



Cat[®] RB120

ROOF BOLTER

Specifications

Dimensions (approximate)

Overall length with ATRS	4521 mm	14 ft 10 in
Chassis overall width	1880 mm	6 ft 2 in
Drill boom feed	1270 mm	4 ft 2 in
Minimum tramming height with 26×7-12 tires	813 mm	2 ft 8 in
ATRS reach with 26×7-12 tires	1930 mm	6 ft 4 in
Ground clearance with 26×7-12 tires	150 mm	6 in
Chassis height with 26×7-12 tires	660 mm	2 ft 2 in
Wheelbase	1067 mm	3 ft 6 in
Tram speed		
fast	0-39.6 m/min	0-130 ft/min
slow	0-18.3 m/min	0-60 ft/min
Drilling feed thrust (maximum)	3175 kg	7,000 lb
Drilling torque (variable)	380 N·m	280 lb·ft
Bolt tightening torque (adjustable)	271 N·m	200 lb·ft

Drive Train

- Four wheel planetary drive; each drive consists of a Fairfield W1B torque hub along with a Char-Lynn series 2000 hydraulic motor.

Automatic Parking Brake

- Two spring applied, hydraulic released, fail safe brakes at front of machine.

Hydraulics

Pump

- Two stage gear pump rated at 94.6/56.8 L/min (25/15 gal/min) at 1,770 rpm with spline fit to pump motor.

Reservoir

- 446.7 L (118 gal) capacity reservoir with 7 micron return filtration, filter by-pass and “in tank” strainer.

Hydraulic Hose

- All main system hoses are two wire braid rated at 621 bar (9,000 psi) burst pressure; MSHA 2G flame resistant approved; all fittings JIC

Stab Foot Cylinder

- One (1) 76.2 mm (3 in) bore, double acting cylinder.

Boom Feed Cylinder

- One (1) 127 mm (5 in) bore, double acting cylinder with in line check valve.

ATRS Support Cylinder

- One (1) 89 mm (3.5 in) bore, double acting cylinder with pilot operated check valve.

Valve Banks and Auxiliary Controls

All valve banks are spring returned, bi-directional with main relief set at 138 bar (2,000 psi). All other pressures are set for each function accordingly.

- One (1) main valve bank with the following functions; cable reel function, drill rotation function, drill feed function, tram functions, A.T.R.S. function, and stab function, located in the operator’s tram station.
- Three (3) auxiliary controls for operating stab function, A.T.R.S. and inch tram function located between the tires of the operator’s side of machine.
- Two (2) auxiliary cable type controls for operating rotation function, and drill feed function located at the operator’s drill station.
- One (1) cable reel control operated by means of valve handle located in the operator’s tram station.

RB120 Roof Bolter

Electrical

Start

- Two (2) push buttons located at tram and drill station.

Stop

- Three (3) tape switch (panic strip) at tram station, drill station and drill positioning controls that de-energize electrical system and applies automatic brake.

Controller

- Size 3 electro-mechanical starter with heater strips, 1.5 kVA transformer and 100 amp circuit breaker.

Fire Suppression

- Four point, 9.1 kg (20 lb) tank, multi-purpose, ABC dry chemical fire suppression system manually actuated from operator's compartment and drill station area.

ATRS (H-type)

- 1930 mm (6 ft 4 in) reach H-type Design; one primary ATRS cylinder is required for this reach.

Frame

- Low profile rigid frame. The frame design is a box structure type for a light weight, high strength frame assembly.

Operator's Drill Station Area

- Drill boom feed function control.
- Drill rotation function control.
- Tool supply area on boom for drill steel, drill bits, bolts, resin, etc.

Mid-Machine Area (between tires)

- ATRS support function control.
- Inch tram function controls.
- Stab foot function control.

Tram Station Area

- Cable reel function control.
- Full tram function controls.
- Manually adjustable tram canopy.
- Two pressure gauges.

Dust System Blowers

- Guyan 3300 series blower rated 56 CFM at 12 in Hg, variable.

Blower Drive

- Belt driven; vacuum blower is directly driven from a hydraulic motor by means of sheaves and "v" belts.

Dust Box

- Donaldson style dust collector box with internal separator, cyclone and filter.

Tire/Wheels

- Four 26x7-12 Solid Rubber Tires – 26 in maximum form diameter, tires mounted on formed rim assemblies.

Cable Reel

- 457 mm (18 in) diameter for #4/3C Round Cable – 83.8 mm (275 ft) capacity reel for #4/3C, GGC round trailing cable. Unit is supplied with 7.6 m (25 ft) of recommended cable.

Lighting System

- Ocenco Incandescent Lighting – with one headlight on front and rear.

Drill Station Canopy

- Drill Station Canopy – Attached to A.T.R.S. support arm for operator coverage at drilling controls.

Voltage

- 440 Volt AC Electrical System – pump motor rated at 29.8 kW (40 hp) for one hour at 1,770 rpm; MSHA totally enclosed explosion proof; non-ventilated cooling; foot mounted; splined insert for direct mounted pump and 440 volt AC heater strip.

Manuals

- Two parts manuals.

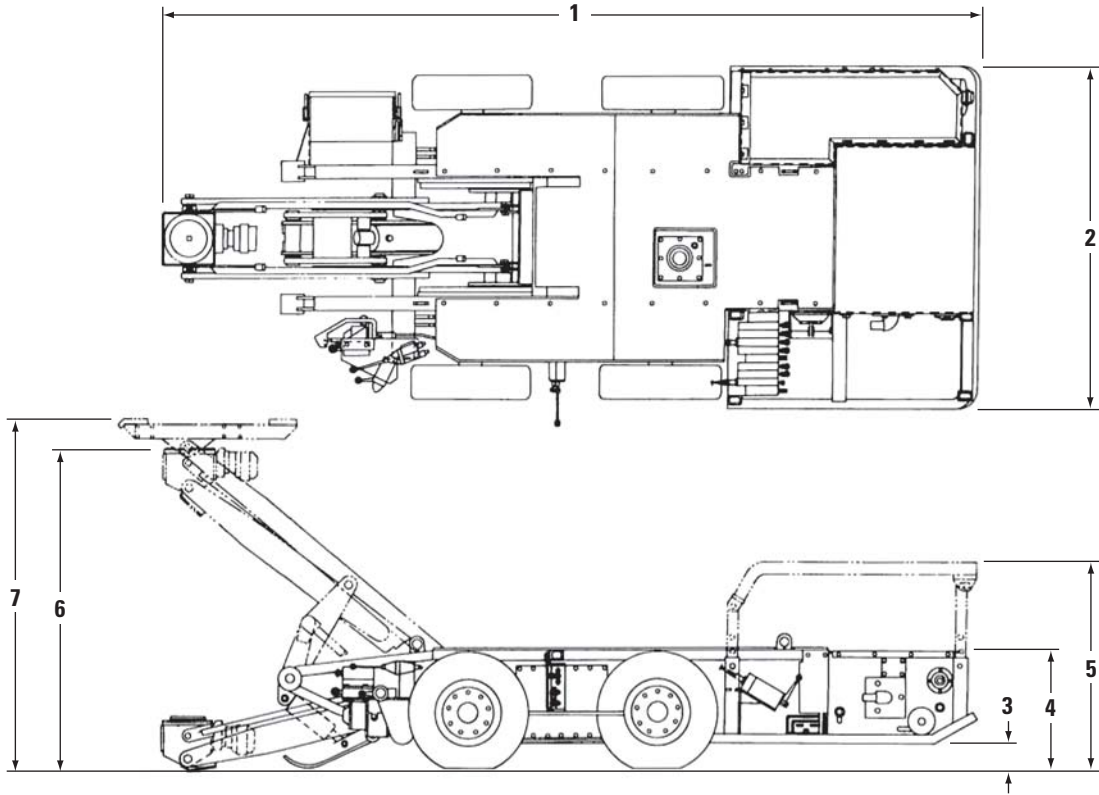
Miscellaneous

- Seven (7) oil sampling kits.

Accessories

- Extra Parts Manual.

RB120 Roof Bolter



Dimensions (All dimensions are approximate.)

	150 mm (6 in) Ground Clearance		200 mm (8 in) Ground Clearance		250 mm (10 in) Ground Clearance		300 mm (12 in) Ground Clearance	
1 Overall Length with ATRS	4521 mm	14 ft 10 in	4521 mm	14 ft 10 in	4521 mm	14 ft 10 in	4521 mm	14 ft 10 in
2 Chassis Overall Width	1880 mm	6 ft 2 in	1880 mm	6 ft 2 in	1880 mm	6 ft 2 in	1880 mm	6 ft 2 in
3 Ground Clearance	150 mm	6 in	200 mm	8 in	250 mm	10 in	300 mm	12 in
4 Cover Height	690 mm	27 in	740 mm	29 in	790 mm	31 in	840 mm	33 in
5 Canopy Height	1140 mm	45 in	1190 mm	47 in	1240 mm	49 in	1290 mm	51 in
6 Drilling Height	1550 mm	61 in	1600 mm	63 in	1650 mm	65 in	1700 mm	67 in
7 Safety Arm Height	1950 mm	77 in	2000 mm	79 in	2050 mm	81 in	2100 mm	83 in

RB120 Roof Bolter

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