

Boomer M20 P

Face drilling rig for tunneling and mining applications with a coverage area up to 66 m²



Strong by design, simple by nature

The Boomer M20 P is a robust and reliable drill rig built for durability and ease of service. It features a clean, accessible service layout, the Direct Control System (DCS 2), and precise hydraulic parallel holding, delivering consistent performance in all conditions.

⊕ Main benefits

Maximized productivity driven by the new BUT MD boom, delivering higher torsional rigidity and pinpoint drilling accuracy combined with state-of-the-art rock drills

Reliable performance thanks to a true and tested, rugged, straightforward design

Cost-efficient ownership enabled by clear, accessible mechanics, easy maintenance and maximized uptime

FOPS certified canopy (standard), ROPS and FOPS certified cabin (option)

BUT MD booms

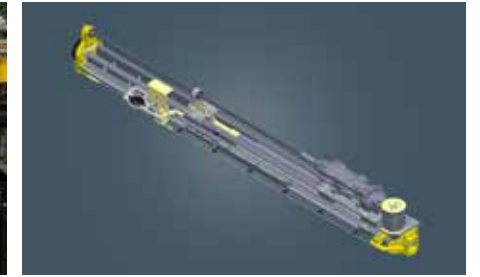
Safe bolting platforms



The BUT MD boom's upgraded telescope enables significant drill rig running cost reduction. Among the upgrades are 3.4x vertical stiffness, 2.4x horizontal stiffness, 70% vertical stiffness reduction, 60% horizontal deflection reduction and 3x torsional stiffness compared to its predecessor.



The safe bolting platform combined with the boom functionality eliminates the need for operators to step in front of the rig beneath unsupported rock during bolt installation. The platform is positioned at the same height as the operator cabin floor, ensuring safe and ergonomic access. When not in use, the platform can be folded away to maximize maneuverability during tramming.



The BMHTC feed is a compact telescopic feed engineered to deliver high robustness and maximum productivity. Its reduced height from the boom to the drill center enables operation in confined spaces and enhances overall rig control. A robust front drill support ensures stable and accurate drilling, while protected hydraulics and smooth hose routing help increase uptime and reduce maintenance needs.



Maximized productivity

With the new BUT MD boom, the Boomer M20 P takes productivity to the next level. This boom delivers significantly higher torsional rigidity, stiffness, and overall robustness, compared to previous models. Combined with adjustable boom telescope bearings, it provides greater drilling precision and straighter holes. On top of that, you get faster positioning and improved crosscut and roof-drilling capabilities. In other words: higher productivity.



+ Reliable performance

The M-size Boomer has a long legacy and has seen numerous upgrades and refinements over the years. With the robust and reliable BUT MD boom, this rig continues to meet and exceed expectations. With no sensors or external cabling on the booms and feeds, the design is clean, accessible, and service-friendly. The straightforward architecture makes daily inspections, troubleshooting, and maintenance easier. This helps keeping the rig performing reliably. It's a tough, uncomplicated solution built for real-world productivity.



+ Cost-efficient ownership

Boomer M20 P, equipped with the dependable BUT MD booms, delivers long service intervals and a rig that is easy and cost-efficient to keep running. The boom telescope is designed for durability and straightforward maintenance, saving both time and money while ensuring excellent availability and truly cost-effective ownership.



+ COP MD20 - world-class rock drill for mining

The optional COP MD20 rock drill delivers fast, reliable drilling for mining applications, with service intervals up to 1 000 hours. It features individually routed hoses for reduced wear, an optimized damper for lower vibration, and improved resistance to free hammering. The result is higher operator comfort, longer tool life, and exceptional durability underground.



A comprehensive service offering

Even the best equipment needs to be serviced regularly to make sure it sustains peak performance. An Epiroc service solution offers peace of mind, maximizing availability and performance throughout the lifetime of your equipment. We focus on safety, productivity and reliability.

By combining genuine parts and an Epiroc service from our certified technicians, we safeguard your productivity – wherever you are.

Technical specifications

● - Standard ○ - Option

Drilling system

COP 1838HD+	●
COP 2238HD+	○
COP MD20	○
Water mist flushing: External water and air supply	○
Water mist flushing: External water, internal air supply	○
Air fan cooled hydraulics	○
Rock drill lubrication air filtration system	○
Rock drill lubrication warning system	●
Big hole drilling system	●
Hole blowing kit with 80 l air receiver	○

Boom

BUT MD S (6 364 mm)	●
BUT 29 HD	○
Safe bolting *	○
Service platform P2 **	○
Automatic boom lubrication kit, rear part of boom	○
* Includes platform and safe bolting boom variant	
** With BUT 29 HD booms	

Feed

BMH 6000-series 14 ft, 16 ft, 18 ft, 21 ft	●
BMHTC compact telescopic feed	○
Telescopic feed BMHT 6000-series	○
Extension drilling set BSH 110 (BMH feeds only)	○
Rod Adding System, RAS (BMH feeds only)	○
Mining (heavy duty) drilling centraliser	○

Air/water system

GAR 5 hydraulically driven screw compressor	●
GAR 30 hydraulically driven screw compressor	○
Water booster pump capacity at 15 bar: 250 l/min Min. water inlet: 200 l/min at preferred pressure of 2 bar	●
Water hose reel	○
Manual lubrication kit	○
Low pressure rig washing kit	○
High pressure rig washing kit	○

Hydraulic system

Low oil level indicator	●
Oil temperature gauge on oil tank	●
Electrical oil filling pump	●
Oil filter indicator	●
Water cooled oil	●
Ni-Cr plated piston rods	○
Extra filtration package for water and fine particle removal	○
Hydraulic tuning kit	○

Control system

Direct Control System (DCS 2, pilot controlled)	●
Two operator panels (for standing operation only)	○
Feed Angle Measurement system, FAM I	○
Feed angle measurement system with drill plan handling and navigation, FAM III	○
Measure While Drilling (MWD)	○
Underground Manager Pro (PC software)	○
Underground Manager MWD (software) for analysis of data	○
Fleet+ telematics system	●
Drill stop protection system (CE cetrified)	○
Boom isolation switch	○
Total station navigation	○

Electrical system

Total installed power: 158 kW, main motors: Sf 115 2x75 kW	●
Voltage: 380-1 000 V, 50/60 Hz	●
Starting method: star/delta (380-690 V)	●
Starting method: DOL (1 000 V)	○
Starting method: soft start (380-690 V)	○
Electronic overload protection for electric motors	●
Percussion hour meter on electrical cabinet	●
Digital voltmeter/ampere meter in electrical cabinet	●
Phase sequence indicator	●
Earth fault indicator	●
Battery charger	●
Battery jump start receptacles	○
Transformer: 8 kVA	●
Cable reel, diameter: 1 600 mm	●
Dual controls for cable reel	●
Cable auto spooling kit	○
Stainless steel electrical enclosure	○
Electric outlet for accessories, 16 A (CE and not for 1 000 V)	○
Extra transformer 3-phase, 15 kVA, 230/400 V	○
Electric system: 24 V	●
Batteries: 2x12 V, 125 Ah	●
Tramming lights: 6x40 W 24 V LED, 2x70 W halogen	●
Working lights: 4x80 W LED, 24 V DC	●
Brake lights	●
Illuminated stairs	●

Carrier

Deutz TCD 2013 LO4, Stage IIIA/Tier 3, 120 kW	●
Deutz TCD 4.1 LO4, Stage V, 115 kW	○
Deutz TCD 4.1, China IV, 115 kW	○
Articulated steering: ±38° steering angle	●
Four-wheel drive	●
Hydrodynamic transmission: Clark 24000	●
Dana 113 axles (rear axle ±8° oscillation)	●
Automatic differential lock on front axle, limited slip	●
Tyres: 12xR24	●
Tyres: 12xR24, foam filled	○
Clearance outside axles: 22' front, 13' rear	●
Emergency and parking brakes: SAHR	●
Fuel tank, volume: 110 l	●
Fire extinguisher	●
Central lubrication grease point	●
Central lubrication system	○
Horn, beacon and reverse alarm	●
Shelf for drill bits and tools	●
Fire suppression system ANSUL (manual/automatic)	○
Fire suppression system FORREX (automatic)	○
Heater kit for hydraulic oil tank, diesel engine and electric motors	○
Hose/cable guiding at water/cable reel	○

Protective roof (standard)

Manual spotlight, left and right	○
Mounting height, -80 mm/+310 mm	○
Fixed seat	●
Swingable seat	○
FOPS certified	●

Cabin (optional)

ROPS and FOPS certified	●
Mounting height, -140 mm/+250 mm	○
Low profile cab, -150 mm	○
Stainless steel cabin body	○
Protection bars for front window	○
Heating function for air conditioning (water transferred)	○
Electrical heater, 1.2 kW, 230 V (CE)	○
Joystick-controlled spotlights left and/or right	○
Air conditioning unit	○
Media player	○
Fixed seat	●
Swingable seat	○
Reversing camera with monitor	○
12 V outlet for com radio	○

Drifter rods

Rock drill	Rod	Min. hole diameter (mm)
COP 1838	SR35-H35-T38 Speedrod	38
COP 2238	SR35-H35-T38	38
COP MD20	SR35-R39-T38	38
COP 3038	SR35-R39-T38	45

Extension rods for injection drilling/RAS

Rock drill	Rod	Min. hole diameter (mm)
COP 1838	Rnd 32 Speedrod	38
COP 2238	Rnd 39 Speedrod	38
COP MD20		
COP 3038	TC42-R39-TC42 Speedrod	64

Shank adapters

Rock drill	Rod	Min. hole diameter (mm)
COP 1838	R38	38
COP 2238	T38	38
COP MD20	R32*	38
COP 3038	TC42 (conical T-thread)	45

*Intended for RAS and extension drilling with BSH 110

Couplings

Rock drill	Rod	Diameter (mm)	Length (mm)
COP 1838	R38	55	170
COP 2238	T38	55	170
COP MD20			
COP 3038	TC42/T38	57	175

Recomended cable size and length

Voltage	Type	Dimension (mm²)	Diameter (mm)	Length (m)
380–400 V	Buflex	3x185+3G35	56	90
440–500 V	Buflex	3x150+3G25	52	100
550 V	Buflex	3x120+3G25	46	135
660–690 V	Buflex	3x95+3G16	45	155
1 000 V	Buflex	3x50+3G10	33	200

Recommendations are given for surrounding temperature of 40° C and up to a height of 2 000 m.

Noise and vibration

Operator sound pressure level in canopy, drilling, free field (ISO 11201)	104±6 dB(A) re 20 uPa
Operator sound pressure level in cabin, drilling, free field (ISO 11201)	75±3 dB(A) re 20 uPa
Operator sound pressure level working close to machine, drilling, free field	104±6 dB(A) re 20 uPa
Sound power level (ISO 3744), drilling, free field	128 dB(A) re 1 pW
Vibration levels seated, drilling (ISO 2631-1)	0.07±0.07 m/s ²
Vibration levels standing, drilling (ISO 2631-1)	0.07±0.07 m/s ²

Tramming speed

On flat ground (rolling resistance 0.05)	>14 km/h
On incline 1:8	>6 km/h

Gross weight (depending on configuration)

Total, min/max	23 000/29 000 kg
Boom side, min/max	17 000/19 000 kg
Engine side, min/max	6 000/10 000 kg

Dimensions

Width	2 245 mm
Height with cabin (H)	3 179 mm
Height roof up/down	3 019/2 324 mm
Length with BMH 6814 feed(s)	14 297 mm
Ground clearance	260 mm
Turning radius outer/inner	7 500/4 400 mm

Dimensions in millimeters

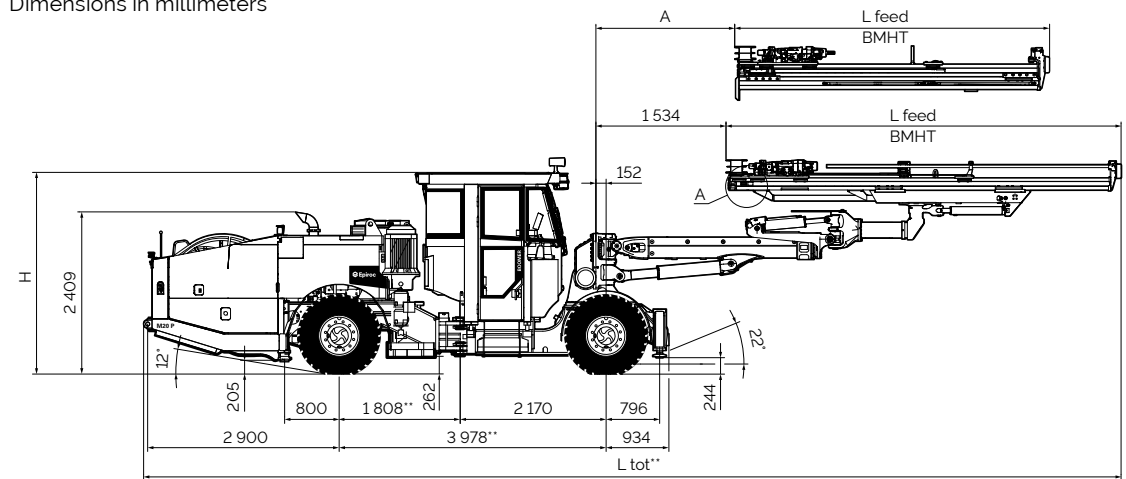
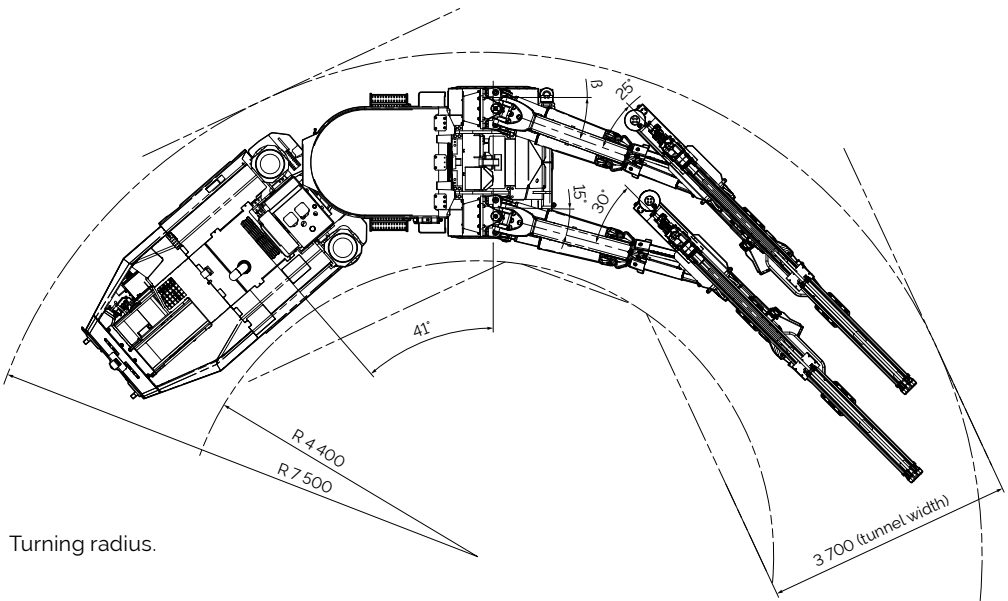
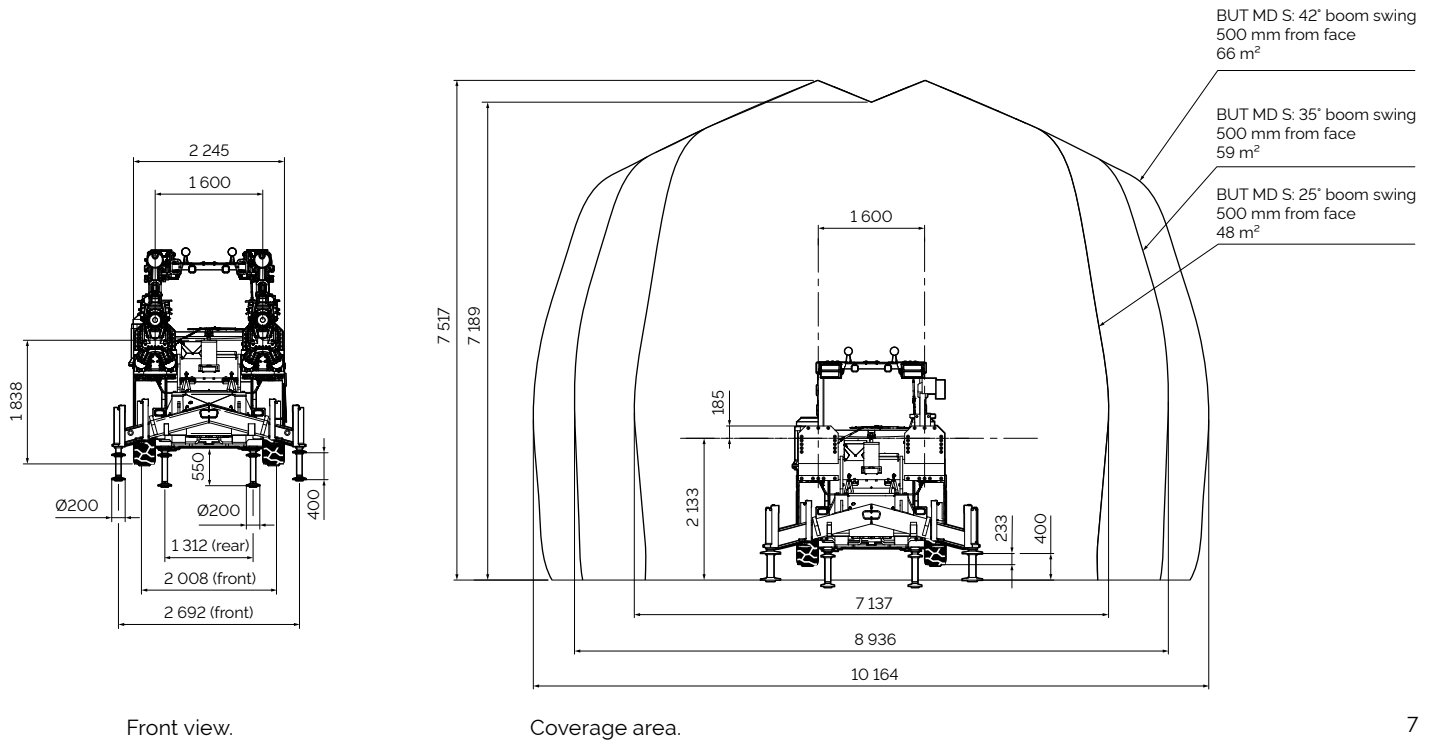


Illustration shows rig with optional equipment mounted.



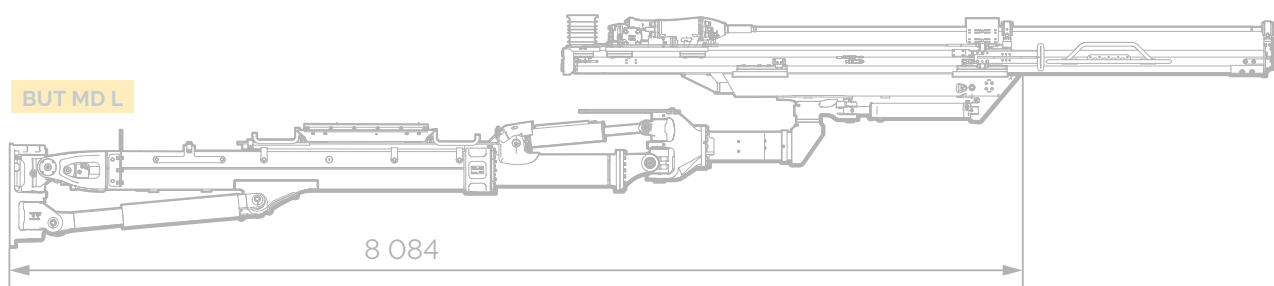
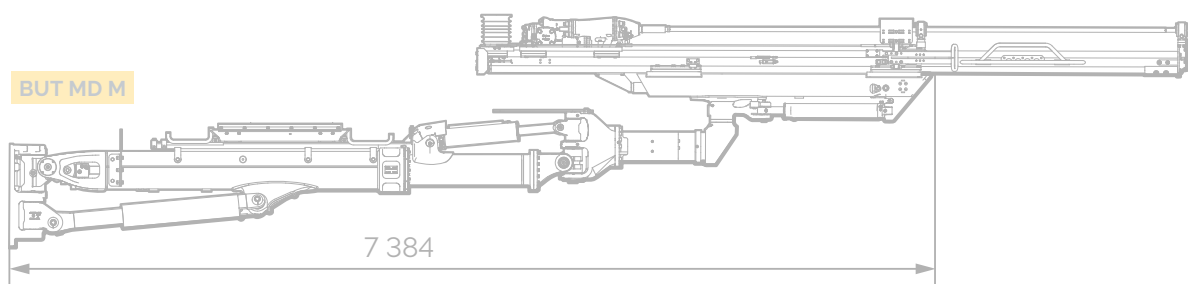
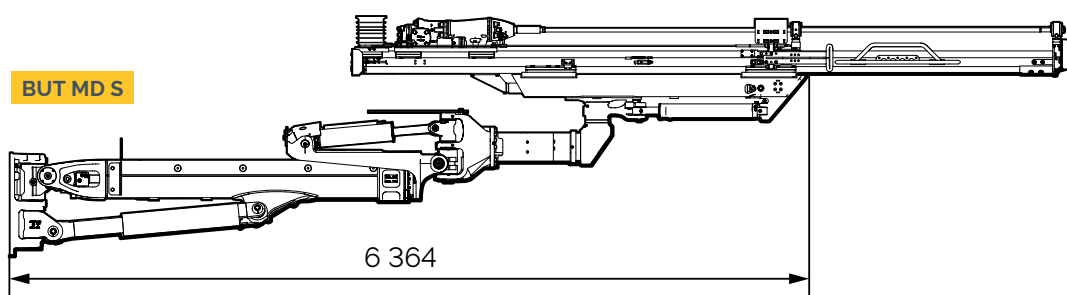
Turning radius.



Front view.

Coverage area.

The BUT MD boom compatible with Boomer M20 is the short version (BUT MD S).
Dimensions in millimeters.



United in performance. Inspired by innovation.

Performance unites us, innovation inspires us, and commitment drives us to keep moving forward.

Count on Epiroc to deliver the solutions you need to succeed today and the technology to lead tomorrow.

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