



# **4810 Series VT Open-Lineshaft Vertical Turbine**



**Flows to: 34,000 GPM**  
**Heads to: 980 Feet**  
**Temperatures to: 250°F**

# SERIES 4810

## MODEL VT

### VERTICAL TURBINE OPEN-LINESHAFT

**Sizes:** 4" to 42" Discharge  
**Bowls:** 5" to 52" Diameter  
**Flows:** To 34,000 GPM  
**Heads:** To 980 Feet  
**Temp:** To 250°F

#### Services:

Cooling Water  
Raw Water Intake  
Sea Water  
Industrial Process  
Condenser Circulating  
Irrigation & Drainage  
Municipal Water Supply

#### DISCHARGE HEAD

- Supplied standard in ASTM A48 class 30 cast iron
- Fabricated steel discharge heads (above base, below base & inline) available upon request
- Optional oil-lubricated motor stand for high axial thrust applications
- Discharge gauge package with 304 stainless steel buffer tube, fittings and ball valves
- Discharge flanges supplied in 250 PSI rating with integral o-ring groove for high pressure applications
- Integral drip basin with threaded connection collects all packing leakage
- Alternate metallurgy options available upon request

#### BOWL ASSEMBLY

- Supplied standard in ASTM A48 class 30 cast iron with vitreous enamel interior lining
- Heavy wall thickness for corrosion allowance and high pressure applications
- Includes investment cast, 316 stainless steel, single suction impellers
- Impellers can be offered in enclosed or semi-open design for aggressive applications
- Optional bowl and impeller wear rings upon request
- Francis impeller design allows for broad band, high efficiency performance
- Impellers are machined and dynamically balanced prior to assembly
- 416 stainless steel bowl steel shaft is stronger than standard carbon steel and has superior corrosion resistance
- Keyed impeller construction for high pressure applications upon request
- Bronze bowl bearings with a wide variety of other materials upon request
- All stages feature o-ring construction making sure no leakage is present
- Dual bearing discharge supplied standard in ASTM A536 ductile iron case for additional shaft support at the top of the bowl assembly
- Alternate metallurgy options available upon request

#### STRAINER

- Supplied standard in conical or basket design in galvanized steel, all bronze, all 304 or all 316 stainless steel construction
- Protects the bowl assembly from large solids that may be present in the pumped fluid
- Alternate metallurgy options available upon request

#### DRIVER

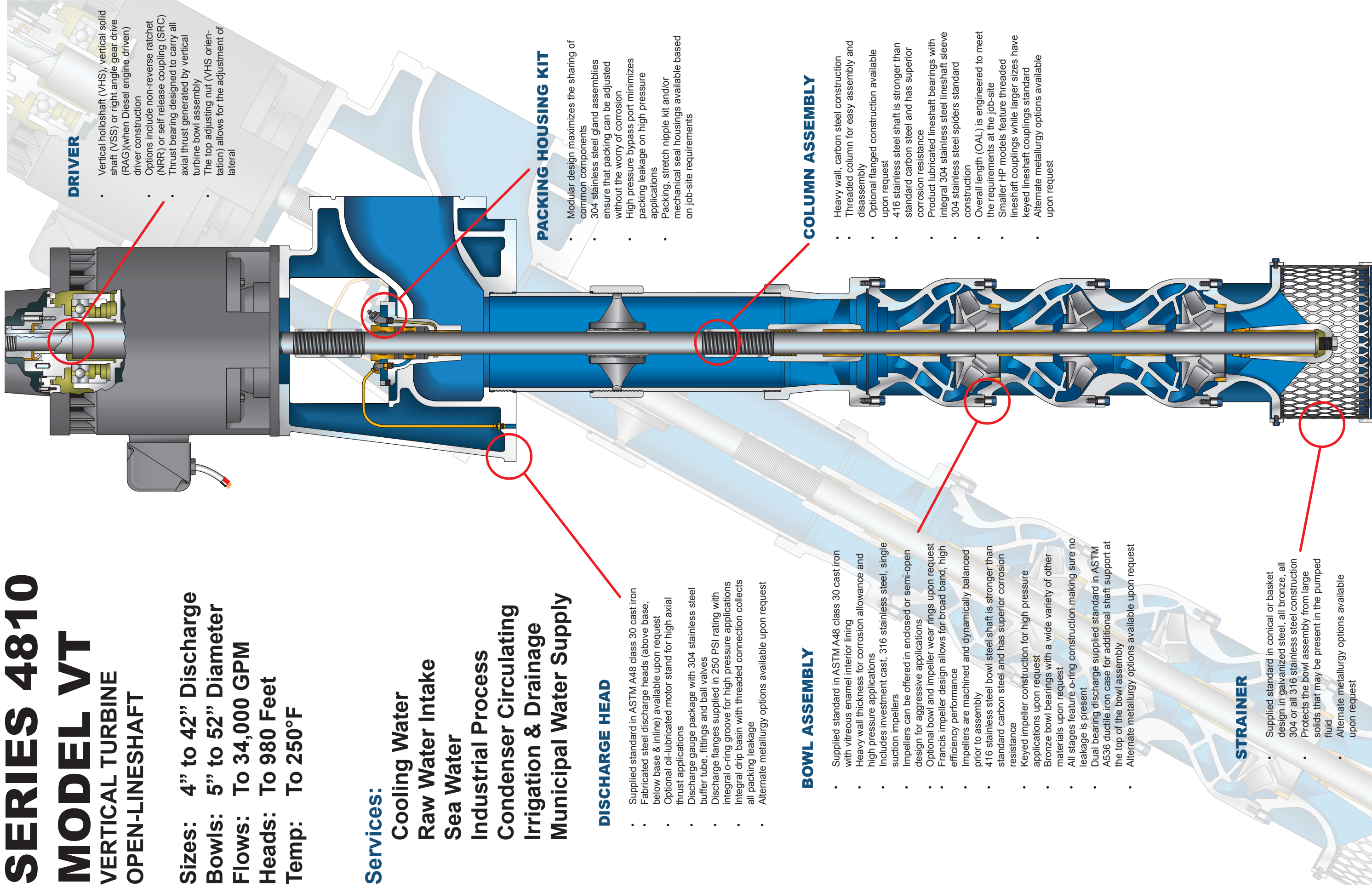
- Vertical hollowshaft (VHS), vertical solid shaft (VSS) or right angle gear drive (RAG)(when Diesel engine driven) driver construction
- Options include non-reverse ratchet (NRR) or self release coupling (SRC)
- Thrust bearing designed to carry all axial thrust generated by vertical turbine bowl assembly
- The top adjusting nut (VHS orientation) allows for the adjustment of lateral

#### PACKING HOUSING KIT

- Modular design maximizes the sharing of common components
- 304 stainless steel gland assemblies ensure that packing can be adjusted without the worry of corrosion
- High pressure bypass port minimizes packing leakage on high pressure applications
- Packing, stretch nipple kit and/or mechanical seal housings available based on job-site requirements

#### COLUMN ASSEMBLY

- Heavy wall, carbon steel construction
- Threaded column for easy assembly and disassembly
- Optional flanged construction available upon request
- 416 stainless steel shaft is stronger than standard carbon steel and has superior corrosion resistance
- Product lubricated lineshaft bearings with integral 304 stainless steel lineshaft sleeve
- 304 stainless steel spiders standard construction
- Overall length (OAL) is engineered to meet the requirements at the job-site
- Smaller HP models feature threaded lineshaft couplings while larger sizes have keyed lineshaft couplings standard
- Alternate metallurgy options available upon request







## How It All Began EFFICIENCY BY DESIGN

With years of manufacturing experience, Ameriflo has spent considerable time developing what the customer has asked for. The most diverse hydraulic offering in the vertical turbine markets with an emphasis on pump efficiency and systems integration. Ameriflo manufactures all product type in a wide variety of standard and optional materials offering you the solution you need.

Ameriflo is a global manufacturer of integrated systems with facilities located in several countries and has clients in over 80 countries. The corporate manufacturing headquarters is located in Tennessee, along with a very large testing and training facility for distributor and representative training.

Ameriflo uses computational fluid dynamics (CFD) and 3D Solids Works for designing all pumps and systems with detail for all valves, suction & discharge piping and any installed optional accessories specified by the end user. Electric and Diesel engine driven systems are available and can be ordered in a variety of flows and pressures with full optional metallurgy support.

### Product Line

The benefit to the Ameriflo offering is that you only need to go to one place for your product line needs. Whether your need is an end suction pump, a large split case or even a vertical turbine Ameriflo has a model for you. Each product line has a very diverse offering from the very small to the very large and everything in between. Do not rely on other manufacturers who have broken product lines with missing models.

Ameriflo also has state-of-the-art engineered customer service.

[www.ameriflo-usa.com](http://www.ameriflo-usa.com)



The applications engineering part of Ameriflo have decades of engineering and specification work. This background and experience is critical when the design engineer is looking for answers to questions.

Ameriflo has one of the largest test facilities in North America with nearly 300,000 gallons of water utilizing 8 different test loops from 2 inch through 36 inch. The horizontal and vertical test labs have ratings up through 1,000 HP and include string test stands allowing testing with the job motor or Diesel engine.

### Communication Is The Key To Our Success

Ameriflo has systems in place making communication with our clients of the utmost priority. Each client has their own customer portal that will allow them to check on all quotations, sales orders and any client case that is generated. These tools put the power in the hands of the client and allow them access to the most current information. This access empowers our clients to respond to their customers in a more timely fashion and secure that next opportunity!

Ameriflo also has a dedicated

theater used for sales and service training. This theater can house approximately 35 students and is used to cover the Ameriflo pump and Diesel engine product lines. Schools are available to sales people and dedicated service schools are also offered. Service schools feature a hands on portion allowing students to disassemble and re-assemble pumps and/or Diesel engines to allow for certified repairs in the field. Contact Ameriflo to inquire about the next school and how you can join in these events.

Ameriflo also has a state-of-the-art software selection package with full configuration, **Ameriflo IQ**, that can be used by simply signing up. E-mail us for additional information.

If you would like more information about what Ameriflo is all about, please contact us.

What separates Ameriflo from the competition, **WE DELIVER.....**

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