Vaughan®
Unmatched Reliability

Portable Pump Inquiry Form

Name: _____

Company: _____

Address: _____

City: _____

State/Country: _____ Zip/Code: _____

Phone: _____

Fax: _____

e-mail: _____

Project Name: _____

Project Location: _____

TYPE OF PUMP:

DRY PRIME
    Horizontal Chopper
    Horizontal Screw

WET PRIME
    Horizontal Chopper
    Horizontal Screw

HYDRAULIC
    Submersible Chopper

PROPERTY OF LIQUIDS:

Temperature: _____ °F _____ °C

Solids (Wt): _____ % / SOLIDS (Vol): _____ %

PH: _____ Specific Gravity: _____

Viscosity (cps): _____ (ssu): _____

Describe Solids: _____
_____
_____

PUMP PERFORMANCE:

Capacity: _____ GPM _____ M3/Hr _____

Head (TDH): _____ feet _____ m
_____ PSI

SYSTEM DESCRIPTION:

SELF-PRIMING

Suction Head-'H2': _____ feet _____ m

Static Head-'H1': _____ feet _____ m

FLOODED SUCTION

Suction Head-'H3': _____ feet _____ m

Static Head-'H4': _____ feet _____ m

HOSE SUCTION

Hose Dia Discharge: _____ inch _____ mm

Hose Length Dischg: _____ feet _____ m

Hose Dia Suction: _____ inch _____ mm

Hose Length Suct: _____ feet _____ m

Note: For maximum re-prime height 'H2', see applicable Portable Pump product brochure, specification sheet and/or pump curves.

PACKAGE OPTIONS:

FRAME
    Trailer   Skid

TYPE OF UNIT
    Open   Enclosed, Sound Attenuated

POWER
    Diesel   Dual Fuel (Gas or LPG)
    Electric   Hydraulic

PUMP PRIMING
    Ventruri Float Prime
    Vacumm Prime

PUMP CONTROLS
    Manual
    Auto-Start High-Low Control - Floats
    Auto-Start Level Control - Transducer

BRAKES
    Electric   Hydraulic Surge
    None

DO NOT LIGHT PACKAGE
    Turn Signal, Brake, and Marker Lights
    None

TRAILER HITCH
    Lunette Eye   Ball Hitch (2 ⁵⁄₁₆)

ELECTRIC CABLE (Connector)
    6-Pin   7-Blade
    4-Flat (Hydraulic Brakes Only)

Upgrade Options: Include hose rack, control panel viewing door, exterior work lights, interior LED lights, lockable storage box, spare tire, upsized fuel tank, trickle charger, cold climate package, remote monitoring, and hose with fittings (Camlock or Bauer).

Fax, e-mail or mail form directly to:

Vaughan Company, Inc.
364 Monte Elma Road
Montesano, WA 98563
Phone: 360-249-4042; Fax: 360-249-6155
e-mail: info@chopperpumps.com

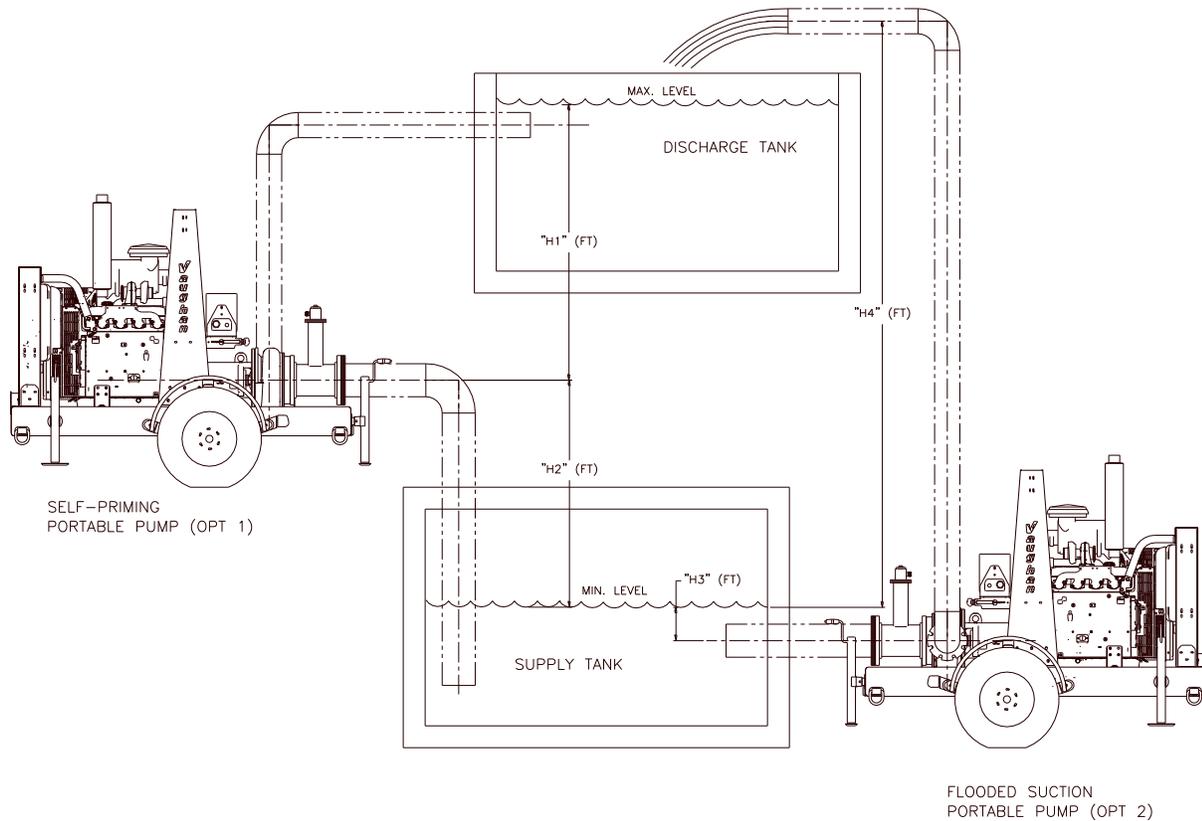# TOTAL HEAD CALCULATIONS

TOTAL HEAD:

- TDH = Pipeline Friction + Vertical Lift (H) + Velocity Head ($V^2/2g$)
  - Pipeline Friction = [Pipe Length (ft) / 100] x friction factor (table on form V137)

- Water friction tables are suitable for sewage & most water-borne slurries up to 5% solids. For high solids loadings & heavy organic sludge, use the biological friction table on form V137.
  - Vertical Lift = feet up from supply tank low-water level to high level in discharge tank, or to the center of the open discharge pipe.
    - Note: - Lift may be negative (-) if the pipeline is downhill.
      - The pump shutoff head must be higher than H4 in order to initiate flow.
  - Velocity Head = Energy in the liquid being discharged due to its velocity.
    - Note: - Usually ignored as insignificant in low head sump pump systems.
      - For high head systems, use nozzle manufacturer's printed data, or calculate using data as follows:
        V = Velocity of the stream at the discharge diameter (ft/sec)
        G = Acceleration due to gravity (32.2 ft/sec^2)

NOTE:

For specific pump characteristics, refer to applicable Vaughan specification sheets, performance curves and drawings.

SPECIAL CASES:

Pipelines with valves & fitting, add appropriate equivalent pipe length.
Pressurized supply or discharge tanks, add the discharge tank pressure, in feet, less any supply tank pressure, in feet, to the above Total Head calculation. Gauge pressure, in psi x 2.31 = head in feet.
Very high solids content sludges & slurries, contact Vaughan on reliable test data for friction values.