

V O L V O



Volvo Excavators 21.0 - 26.4 t / 46,220-58,250 lb 173 hp

EC230

Volvo Construction Equipment

EC230

For general construction, road building or something more specialist, this is a versatile machine designed to help you achieve outstanding results



An edge in versatility

With its cutting-edge technology, outstanding efficiency and robust design, the EC230 effortlessly handles heavy loads, tackles tough terrain, and ensures exceptional productivity across a wide range of tasks and applications. Whether you're working in general construction, road building or something more specialist, the Volvo EC230 is a versatile and high performing machine designed to help you achieve outstanding results.



Operator comfort

- More precise controls
- Quieter cab
- Personalized settings for greater comfort
- ROPS cab as standard



Smart View with Obstacle Detection

- Increased safety onsite and for the operator
- Radar warns for items outside the screen
- HD screen
- Human identifying alarm separate from other obstacles



Serviceability

- Ground level access for service
- Long service intervals
- Grouped filters and lubrication points
- Quick and easy oil changes



Fuel Efficiency

- Up to 15% improvement
- Engine pump optimization with engine speeds as low as 1,600 rpm
- Smart MCV



Productivity

- Volvo Active Control
- Dig Assist with On-Board Weighing
- Electro-hydraulic system
- Boom/Swing & Boom/Travel priority functions

Volvo EC230 in detail

Engine

The latest generation, Volvo engine Tier 4f emissions compliant diesel engine fully meets the demands of the latest, emissions regulations. Featuring Volvo Advanced Combustion Technology (V-ACT), it is designed to deliver superior performance and fuel efficiency. The engine uses precise, high pressure fuel injectors, turbo charger and air-to-air intercooler, and electronic engine controls to optimize machine performance.

- **Air Filter:** 3-stage with precleaner

- **Automatic Idling System:** Reduces engine speed to idle when the levers and pedals are not activated resulting in less fuel consumption and low cab noise levels.

Engine	Volvo	D6J
Max power at	r/min (r/s)	1,800 (30)
Net, ISO 9249/SAE J1349	kW (hp)	128 (172)
Gross, ISO 14396/SAE J1995	kW (hp)	129 (173)
Power output at		
Operating max	r/min (r/s)	1,600 (27)
Travel max	r/min (r/s)	1,800 (30)
Max torque	Nm (ft lbf)	849 (626)
at engine speed	r/min (r/s)	1,350 (22.5)
No. of cylinders		6
Displacement	l (in ³)	5.7 (348)
Bore	mm (in)	98 (3.86)
Stroke	mm (in)	126 (4.96)

Electrical System

High-capacity electrical system that is well protected. Waterproof double-lock harness plugs are used to secure corrosion-free connections. The main relays and solenoid valves are shielded to prevent damage. Contronics provides advanced monitoring of machine functions and important diagnostic information.

Voltage	V	24
Batteries	V	2 x 12
Battery capacity	Ah	140
Alternator	V/A	28 V / 180 A
Start motor	V - kW	24 / 5.5

Undercarriage

The undercarriage has a robust X-shaped frame. Greased and sealed track chains are standard.

EC230F L

Track shoe		2 x 49
Link pitch	mm (in)	190 (7.5)
Shoe width	mm (in)	600 (24)
Shoe width, triple grouser	mm (in)	500 / 600 / 700 / 800 / 900 (20 / 24 / 28 / 32 / 36)
Shoe width, triple grouser (HD)	mm (in)	600 (24)
Shoe width, double grouser	mm (in)	700 (28)
Bottom rollers		2 x 8
Top rollers		2 x 2

Swing system

The swing system uses an axial piston motors, driving a planetary gearbox for maximum torque. An automatic holding brake and antirebound valve are standard.

Max. slew speed	r/min	11.5
Max. slew torque	kNm (ft lbf)	83.3 (61,430)

Travel System

Each track is powered by an automatic two-speed shift travel motor. The track brakes are multi-disc, spring-applied and hydraulic released. The travel motor, brake and planetary gears are well protected within the track frame.

Max. drawbar pull	kN (lbf)	178 (40,016)
Max. travel speed (low)	km/h (mi/h)	3.4 (2.1)
Max. travel speed (high)	km/h (mi/h)	5.6 (3.5)
Gradeability	°	35

Cab

The operator's cab has easy access via a wide door opening. The cab is supported on hydraulic dampening mounts to reduce shock and vibration levels. These along with sound absorbing lining provide low noise levels. The cab has excellent all-round visibility. The front windshield can easily slide up into the ceiling, and the lower front glass can be removed and stored in the side door.

Integrated air-conditioning and heating system: The pressurized and filtered cab air is supplied by an automatically controlled fan. The air is distributed throughout the cab from 10 vents.

Ergonomic operator's seat: The adjustable seat and joystick console move independently to accommodate the operator. The seat has 12 different adjustments plus a seat belt for the operator's comfort and safety.

Sound Level

Sound level in cab according to ISO 6396		
L _{pA}	dB	70
External sound level according to ISO 6395, EU Noise Directive (2000/14/EC)		
L _{WA}	dB	99

Hydraulic system

The new electro-hydraulic system and new MCV (main control valve) use intelligent technology to control on-demand flow for high productivity, high-digging capacity and excellent fuel consumption.

The following important functions are included in the system:

Summation system: Combines the flow of both hydraulic pumps to ensure quick cycle times and high productivity.

Boom priority: Gives priority to the boom operation for faster raising when loading or performing deep excavations.

Arm priority: Gives priority to the arm operation for faster cycle times in leveling and for increased bucket filling when digging.

Swing priority: Gives priority to swing functions for faster simultaneous operations.

Regeneration system: Prevents cavitation and provides flow to other movements during simultaneous operations for maximum productivity.

Power boost: All digging and lifting forces are increased.

Auto warm up: Hydraulic oil temperature can be set below the threshold that has been set.

Creep mode: Lower travel speed (10%~50% of 1st full speed) can be set by creep switch on.

Holding valves: Boom and arm holding valves prevent the digging equipment from creeping.

Main pump: 2 x Variable displacement axial piston pumps

Maximum flow	l/min (gal/min)	2 x 208 (2 x 55)
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Pilot pump: Gear pump

Maximum flow	l/min (gal/min)	1 x 16 (1 x 4)
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Max. pressure

Implement	MPa (psi)	34.3 / 36.3 (4,975 / 5,265)
Travel circuit	MPa (psi)	34.3 (4,975)
Slew circuit	MPa (psi)	29.5 (4,279)
Pilot circuit	MPa (psi)	3.9 (570)

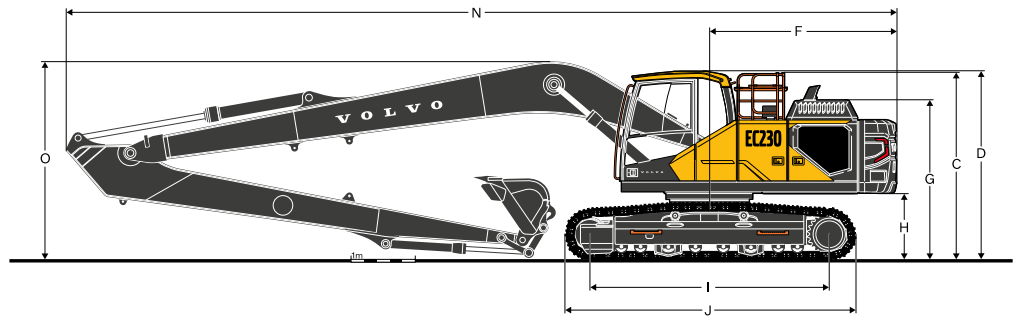
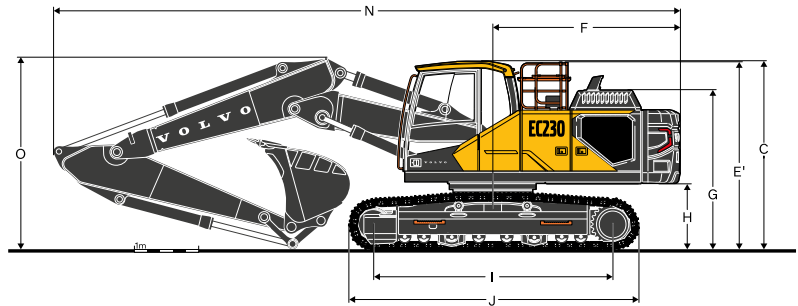
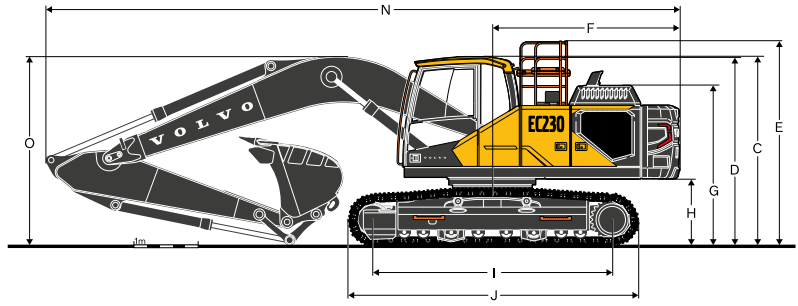
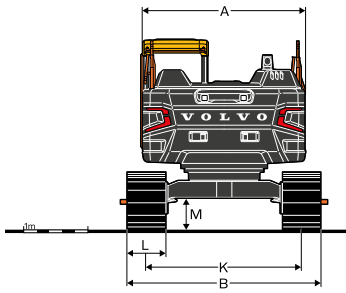
Hydraulic Cylinders

Boom		2
Bore x Stroke	ø x mm (ø x in)	125 x 1,235 (4.9 x 48.6)
2 piece boom		1
Bore x Stroke	ø x mm (ø x in)	160 x 1,070 (6.3 x 42.1)
Arm		1
Bore x Stroke	ø x mm (ø x in)	135 x 1,540 (5.3 x 60.6)
Bucket		1
Bore x Stroke	ø x mm (ø x in)	120 x 1,065 (4.7 x 41.9)
Bucket for LR boom		1
Bore x Stroke	ø x mm (ø x in)	100 x 865 (3.9 x 34.1)

Service Refill

Fuel tank	l (gal)	315 (83)
DEF/AdBlue® tank	l (gal)	27 (7)
Hydraulic system, total	l (gal)	215 (57)
Hydraulic tank	l (gal)	98 (26)
Engine oil	l (gal)	25 (7)
Engine coolant	l (gal)	35 (9)
Slew reduction unit	l (gal)	4 (1)
Travel reduction unit	l (gal)	2 x 3.5 (2 x 1)

Specifications

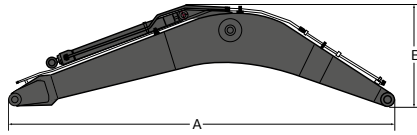


DIMENSIONS

	Unit		EC230F L								EC230F LR	
	m	ft in	5.7 (18'8") / 5.57 (18'3")								8.85 (29'0")	
Boom												
Arm	m	ft in	2.0	6'7"	2.5	8'2"	2.9	9'6"	3.5	11'6"	6.25	20'6"
A. Overall width of upper structure	mm	ft in	2,500	8'2"	2,500	8'2"	2,500	8'2"	2,500	8'2"	2,500	8'2"
B. Overall width	mm	ft in	2,990	9'10"	2,990	9'10"	2,990	9'10"	2,990	9'10"	3,190	10'6"
C. Overall height of cab	mm	ft in	2,900	9'6"	2,900	9'6"	2,900	9'6"	2,900	9'6"	2,900	9'6"
D. Overall height of handrail	mm	ft in	2,875	9'5"	2,875	9'5"	2,875	9'5"	2,875	9'5"	2,875	9'5"
E. Overall height of guardrail	mm	ft in	3,120	10'3"	3,120	10'3"	3,120	10'3"	3,120	10'3"	3,120	10'3"
F. Tail swing radius	mm	ft in	2,870	9'5"	2,870	9'5"	2,870	9'5"	2,870	9'5"	2,870	9'5"
G. Overall height of engine hood	mm	ft in	2,450	8'0"	2,450	8'0"	2,450	8'0"	2,450	8'0"	2,450	8'0"
H. Counterweight clearance *	mm	ft in	1,005	3'4"	1,005	3'4"	1,005	3'4"	1,005	3'4"	1,005	3'4"
I. Tumbler length	mm	ft in	3,660	12'0"	3,660	12'0"	3,660	12'0"	3,660	12'0"	3,660	12'0"
J. Track length	mm	ft in	4,460	14'8"	4,460	14'8"	4,460	14'8"	4,460	14'8"	4,460	14'8"
K. Track gauge	mm	ft in	2,390	7'10"	2,390	7'10"	2,390	7'10"	2,390	7'10"	2,390	7'10"
L. Shoe width	mm	ft in	600	2'0"	600	2'0"	600	2'0"	600	2'0"	800	2'7"
M. Min. ground clearance *	mm	ft in	455	1'6"	455	1'6"	455	1'6"	455	1'6"	455	1'6"
N. Overall length	mm	ft in	9,830	32'3"	9,770	32'1"	9,715	31'10"	9,765	32'0"	12,900	42'4"
N ¹ . Overall length	mm	ft in	9,675	31'9"	9,630	31'7"	9,575	31'5"	9,595	31'6"		
O. Overall height of boom	mm	ft in	3,155	10'4"	3,175	10'5"	3,035	9'11"	3,170	10'5"	3,090	10'2"
O ¹ . Overall height of boom	mm	ft in	3,065	10'1"	3,050	10'0"	2,955	9'8"	3,285	10'9"		

* Without shoe grouser

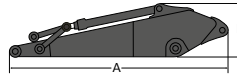
¹ 2-piece boom



DIMENSIONS

Description	Unit		Boom							
	m (ft in)		5.7 (18'8") GP		5.7 (18'8") HD		5.57 (18'3") 2-piece		8.85 (29'0") LR	
A. Length	mm	ft in	5,915	19'5"	5,915	19'5"	5,785	19'0"	9,065	29'9"
B. Height	mm	ft in	1,600	5'3"	1,600	5'3"	1,420	4'8"	1,460	4'9"
Width	mm	ft in	670	2'2"	670	2'2"	670	2'2"	670	2'2"
Weight	kg	lb	2,010	4,430	2,155	4,750	2,640	5,820	2,560	5,640

* Includes cylinder, piping and pin, excludes boom cyl. Pin

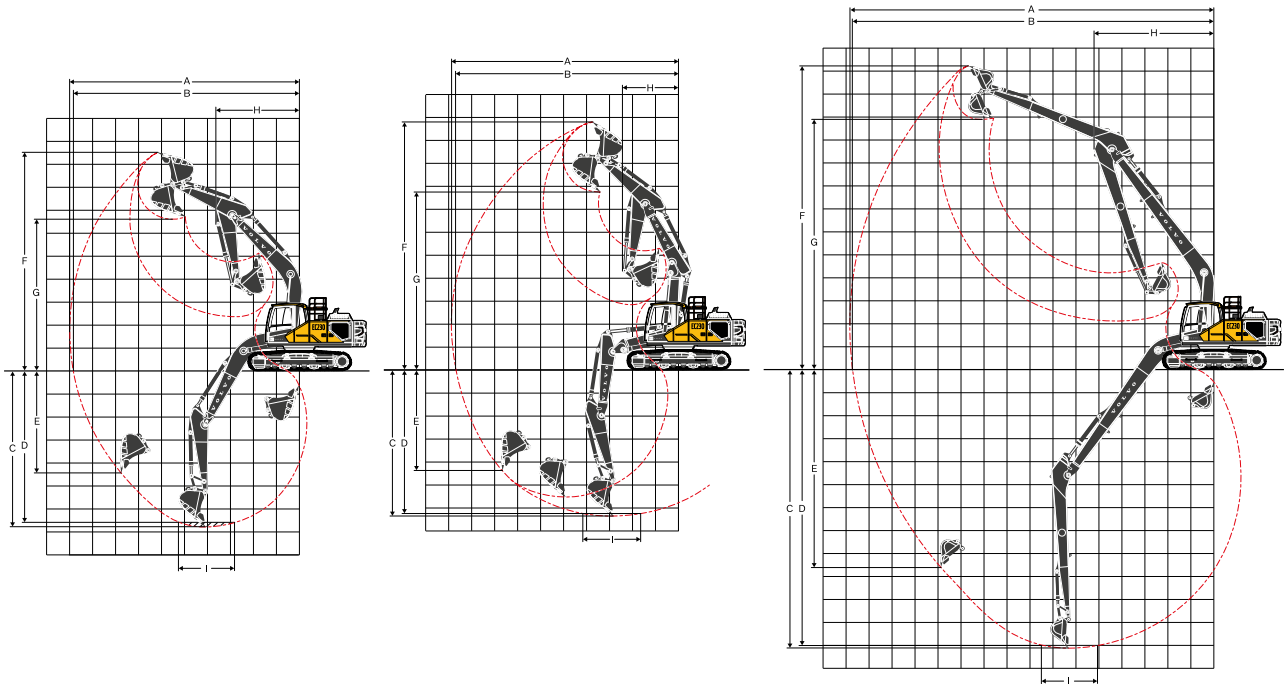


DIMENSIONS

Description	Unit		Arm											
	m (ft in)		2.0 (6'7") ME		2.5 (8'2") HD		2.9 (9'6") GP		2.9 (9'6") HD		3.5 (11'6") GP		6.25 (20'6") LR	
A. Length	mm	ft in	3,070	10'1"	3,530	11'7"	3,895	12'9"	3,895	12'9"	4,540	14'11"	7,310	24'0"
B. Height	mm	ft in	980	3'3"	865	2'10"	865	2'10"	865	2'10"	865	2'10"	945	3'1"
Width	mm	ft in	440	1'5"	440	1'5"	440	1'5"	440	1'5"	440	1'5"	385	1'3"
Weight	kg	lb	1,080	2,380	1,135	2,500	1,140	2,510	1,190	2,620	1,165	2,570	1,255	2,770

* Includes cylinder, linkage and pin

Specifications



WORKING RANGES WITH DIRECT FIT BUCKET

Description	Unit	EC230F L																EC230F LR	
		5.7 (18'8")								5.57 (18'3")								8.85 (29'0")	
Boom	m (ft in)	2.0	6'7"	2.5	8'2"	2.9	9'6"	3.5	11'6"	2.0	6'7"	2.5	8'2"	2.9	9'6"	3.5	11'6"	6.25	20'6"
A. Max. digging reach	mm ft in	9,145 30'0"	9,605 31'6"	9,995 32'10"	10,450 34'3"	9,040 29'8"	9,505 31'2"	9,900 32'6"	10,365 34'0"	15,805 51'10"									
B. Max. digging reach on ground	mm ft in	8,975 29'5"	9,445 31'0"	9,835 32'3"	10,305 33'10"	8,870 29'1"	9,345 30'8"	9,740 31'11"	10,215 33'6"	15,705 51'6"									
C. Max. digging depth	mm ft in	5,925 19'5"	6,425 21'1"	6,825 22'5"	7,425 24'4"	5,505 18'1"	5,995 19'8"	6,400 21'0"	6,945 22'9"	12,140 39'10"									
D. Max. digging depth (l=2.44 m / 8'0" level)	mm ft in	5,670 18'7"	6,205 20'4"	6,635 21'9"	7,235 23'9"	5,385 17'8"	5,885 19'4"	6,295 20'8"	6,845 22'5"	12,035 39'6"									
E. Max. vertical wall digging depth	mm ft in	4,315 14'2"	5,070 16'8"	5,535 18'2"	5,885 19'4"	4,125 13'6"	4,735 15'6"	5,150 16'11"	5,645 18'6"	10,860 35'8"									
F. Max. cutting height	mm ft in	8,925 29'3"	9,205 30'2"	9,445 31'0"	9,450 31'0"	10,015 32'10"	10,395 34'1"	10,715 35'2"	10,930 35'10"	13,260 43'6"									
G. Max. dumping height	mm ft in	6,090 20'0"	6,330 20'9"	6,555 21'6"	6,600 21'8"	7,005 23'0"	7,365 24'2"	7,680 25'2"	7,910 25'11"	10,905 35'9"									
H. Min. front swing radius	mm ft in	3,660 12'0"	3,670 12'0"	3,645 12'0"	3,630 11'11"	2,895 9'6"	2,735 8'12"	2,465 8'1"	2,740 8'12"	5,205 17'1"									

DIGGING FORCES WITH DIRECT FIT BUCKET

Bucket radius		mm	ft in	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,528 5'0"	1,250 4'1"
Breakout force (bucket)	Normal	SAE J1179	kN	lb	146 32,820	125 28,100	125 28,100	125 28,100	125 28,100	146 32,820	125 28,100	125 28,100	125 28,100	125 28,100	125 28,100	125 28,100	68 15,290
	Power boost	SAE J1179	kN	lb	154 34,620	132 29,670	132 29,670	132 29,670	132 29,670	154 34,620	132 29,670	132 29,670	132 29,670	132 29,670	132 29,670	132 29,670	-
	Normal	ISO 6015	kN	lb	165 37,090	141 31,700	141 31,700	141 31,700	141 31,700	165 37,090	141 31,700	141 31,700	141 31,700	141 31,700	141 31,700	141 31,700	77 17,310
	Power boost	ISO 6015	kN	lb	174 39,120	149 33,500	149 33,500	149 33,500	149 33,500	174 39,120	149 33,500	149 33,500	149 33,500	149 33,500	149 33,500	149 33,500	-
Tearout force (arm)	Normal	SAE J1179	kN	lb	144 32,370	117 26,300	101 22,710	92 20,680	144 32,370	117 26,300	101 22,710	92 20,680	144 32,370	117 26,300	101 22,710	92 20,680	44 9,890
	Power boost	SAE J1179	kN	lb	153 34,400	124 27,880	107 24,050	97 21,810	153 34,400	124 27,880	107 24,050	97 21,810	153 34,400	124 27,880	107 24,050	97 21,810	-
	Normal	ISO 6015	kN	lb	149 33,500	121 27,200	104 23,380	94 21,130	149 33,500	121 27,200	104 23,380	94 21,130	149 33,500	121 27,200	104 23,380	94 21,130	45 10,120
	Power boost	ISO 6015	kN	lb	158 35,520	128 28,780	110 24,730	99 22,260	158 35,520	128 28,780	110 24,730	99 22,260	158 35,520	128 28,780	110 24,730	99 22,260	-
Rotation angle, bucket		°		166	175	175	175	166	175	175	175	166	175	175	175	178	

GROUND PRESSURE

Description	Shoe width		Operating weight		Ground pressure		Overall width		Operating weight		Ground pressure		Overall width	
	mm	in	kg	lb	kPa	psi	mm	ft in	kg	lb	kPa	psi	mm	ft in
Triple grouser	500	20	23,140	51,020	57.9	8.4	2,890	9'6"	23,770	52,410	58.8	8.5	2,890	9'6"
	600	24	23,400	51,600	48.0	7.0	2,990	9'10"	24,030	52,990	50.0	7.3	2,990	9'10"
	600 (HD)	24 (HD)	23,530	51,880	49.0	7.1	2,990	9'10"	24,170	53,290	50.0	7.3	2,990	9'10"
	700	28	23,820	52,520	42.2	6.1	3,090	10'2"	24,450	53,910	43.1	6.3	3,090	10'2"
	800	32	24,100	53,140	37.3	5.4	3,190	10'6"	24,730	54,530	38.2	5.5	3,190	10'6"
	900	36	24,380	53,760	33.3	4.8	3,290	10'10"	25,010	55,150	34.3	5.0	3,290	10'10"
Single grouser	600	24	23,610	52,060	49.0	7.1	2,990	9'10"	24,240	53,450	50.0	7.3	2,990	9'10"
Double grouser	700	28	24,120	53,180	43.1	6.3	3,090	10'2"	24,760	54,600	44.1	6.4	3,090	10'2"
			EC230F L, 5.7 m / 18'8" GP boom, 2.9 m / 9'6" HD arm, 1,036 kg / 2,280 lb bucket, 4,600 kg / 10,140 lb counterweight						EC230F L, 5.57 m / 18'3" 2-pieces boom, 2.9 m / 9'6" HD arm, 1,036 kg / 2,280 lb bucket, 4,600 kg / 10,140 lb counterweight					
Description	Shoe width		Operating weight		Ground pressure		Overall width							
	mm	in	kg	lb	kPa	psi	mm	ft in						
Triple grouser	800	32	24,950	55,010	39.2	5.7	3,190	10'6"						
	900	36	25,230	55,630	35.3	5.1	3,290	10'10"						
			EC230F LR, 8.85 m / 29'0" LR, 6.25 m / 20'6" LR arm, 452 kg / 1,000 lb bucket, 5,400 kg / 11,910 lb counterweight											

Specifications

BUCKET SELECTION GUIDE

EC230F L with 600 mm (24") shoe, 4,600 kg (10,140 lb) counterweight

Bucket Type		Capacity		Cutting width		Weight		Teeth	Recommended maximum material density (kg/m ³ / lb/yd ³)			
		L	yd ³	mm	ft in	kg	lb		EA	5.7 m (18'8") GP Boom		
								H2.5 m (8'2") Arm		G2.9 m (9'6") Arm	H2.9 m (9'6") Arm	G3.5 m (11'6") Arm
Direct fit Buckets	GP	480	0.63	600	2'0"	666	1,468	3	C	C	C	C
		590	0.77	750	2'6"	711	1,567	3	C	C	C	C
		750	0.98	900	2'11"	792	1,746	4	C	C	C	C
		920	1.2	1,050	3'5"	862	1,900	4	C	C	C	C
		1,090	1.43	1,200	3'11"	951	2,097	5	C	C	C	C
		1,320	1.73	1,420	4'8"	1,041	2,295	5	C	C	C	C
	HD	480	0.63	600	2'0"	738	1,627	3	D	D	D	D
		480	0.63	600	2'0"	675	1,488	3	D	D	D	D
		750	0.98	900	2'11"	872	1,922	4	D	D	D	D
		750	0.98	900	2'11"	808	1,781	4	D	D	D	D
		920	1.2	1,050	3'5"	951	2,097	4	D	D	D	D
		920	1.2	1,050	3'5"	888	1,958	4	D	D	D	D
		1,090	1.43	1,200	3'11"	1,046	2,306	5	D	D	D	D
		1,090	1.43	1,200	3'11"	983	2,167	5	D	D	D	D

Bucket Type		Capacity		Cutting width		Weight		Teeth	Recommended maximum material density (kg/m ³ / lb/yd ³)			
		L	yd ³	mm	ft in	kg	lb		EA	5.7 m (18'3") VA Boom		
								H2.5 m (8'2") Arm		G2.9 m (9'6") Arm	H2.9 m (9'6") Arm	G3.5 m (11'6") Arm
Direct fit Buckets	GP	480	0.63	600	2'0"	666	1,468	3	C	C	C	C
		590	0.77	750	2'6"	711	1,567	3	C	C	C	C
		750	0.98	900	2'11"	792	1,746	4	C	C	C	C
		920	1.2	1,050	3'5"	862	1,900	4	C	C	C	C
		1,090	1.43	1,200	3'11"	951	2,097	5	C	C	C	C
		1,320	1.73	1,420	4'8"	1,041	2,295	5	C	C	C	C
	HD	480	0.63	600	2'0"	738	1,627	3	D	D	D	D
		480	0.63	600	2'0"	675	1,488	3	D	D	D	D
		750	0.98	900	2'11"	872	1,922	4	D	D	D	D
		750	0.98	900	2'11"	808	1,781	4	D	D	D	D
		920	1.2	1,050	3'5"	951	2,097	4	D	D	D	D
		920	1.2	1,050	3'5"	888	1,958	4	D	D	D	D
		1,090	1.43	1,200	3'11"	1,046	2,306	5	D	D	D	D
		1,090	1.43	1,200	3'11"	983	2,167	5	D	D	D	D

Please consult with your Volvo dealer for the proper match of buckets and attachments to suit the application.

The recommendations are given as a guide only, based on typical operation conditions.

Bucket capacity based on ISO 7451, heaped material with a 1:1 angle of repose.

Maximum material density

D: 2,100 kg/m³ (3,500 lb/yd³)

C: 1,800 kg/m³ (3,100 lb/yd³)

B: 1,500 kg/m³ (2,500 lb/yd³)

A: 1,200 kg/m³ (2,000 lb/yd³)

X : Not recommended

LIFTING CAPACITY EC230F L

Lifting capacity at the arm end without bucket.

For lifting capacity including bucket, simply subtract actual weight of the direct fit bucket or the bucket with quick coupler from the following values.

	Lifting hook related to ground level	1.5 m / 5 ft		3.0 m / 10 ft		4.5 m / 15 ft		6.0 m / 20 ft		7.5 m / 25 ft		Max. reach		Max.		
		Along UC	Across UC	Along UC	Across UC	Along UC	Across UC	Along UC	Across UC	Along UC	Across UC	Along UC	Across UC			
Boom : 5.7 m GP 18'8" GP Arm : 2.5 m HD 8'2" HD Shoe : 800 mm 32" CWT : 4,600 kg 10,140 lb	7.5 m	kg											*5,680	*5,680	5.6 m	
	25 ft	lb											*12,560	*12,560	18.0 ft	
	6.0 m	kg						*5,500	*5,500				*5,600	4,770	6.8 m	
	20 ft	lb						*12,110	*12,110				*12,360	10,670	22.3 ft	
	4.5 m	kg					*6,970	*6,970	*6,010	5,760	*5,680	4,070	*5,690	3,990	7.6 m	
	15 ft	lb					*15,040	*15,040	*13,090	12,420			*12,530	8,850	24.8 ft	
	3.0 m	kg					*8,970	8,340	*6,880	5,510	*5,980	3,970	5,530	3,610	8.0 m	
	10 ft	lb					*19,310	18,010	*14,940	11,890	*13,080	8,560	12,230	7,990	26.2 ft	
	1.5 m	kg					*10,730	7,850	*7,780	5,270	5,970	3,860	5,360	3,480	8.1 m	
	5 ft	lb					*23,160	16,930	*16,860	11,370	12,870	8,330	11,820	7,670	26.5 ft	
	0 m	kg					*11,530	7,620	8,140	5,110	5,890	3,790	5,500	3,550	7.9 m	
	0 ft	lb					*24,980	16,440	17,540	11,040	12,700	8,180	12,130	7,830	25.8 ft	
	-1.5 m	kg			*10,800	*10,800	*11,460	7,590	8,090	5,070				6,030	3,870	7.4 m
	-5 ft	lb			*24,670	*24,670	*24,840	16,360	17,430	10,940				13,330	8,560	24.1 ft
	-3.0 m	kg			*14,740	*14,740	*10,550	7,700	*7,780	5,140				*6,990	4,670	6.5 m
-10 ft	lb			*31,960	*31,960	*22,810	16,590	*16,720	11,120				*15,440	10,380	21.1 ft	
-4.5 m	kg			*11,410	*11,410	*8,150	7,990						*7,140	6,930	5.0 m	
-15 ft	lb			*24,390	*24,390	*17,220	*17,220						*15,720	*15,720	16.0 ft	
Boom : 5.7 m GP 18'8" GP Arm : 2.9 m HD 9'6" HD Shoe : 800 mm 32" CWT : 4,600 kg 10,140 lb	7.5 m	kg							*5,180	*5,180			*4,960	*4,960	6.2 m	
	25 ft	lb											*11,040	*11,040	19.8 ft	
	6.0 m	kg							*5,070	*5,070			*4,630	4,340	7.3 m	
	20 ft	lb							*11,160	*11,160			*10,230	9,710	23.8 ft	
	4.5 m	kg							*5,640	*5,640	*5,330	4,120	*4,570	3,700	8.0 m	
	15 ft	lb							*12,290	*12,290	*11,730	8,860	*10,060	8,200	26.2 ft	
	3.0 m	kg					*8,390	*8,390	*6,560	5,570	*5,730	4,010	*4,690	3,380	8.4 m	
	10 ft	lb					*18,060	*18,060	*14,240	12,030	*12,510	8,640	*10,320	7,460	27.4 ft	
	1.5 m	kg					*10,290	7,930	*7,520	5,310	5,990	3,880	*5,010	3,260	8.5 m	
	5 ft	lb					*22,200	17,110	*16,310	11,460	12,920	8,370	*11,010	7,190	27.8 ft	
	0 m	kg			*5,420	*5,420	*11,350	7,630	8,160	5,120	5,890	3,780	5,120	3,310	8.3 m	
	0 ft	lb			*12,560	*12,560	*24,560	16,450	17,570	11,050	12,690	8,170	11,300	7,310	27.1 ft	
	-1.5 m	kg	*6,270	*6,270	*10,310	*10,310	*11,510	7,550	8,070	5,040	5,860	3,750	5,560	3,580	7.8 m	
	-5 ft	lb	*14,060	*14,060	*23,460	*23,460	*24,960	16,270	17,380	10,890	12,640	8,120	12,290	7,910	25.5 ft	
	-3.0 m	kg	*11,370	*11,370	*15,560	14,800	*10,870	7,620	*8,050	5,080				6,580	4,210	7.0 m
-10 ft	lb	*25,560	*25,560	*33,730	31,720	*23,520	16,430	*17,370	10,980				14,620	9,350	22.7 ft	
-4.5 m	kg			*12,680	*12,680	*9,020	7,860						*6,890	5,810	5.6 m	
-15 ft	lb			*27,220	*27,220	*19,270	16,970						*15,200	13,120	18.1 ft	
Boom : 5.7 m GP 18'8" GP Arm : 3.5 m GP 11'6" GP Shoe : 800 mm 32" CWT : 4,600 kg 10,140 lb	7.5 m	kg											*4,250	*4,250	6.8 m	
	25 ft	lb												*9,440	*9,440	21.9 ft
	6.0 m	kg									*4,610	4,220	*4,040	3,910	7.8 m	
	20 ft	lb									*9,980	9,060	*8,920	8,730	25.5 ft	
	4.5 m	kg							*5,010	*5,010	*4,820	4,150	*4,020	3,380	8.5 m	
	15 ft	lb							*10,920	*10,920	*10,580	8,940	*8,860	7,490	27.8 ft	
	3.0 m	kg			*11,270	*11,270	*7,410	*7,410	*5,980	5,630	*5,300	4,020	*4,150	3,100	8.8 m	
	10 ft	lb			*23,950	*23,950	*15,980	*15,980	*12,990	12,140	*11,560	8,660	*9,150	6,850	29.0 ft	
	1.5 m	kg					*9,520	8,060	*7,050	5,340	*5,860	3,870	*4,450	2,980	8.9 m	
	5 ft	lb					*20,550	17,380	*15,290	11,520	*12,760	8,350	*9,790	6,590	29.3 ft	
	0 m	kg			*7,050	*7,050	*10,940	7,660	*7,910	5,110	5,850	3,750	4,690	3,020	8.7 m	
	0 ft	lb			*16,140	*16,140	*23,670	16,520	*17,150	11,030	12,620	8,090	10,340	6,660	28.7 ft	
	-1.5 m	kg	*6,210	*6,210	*10,310	*10,310	*11,470	7,500	8,020	4,990	5,780	3,680	5,030	3,220	8.3 m	
	-5 ft	lb	*13,880	*13,880	*23,400	*23,400	*24,860	16,160	17,270	10,770	12,470	7,950	11,110	7,120	27.2 ft	
	-3.0 m	kg	*10,120	*10,120	*15,210	14,590	*11,190	7,510	8,010	4,980	5,810	3,710	5,800	3,700	7.5 m	
-10 ft	lb	*22,720	*22,720	*34,600	31,280	*24,220	16,180	17,250	10,760				12,870	8,210	24.5 ft	
-4.5 m	kg	*15,160	*15,160	*14,260	*14,260	*9,910	7,670	*7,170	5,110				*6,700	4,820	6.3 m	
-15 ft	lb	*34,230	*34,230	*30,700	*30,700	*21,310	16,540	*15,230	11,060				*14,830	10,820	20.3 ft	

Notes: 1. Machine in "Fine Mode-F" (Power Boost) for lifting capacities. 2. The above loads are in compliance with SAE J1097 and ISO 10567 Hydraulic Excavator Lifting Capacity Standards. 3. Rated loads do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. 4. Rated loads marked with an asterisk (*) are limited by hydraulic capacity rather than tipping load.



Equipment

STANDARD AND OPTIONAL EQUIPMENT

• = Standard / o = Optional

Engine

Turbocharged, 4 stroke diesel engine with water cooling, direct injection and charged air cooler that meets Tier 4f requirements	•
Electric cooling fan system	•
New work mode with 10 steps	•
Cyclone pre-cleaner	•
Fuel shut off valve	•
Engine block heater	o
Coolant heater by diesel	o
Reversible fan drive	o
Precleaner, oil bath	o
Air filter, High efficiency	o
Delayed engine shutdown	•
Automatic engine shutdown	o
Water separator with heater	o
Arctic regeneration	o
Regeneration control	o
Oil sampling port for engine oil	o

Electric / Electronic control system

Anti-theft with code lock system	•
Alternator, 180 A	•
Automatic idling system	•
Lock Out / Tag Out function on battery main switch	•
Standard light	•
Basic light package	o
Advanced light package	o
Deluxe light package	o
Arm light	o
LH light	o

Undercarriage and structures

3-point side access	•
Link 600 mm (24") single grouser shoe	o
Link 600 mm (24") add rubber pad shoe	o
Direct filling DEF (AdBlue) / Sight gauge and splash guard	•
Openable 1 piece hood	•
Link 700 mm (28") double grouser shoe	o
Platform handrail fixed & Guardrail, foldable	•
Full track guard	o
Counterweight 5,400 kg (10,900 lb)	o
Inner rail	•
SIPS (Side Impact Protection Steel)	o
HD Side door & hood with screen	o
Without lower structure	o
Lower frame NL, N, NH, High walker	o
Link 500/600/700/800/900 mm (20/24/28/32/36") triple grouser shoe	o
Link 600 mm (24") triple grouser shoe, HD	o

STANDARD AND OPTIONAL EQUIPMENT

• = Standard / o = Optional

Hydraulic system

EH-positive (Electro-Hydraulic) control system	•
Boom up & swing priority	•
Auto warm up	•
Auto power boost	•
One touch power boost	•
Priority Adjustment	•
Boom down speed control	•
Shock reduction function	•
Joystick, 4 switch / 4 switch & 1 proportional / Simple L8 / L8	o
Hydraulic oil mineral, 32 / 46 / 68	o
Longlife hyd oil mineral, 32 / 46 / 68	o
Hydraulic oil bio 46	o
Pattern change	•
Boom float function	•
Straight travel pedal	o
Comfort driving control	o
Creep mode	•
Dedicated drain line	o
Variable X3 P-Q control	o
Hose rupture valve for boom	o
Hose rupture valve for arm	o
X1/X3/QF Piping on Long Reach Boom & Arm	o

Cab and interior

Keyless engine start and stop	•
8" HD display	•
ROPS certified cab	•
Tiltable left console	•
Digital hour meter	•
Wireless mobile charger with Kinematic sensor package option	•
Various storage space with cool/heated	•
Cleaning air gun preparation	o
1 piece wind shield cab	o
High visibility cab	o
Cabin large mirror	o
Cabin large mirror, Heated	o
Basic / Premium / Deluxe seat	o
Seat belt, 2 inch 2 point / 3 inch 2 point / 3 inch 3 point	o
Climate control-HEPA filter	o
Radio with MP3/USB/Bluetooth	o
Front rain shield	o
Sun screen	•
Lower wiper	o
Sun shield, roof hatch	o
Foot rest, High mount	o
FOG (Falling Object Guard)	o
FOPS (Falling Object Protection Structure)	o
Safety net	o

STANDARD AND OPTIONAL EQUIPMENT

• = Standard / o = Optional

Digging equipment

GP 5.7 m (18'8") boom	•
HD 5.7 m (18'8") boom / VA 5.57 m (18'3") boom / LR 8.85 m (29'0") boom	o
HD 2.9 m (9'6") arm	•
GP 2.9 m (9'6") arm/ ME 2.0 m (6'7") arm/ HD 2.5 m (8'2") arm/ GP 3.5 m (11'6") arm	o

Machine controls

Kinematic sensor package	•
Volvo Co-Pilot 2nd display, 12.8" touchable Full HD	•
Dig Assist, Start	•
Dig Assist, 2D	o
Dig Assist, In-Field Design	o
Dig Assist, Topcon 3D-MC	o
Dig Assist, Trimble Earthworks	o
Dig Assist, Infield-Design Advanced	o
Dig Assist, On-Board Weighing	o
Dig Assist, Laser Receiver	•
Volvo Active Control	o
Dig Assist, Boundary Limit	•

Service and maintenance

Fuel level gauge	•
Swing out A/C condenser	•
Fuel filler pump	o
Quick Hydraulic Oil Fill connection	o
Quick Engine Oil Change	o
Jump start connector	o
Auto lubrication system	o
Tool kit	o

Safety and security

Travel alarm, beep / white noise	o
Flashing beacon, LED	o
Green light beacon	o
Rear view camera	•
Side view camera	o
HD VSV(Volvo Smart View)	o
HD VSV with obstacle detection	o
Provision, HD VSV with obstacle detection	•

V O L V O