

## **1400 Series High Capacity Circulators**

Taco 1400 Series High Capacity Circulators are specifically designed for quiet, efficient, dependable operation in a wide range of medium to high flow/head hydronic heating, chilled water cooling and hot water recirculation applications. The space saving, close-coupled, maintenance free motor with permanently lubricated, sealed-for-life bearings, Nu-Tride<sup>®</sup> coated solid steel shaft, Noryl<sup>®</sup> impeller and durable, carbon/silicon-carbide mechanical seal provide unmatched reliability. Available in Cast Iron or Bronze construction.



**HYDRONIC COMPONENTS & SYSTEMS**

**Do it once.  
Do it right.®** 

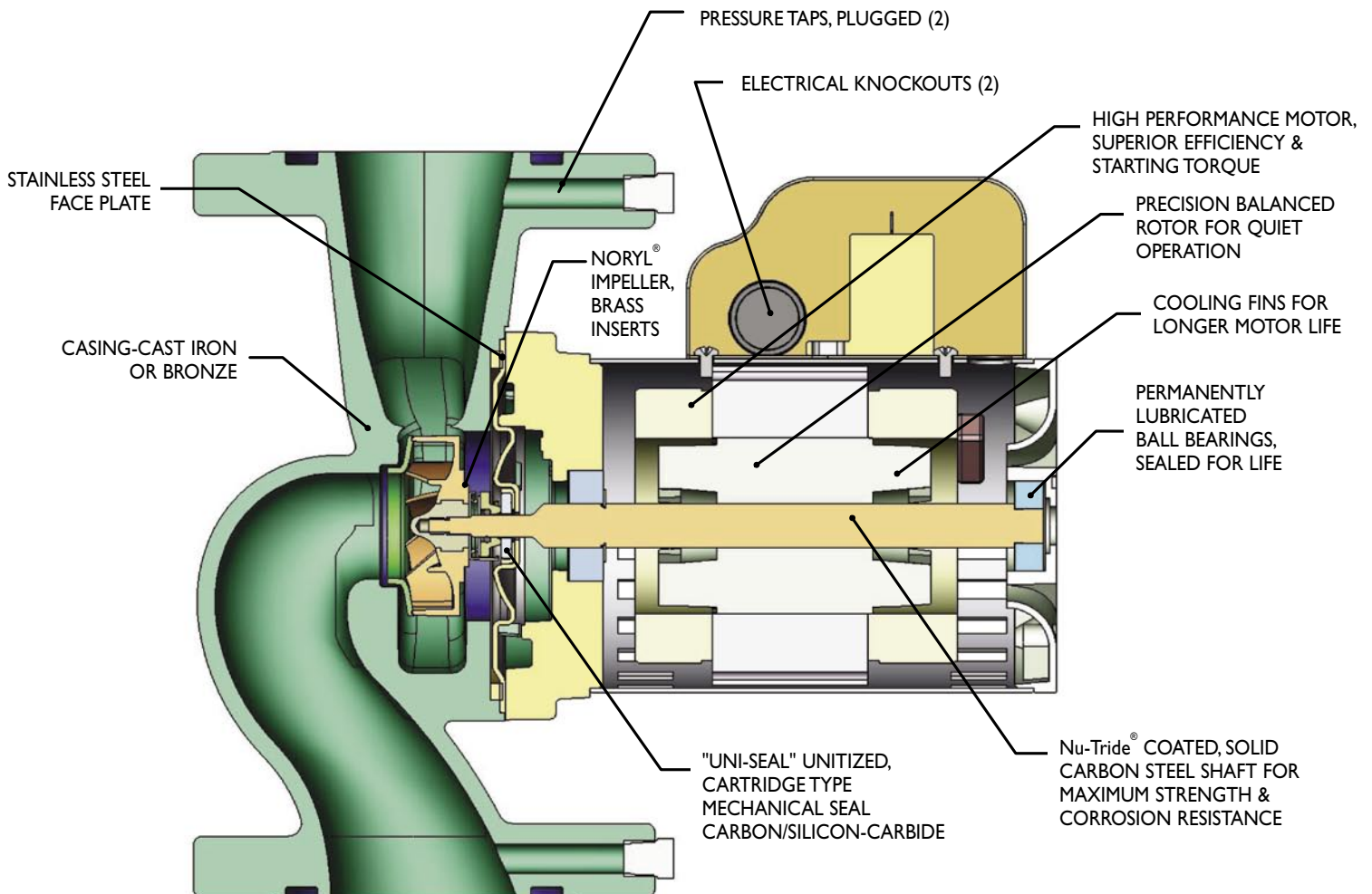
## Features & Benefits 1400 Series High Capacity Circulators

### Features

- Compact, Space Saving Design
- Powerful Close-Coupled, Maintenance Free Motor
- Superior Efficiency, High Starting Torque
- Permanently Lubricated, Sealed for Life Bearings
- Precision Balanced Rotor for Quiet Operation
- Carbon/Silicon-Carbide Mechanical Seal for Long Life
- Universal Flange to Flange Dimensions - Ideal for Retrofits
- Anti-Condensate Design for Chilled Water
- Dual Electrical Knock-outs
- Dual Pressure Taps, Suction/Discharge

### Application

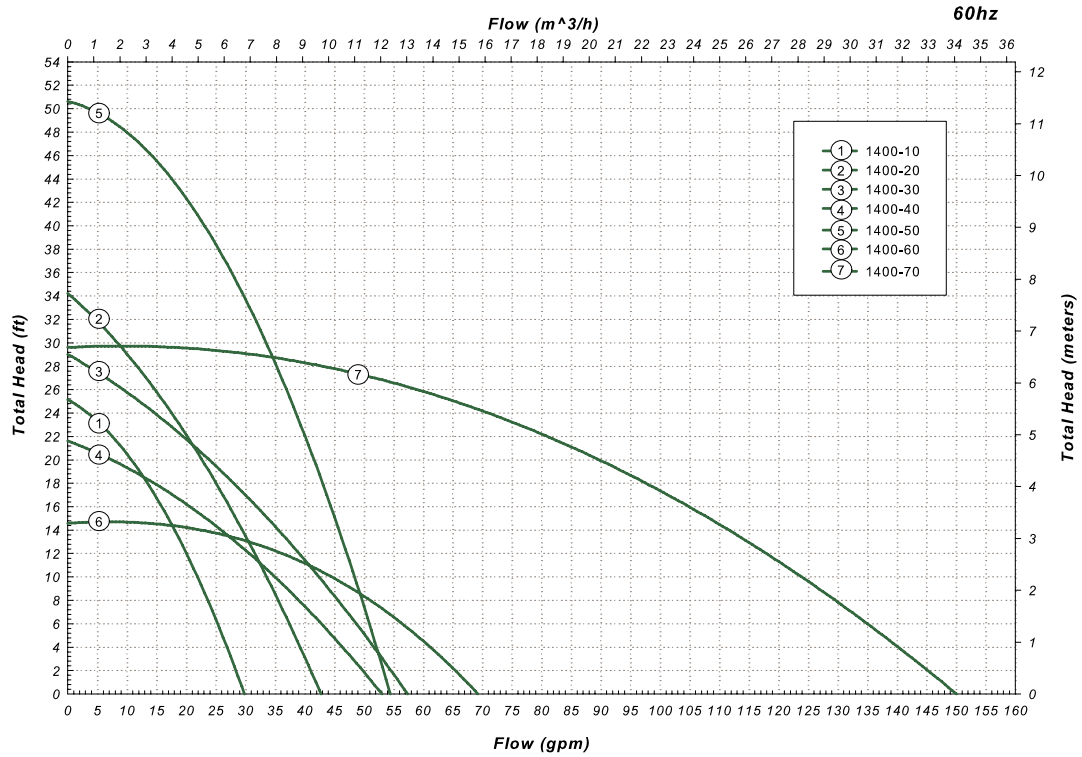
The compact 1400 Series High Capacity Circulators are designed for quiet, efficient operation in a wide range of medium to high flow/head systems. Typical applications include hydronic heating, in-floor radiant, snow melt, high pressure drop boilers, outdoor wood boilers, chilled water cooling, geothermal heat pumps, primary/secondary loops and hydro air fan coils. The Bronze 1400 series should be used for open, domestic water recirculation systems. The unitized, one-piece mechanical seal is easy to service in only a few minutes. It's stainless steel faceplate, durable Noryl<sup>®1</sup> impeller, Nu-Tride<sup>®2</sup> coated shaft and maintenance free motor provide years of dependable service .



# Performance Curves 1400 Series High Capacity Circulators

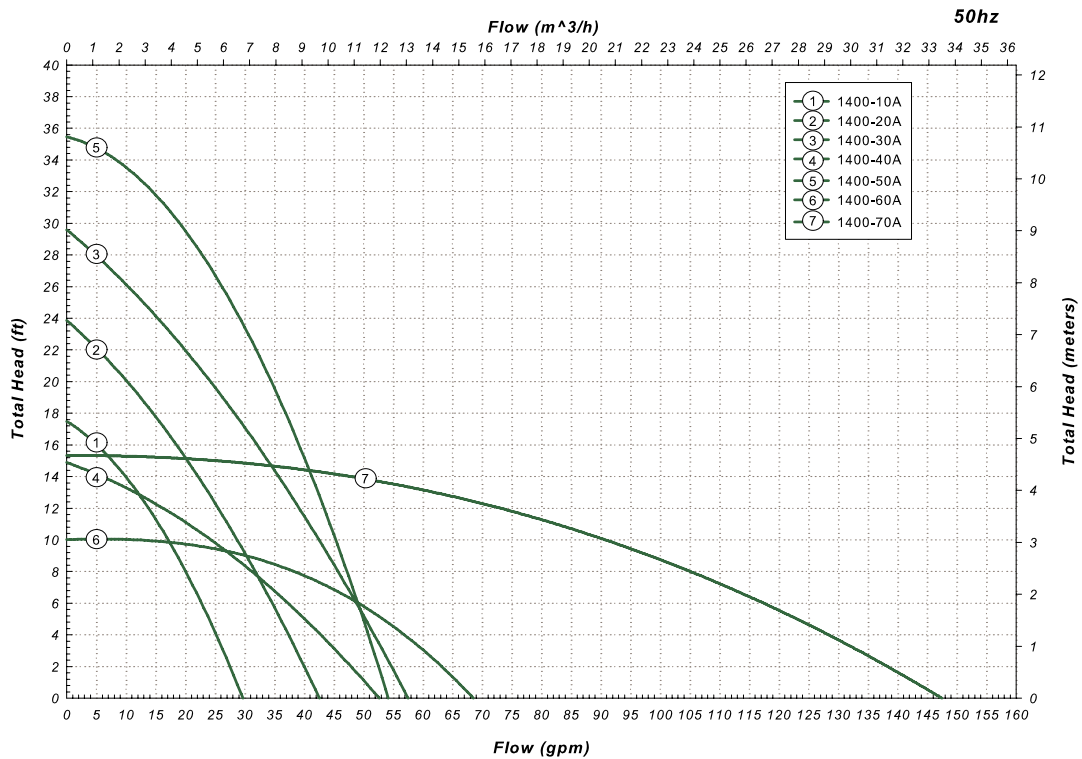
## Performance Field - 60Hz

**Taco** 1400 Series - High Capacity Circulators



## Performance Field - 50Hz

**Taco** 1400 Series - High Capacity Circulators



# Submittal Data Information

## 1400 Series High Capacity Circulators

Submittal Data # 101-104  
Supersedes: New

Effective: 03/1/05

### Materials of Construction

Casing: Cast Iron or Bronze  
Face Plate: Stainless Steel  
Motor Housing: Steel  
Impeller: 30% Glass Filled Noryl®  
Impeller Insert: Brass  
Shaft: Solid Alloy Steel, Nu-Tride® Coated  
Mechanical Seal: Carbon/Silicon-Carbide  
Motor Bearings: Stainless Steel, Permanently Lubricated  
O-Ring/Flange Gaskets: EPDM

### Model Nomenclature

B – Bronze Casing  
Y – 230/60/1 Motor  
A – 220/50/1 Motor

### Performance Data

Flow Range: 0-147 GPM  
Head Range: 0-51 Feet  
Minimum Fluid Temp: 40°F (4°C)  
Maximum Fluid Temp: 225°F (107°C)  
Maximum Working Pressure: 150 psi



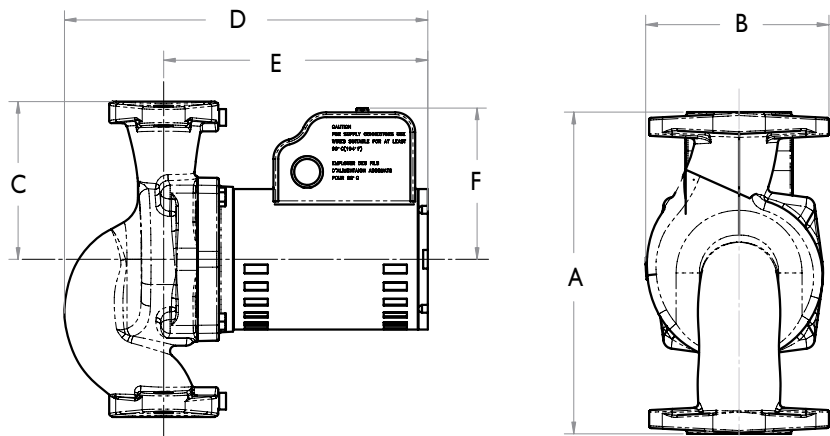
**FOR INDOOR USE ONLY**

### Electrical Data

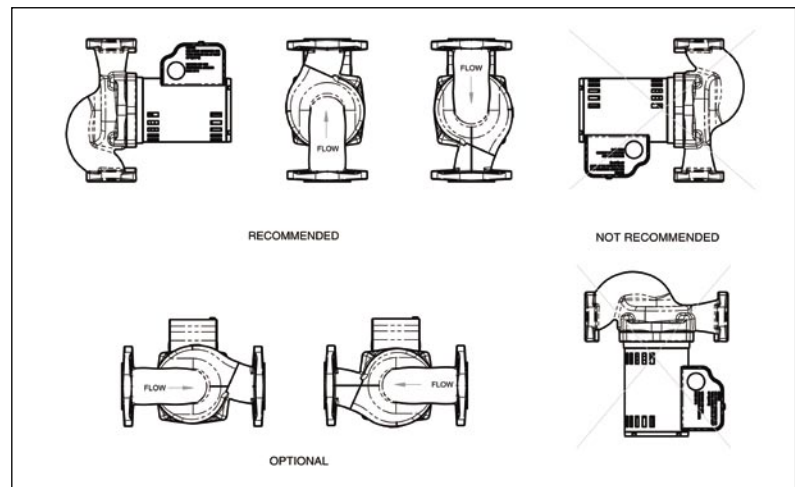
Model	Volts	Hz	Ph	Amps	RPM	HP
1400-10	115	60	1	1.5	3450	1/10
1400-20	115	60	1	2.0	3450	1/6
1400-30	115	60	1	2.0	3450	1/6
1400-40	115	60	1	2.0	3450	1/6
1400-50	115	60	1	5.0	3450	1/2
1400-60	115	60	1	2.0	3450	1/6
1400-70	115	60	1	5.0	3450	1/2
Motor Type	Open Drip Proof, Permanent Split Capacitor, Thermally Protected					
Motor Options	230/60/1, 220/50/1					

### Pump Dimensions & Weights

Cast Iron Model	Bronze Model	A		B		C		D		E		F		Ship Wt.	
		in.	mm	in.	mm	in.	mm	in.	mm	in.	mm	in.	mm	lbs.	Kg.
1400-10	1400-10B	6-3/8	162	4-1/2	114	3-3/16	82	8-3/16	208	6-3/8	162	4	102	12	5.4
1400-20	1400-20B	6-3/8	162	4-1/2	114	3-3/16	82	8-5/8	220	7	178	4	102	12.5	5.7
1400-30	1400-30B	8-1/2	216	4-3/4	121	4-1/4	108	9-3/4	248	7-1/8	181	4	102	15	6.8
1400-40	1400-40B	8-1/2	216	4-3/4	121	4-1/4	108	9-3/4	248	7-1/8	181	4	102	15	6.8
1400-50	1400-50B	6-3/8	162	4-5/8	119	3-3/16	82	10	254	8	203	4	102	16.5	7.5
1400-60	1400-60B	8-1/2	216	5-3/16	132	4-1/4	108	9-3/4	248	7-1/8	181	4	102	18.5	8.4
1400-70	1400-70B	8-1/2	216	5-1/2	140	4-1/4	108	11	279	8-1/4	210	4	102	23.5	10.7



### Mounting Positions



1 Noryl® is a registered trademark of El DuPont de Nemours, Inc.

2 Nu-Tride® is a registered trademark of Kolene Corp.

### HYDRONIC COMPONENTS & SYSTEMS

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Do it right.® **Taco**

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