standard NEMA requirements including 40°C ambient conditions, class F insulation (with class B temperature rise), NEMA Design B and usable up to 3,300 feet above sea level.

The Unimount has an aluminum alloy extruded frame that improves heat dissipation for cool operation and long life (180 frame and larger). Die cast aluminum brackets have steel or cast iron bearing cavity inserts to ensure reliable under load performance severe applications. The 56 and 140 frames are rolled steel.

Unimount motors offer the widest range of electrical and mechanical features of any motor on the market today. The diagonally split conduit box is oversized compared to NEMA standards. Other mechanical features include a rugged motor base which is removable on 180 frame and larger to allow conversion to a footless configuration. A canopy cap kit is provided for vertical mounting, and Shur-Stop brake kits are available from 1 1/2 to 35ft. Ibs. In addition, C Face and D Flange kits are available - and there is no need to pull the output bearing!

All copper windings and low loss stator laminations provide maximum efficiency. The Unimount motor is offered in both high efficient type FUT and the NEMA[™] premium efficient type UTE. This allows you to choose the level of motor efficiency that best suits the needs of your application - plus, both efficiency levels meet the 1997 federally legislated efficiency levels.



Shown above are the many options available to easily convert the Unimount Motor to meet you specific application requirements.



Product Features

Total Winding Temperature

	1.0 SF Load	1.15 SF Load	1.25 SF Load
Unimount	A (100° C)	B (130° C)	C (155° C)
Most Competitive Motors	B (130° C)	C (155° C)	Not Available
Most Competitive motors (with "B" Insulation)	D (130° C)		

Industry Rule of Thumb: (See above table Total Winding Temperature)

Each 10°c reduction in motor temperature doubles the expected life of motor windings.

RESULT - locating points A through D on the following graph, you can see that the Unimount offers incredible improvement in winding life due to U-frame type of temperature rise while offering a full Class F insulation system.



Temperature vs. Life Curves for Insulation Systems



Unimount 125® motors offer the widest range of application possibilities of any motor on the market today.

- * The Unimount motor can be used on pumps, fans, compressors, general industrial belt drive and direct drive equipment
- The footless "C" face type can be used as an input to speed reducers for material handling equipment.
- The Unimount Air Over model is used on propeller fans where fan air blows directly over the motor.
- The Unimount multispeed is used on fans, blowers and machine tools where more than one standard speed is required.
- The Unimount motor can be converted to a brakemotor for use on conveyors, speed reducers and other equipment requiring quick stops.

• The Unimount is used for pumps, fans, compressors, general industrial belt drive and direct-connected equipment where 12-lead, wye-start/delta-run is required.

• The Unimount is also available as an inverter duty motor, meeting both parts 30 and 31 of NEMA MG-1 standards.

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PDS 200-192 Rev. 12/03

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