



# **Technology in Cab Design**

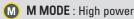
### **Wide Comfortable Operating Space**

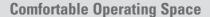
All the controls are designed and positioned according to the latest ergonomic research. Reinforced pillars have been added for greater cab rigidity.



#### **Reliable Instrument Panel**

All information such as engine RPM, engine water temp., fuel status and the state of all electric switches are displayed on the instrument panel to provide the operator with the exact condition of the machine. This makes troubleshooting much easier.









Radio & CD Player Deluxe radio & CD player is located at a convenient position.



**Dial Type Engine Speed Switch and Key Switch** 



Wide Cab with Excellent Visibility

The cab is spacious and ergonomically designed with low noise level and good visibility.

A full view front window, large rear and side windows provide excellent visibility in all directions.



**High-output Air Conditioner** & Heater

Large capacity air conditioning system is installed for operator's comfort in all

For more convenience, the cab is equipped with a window-defroster for cold seasons.



**Sensitive Joysticks and Easy** Entrance

New joystick grips for precise control have been equipped with 4 switches. Tilting tower combined with large door provides more space to enter the cabin.

Left Horn / Dummy

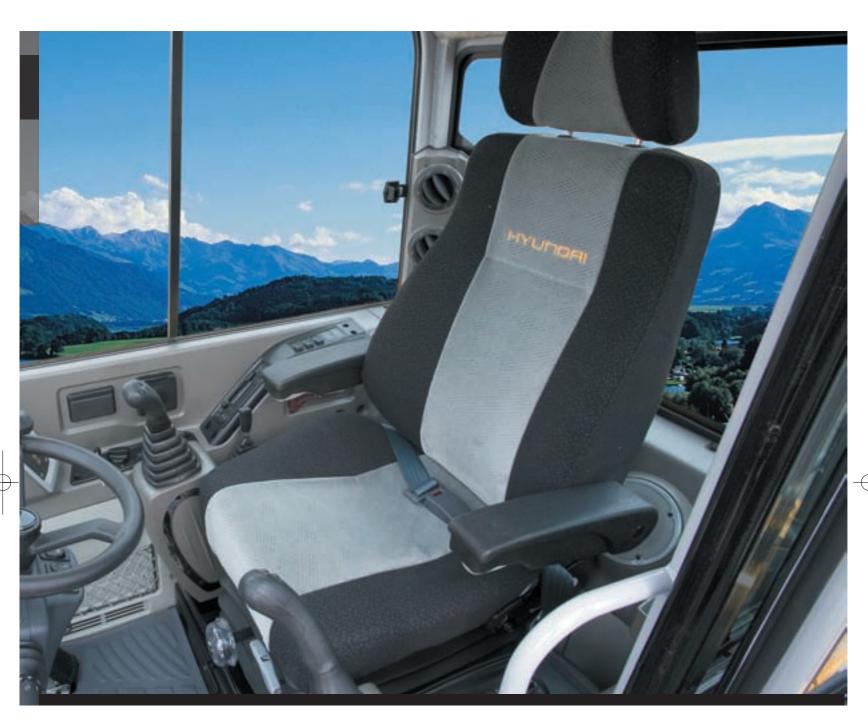




optimal position for various operators'

body sizes.

Right Breaker / Dummy





Sliding Side Window
Sliding window enables operator to
communicate outside and air to circulate
without opening main door.



Big Size Sun Visor & Roof Glass
Glass on top front corner is large enough
to give better visibility while sun visor
protects operator from exposing to
direct sunlight.

Roof Glass : Bronze color laminated glass



Rise-up Wiper
Rise-up wiper gives better front view to
operator during rainy weather conditions.



Easy to Open Front Window Sliding fold-in front window is easily opened and safely maintained in open position to improve working conditions.

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## Robex 55W-7A









Exceptional Traction & Lifting Capacity
Considerable traction and lifting force enables fast work.



Higher bucket link durability and antiwear characteristics with additional reinforcement plates on cutting edge section. The bucket is reinforced with thicker steel and additional lateral plate.

**Reinforced Bucket** 

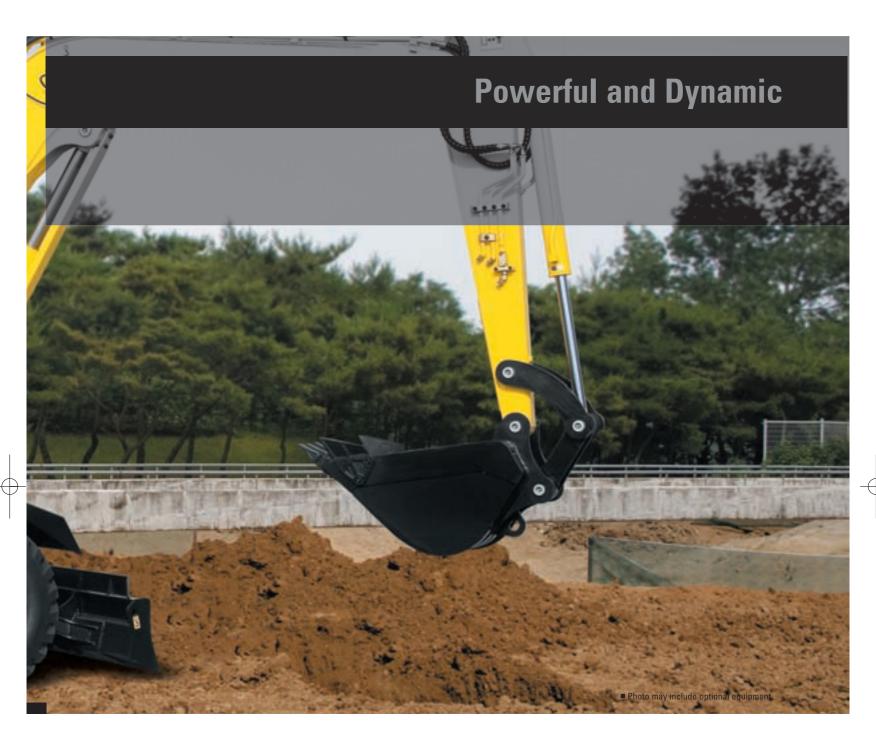


Reinforced Arm

To protect the arm from impacts and wear, reinforcements are welded at the inner side of the arm.



**Grade-ability**Grade-ability of 35 degrees (70%) and long tumbler distance make it easier to work on a slope.





Anti-Restart System
During operation the anti-restart system prevents activation of the starter.



Easy-to-Reach Control Levers
Switches and other controls are located near the operator.

This reduces operator movements and enhances control with less operator fatigue.



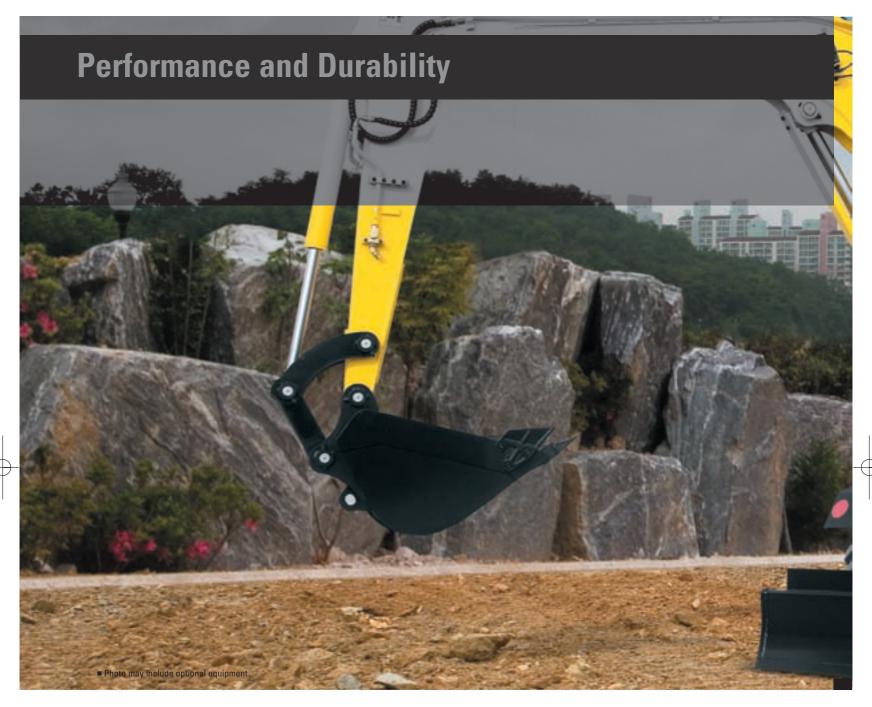
Installation for Breaker Operation Overload relief value and pipes are installed standard for customer's convenience.



Offset Boom Swing

The R55W-7A is designed for efficient work in congested residential and urban areas.

The boom can be offset within a range of 130 degrees.





Assembly of Bucket and Dozer Blade Powerful Dozer Blade Boom-arm-bucket kinematics is designed Large size dozer blade improves to minimize dead space between bucket and blade during efficient grading work.



work efficiency, equipment durability and stability.



**FEM** (Finite Element Method) Durability of structure is proven through FEM (Finite Element Method) analysis and long term durability test.



**Better Ground Clearance** Better ground clearance increases safety on rough ground.





Rectangular Tube Cabin
Certified cabin for ROPS, FOPS and TOPS increases safety of operator in case external force is exerted on cabin.



**Boom Cylinder Cover**Boom cylinder cover is installed standard to prevent cylinder damage.



Applied Side Protector
In case of close turning, the side protector prevents any damage to engine hood.



Large Capacity Radiator

To improve performances for a heavy duty job, a large capacity radiator is installed.





**Easy Change of Air Cleaner** air cleaner for easy maintenance and quick service.



Fuel Filler Pump (Option) filling of the machine.

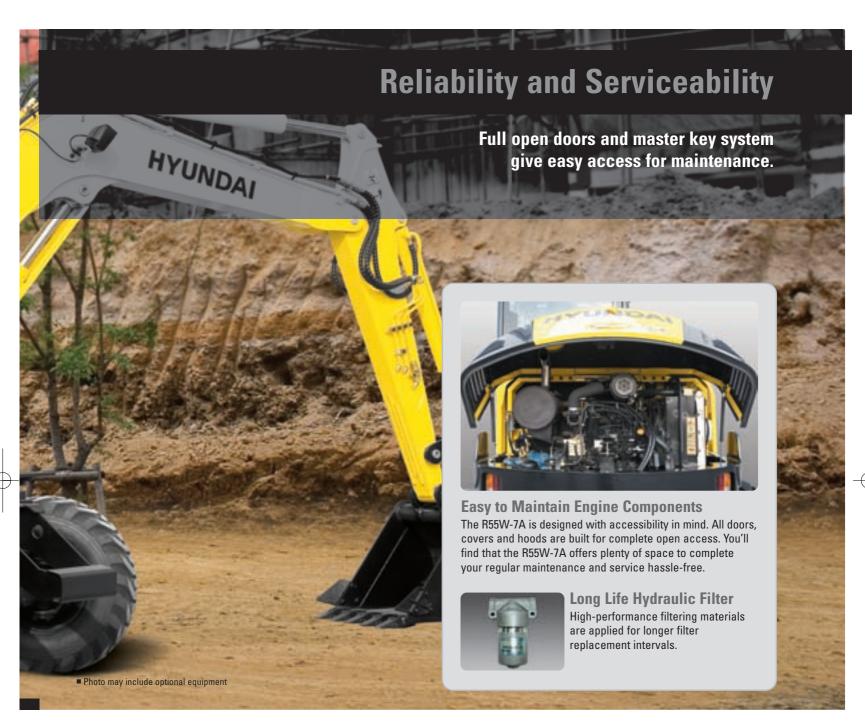


**High Capacity Water Separator** & Fuel Filter

To protect the injection system and minimize the risk of fuel breakdown, high capacity fuel filter and transparent water separator are applied for durability.



**Centralized Grease Fittings** Grease fittings are centralized for easy access during service checks, saving time and money.





**Centralized Fuse Box**Fuse box is arranged on the rear of seat for easy service.



Large Capacity Fuel Tank
The large capacity fuel tank provides longer working time.



Battery Master Switch
The battery master switch enables
checking and maintaining the battery
while minimizing the discharge of battery.



Smooth and precise swing control
Shock absorbing design is improved
to stop and start swing precisely
and smoothly.

# **Specifications**



#### **Engine**

Model		YANMAR 4TNV98-EPHYB			
Туре		Water cooled, 4 cycle diesel 4 cylinders in line, direct injection, low emission			
Rated flywheel h	orse power				
SAE	J1995 (gross)	42.5 kW (57 HP) at 2,400 rpm			
SAE	J1349 (net)	41.2 kW (55.2 HP) at 2,400 rpm			
DIN	6271/1 (gross)	42.5 kW (57.8 PS) at 2,400 rpm			
DIN	6271/1 (net)	41.2 kW (56 PS) at 2,400 rpm			
Max. torque		205 Nm (148 lbf.ft) at 1,550 rpm			
Bore x stroke		98 mm (3.86") x 110 mm (4.33")			
Displacement		3,319 cc (203 cu in)			
Battery		1 x 12 V x 100 AH			
Starter motor		12 V - 3.0 kW			
Alternator		12 V - 80 Amp			



#### Hydraulic System

	"					
Main pump						
Туре		Two vari	Two variable displacement piston pumps			
Rated flow		2 x 55 ℓ/	min (12.1 gpm) pumps			
Sub-pump for pilot cire	cuit	Gear pur	пр			
Hydraulic motors						
Travel			Two speed axial piston motor with counter balance valve and parking brake			
Swing		Axial piston motor with automatic brake				
Relief valve setting						
Implement circuits		21.58 MPa (3,130 psi)				
Travel circuit		21.58 MPa (3,130 psi)				
Swing circuit		19.58 MPa (2,840 psi)				
Pilot circuit		2.96 MPa (430 psi)				
Service valve		Installed				
Hydraulic cylinders						
	Boom	:	1 - 110 x 65 x 715 mm (4.3" x 2.6" x 28.1")			
No of outlandon hour	Arm:		1 - 90 x 55 x 850 mm (3.5" x 2.2" x 33.5")			
No. of cylinder-bore x rod x stroke	Bucket:		1 - 80 x 50 x 660 mm (3.1" x 2.0" x 26.0")			
A TOU A SUUKE	Boom swing :		1 - 95 x 50 x 527 mm (3.7" x 2.0" x 20.7")			



#### **Drives & Brakes**

Dozer blade :

 $\hbox{4-wheel hydrostatic drive, mesh, helical gear transmission provides 2 forward and}\\$ reverse travel speeds.

1 - 100 x 50 x 159 mm (4.3" x 2.0" x 7.5")

Max. travel speed	27 km/h
Grade-ability	35° (70%)



#### **Swing System**

Swing motor	Axial piston motor
Swing reduction	Planetary gear reduction
Swing circuit lubrication	Grease
Swing brake	Multi wet disc
Swing speed	9.3 rpm



#### Controls

Pilot pressure-operated joysticks and pedals provide almost effortless operation.

Pilot control	Two joysticks with one safety lever (LH): Boom Swing and arm, (RH): Boom and bucket (ISO)
Traveling and steering	Pedal and steering wheelbucket (ISO)
Engine throttle	Mechanical, cable type
External Lights	Two lights mounted on the boom, one below the cab



#### **Coolant & Lubricant Capacity**

(Refilling)	liter	US gal	UK gal
Fuel tank	120.0	31.7	26.4
Engine coolant	10.0	2.6	2.2
Engine oil	11.6	3.1	2.6
Swing device-gear oil	1.5	0.4	0.3
Hydraulic tank	70.0	18.5	15.4
Axle (Front / Rear)	5.3 / 5.3	1.4 / 1.4	1.2 / 1.2



#### **Axles & Wheels**

Full floating front axle is supported by center pin for oscillation. It can be locked by oscillation lock cylinders. Rear axle is fixed on the lower chassis.

Tires	12.0 x 16.5-12PR, single



#### **Dozer Blade**

Pin-on type dozer blade is standard. Dozer blade is a very useful addition for leveling, back filling or clean-up work.

	Width x Height	1,925 x 354 mm (6' 4" x 14" )
Dozer blade	Max. lifting above groun	d level 400 mm (15.7")
	Max. depth below group	d level 90 mm (3.5")



#### **Operating Weight (approximate)**

Operating weight, including 3,000 mm (9' 10") boom, 1,600 mm (5'3") arm, SAE heaped 0,18 m³ (0.24 yd³) digging bucket, lubricant, coolant, full fuel tank, hydraulic tank and standard equipment.

Major component weight				
Upper structure	2,650 kg (5,840 lb)			
Counterweight	200 kg (440 lb)			
Mono boom (with arm cylinder)	310 kg (680 lb)			
Operating Weight				
Operating Weight	5,450 kg (12,020 lb)			

• Mono boom with blade



### **Buckets**

Сара	ncity	Width			3.0 m (9' 10") Boom		
SAE CECE heaped heaped		Without With side cutters side cutters		Weight	1.6 m (5' 3") arm	1.9 m (6' 3") arm	
0.07 m³ (0.09 yd³) 0.06 m³ (0.08 yd³)		315 mm (12.4")	360 mm (14.2")	84 kg (185 lb)			
* 0.18 m³ (0.24 yd³)	0.15 m³ (0.20 yd³)	705 mm (27.8")	770 mm (30.3")	137 kg (300 lb)		<b>A</b>	

- st : Standard digging bucket
- : :Applicable for materials with density 1,600 kg/m² (2,700 lb/yd³) or less

  : :Applicable for materials with density 1,100 kg/m² (1,850 lb/yd³) or less

Arm	Length	* 1,600 mm (5' 3")	1,900 mm (6' 3")	
AIIII	Weight	195 kg (430 lb)	210 kg (460 lb)	
		37.7 kN	37.7 kN	
	SAE	3,850 kgf	3,850 kgf	
Bucket digging force		8,490 lbf	8,490 lbf	
		42.4 kN	42.4 kN	
	ISO	4,330 kgf	4,330 kgf	
		9,550 lbf	9,550 lbf	
		28.4 kN	25.5 kN	
	SAE	2,900 kgf	2,600 kgf	
		6,390 lbf	5,730 lbf	
Arm crowd force		31.9 kN	28.7 kN	
	ISO	3,260 kgf	2,930 kgf	
		7,190 lbf	6,460 lbf	





SAE heaped

0.07 m³ (0.09 yd³) \* 0.18 m³ (0.24 yd³)



#### Lifting Capacities R55W-7A



Rating over-front

Rating over-side or 360 degree

• Boom : 3.0 m (9' 10") • Arm : 1.6 m (5' 3") • Bucket : 0.18 m² (0.24 yd³) SAE heaped • Dozer blade down with 200 kg (440 lb) counterweight.

		Load radius								At max. reach		
	Load point height		m (5 ft)	3.0 m	(10 ft)	4.0 m (	13.12 ft)	5.0 m (	16.40 ft)	Сар	acity	Reach
m (												m (ft)
5.0 m (16.40 ft)	kg Ib		 		 		 		1	*960 *2120	*960 *2120	4.46 (14.6)
4.0 m (13.12 ft)	kg lb		 		 	*1020 *2250	*1020 *2250			*990 *2180	720 1590	5.26 (17.3)
3.0 m (10 ft)	kg lb		1		 	*1150 *2540	1110 2450			*1030 *2270	610 1340	5.69 (18.7)
2.0 m (5 ft)	kg lb			*1910 *4210	1670 3680	*1410 *3110	1060 2340	*1210 *2670	740 1630	*1070 *2360	570 1260	5.86 (19.2)
1.0 m (5 ft)	kg lb		1	*2510 *5530	1570 3460	*1670 *3680	1010 2230	*1320 *2910	720 1590	*1120 *2470	570 1260	5.80 (19.0)
Ground Line	kg lb	*2680 *5910	*2680 *5910	*2730 *6020	1510 3330	*1820 *4010	980 2160			*1160 *2560	610 1340	5.51 (18.1)
-1.0 m (-5 ft)	kg lb	*4040 *8910	3020 6660	*2620 *5780	1510 3330	*1770 *3900	970 2140		1	*1190 *2620	740 1630	4.91 (16.1)
-2.0 m (-5 ft)	kg lb	*3410 *7520	3080 6790	*2100 *4630	1540 3400		 		 		 	

		Load radius							At max. reach			
Load point height m (ft)		2.0 m (5 ft)		3.0 m (10 ft)		4.0 m (13.12 ft)		5.0 m (16.40 ft)		Capacity		Reach
			4		4						4	m (ft)
5.0 m (16.40 ft)	kg lb		 		 	*940 *2070	*940 *2070		 	*880 *1940	840 1850	4.86 (15.9)
4.0 m (13.12 ft)	kg Ib		 		 		 		 	*910 *2010	650 1430	5.58 (18.3)
3.0 m (10 ft)	kg lb				 	*1010 *2230	*1010 *2230	*1010 *2230	760 1680	*950 *2090	560 1230	5.98 (19.6)
2.0 m (5 ft)	kg lb	*3010 *6640	*3010 *6640	*1660 *3660	*1660 *3660	*1290 *2840	1070 2360	*1130 *2490	740 1630	*990 *2180	520 1150	6.14 (20.1)
1.0 m (5 ft)	kg lb	*1980 *4370	*1980 *4370	*2340 *5160	1580 3480	*1580 *3480	1020 2250	*1260 *2780	710 1570	*1040 *2290	520 1150	6.09 (20.0)
Ground Line	kg Ib	*2560 *5640	*2560 *5640	*2680 *5910	1510 3330	*1780 *3920	980 2160	*1340 *2950	690 1520	*1080 *2380	560 1230	5.81 (19.1)
-1.0 m (-5 ft)	kg lb	*3610 *7960	2980 6570	*2670 *5890	1490 3280	*1800 *3970	960 2120		1	*1120 *2470	650 1430	5.27 (17.3)
-2.0 m (-5 ft)	kg lb	*3850 *8490	3030 6680	*2300 *5070	1510 3330	*1500 *3310	970 2140		1	*1100 *2430	910 2010	4.31 (14.1)
-3.0 m (-10 ft)	kg lb	*2080 *4590	*2080 *4590		 		I I		1		I I	

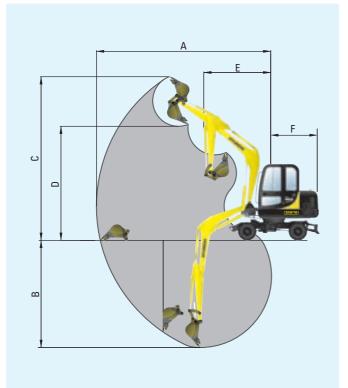
NOTES

- Lifting capacity is based on SAE J1097, ISO 10567.
   Lifting capacity of the Robex Series does not exceed 75% of tipping load with the machine on firm, level ground or 87% of full hydraulic capacity.
- 3. The load point is a hook (standard equipment) located on the back of the bucket. 4. (\*) indicates load limited by hydraulic capacity.

#### **Dimensions**



### **Working Ranges**



Boom length	3,000 mm (9' 10")					
Arm length	<b>※ 1,600 mm (5' 3")</b>	1,900 mm (6' 3")				
A. Max. digging reach	6,150 mm (20' 2")	6,430 mm (21' 1")				
B. Max. digging depth	3,500 mm (11' 6")	3,800 mm (12' 6")				
C. Max. digging height	6,070 mm (19' 11")	6,260 mm (20' 6")				
D. Max. dumping height	4,340 mm (14' 3")	4,530 mm (14'10")				
E. Min. swing radius	2,350 mm ( 7' 9")	2,350 mm ( 7' 9")				
F. Tail swing radius	1,650 mm ( 5' 5")	1,650 mm ( 5' 5")				

#### **Standard Equipment**

#### ISO standard cabin

 Cabin ROPS (ISO 3471) FOPS (ISO 3449) TOPS (ISO 12117)

- · All-weather steel cab with all-around visibility
- Safety glass windows · Rise-up type windshield wiper Sliding fold-in front window
- · Sliding side window • Lockable door
- Accessory box & Ash-tray

Auto warm up system Auto overheat prevention system

Air-conditioner (4,000 kcal/hr, 16,000 BTU/hr) Three front working lights **Heater & Defroster** 

#### Self diagnostic system **Centralized monitoring**

- · Service meter
- Clock
- Gauges Fuel level gauge Engine coolant temperature gauge
- Engine speed Warning Overheat warning Fuel low level warning

Engine oil pressure warning

Hyd. oil temperature warning Battery warning Air cleaner clogging

Unit (mm)

- Indicate
- Warming up Preheat Travel speed low Travel speed high

Door and cab locks, one key AM/FM radio and CD Two outside rear view mirrors Fully adjustable suspension seat with

seat belt Console box tilting system (LH.)

Electric horn Battery (1 x 12 V x 100 AH) **Battery master switch** 

Removable clean out screen for radiator

**Automatic swing brake** Removable reservoir tank Water separator, fuel line Counterweight (210 kg, 460 lb) Mono boom (3.0 m, 9' 10") Arm (1.6 m. 5' 3") Tires (12.0 x 16.5 - 12PR) Blade (1,925 x 354 mm, 6' 4" x 14")

Starting Aid (air grid heater), cold weather

	-					
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Fuel filler pump (35 ½/min, 7.7 gpm) Beacon lamp

Single acting piping kit (breaker, etc) Double acting piping kit (clamshell, etc) Accumulator, work equipment lowering 12volt power supply (DC-DC converter)

Quick coupler Long arm (1.9 m, 6' 3") Narrow bucket (0.07 m³, 0.09 yd³) Mechanical suspension with heater

Standard and optional equipment may vary. Contact your Hyundai dealer for more information. The machine shown may vary according to International standards. Standard and optional equipment may vary. Contact your myunual dealer for information. The incoming successions are subject to change without notice.

All US measurement are rounded off to nearest value. Materials and specifications are subject to change without notice.



#### **CONSTRUCTION EQUIPMENT**

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