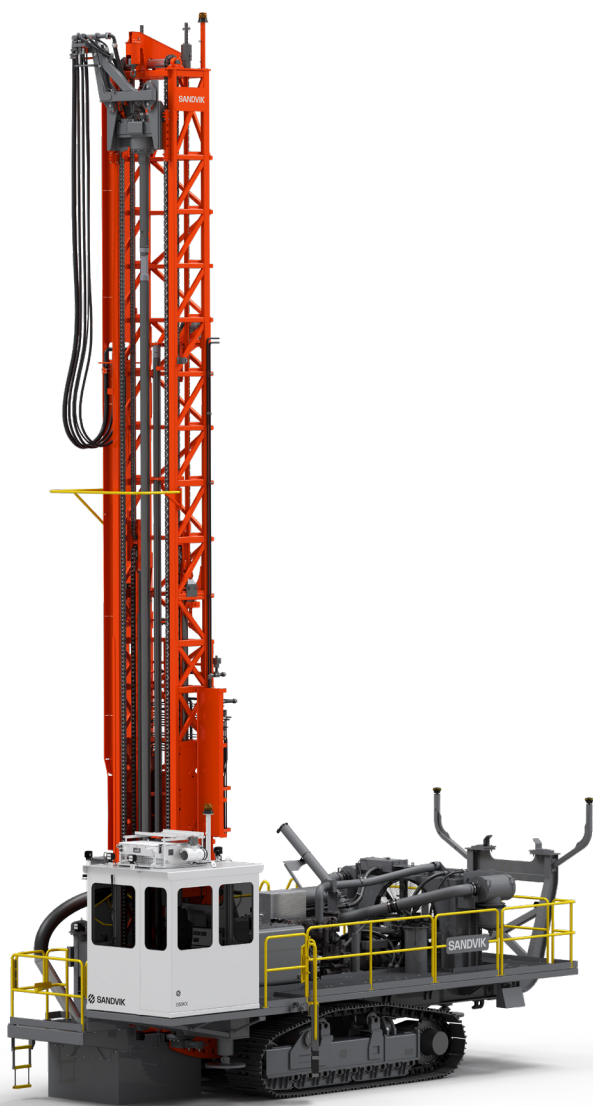


Sandvik D50KX

Rotary / DTH blast hole drill



Sandvik D50KX is a diesel-powered, self-propelled, crawler-mounted blasthole drill for surface mining. It is standard equipped for rotary with optional down-the-hole (DTH) hammer drilling power.

Higher productivity through innovation

Sandvik D50KX uses electric over hydraulic system to operate the machine, allowing for ease of operation, troubleshooting and delivering higher availability.

Rugged design

Sandvik D50KX is equipped to drill 127 to 229 millimeter (5 to 9 inch) diameter blastholes with first-pass capacity of 11 meters (36 feet) with a total depth of 63.5 meters (208.5 feet).

Innovation for safer operation

Pipes can be handled from within the cab using the Sandvik carousel and breakout system and with sliding bit breaker inbuilt on the deck wrench, bit handling is made easier.

Operator comfort and control

The new-generation ergonomically designed cab includes controls on the armrests, touchscreens, large drill window and roof mounted HVAC system to keep the cab cooler.

Easier access

Maintenance can be done with walkways in all the service areas with ladders for entry and egress.

Designed with safety in mind

Sandvik D50KX is designed with worldwide standards in mind, such as ISO standards and Earth Moving Equipment Safety Round Table (EMESRT) design philosophies.

Compressor management

Advanced compressor management reduces the compressor load allowing the operator to manage air volume and pressure to maximize efficiency and reduce fuel burn reducing your carbon footprint and extending engine and compressor life.

Performance	
Hole diameter	127 – 229 mm / 5 – 9 in
First pass hole depth (Std. mast) First pass hole depth (Ext. mast)	8.86 m / 29 ft. 11 m / 36 ft.
Max. hole depth (Std. mast) Max. hole depth (Ext. mast)	63.5 m / 208.5 ft. 20.1 m / 66 ft.
Pull down force	222 kN / 50,000 lbf.
Max. weight on bit	24,948 kg / 55,000 lbs.
Power group	
<i>Engine options:</i>	
CAT C15 (Tier 4 / Non Tier 4)	403 kW / 540 HP
CAT C18 (Non Tier 4)	470 kW / 630 HP
CAT C18 (Non Tier 4)	522 kW / 700 HP
<i>Compressor options:</i>	
Rotary drilling	29.7 m³/min. @ 6.9 bar / 1,050 CFM @ 100 psi 37.5 m³/min. @ 6.9 bar / 1,323 CFM @ 100 psi 45.3 m³/min. @ 6.9 bar / 1,600 CFM @ 100 psi
DTH drilling	28.3 m³/min. @ 24.1 bar / 1,000 CFM @ 350 psi 32.8 m³/min. @ 24.1 bar / 1,160 CFM @ 350 psi
Fuel tank	1,135 l / 300 gal. (standard) 379 l / 100 gal. (auxiliary)
Ambient operating range	-40° to 50°C / -40° to 122°F
Hydraulic system	
Reservoir capacity	568 l / 150 gal.
Frame and integral jacks	
Main frame	Designed with wide flange beams and design verified by structural FEA calculations
Walkways	Slip resistant FRP grating on all maintenance areas
Leveling jacks	3
Pad diameter	762 mm / 24 in
Pad to ground clearance	508 mm / 20 in on rear 625 mm / 24.6 in on front
Undercarriage	
Model	S30HD
Track shoe width	750 mm / 29.5 in
Track shoe type	Triple grouser
Width over tracks	3,687 mm / 145.2 in
Track length	4,612 mm / 181.5 in
Tram speed	2.9 kmph / 1.8 mph

Mast	
Construction	Designed with rectangular structural tubing and design verified by structural FEA calculations
Angle drilling	0 - 30°
Hoist	17.8 kN / 4,000 lbf.
Pipe loader	Standard mast: 4 pipes (Ø 6, 6.5, 7 in), 5 pipes (Ø 5.5 in), 6 pipes (Ø 4.5, 5 in) Extended mast: 1 pipes (all pipe dia.)
Pipe size	102 mm / 4 in, 114 mm / 4.5 in, 127 mm / 5 in, 140 mm / 5.5 in, 152 mm / 6 in, 165 mm / 6.50 in, 178 mm / 7 in
Feed	
Feed type	Twin cylinders with heavy duty roller chains
Pull down force	222 kN / 50,000 lbf.
Feed speed	0 – 30.5 m/min. / 0 – 100 fpm
Pull back force	111 kN / 25,000 lbf.
Chain tensioning	Manual
Rotary head	
Rotary power	103 kW / 140 HP
Speed	0 – 184 RPM
Bull shaft thread	5.5 in API REG.
Operator's cab	
Certification	FOPS rated (ISO 3449 level II)
Sound level	80 dB or less
Operator's seat	Fully adjustable and swiveling with lumbar support, pneumatic suspension and 3 point seat belt
Helper's seat	With 2-point seat belt
Camera display	Tramming and pipe handling
HVAC (Ambient range)	-40° to 50°C / -40° to 122°F
Sunshades	Standard on all windows – retractable
Operator's controls	
Location	Seat mounted left and right hand control panels for all drill functions
GUI	12” touch screen display
Dust suppression	
Dust collector	127 m³/min. / 4,500 CFM
Water injection (w/o DC)	1,514 l / 400 gal.
Water injection (w/ DC)	757 l / 200 gal.
Water pump	34 lpm / 9 GPM
Dust hood	Hyd. cylinder actuated dust door and curtains

Standard features	
Lighting	LED lights for access and maintenance
Central grease lubrication	Electric, automatic
Thread lubrication	Operated from cab
Cameras	2 for tramming 1 for pipe handling
Safety features	Emergency stops near all ladders Pull type cable stop on mast
Fluid service center	Remote fill points: Fuel, engine oil, coolant, hyd. oil Remote drain points: Engine oil, coolant, hyd. oil
Strobe lights	2 (on mast and on frame)
Diagnostics package	Sensor package for key pump parameters
Options	
Radio remote	For tramming and hoist
Wash down	Water wash hose reel
Air hose reel	Retractable hose reel
Hammer lube / bit lube	115 l / 30 gal.
Fire suppression	Sandvik Eclipse wet fire suppression system
Arctic package	
Electric heaters	Hydraulic oil, compressor oil, engine oil, battery warmer
Fuel fired heaters	Water, engine coolant
Electrical supply to heaters	Breaker box to power feed all heaters
Technology features	
Performance	Auto level
Navigation	High precision TIM 3D navigation
Connectivity	Onboard Knowledge box® (4G / LTE , Wifi)
iLink Data interface	3 rd party interface through a REST API
Digital solutions	Driller's office My Sandvik Onsite My Sandvik Productivity



Dimensions	
Length – Mast up	10.5 m / 34 ft. 4 in
Length – Mast down (Std. mast)	14 m / 46 ft. 1 in
Length – Mast down (Ext. mast)	16 m / 52 ft. 7 in
Height – Mast down	5.9 m / 19 ft. 5 in
Height – Mast up (Std. mast)	14.1 m / 46 ft. 4 in
Height – Mast up (Ext. mast)	16.1 m / 52 ft. 10 in
Width	5.2 m / 17 ft. 2 in

Weight	
Estimated operating weight	45 – 47.1 tonnes / 99,000 – 104,000 lbs.
Dimensions are per engineering drawings, actuals may vary slightly. Weights are approximate and subject to change without notice. All performance figures are theoretical and at 100% systems efficiency.	

