

## Rig 39

### General Discription

Type .....	RD 20 Range III, Atlas Copco, Carrier Feed System
Pulldown .....	30,000 klb. (13,608 kg)(133.45Kn)
Pullback.....	120,000 klb. ( 54,446 kg)(533.79 Kn)
Fast Feed Up (regen. on) .....	106 ft/min. (32.29 m/min.)
Fast Feed Up (regen. off) .....	72 ft/min. (21.9m/min.)
Fast Feed Down .....	180ft/min.(54.9m/min.)
Drill Feed Rate .....	29 ft/min. ( 8.8m/min.)
Pullback Cable .....	1-1/4 in. ( 32 mm) cable
Pulldown Cable .....	7/8 in. (22 mm) cable
Carriage Sheaves.....	32 in. (813 mm) dia. lightweight, high strength Nylatron

### Derrick

Derrick Height.....	62 ft. 6 in. (19.05 m)
Dimension .....	L 61 ft. 11-1/2 in. ( 18.88 m)
	W 48-1/2 in. (1231.9mm)Depth 41 in. (1041.4 mm)
Top of Table to Spindle.....	51 ft. 6 in. (15.70 m)
Table to Ground (rig on tires) .....	44 in. (1117.6 mm)
Table to Ground (jacks extended) .....	92 in. (2336.8 mm)

### Carrier Weight & Dimensions

Height Derrick Down.....	13ft. 10in. (5.76m)
Height Derrick Up .....	62ft. 6in. (19.05m)
Width: 8 ft. 4 in .....	(2.51 m)
Weight .....	88,000 lb. (40,000 kg) less tooling

### Carrier & Engine

Make .....	Caterpillar
Model .....	CAT C13.380 HP (283kw)
Transmission.....	Fuller RTO-14908LL, 10-speed forward,3-reverse
Front Axles.....	22,000 lb. (9,979 kg) capacity each axle. Two steering
Axles with .....	44,000 lb. (19,958 kg) total capacity.
Front Springs.....	44,000 lb. (19,958 kg) capacity/leaf type
Rear Axles.....	Eaton DP-451P (46,000 lb. (20,865 kg)
Tandem Suspension.....	Hendrickson R-450

### Pony Base (Allows Carrier To Locate Above BOP)

Style .....	Hydraulically Raised Pony Base(w) Capacity 51 Tonns
Height & Width.....	H-135.827'X W-167.323'X L458.661

### SubStructure

Clear Height, Table Base to Ground	151.575"(12.63 Ft)
Capacity .....	120,000 Lbs

### Centralizer Table

Type.....	(2) Manually operated jacks for easy leveling with removable facility
	Hokuetsu.Co.Ltd
Features.....	Master bushing similar to API 17-1/2in, removable to gain 25-1/2in
Capacity .....	Handles 20in casing

### Break Out Wrench

Type.....	Hydraulically powered, self-adjusting
Rating.....	20,000 ft-lb. (27,120 N-m) torque

### Drill Pipe Changer

Type.....	Hydraulically Powered Holds (1) 4-1/2in & (1) 5-1/2in drill collar
Capacity.....	Set to handle 40Ft drill pipe or drill collars

### Hoist

Hyd Casing Hoist Capacity.....	Lifting Capacity: 7,500 lb. (3,402 kg) max (33.36 Kn)
Hyd Jib Hoist Capacity.....	Maximum Lifting Capacity: 4,000 lb. (1,814 kg) (17.79 Kn)

### Rotary Head & Rotation

Model.....	4SF-2-12 spur gear head
RPM.....	0 to 120
Torque.....	8,000ft-lb. (10,848 N-m) maximum
Swivel.....	3 in. (76-mm) swivel with chevron packing
Piping.....	Circulation piping rated at 1,500 psi (10.3 MPa) WP 3 in manifold for air

### Deck Engine & Power Pack

Model.....	Cummins QSK-19C
HP/RPM.....	755 hp /563 kw @ 1,800 RPM
Gear Box Drive.....	Mounted on a 4-hole pump-drive gearbox
Input & Out Put.....	Engine input at 1,800 RPM increased to 2,490 RPM by pump drive
Hyd Main Pump.....	(2) Piston Pumps 48.5 Gpm for main Rotary Head & Feed System
Hyd Vane Pump Stage 1 .....	(1) 52.2 Gpm, operates cooler fan
Hyd Vane Pump Stage 2.....	(1)30.3 Gpm, operates secondary equipmen
Hyd Piston Pump.....	(1)12.5 Gpm Runs the drilling feed circuit
Hyd Auxilliary Pump.....	(1) 34 Gpm operates the Hoists



### Power Generation

Make.....	(1) Airman
Capacity.....	Hino-1500/1800 6 Cyl Inline 50/60Hz
Generator.....	(1) Taiyo Electric Co Ltd
Capacity.....	195/220 Kva,200/400V,50-60Hz,1500-1800Rpm

### Air General

Make.....	Screw Compressor
Model.....	PDS 175S,
Capacity.....	130 Cfm
Driven By.....	3 cyl,4 Stroke,Wt Cooled

### Mud System

Mud Pump.....	Weatherford MP5 (6-1/2"X7-1/2" Liner) Driven by Detroit 6 Cyl
Power Rating .....	500 HP
Pressure rating .....	3000 Psi
Mud Volume.....	Active Tank, 210 Bbbls
Settling Tank.....	175 Bbbls
Trip Tank.....	35 Bbbls
Sand Trap.....	55 Bbbls
Pill Tank.....	80 Bbbls
Shale Shaker.....	Brandt
Disilter.....	DSC Offshore Mdl-HM 100X8C (704-792 Gpm)

### Well Control

BOP Annular.....	Guanghan Petroleum 3K,11"
BOP DbL.....	Guanghan Petroleum 3K,11"
BOP Closing .....	Yancheng Sanyi 10 GalX 8 Bottles
Choke Manifold.....	2-1/16" 5K, Kunshan AB Valve Co Ltd

### Enhancement

Pipe Loader.....	Oztec Equipment Manufacturing
Model.....	OZ001
Max Tubular Dia.....	13-3/8"
Maximum L.....	45 Feet
Max Tubular Wt.....	6000 Lbs
Pipe Tub.....	(2) Hydraulic Operated