TEMA SPM132
Permanent Magnet Motors

Practicing the advantage of a new permanent magnet motor technology

16-76 HP
SPM132

Your *Permanent* Power

SPM132 motor and generator family is extremely versatile and endurant. Whether in industrial, working machines, automotive or marine applications these motors will give you the best results.
Motor with forced air cooling

Motor with natural cooling

Motor Type | A [mm] | B [mm] | C [mm] | C* [mm] | D [mm] | E [mm] | F [mm]
---|---|---|---|---|---|---|---
SPM132-01 | 80 | 100 | 342,5 | 274,5 | 12 | 44,8 | 42
SPM132-12 | 90 | 106 | 395,0 | 327,0 | 14 | 51,5 | 48
SPM132-02 | 90 | 106 | 447,5 | 379,5 | 14 | 51,5 | 48
SPM132-22 | 90 | 106 | 500,0 | 432,0 | 14 | 51,5 | 48
SPM132-03 | 90 | 106 | 552,5 | 484,5 | 14 | 51,5 | 48

C* - Motor with natural cooling

Shaft end can be made according to user specification

Connections can be oriented according to user specification
SPM132 PERMANENT MAGNET MOTOR & GENERATOR FAMILY - TECHNICAL DATA

Flange = 260x260mm  Isolat.Class = H  Thrm.Class = F
Nnom = 1800 & 3600 RPM  fnom = 120 & 240 Hz
Nmax = 2500/4500 RPM  fmax = 168 & 300 Hz  cos φ = 0,95 - 0,99
Mch.Prt  IP23 & IP54

SPM132-1 [73Kg]
@1800 RPM 12KW/16HP 63/70Nm
@3600 RPM 19KW/25HP 52/70Nm

SPM132-12 [93Kg]
@1800 RPM 19KW/25HP 103/111Nm
@3600 RPM 29KW/39HP 77/111Nm

SPM132-2 [110Kg]
@1800 RPM 25KW/33HP 133/145Nm
@3600 RPM 41KW/55HP 109/145Nm

SPM132-22 [130Kg]
@1800 RPM 30KW/45HP 159/178Nm
@3600 RPM 50KW/67HP 132/178Nm

SPM132-3 [148Kg]
@1800 RPM 35KW/47HP 185/205Nm
@3600 RPM 57KW/76HP 152/205Nm

SPM132 version
without fan
- smaller dimensions

SPM132 version
with fan - more
power

- Rotor position feedback resolver sensor built in
- All motors forced ventilation cooled or natural cooled on request
- All motors can operate in 40°C ambient temperature with different tech specification
- Motors can be supplied in a frameless OEM version
  We retain the right to change any data without prior notice.
SPM132 is a surface permanent magnet motor and generator family in a standard 132 motor frame. Advanced design of these machines offers higher power concentration (W/cm³), high dynamic and lower torque ripple.

**FEATURES**
- Surface Permanent Magnet segments
- Mechanical and chemical PM protection
- Constant torque & constant power control features
- Very low torque ripple
- Low vibration
- High efficiency
- High W/Kg ratio
- Ambient friendly machine
- Efficient air cooling system
- Low thermal dissipation
- Long life
- Closed mechanical design

**APPLICATIONS**
- Industrial applications
- Marine applications
- Electric vehicles
- Power generation
- Oil industry
- Machine tool industry
- Mining
- Pumps
- Compressors
- Cranes & Hoists
- Elevators
- Paper machines
- Air conditioning equipment
- Winders
- Winches

**BENEFITS**
- Smaller dimensions
- Lower weight
- Lower cost
- Smoother running
- Constant torque across RPM's
- Mechanically protected PM segments
- Chemically protected PM segments
- Robust bearing support
- Higher efficiency under various conditions
- Robust mechanical construction
- Fits submerged applications
- No maintenance required

The connection box can be arranged according to user needs and specification.

SMP132 coupled to a propeller shaft by reduction gearbox

The rotor has a perforated center core for achieving minimum rotor inertia.
Advance technical features make these electric machines perfect for highly demanding purposes and long life reliance while offering an ambient friendly solution.

All applications where precise speed and/or torque control are required the SPM132 permanent magnet motor family is the best solution.

Cooling system integrated in to the stator structure  Precise and high quality winding  Robust industrial strength shaft

The SPM132 is a highly efficient generator and can work with all types of prime movers, resulting in a very compact generator set.

SPM132 is optimal for electro propulsion solutions. Whether in marine applications or electric vehicles, the benefits are numerous. Smaller dimensions, less vibration and lower noise will make your driving experience more comfortable, while leaving no carbon footprint.