

# **Hydraulic** Rig

**Hydraulic Tophead Drill** 



**B80 Drilling Benefits** 

Geotechnical

Geothermal

- · Compact size permits mounting on variety of carriers to provide goanywhere versility
- Auger Drilling, Hollow Stem & Continuous Flight, Rotary Drilling, Diamond Core, and Angle Drilling
- Retract Force: 24,500 lbs [11,113 kg]
- Pulldown Force: 18,400 lbs [8,346 kg]
- Maximum Rotary Speed of 837 rpm (87.65 rad/s)
- 14-ft (4.27 m) or 22-ft (7.32 m) Feed Stroke



#### PERFORMANCE SPECIFICATIONS

# **Hydraulic Feed System**

- Pulldown Force: 18,400 lbs (8,346 kg)
- Retract Force: 24.500 lbs (11.113 kg)
- Feed Speed, Down: 0-65 ft/min (19.81 m/min) Low,
  0-162 ft/min (49.38 m/min) High
- Feed Speed, Retract: 0-48 ft/min (14.63 m/min) Low,
  0-122 ft/min (37.19 m/min) High
- Feed Stroke: 14' (4.27 m), Optional 22-ft (6.71 m) or 24-ft (7.32 m)
- Angle Drill Capable

#### **Power Unit**

- Deck Engines: Cummins, Deutz Diesel
- PTO: Transmission or Transfer Case

## **Hydraulic Pumps**

- Primary Pump: 36 gpm (136.3 l/min)
- Auxiliary Pump: 24 gpm (90.85 l/min)

## **Drill Head Rotary**

- Maximum Rotary Speed: 837 rpm (87.65 rad/s)
- Torque: 8,600 ft-lbs (11,660 Nm)
- 15 in (381 mm) Off Hole Side Slide
- 10-Speed

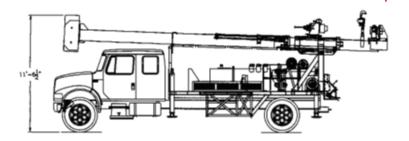
# **Estimated Operating Capacities**

- Hollow Stem Auger, 4-1/4 in (108 mm) ID: 250 ft (76.2 m)
- Continuous Flight Auger, 6 in (152 mm) OD: 400 ft (121.92 m)
- Rotary Drilling, 4-1/2 in (114.3 mm) OD Drill Pipe: 1,800 ft (548.64 m)
- Diamond Core Drilling NQ: 5,000 ft (1,524 m)
- Reverse Circulation, 4-1/2 in (114.3 mm) CIP Drill Pipe: 1,200 ft (365.76 m)

Note: Above drilling capacities may vary according to subsurface conditions.

#### **Leveling Jacks**

- Single Front/Dual Rear, 24 in (609.6 mm) OR
- 36 in (914.4 mm) Stroke



## Weight

• Minimum: 8,000 lbs (3628.74 kg)

# **Mounting Options**

• Rubber Track Carrier, Truck (4x2, 4x4, 6x4, 6x6), Trailer

#### Hoist

- Main Single Line Capacity: 12,000 lbs (5,443.1 kg)
  Line Speed: 52 fpm (15.85 mpm)
  Cable Diameter: 5/8-in (.625) [15.88 mm]
  Cable Length: 100-ft (30.48 m) Standard
- Main Single Line Capacity: 8,500 lbs (3,855.54 kg)
   Line Speed: 0-75 fpm (0-22.86 mpm)
   0-325 fpm (0-99.06 mpm) Reverse
   Cable Diameter: 1/2-in (.500) [12.7 mm]
   Cable Length: 100 ft (30.48 m) Standard
- Auxiliary Single Line Capacity: 4,500 lbs (2041.17 kg)
  Line Speed: 0-135 fpm (41.15 mpm)
  Cable Diameter: 5/16-in (.325) [8.26 mm]
  Cable Length: 100-ft (30.48 m) Standard
- Safe-T Driver Single Line Capacity: 900 lbs (408.23 kg) Line Speed: Variable Up, Freefall Down Cable Diameter: 1/4-in (.250) [6.35 mm] Cable Length: 300-ft (91.44 m) Standard
- Wireline Single Line Capacity: 1,200 lbs ([544.3 kg) Line Speed: 0-500 fpm (0-152.4 mpm)
  Cable Diameter: 3/16-in (.185) [4.7 mm]
  Cable Length: 400-ft (121.92 m) Standard
  Winch Capacity: 3,500-ft (1,066.8 m) Cable

#### **SPT Automatic Hammer**

- ASTM D-1586 Standards, Standard Duty and Heavy Duty
- 140 lb (63.5 kg), 170 lb (77.1 kg), 300 lb (136.1 kg), 340 lb (154.2 kg) Slugs Available
- Hydraulic Compensated
- Self Compensating Optional

## **Optional Equipment**

- Above Deck Combination Auger/Rod Rack
- Front mounted auger rack

