



# 4" Motors and Controls

BRCP4MTR R3

### 4" GOULDS WATER TECHNOLOGY MOTORS



#### SINGLE-PHASE MOTORS:

##### Two-Wire PSC Motors

- ½ HP, 115 V
- ½ - 1½ HP, 230 V

##### Three-Wire Motors

- ½ HP, 115 V
- ½ - 5 HP, 230 V

#### THREE-PHASE MOTORS:

- ½ - 10 HP (10 HP is 460V only)
- 200V, 230V, 460V and 575V available

#### FEATURES:

##### Three-Wire - Capacitor Start Motor Design

- Use with Goulds Water Technology Quick Disconnect, CSCR or Magnetic Contactor (MC) style control boxes.

##### Two-Wire PSC (Permanent Split Capacitor) Design

- Quieter than split-phase, 2-wire motors, capacitor reduces pulsation noise.
- Capacitor built-in and hermetically sealed.

##### Two-Wire and Three-Wire Designs

- 304 Stainless steel end bells, top and bottom
- 304 Stainless steel shell
- Laser Welded - 21st century welding technology for improved welds.
- Built-in lightning/surge protection through 5 HP, 200 or 230V.
- Three-shoe Kingsbury thrust bearing (ratings in chart).
- Precision machined, one-piece, 304 stainless steel castings used for upper and lower end bells.
- Water-filled design with non-toxic propylene glycol solution to protect the motor during shipping and storage.
- Built-in check valve maintains water fill needed for cooling and lubrication.
- Replaceable motor lead is held in place by (2) screws for controlled compression - no danger of stripping the lead threads.
- Tested to UL and CSA standards by CSA.
- Tested to ANSI/NSF 61 by U.L.



Goulds Water Technology Motor - tested to UL778 and CAN 22.2 by CSA International (Canadian Standards Association)



Goulds Water Technology Motor - Certified to NSF/ANSI 61, Annex G, Drinking Water System Components 4P49

### 4" GOULDS WATER TECHNOLOGY MOTORS



#### SINGLE PHASE 115 AND 230 VOLT

Type	Order No.	Control Box	HP	Volts	SF	Thrust Rating	Length (in)	Wt. (lbs)
2-Wire (PSC)	M05421	Not required	0.5	115	1.6	700 #	10.5	18.0
	M05422	Not required	0.5	230	1.6		10.5	18.0
	M07422	Not required	0.75	230	1.5		11.9	22.0
	M10422	Not required	1	230	1.4		12.5	24.0
	M15422	Not required	1.5	230	1.3		14.2	28.0
3-Wire	M05411	CB05411	0.5	115	1.6		9.6	17.9
	M05412	CB05412	0.5	230	1.6		9.2	16.7
	M07412	CB07412	0.75	230	1.5		10.3	19.8
	M10412	CB10412	1	230	1.4		11.2	22.0
	M15412	CB15412CR	1.5	230	1.3		12.6	26.0
	M20412	CB20412CR	2	230	1.25	900 #	15.1	31.0
	M30412	CB30412CR	3	230	1.15		18.3	40.0
	M50412	CB50412CR	5	230	1.15	1500 #	27.7	70.0

#### THREE PHASE 4" MOTORS - ORDER NUMBERS FOR GOULDS WATER TECHNOLOGY

HP	kW	SF	200 Volt	230 Volt	460 Volt	575 Volt
0.5	0.37	1.6	M05430	M05432	M05434	NA
0.75	0.55	1.5	M07430	M07432	M07434	NA
1	0.75	1.4	M10430	M10432	M10434	NA
1.5	1.1	1.3	M15430	M15432	M15434	M15437
2	1.5	1.25	M20430	M20432	M20434	M20437
3	2.2	1.15	M30430	M30432	M30434	M30437
5	3.7	1.15	M50430	M50432	M50434	M50437
7.5	5.5	1.15	M75430	M75432	M75434	M75437
10	7.5	1.15	-	-	M100434	-

### QUICK DISCONNECT CONTROL BOX FEATURES

- Voltage Relays for installer convenience
- 208 volt relay available for low voltage applications
- NEMA 3R enclosure for indoor or outdoor mounting
- Quick disconnect cover design will retrofit with F.E. Q-D control boxes
- 115 and 230 volt models
- Start Capacitors
- Multiple knockouts
- Two ground lugs

AGENCY LISTINGS: 



### GOULDS WATER TECHNOLOGY ORDER NUMBERS

Control Box Order Number	HP	KW	Volts	Enclosure Dimensions W x D x H (in)	Shipping Weight (lbs)
CB05411	.5	.37	115	4.8 x 2.9 x 8.4	4
CB05412	.5	.37	230		
CB07412	.75	.55	230		
CB10412	1	.75	230		

**Note:** 208 Volt starting relay is available as a repair part for 200-208 volt power supplies, 9K461.

### CSCR (CAPACITOR START-CAPACITOR RUN) CONTROL BOX FEATURES

- Voltage Relay for installer convenience
- 230 volt standard models - 208 volt relay, order no. 9K479 is available for low voltage applications
- Start Capacitors for starting torque
- Run Capacitors for efficiency and quiet operation
- Type 3R enclosure for indoor or outdoor mounting
- Accepts up to #2 AWG wire
- Multiple knockouts and two ground terminals
- Higher HP models require heavy duty pressure switches - See Magnetic Contactor version to use standard pressure switches
- Manual reset overloads on 1½ - 5 HP models



AGENCY LISTINGS:  TESTED TO UL AND CSA STANDARDS BY UL.

Control Box Order Number	HP	KW	Volts	Enclosure Dimensions W x D x H (in)	Shipping Weight (lbs)
CB05412CR	0.5	.37	230	8.1 x 5.9 x 9.3	7
CB07412CR	.75	.55	230		
CB10412CR	1	.75	230		
CB15412CR	1.5	1.1	230		
CB20412CR	2	1.5	230		
CB30412CR	3	2.2	230		
CB50412CR	5	3.7	230	8.1 x 5.9 x 9.3	8

# MAGNETIC CONTACTOR 1Ø CONTROL BOXES

For 3-wire, 1½ – 5 HP Submersible Motors



1½ - 3 HP

### FEATURES

- Built-in Magnetic Contactors allow the use of standard pressure switches, prolong switch life and eliminate the need to source and install separate contactors, saving installation time and reducing total system component costs.
- Voltage Relay for installer convenience
- 230 volt standard models – 208 volt relay, order no. 9K479 is available for low voltage applications
- Start Capacitors for starting torque
- Run Capacitors for efficiency and quiet operation
- Type 3R enclosure for indoor or outdoor mounting
- Accepts up to #2 AWG wire
- Multiple knockouts and two ground terminals
- Manual reset overloads on 1½ - 5 HP models

### AGENCY LISTINGS:



TESTED TO UL AND CSA STANDARDS BY UL.

Control Box Order Number	HP	KW	Volts	Enclosure Dimensions W x D x H (in)	Shipping Weight (lbs)
CB15412MC	1.5	1.1	230	8.1 x 5.9 x 9.3	8
CB20412MC	2	1.5	230		
CB30412MC	3	2.2	230		
CB50412MC	5	3.7	230	11 x 6.7 x 12.5	15

### PUMPSAVER® INSIDERS; PUMPSAVER® 111, 233 AND 235; 777KWHP - 3 PHASE



#### FEATURES

- Quickly and easily calibrates any submersible or centrifugal pump to jobsite conditions (voltage and current). Unlike other protection devices which only work with one brand of submersible motors.
- Most models available installed in NEMA 3R Rainproof (outside) enclosures or shipped loose for installation in existing control panels.
- Single phase units work with the hand held Informer for simple, fast troubleshooting and system diagnostics.
- Available in single and three phase models.
- Insider Plus models fit in Goulds Water Technology, Pentair and Franklin Electric Quick Disconnect type control boxes from ½ - 1 HP. The Plus version contains a fiber optic kit to signal an Informer.
- Protects against dry wells, low and high voltage, rapid cycling, jammed pump, dead heading (flow restriction)
- Automatic reset selectable, 2-225 minutes or can be set on manual reset.

### ELECTRICAL ACCESSORIES

Replacement Motor Leads, Cable Accessories, Bulk Cable

#### FEATURES

##### Motor Leads

- 4" Goulds Water Technology Motor Leads
- 6" Goulds Water Technology Motor Leads
- 4" Goulds Water Technology Packaged Cables 50' - 300'

##### Cable Accessories

- Heat Shrink Kits
- Splicing Tape



##### Bulk cable with ground

- Twisted design, solid copper conductor.
- PVC insulated
- AWG 8-14

### AQUAVAR® SOLO<sup>2</sup>

1AS15, 3AS20, 3AS30 and 3AS50

Constant Pressure Controllers for ½-2, 3 and 5 HP Submersible Pumps

The SOLO<sup>2</sup> provides consistent water pressure with all the tried-and-true features of the SOLO plus innovative upgrades.



#### FEATURES

##### EASY SET UP

- Simple wiring and menu set-up

##### RETROFITABLE

- Turns virtually any conventional system into a premium constant pressure system

##### USER-FRIENDLY INFORMATION CENTER

- Fade-resistant LED display indicates system pressure, speed and current
- Error log - displays last four faults and can be reset

##### ADVANCED FEATURES

- Dual setpoint feature for advanced system application
- Programmable output relay can be configured to control an external device such as a pump, accessories or sending status signal to a monitoring device.

#### ADDITIONAL FEATURES

- **NEMA 3R Enclosure:** Rainproof, outdoor/indoor rated enclosure
- **Adjustable Motor Overload:** Simple rotary switch to set current limit to match motor Service Factor Amps (SFA)
- **Dry Well Sensitivity Switch:** Choice of low or high sensitivity
- **Pressure Drop:** Choose a 5 or 20 PSI pressure drop for restarts
- **Low Pressure Cut-Off:** Set on or off depending on application
- Controller acts as a pump protection and troubleshooting device. LED display clearly indicates fault codes and system parameter
- Pressure transducer and 10' Pressure Sensor Cable Included. Optional lengths up to 200' are available.
- Integrated output motor filter protects the motor from voltage spikes and limits electrical interference with devices such as portable telephones, radios, televisions, and garage door openers.
- Optional accessories include float switch, overpressure switch and moisture sensor relay.

# Xylem |'zīləm|

- 1) The tissue in plants that brings water upward from the roots;
- 2) a leading global water technology company.

We're a global team unified in a common purpose: creating innovative solutions to meet our world's water needs. Developing new technologies that will improve the way water is used, conserved, and re-used in the future is central to our work. We move, treat, analyze, and return water to the environment, and we help people use water efficiently, in their homes, buildings, factories and farms. In more than 150 countries, we have strong, long-standing relationships with customers who know us for our powerful combination of leading product brands and applications expertise, backed by a legacy of innovation.

**For more information on how Xylem can help you, go to [www.xylem.com](http://www.xylem.com)**



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