

# SPECIFICATIONS

## HW180

Tier 4 Final Engine

### Net Power

SAE J1349 / 171 HP  
(127 kW) at 1,800 rpm

### Bucket Range

0.39 m<sup>3</sup> - 1.05 m<sup>3</sup>  
0.51 yd<sup>3</sup> - 1.37 yd<sup>3</sup>

### Operating Weight

17,800 kg (42,480 lb)

### Standard Bucket

0.76 m<sup>3</sup> (0.99 yd<sup>3</sup>)

### ENGINE

Maker / Model		Cummins QSB6.7
Type		Water-cooled, 4-cycle diesel, 6-cylinder in-line, Direct injection, Turbocharged, Charge air cooled, Low emission
Rated flywheel horse power	SAE J1995 (gross)	180 HP (134 kW) at 1,800 rpm
	J1349 (net)	171 HP (127 kW) at 1,800 rpm
Max. torque		74.7 kgf.m (620 lbf.ft) at 1,500 rpm
Bore x stroke		107 x 124 mm (4.21" x 4.88")
Piston displacement		6,700 cc (409 in <sup>3</sup> )
Batteries		2 x 12 V x 100 Ah
Starting motor		24 V - 4.8 kW
Alternator		24 V - 95 Amp

### HYDRAULIC SYSTEM

#### MAIN PUMP

Type	Two variable displacement piston pumps
Max. flow	2 X 172 l/min (45.4 US gpm)
Sub-pump for pilot circuit (Gear Pump)	33 l/min (8.7 gpm)

### CROSS-SENSING AND FUEL-SAVING PUMP SYSTEM

#### HYDRAULIC MOTORS

Travel	Variable displacement pistons motor with brake valve
Swing	Axial piston motor with automatic brake

#### RELIEF VALVE SETTING

Implement circuits	400 kgf/cm <sup>2</sup> (5,690 psi)
Travel	380 kgf/cm <sup>2</sup> (5,400 psi)
Power boost (boom, arm, bucket)	380 kgf/cm <sup>2</sup> (5,400 psi)
Swing circuit	285 kgf/cm <sup>2</sup> (4,050 psi)
Pilot circuit	40 kgf/cm <sup>2</sup> (570 psi)
Service valve	Installed

#### HYDRAULIC CYLINDERS

No. of cylinder bore X stroke	Boom: 2-115 x 1,090 mm (4.5" x 42.9")
	Arm: 1-120 x 1,355 mm (4.7" x 53.3")
	Bucket: 1-110 x 995 mm (4.3" x 39.2")
	Blade: 2-110 x 235 mm (4.3" x 9.3")
	Outrigger: 2-125 x 463 mm (4.9" x 18.2")
	2-PCS boom: 2-115 x 960 mm (4.1" x 37.8")
	Adjust (boom): 1-160 x 650 mm (6.29" x 25.6")

#### DRIVES & BRAKES

4-wheel hydrostatic drive. Constant mesh, helical gear transmission provides 2 forward and reverse travel speeds.

Max. drawbar pull	10,320 kgf (22,750 lbf)
Travel speed	1st 5.9 km/h
	2nd 21.7 mph
Gradeability	30° (70 %)

#### Service Brake :

- Independent dual brake, front and rear axle full hydraulic power brake.
- Spring released and hydraulic applied wet type multiple disc brake.

#### Parking Brake :

- Spring applied and hydraulic released wet disc brake type in transmission.

#### CONTROL

Pilot pressure operated joysticks and pedals with detachable lever provide almost effortless and fatiguesless operation.

Pilot control	Two joysticks with one safety lever (LH): Swing and arm, (RH): Boom and bucket (ISO)
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### OPERATING WEIGHT (APPROXIMATE)

Operating weight, including 5,200 mm (17' 1") mono boom, 2,600 mm (8' 6") arm, SAE heaped 0.76 m<sup>3</sup> (0.99 yd<sup>3</sup>) backhoe bucket, lubricant, coolant, full fuel tank, hydraulic tank and the standard equipment.

#### OPERATING WEIGHT

Undercarriage	Mono boom	Hyd. 2-Piece boom
Rear dozer blade	17,800 kg (39,240 lb)	18,270 kg (40,280 lb)
Rear outrigger	17,950 kg (39,570 lb)	18,420 kg (40,010 lb)
Front outrigger and rear blade	18,750 kg (41,340 lb)	19,220 kg (42,370 lb)
Front blade and rear outrigger	18,800 kg (41,450 lb)	19,270 kg (42,480 lb)
Four outrigger	18,900 kg (41,670 lb)	19,370 kg (42,700 lb)

#### SWING SYSTEM

Swing motor	Fixed displacement axial pistons motor
Swing reduction	Planetary gear reduction
Swing bearing lubrication	Grease-bathed
Swing brake (option)	Multi wet disc (pin lock type)
Swing speed	9.3 rpm

#### SERVICE REFILL CAPACITIES

	liter	US gal
Re-filling		
Fuel tank	290	76.6
Engine coolant	19.5	5.2
Engine oil	23.7	6.3
Swing device - gear oil (OPT)	6.2	1.64
Swing device - greese (OPT)	(1.2)	(0.32)
Axle	Front 15.5	4.11
	Rear 17.5	4.6
Hydraulic system (including tank)	270	71.3
Hydraulic tank	125	32.8
DEF/AdBlue®	27	7.1

#### UNDERCARRIAGE

Reinforced box-section frame is all-welded, low-stress.

Dozer blade and outriggers are available. A pin-on design.

Dozer blade	Ideal for leveling and back filling or clean-up work.
Outrigger	Required for max. operation stability when digging and lifting. Can be mounted on the front/or the rear.

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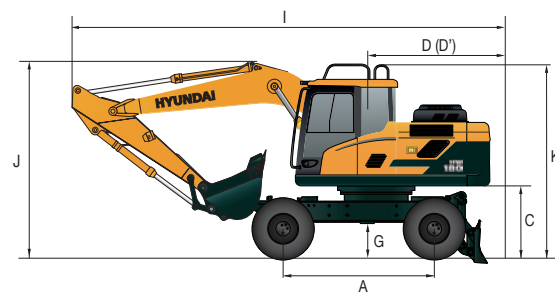
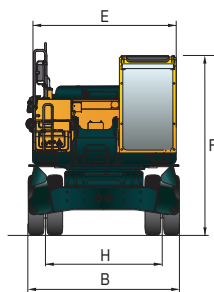
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### HW180 DIMENSIONS

Unit: mm (ft-in)

5.2 m (17' 1") Mono boom, 2.6 m (8' 6") Arm, Rear dozer



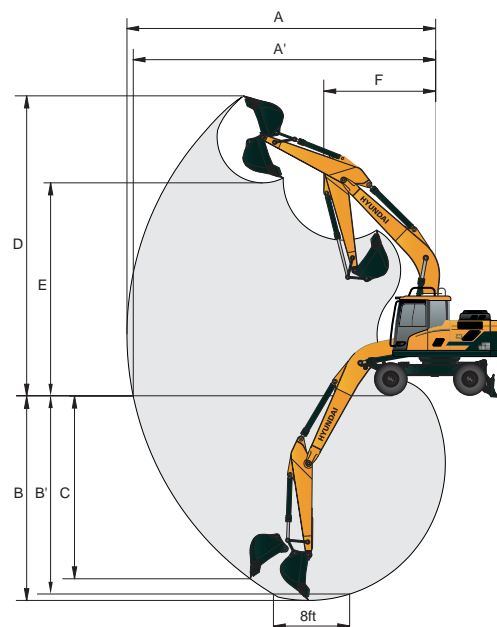
A	Wheel base	2,600 (8' 6")
B	Overall width	2,500 (8' 2")
C	Ground clearance of counterweight	1,270 (4' 2")
D	Rear-end distance	2,430 (8' 0")
D'	Rear-end swing radius	2,430 (8' 0")
E	Upperstructure width	2,475 (8' 1")
F	Overall height of cab	3,190 (10' 6")
G	Min. ground clearance	340 (1' 1")
H	Tread	1,944 (6' 5")
K	Overall height of guardrail	3,420 (11' 3")

	Boom length	5,200 (16' 9")		
	Arm length	2,200 (7' 3")	2,600 (8' 6")	3,100 (10' 2")
I	Overall length (Traveling position)	8,590 (28' 2")	8,710 (28' 7")	8,480 (27' 10")
I'	Overall length (Shipping position)	8,650 (28' 5")	8,760 (28' 9")	8,760 (28' 9")
J	Overall height of boom (Traveling position)	3,610 (11' 10")	3,540 (11' 7")	3,900 (12' 10")
J'	Overall height of boom (Shipping position)	3,060 (10' 0")	3,180 (10' 5")	3,150 (10' 4")

### HW180 WORKING RANGE

Unit : mm (ft-in)

	Boom length	5,200 (17' 1")		
	Arm length	2,200 (7' 3")	2,600 (8' 6")	3,100 (10' 2")
A	Max. digging reach	8,820 (29' 1")	9,200 (30' 3")	9,450 (31' 0")
A'	Max. digging reach on ground	8,615 (28' 4")	9,000 (29' 7")	9,250 (30' 4")
B	Max. digging depth	5,500 (18' 2")	5,900 (19' 5")	6,320 (20' 9")
B'	Max. digging depth (8' level)	5,280 (17' 5")	5,700 (18' 9")	6,130 (20' 1")
C	Max. vertical wall digging depth	4,850 (16' 1")	5,310 (17' 6")	5,470 (17' 11")
D	Max. digging height	9,180 (30' 3")	9,300 (30' 7")	9,220 (30' 3")
E	Max. dumping height	6,520 (21' 5")	6,660 (21' 8")	6,620 (21' 9")
F	Min. swing radius	3,290 (10' 9")	3,230 (10' 8")	3,160 (10' 4")



### DIGGING FORCE

Arm	Length	mm (ft.in)	2,200 (7' 3")	2,600 (8' 6")	3,100 (10' 2")	[Power Boost]
	Weight	kg (lb)	750 (1,650)	810 (1,790)	890 (1,960)	
Bucket digging force	SAE	kN	98.1 [106.5]	98.1 [106.5]	107.9 [117.2]	
		kgf	10,000 [10,860]	10,000 [10,860]	11,000 [11,940]	
		lbf	22,050 [23,940]	22,050 [23,940]	24,250 [26,330]	
	ISO	kN	113.4 [123.1]	113.4 [123.1]	123.6 [134.2]	
		kgf	11,560 [12,550]	11,560 [12,550]	12,600 [13,680]	
		lbf	25,490 [27,670]	25,490 [27,670]	27,780 [30,160]	
Arm crowd force	SAE	kN	76.0 [82.5]	66.4 [72.1]	69.0 [74.9]	
		kgf	7,750 [8,410]	9,770 [7,350]	7,030 [7,630]	
		lbf	17,090 [18,550]	16,930 [16,210]	15,500 [16,830]	
	ISO	kN	79.4 [86.2]	69.1 [75.1]	71.4 [77.5]	
		kgf	8,100 [8,790]	7,050 [7,650]	7,280 [7,900]	
		lbf	17,860 [19,390]	15,540 [16,870]	16,050 [17,430]	

Note : Arm weight includes bucket cylinder, linkage, and pin

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Tier 4 Final Engine

### BUCKETS



0.39 (0.51)



0.50 (0.65)



0.64 (0.84)  
0.70 (0.92)  
0.76 (0.99)



0.70 (0.92)



0.89 (1.16)  
1.05 (1.37)



0.69 (0.90)



0.75 (0.90)

SAE heaped  
m<sup>3</sup> (yd<sup>3</sup>)

Capacity m <sup>3</sup> (yd <sup>3</sup> )		Width mm (in)		Weight kg (lb)	Recommendation mm (ft.in)				
					5,200 (17' 1") Mono Boom			5,100 (16' 9") 2-Piece Boom	
SAE heaped	CECE heaped	Without side cutters	With side cutters		2,200 (7' 3") Arm	2,600 (8' 6") Arm	3,100 (10' 2") Arm	2,200 (7' 3") Arm	2,600 (8' 6") Arm
0.39 (0.51)	0.34 (0.44)	650 (25.6)	740 (29.1)	410 (900)	●	●	●	●	●
0.50 (0.65)	0.44 (0.58)	790 (31.1)	880 (34.6)	470 (1,040)	●	●	●	●	●
0.64 (0.84)	0.55 (0.72)	950 (37.4)	1,040 (40.9)	510 (1,120)	■	■	▲	■	■
0.70 (0.92)	0.60 (0.78)	1,020 (40.2)	1,110 (43.7)	600 (1,320)	■	■	▲	■	▲
0.76 (0.99)	0.65 (0.85)	1,090 (42.9)	1,180 (46.5)	620 (1,370)	■	▲	▲	■	▲
0.89 (1.16)	0.77 (1.01)	1,250 (49.2)	1,340 (52.8)	610 (1,340)	▲	▲	-	▲	▲
1.05 (1.37)	0.90 (1.18)	1,430 (56.3)	1,520 (59.8)	680 (1,500)	▲	-	-	▲	-
0.69 (0.90)	0.62 (0.81)	1,050 (41.3)	-	720 (1,590)	■	▲	▲	■	▲
0.75 (0.98)	0.65 (0.85)	1,820 (71.7)	-	540 (1,190)	■	■	▲	■	▲

- Heavy duty bucket  
● Ditch cleaning bucket

- : Applicable for materials with density of 2,000 kgf/m<sup>3</sup> (3,370 lbf/yd<sup>3</sup>) or less  
■ : Applicable for materials with density of 1,600 kgf/m<sup>3</sup> (2,700 lbf/yd<sup>3</sup>) or less  
▲ : Applicable for materials with density of 1,100 kgf/m<sup>3</sup> (1,850 lbf/yd<sup>3</sup>) or less

### Lifting Capacity Chart

Boom: 5,200 mm (17')  
Arm: 2,600 mm (8'5")  
Bucket: 0.76 m<sup>3</sup> (0.99 yd<sup>3</sup>) SAE heaped  
CWT 3,150 kg (6,945 lb)

Capacities based on North American Standard  
Configuration in accordance with ISO condition 2 standard.



Rating over front



Rating over side or 360 degree

Lift-point height m (ft)		Lift-point radius										At max. reach		
		1.5 m (4.9 ft)		3.0 m (9.8 ft)		4.5 m (14.8 ft)		6.0 m (19.7 ft)		7.5 m (25 ft)		Capacity		Reach
														m (ft)
7.5 m (29.5 ft)	kg lb											*2,940 *6,480	*2,940 *6,480	5.47 (17.9)
6.0 m (20 ft)	kg lb							*4,230 *9,330	*4,230 *9,330			*2,630 *5,800	*2,630 *5,800	6.68 (21.9)
4.5 m (15 ft)	kg lb					*5,160 *11,380	*5,160 *11,380	*4,510 *9,940	*4,510 *9,940			*2,540 *5,600	*2,540 *5,600	7.39 (24.2)
3.0 m (10 ft)	kg lb					*6,490 *14,310	*6,490 *14,310	*5,080 *11,200	*5,080 *11,200	*3,910 *8,620	*3,910 *8,620	*2,580 *5,690	*2,580 *5,690	7.74 (25.4)
1.5 m (5 ft)	kg lb					*7,650 *16,870	*7,650 *16,870	*5,640 *12,430	5,630 12,410	*4,590 *10,120	4,030 8,880	*2,750 *6,060	*2,750 *6,060	7.78 (25.5)
Ground Line	kg lb			*5,530 *12,190	*5,530 *12,190	*8,140 *17,950	*8,140 *17,950	*5,940 *13,100	5,510 12,150	*3,360 *7,410	*3,360 *7,410	*3,090 *6,810	*2,460 *5,420	7.53 (24.7)
-1.5 m (-5 ft)	kg lb	*5,750 *12,680	*5,750 *12,680	*9,750 *21,500	*9,750 *21,500	*7,890 *17,390	*7,890 *17,390	*5,770 *12,720	5,480 12,080			*3,740 *8,250	*3,740 *8,250	6.94 (22.8)
-3.0 m (-10 ft)	kg lb	*10,160 *22,400	*10,160 *22,400	*9,610 *21,190	*9,610 *21,190	*6,790 *14,970	*6,790 *14,970					*4,690 *10,340	*4,690 *10,340	5.91 (19.4)

#### NOTES:

- Lifting capacities are based on ISO 10567.
- Lifting capacities for the HX series do not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.
- The lift-point is the bucket pivot mounting pin on the arm (without bucket mass).
- (\*) indicates load limited by hydraulic capacity.

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Tier 4 Final Engine

ENGINE	STD	OPT
Cummins QSB 6.7 engine	•	
HYDRAULIC SYSTEM	STD	OPT
Intelligent Power Control (IPC)		
3-power mode, 2-work mode, user mode	•	
Variable power control	•	
Pump flow control	•	
Attachment mode flow control	•	
Engine auto idle	•	
Engine auto shutdown control		•
Electronic fan control	•	
CAB & INTERIOR	STD	OPT
ISO Standard cabin		
Rise-up type windshield wiper	•	
Radio / USB player	•	
Handsfree mobile phone system with USB	•	
12 volt power outlet (24V DC to 12V DC converter)	•	
Electric horn	•	
All-weather steel cab with 360° visibility	•	
Safety glass windows	•	
Sliding fold-in front window	•	
Sliding side window (LH)	•	
Lockable door	•	
Hot & cool box	•	
Storage compartment & ashtray	•	
Transparent cabin roof-cover	•	
Sun visor	•	
Door and cab locks, one key	•	
Mechanical suspension seat with heater	•	
Pilot-operated slidable joystick	•	
Console box height adjust system	•	
Cabin lights	•	
Cabin front window rain guard		•
Cabin roof-steel cover		•
Automatic climate control		
Air conditioner & heater	•	
Defroster	•	
Starting Aid (air grid heater) for cold weather	•	
Centralized monitoring		
8" LCD display	•	
Engine speed or trip meter/accel.	•	
Engine coolant temperature gauge	•	
Max power	•	
Low speed/high speed	•	
Auto idle	•	
Overload	•	
Check engine	•	
Air cleaner clogging	•	
Indicators	•	
ECO Gauges	•	
Fuel level gauge	•	
Hydraulic oil temperature gauge	•	
Fuel warmer	•	
Warnings	•	
Communication error	•	
Low battery	•	
Clock	•	

\* Standard and optional equipment may vary. Contact your Hyundai dealer for more information.  
The machine may vary according to International standards.  
\* The photos may include attachments and optional equipment that are not available in your area.

CAB & INTERIOR	STD	OPT
Seat		
Adjustable air suspension seat with heater	•	
Cabin FOPS/FOG		
FOPS (Falling Object Protective Structures)- ISO 3449 Level 2		•
FOG (Falling Object Guard)- ISO 10262 Level 2		•
Cabin ROPS		
ROPS (Roll Over Protective Structures)- ISO 12117-2	•	
SAFETY	STD	OPT
Battery master switch	•	
Rearview camera	•	
AAVM (Advanced Around View Monitoring)		•
Four front working lights (2 boom mounted, 2 front frame mounted)	•	
Travel alarm	•	
Rear work lamp	•	
Beacon lamp		•
Automatic swing brake	•	
Boom holding system	•	
Arm holding system	•	
Safety lock valve for boom cylinder with overload warning device		•
Safety lock valve for arm cylinder		•
Swing Lock System		•
Four outside rearview mirror	•	
OTHER	STD	OPT
Booms		
5.2 m (17' 1") mono	•	
5.1 m (16' 9") 2-Piece		•
Arms		
2.2 m (7' 3")		•
2.6 m (8' 6")	•	
3.1 m (10' 2")		•
Removable clean-out dust net for cooler	•	
Removable reservoir tank	•	
Fuel pre-filter	•	
Fuel warmer	Single Dual	• •
Self-diagnostics system		•
Hi-mate Remote Management System	Mobile Satellite Dual	• • •
Batteries (2 x 12V x 100 Ah)		•
Fuel filler pump (50 l/min)		•
Single-acting piping kit (breaker, etc.)		•
Double-acting piping kit (clamshell, etc.)		•
Rotating Piping Kit		•
Quick coupler piping		•
Quick coupler		•
Accumulator for lowering work equipment	•	
Pattern change valve (2 patterns)		•
Fine swing control system		•
Tool kit		•
Auto cruiser system	•	
Travel pedal (2way)		•
REAR DOZER BLADE	STD	OPT
Front blade		•
Front - grapple rest, rear - dozer		•
Rear - Dozer blade		•
Rear - Outrigger		•
Front blade, rear blade		•
Front outrigger and rear blade		•
Front and rear outrigger	•	
Front blade and rear outrigger		•
Tires-dual (10.00 - 20 -16PR tube)	•	
Tires-dual (10.00 - 20 solid)		•
Fenders (mudguards)		•

\* Materials and specifications are subject to change without advance notice.  
\* All imperial measurements rounded off to the nearest pound or inch.

## PLEASE CONTACT

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