

Hydraulic Controls

Complete system consists of pump, tank with filter, oil cooler, valves, lines, linkage and control levers.

Attachments - Vane-type pump geared from flywheel				
Output at 1900 RPM and 6895 kPa (1000 psi)				
Lift cylinder flow	408 liters/min	108 gpm		
Tilt cylinder flow	121 liters/min	32 gpm		
Relief valve settings				
Bulldozer	18 790 kPa	2725 psi		
Tilt Cylinder	20 340 kPa	2950 psi		
Ripper (Lift)	18 790 kPa	2725 psi		
Ripper (Pitch)	20 340 kPa	2950 psi		

Electro-hydraulic pilot valves assist operations of ripper and dozer tilt controls. Standard hydraulic systems include two valves for 10SU or 10U bulldozer and tilt.

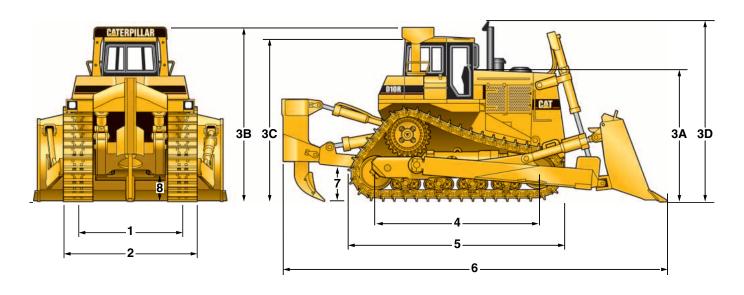
Optional hydraulic control

Two additional valves for ripper function

- hydraulic shank pitch adjustment
- adds 102 kg (226 lb)

Dimensions

All dimensions are approximate.



Tractor Dimensions

		Stand	ard
1.	Track Gauge	2550 mm	8 ft 4 in
2.	Width of Tractor		
	Over Trunnions	3716 mm	12 ft 2 in
	Without Trunnions (std. shoe width)	3160 mm	10 ft 4 in
3.	Machine Height from Tip of Grouser		
	3A Height (stripped top)	3217 mm	10 ft 6 in
	3B Height (to top of ROPS)	4360 mm	14 ft 3 in
	3C Height (to top of FOPS cab)	4102 mm	13 ft 5 in
	3D Height (to top of stack)	4538 mm	14 ft 11 in
4.	Length of Track on Ground	3880 mm	12 ft 9 in
5.	Overall Length of Basic Tractor (with drawbar)	5331 mm	17 ft 6 in
	Attachments add to overall machine length:		
	Single Shank ripper	1760 mm	5 ft 9 in
	Multi-Shank ripper	1717 mm	5 ft 8 in
	10 SU Dozer	2169 mm	7 ft 1 in
	10 U Dozer	2423 mm	7 ft 11 in
6.	Overall Length (with blade and ripper)	9360 mm	30 ft 5 in
7.	Drawbar Height (centerline of clevis) from ground face of shoe	779 mm	2 ft 7 in
8.	Ground Clearance	615 mm	2 ft 0 in

Bulldozers

Tag link dozer coupling brings blade closer for better balance and control.

Blade		10SU	10U	10SU ABR	10U ABR
Blade capacity (SAE J1265)	m³	18.5	22.0	18.5	22.0
	yd³	24.2	28.7	24.2	28.7
Width with blade (over end bits)	mm	4862	5263	4862	5263
	ft/in	15'11"	17'3"	15'11"	17'3"
Blade height	mm	2119	2119	2119	2119
_	ft/in	6'11"	6'11"	6'11"	6'11"
Digging depth	mm	674	674	674	674
	in	26.5	26.5	26.5	26.5
Ground clearance	mm	1497	1497	1497	1497
	ft/in	4'11"	4'11"	4'11"	4'11"
Maximum tilt	mm	993	1074	993	1074
	ft/in	3'3"	3'6"	3'3"	3'6"
Weight*	kg	10 291	10 821	11 121	12 300
-	1b	22,688	23,856	24,518	27,117
Total operating weight**	kg	66 001	66 531	66 831	68 010
(with blade and single shank ripper)	1b	145,507	146,675	147,336	149,936

^{*} Does not include hydraulic controls, but includes blade tilt cylinder.

Features

- dual tilt is optional for improved blade fill and dumping
- cutting edges are DH-2 steel and end bits are DH-3 steel for maximum durability
- · dozer lift cylinders mount to top corners of radiator guard to improve mechanical advantage
- single lever controls all blade movements, including optional dual tilt

Rippers

Ripper carriage and frame designs provide excellent visibility.

Hydraulic tip adjustment cylinders vary shank angle to aid penetration and help lift and shatter rock.

		Single Shank	Single Shank, Deep Ripping Arrangement	+Multi-Shank Arrangement
Overall beam width	mm ft/in	_ _	_ _	2920 9'7"
Maximum penetration force*				
(shank vertical)	kN lb	208 46,715	209 46,932	205 45,980
Maximum penetration				
(standard tip)	mm	1494	1979	876
•	ft/in	4'11"	6'6"	2'11"
Pryout force				
(multi-shank ripper	kN	482	481	429
with one tooth)	lb	108,251	108,013	96,360
Maximum clearance raised				
(under tip, pinned	mm	927	688	1045
in bottom hole)	in	36.5"	27.1"	41.1"
Number of shank holes		3	3	2
Weight				
(without hydraulic controls)	kg	7137	7573	6919
-	1b	15,734	16,695	15,253
Total operating weight**				
(with 10 SU blade	kg	66 001	66 164	65 965
and ripper)	lb	145,507	145,867	145,427

- * Specifications are converted from British to metric measure and rounded.
- ** Operating weight includes lubricant, coolant, full fuel tank, hydraulic controls, 610 mm (24") extreme service shoe, ROPS cab and operator.
- + Includes one shank. Add 528 kg (1164 lb) for each additional shank.

Note: Single shank, deep ripping arrangement weight includes required pin puller.

Features

- optional single shank pin puller lets operator adjust shank depth from seat
- large one piece shank: 100 mm × 400 mm (4" × 15.75")
- multi-shank ripper allows variable use of one, two or three shanks to match job conditions

^{**} Includes hydraulic controls, blade tilt cylinder, coolant, lubricants, full fuel tank, ROPS/FOPS cab, and operator.

Optional Equipment (with approximate change in operating weight)

Standard and optional equipment may vary. For specific tractor applications, additional guarding may be required. Consult your Caterpillar dealer for specifics.

	kg	lb
Air conditioner, ROPS mounted (R134a)	135.2	298
Air conditioner, Fender mounted (R134a)	194	428
Armrest, adjustable right	3.6	8
Bulldozers:		
Dual tilt cylinders	200	441
Rock guards (for 10U blade only)	226.8	500
Counterweight:		
Front mounted	2359.6	5202
*Rear mounted (basic)	4213	9288
*Rear mounted (additional weight)	1206.6	2660
Drawbar, rigid	681.3	1502
Fast-fill fuel system for use with:		
Drawbar or counterweight	40.2	89
Ripper	47	104
Fan, defroster	6.8	15
Fan, demand drive	0	0
Guard, rear power train	224	494
Heater, engine coolant	108	238
Heater, fuel	6.9	15
Hydraulic controls for dual tilt	52	115
Hydraulic controls for ripper		
(two additional valves)	117.5	259
Lights, supplemental		-
2 front, ROPS mounted	10	23
4 front, lift cylinder mounted	56.3	124
2 rear, ROPS mounted	11	24
2 rear, fender mounted	18.2	40
Low temp start (includes two additional		
heavy duty batteries and		
additional starting motor)	162	357
Oil change system for quick service to		
engine and transmission fluids	8.5	19

kg	lb
18.2	40
0	0
84.6	186.5
4	9
14	31
10.6	23
318	701
7137	15,734
7573	16,695
6919	15,253
528	1164
570	1257
45	100
0	0
0	0
2.3	5
652	1437
1230	2712
7707	16,990
_	
	18.2 0 84.6 4 14 10.6 318 7137 7573 6919 528 570 45 0 0 2.3

NOTE: All specifications are converted from metric to British measure and rounded, unless otherwise specified.

^{*} A rear attachment and/or counterweight is recommended for improved performance and balance.

^{**} Requires factory modification if ordered with ripper.