NEMA Contactors and Starters

Freedom Series

NEMA Size 1—BN15DN0AB



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Starters—Single-Phase Non-Reversing, Full Voltage, Bi-Metallic Overload

Product Description

Single-phase, full voltage magnetic starters connect the motor directly across the line, allowing it to draw full inrush current during start-up. These starters are most commonly used for control of self-starting single-phase motors up to 15 hp at 230V. They consist of a two-pole electromagnetic contactor to make and break the motor power circuit and an overload relay to provide running overload protection. Starters listed in the table include:

- Two-pole Freedom Series contactor with long life twin break, silver cadmium oxide contacts. Generously sized for low resistance and cool operation. Designed to 3 million electrical operations at maximum hp and 30 million mechanical operations to Size 0, 10 million operations to Size 2 and 6 million operations to Size 3
- Three-pole Freedom Series overload with poles two and three wired in series for motor overload protection. This overload is ambient compensated, selectable manual or automatic reset, interchangeable Class 10 or 20 heater packs, 1.0 or 1.15 service factor selectability, overload trip indication and electrically isolated NO-NC contacts (pull RESET button to test)
- Holding circuit NO auxiliary contact supplied as standard. On Size 00, the contact occupies the 4th power pole position. Sizes 0–3 have the NO auxiliary mounted on the right side of the contactor
- Steel mounting plate as standard on all open type starters. Wired for separate or common control

Freedom Series

Product Selection

When Ordering Specify

Catalog number

2

Heater pack number (see selection table, Pages V5-T2-40 to V5-T2-42) or full load current

BN16DM0AB Type BN16 NEMA—Manual or Automatic Reset Overload Relay



NEMA Size	Maximum Horsepower Motor Voltage	Single-Phase	Magnet Coil Voltage (60 Hz)	Open Type Two-Pole Catalog Number
00	115	1/3	120 1	BN16AN0AC
	230	1	240	BN16AN0BC
0	115	1	120 1	BN16BN0AC
	230	2	240	BN16BN0BC
1	115	2	120 1	BN16DN0AB
	230	3	240	BN16DN0BB
1P	115	3	120 1	BN16PN0AB
	230	5	240	BN16PN0BB
2	115	3	120 1	BN16GN0AB
	230	7-1/2	240	BN16GN0BB
3	115	7-1/2	120 1	BN16KN0A
	230	15	240	BN16KN0B
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Starter catalog numbers do not include heater packs. Select one carton of three heater packs. Heater pack selection, Pages V5-T2-40 to V5-T2-42.

Note

① For separate 120V control circuit. For maximum hp at listed motor voltages, use the rating of other starters of same size.

Wiring Diagrams

Single-Phase Applications (Factory Wired)



Separate Control

Front View of Panel

