

Effective: November 18, 2014

## Amp Draw General Information Guidelines

These values for motor full-load current and time delay fuses are to be used as guides only. Where exact values are required (e.g. for motor protection), always use the full load ampere appearing on the motor nameplate. If in doubt, consult local hydro authorities for proper fuse sizing.

## Dock Levelers and Vehicle Restraints

### Hydraulic Dock Levelers

All Blue Giant hydraulic dock levelers use a 1HP motor, no matter what the voltage range may be. Some of the values listed below were taken from current motors. Different motor manufacturers may have different ratings due to variables such as RPM, service factor (SF), and duty cycle (DC). If exact values are needed, consult motor nameplate.

The **StrongArm™ SVR303** hydraulic vehicle restraint uses a 1.0 HP motor.

The **StrongArm™ TL85** hydraulic vehicle restraint use a ½ HP motor.

The **StrongArm™ HVR303** electric vehicle restraint uses a ¼ HP motor.

Voltage	1.0 HP Motor Amps FLA	TD Fuses	1/2 HP Motor Amps FLA	TD Fuses
115V / 1PH	13.0	20A	8.2	15A
230V / 1PH	6.5	10A	4.1	8A
230V / 3PH	2.8	5A	2.4	4A
460V / 3PH	1.4	4A	1.2	3A
575V / 3PH	1.1	3A	1.0	2A

### StrongArm™ HVR303 Electric Vehicle Restraint

Voltage	1/4 HP Motor Amps FLA	TD Fuses
115V / 1PH	4.2	5A

### Air Powered Units

This section consists of the following: Air Cylinder U-Series (ACU), Air Cylinder Series (ACS), Airbag (AB).

	Voltage	1/4 HP Motor Amps FLA	TD Fuses
ACU / ACS	115V / 1PH	14.0	20A
	230V / 1PH	14.0	20A
AB	115V / 1PH	14.0	20A
	230V / 1PH	7.0	15A

## Elevating Docks and Scissor Lifts

All Blue Giant dock lifts (ED, SP, FS, and DS) are horsepower specific as per request.

Voltage	1.0 HP Motor Amps FLA	TD Fuses	3 HP Motor Amps FLA	TD Fuses
115V / 1PH	13.6	20A	CF	CF
230V / 1PH	6.8	15A	17.0	30A
230V / 3PH*	3.6	7A	9.2	15A
460V / 3PH	1.8	4A	4.6	8A
575V / 3PH	1.4	3A	3.6	6A

Voltage	5 HP Motor Amps FLA	TD Fuses	7 1/2 HP Motor Amps FLA	TD Fuses
115V / 1PH	CF	CF	CF	CF
230V / 1PH	28.0	50A	CF	CF
230V / 3PH	12.4	25A	22.9	40A
460V / 3PH	6.2	10A	11.4	20A
575V / 3PH	5.0	8A	9.2	15A

Voltage	10 HP Motor Amps FLA	TD Fuses
230V / 3PH	30.5	50A
460V / 3PH	15.2	25A
575V / 3PH	12.2	20A

TD = Time Delay  
FLA = Full Load Amperage  
CF = Consult Factory

A useful formula for calculating a 3 phase motor amperage is:  
700 divided by (your voltage) multiplied by the horsepower

**Example:**  
 $(700 \div 230V) \times 7.5 \text{ HP} = 22.82 \text{ amps}$

**Please note:** this formula is merely a guide. When precise values are needed, consult the motor nameplate data.

\*If the voltage is 208V/3PH, multiply the values in the 230 volt chart by 10% and add the result to the value.

**Example:**  
A 5 HP motor at 230V, 3PH is **12.4** amps. Using the formula above, multiply **12.4** amps by 10% for a result of 1.24. Add this total to 12.4 for a total of **13.64** amps.

The same calculations would apply for a single phase motor.