

## Operator's Comfort is Foremost. Wide Cab Exceeds Industry Standards.

#### 1. Visibility

· Even more visibility than before, for safer, more efficient operating.

#### 2. Excellent Ventilation

- Ventilation has been improved by the addition of the larger fresh air intake system, and by providing additional air flow throughout the cab.
- · Sliding front and side windows provide improved ventilation.
- · A large sunroof offers upward visibility and additional ventilation.

#### 3. Comfortable Operator Environment

- The control levers and seat can be adjusted to provide maximum operator comfort.
- The seat is fully adjustable for optimum operating position, reducing operator fatigue.
- Console boxes slide forward and backward for improved accessibility.
- The proportional pressure controls reduce unnecessary exertion while ensuring precise operation.
- · Large windows allow excellent visibility in all directions.

#### 4. Lower Sound Level

- The Robex 290LC-7 was designed with low sound levels in mind.
- Hyundai engineering helps to keep interior and exterior noise levels to a minimum.
- The cab's noise levels have been additionally reduced by improving the door seals for the cab and engine compartments.
- An insulated diesel engine compartment with sound-dampening material also reduces noise.



# PERATING ENVIRONMENT

#### **Wide Cab with Excellent Visibility**

The cab is roomy and ergonomically designed with low noise level and good visibility. A full view front window and large rear and side windows provide excellent visibility in all directions.



#### **Easy-to-Reach Control Panels**

Switches and other essential controls are located near the operator.

This helps keep operator movement to a minimum, enhancing control with less operator fatigue.



#### Raise-up Wiper and CabinLights

Raise-up wiper has enhanced for the better front view. Cabin Lights enhances safety by brightly lighting the surroundings during night work(optional)

# Remote Radio Control and



## **Highly Sensitive Joystick and Easy Entrance**

New joystick grips for precise control have been equiped with double switches.

(Left : Power max / One touch deceleration, Right : Horn/Optional)

#### **Improved Intelligent Display**

Instrument Panel is installed in front of

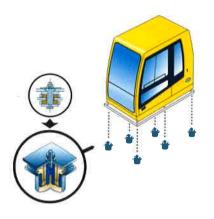


RH console box. It is easy to check all critical systems with easy-to-read indicators.

#### Minimization of Shock and Vibration through Cab Mounting System

The application of Viscous Mounting to the cabin support provides the operator with a much improved ride.

The operator work efficiency will increase as the shock and noise level in the cabin decreases.



## Wide, Comfortable Operating Space



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

#### **Rear Emergency Exit Window**



Rear Exit Window is designed with easy exit for operator's safety.

#### **Drink Holder and Magazine Box**

The New Cab has even more space for the operator. An Additional storage box is located behind operators seat, and it keeps food and beverages cool or warm.

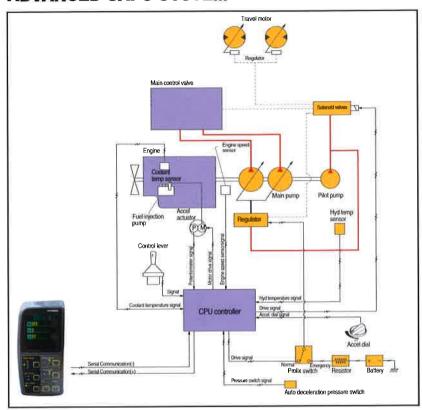




- 1 Centralized control pannel
- ② Horn button
- ③ Optional button
- 4 Travel lever
- **⑤** Remote Radio control
- **6** Cluster
- 7 One touch decel button
- **®** Hour meter
- Travel pedal
- (in Cassette and control panel (optional)
- ① Self locking device
- (2) Fully adjustable suspension seat
- (3) Air Conditioner and Heater controller
- (4) Safety lever
- (5) Joystick control lever
- **®** Power boost button

# DVANCED HYDRAULIC SYSTEM

#### **ADVANCED CAPO SYSTEM**



#### **Advanced CAPO System**

The Advanced CAPO(Computer Aided Power Optimization) system maintains engine and mutual pump power at optimum levels. Mode selections are designed for various work loads and maintaining high performance while reducing fuel consumption. Features such as auto deceleration and power boost are included in the system. The system monitors engine speed, coolant temperature, and hydraulic oil temperature. Contained within the system are self diagnostic capabilities which are displayed by error codes on the cluster.

#### **Self Diagnosis System**

The CPU controller diagnoses problems in the CAPO system caused by electric and hydraulic malfunctions and displays them on the LCD monitor of the cluster through error codes. This controller has the capacity to identify 48 distinct types of errors. As the information from this device, such as engine rpm, main pump delivery pressure, battery voltage, hyd. temperature, and the state of all types of electric switches, provides the operator with a much more exact state of machine operating condition. This makes the machine easier to troubleshoot when anything does go wrong.

# Work Mode Power Mode State I State I

#### ■ NEW MODE CONTROL SYSTEM

#### **▶ POWER MODE**

H mode: High power S mode: Standard power

#### **▶ WORK MODE**

: Heavy duty work

: General work

: Breaker

#### **▶ USER MODE**

Memorizing Operator's Preferable Power Setting(M1, M2)

#### **Arm Flow Regeneration System**

Arm flow regeneration valve provides smooth arm-in operation without cavitation.

#### **Boom & Arm Hoding System**

The Holding valves in the main control valve prevents the boom & arm from dropping over an extended period in neutral position.

#### **Auto Deceleration System**

When remote-control valves are in neutral position more than 4 seconds, CPU controller instructs the accel actuator to reduce engine speed to 1200rpm. This decreases, fuel consumption and reduced cab noise levels.

#### **One Touch Decel System**

When the one touch decel switch is pressed, CPU controller controls the accel actuator to reduce engine speed to 950 rpm. And then the one touch decel switch is pressed again, the engine speed recovers.

#### **Max. Flow Cut-off System**

For precise control and finishing work, the Max. Flow Cutoff System reduces pump flow, thus allowing smooth operation.

#### **Automatic Engine Overheat Prevention**

If the engine coolant temperature gets too high, the CPU controller lowers the engine speed and cools the engine.

#### **Anti Restart System**

The new system protects the starter from restarting during engine operation, even if the operator accidentally turns the start key again.

#### **Power boost control System**

When the power boost system is activated, digging power increases about 10%. It is especially useful when extra power is temporarily needed, for instance, when digging hard earth and rock, or if the bucket teeth are stopped by a stubborn tree root.

#### **Automatic Warming-up System**

After the engine is started, if the engine coolant temperature is low, the CPU controller increases the engine speed and automatically increases the pump flow rate to warm up the engine more effectively.

#### **Pump Flow Control System**

In neutral position: Pump flow is reduced to a minimum to eliminate power loss.

In operation: Maximum pump flow is delivered to the actuator to increase the speed. With movement of the control lever, pump flow is automatically adjusted and the actuator speed can be proportionally controlled.

#### **Hydraulic Damper in Travel Pedal**

Improved travel controllability & feeling by shock reducing when starting and stopping.

### NCREASED HIGHER PERFORMANCE



#### **Track Rail Guide & Adjusters**

Durable track rail guides keep track links in place. Track adjustment is made easy with standard grease cylinder track adjusters and shock absorbing springs.



#### **Strong and Stable Lower Frame**

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

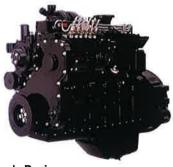
It guarantees safety and resistance against external impact when driving on rough ground and working on wet sites through high tensile strength steel panels, with highly durable upper and lower rollers and track guards.

Long undercarriage incoporates heavy duty excavator style components.

X-leg type center frame is integrally welded for maximum strength and durability.

#### **CUMMINS C8.3-C ENGINE**

The six cylinders, turbo-charged, 4 cycle, aftercooled engine is built for power, reliability, economy and low emissions.



#### Simple Design

The Cummins B5.9-C engine has been designed with 40% fewer parts than the competition. That means there's less that can go wrong when you need it most. It also means fewer parts to inventory. Repairs are simplified because no special tools are needed for maintenance. The weight of the machine is reduced without sacrificing strength.

## Reinforced Bucket and Bucket Linkage

Sealed and adjustable bucket linkage provides less wear of pins and bushes as well as silent

operation. The design inclubucket link durability and a wear characteristics. Addition reinforcement plates on cutting edge section. Reinforced bucket is made with thicker steel and additional lateral plate.





## Powerful and Preciser Swing Control

Improved shock absorbing characteristics make stopping a precise and smooth action

# ELIABILITY & SERVICEABILITY

# Full open doors and master key system provide easy access for servicing.

Handrails and foot steps are applied for safety



Side Cover with Left & Right Swing Open Type

Easy access to vital components gives unrestricted view of component allows easy maintenance and repair.



Centralized Electric Control Box and Easy Change Air Cleaner Assembly

Electric control box and Air cleaner are centralized in a compartment for easy service.



Highly efficient Hydraulic Pump

Pump output and Hydraulic tank capacity have been increased.

A pilot pump has been installed resulting in improved control sensitivity.



Large tool box for extra storage.





#### **Engine**

Model	Cummins C8.3-C
Type	Watercooled, 4 cycle Diesel,
71	6-Cylinders in line, direct injection,
Rated flywheel horse power	turbocharged and low emission
SAE J1349 (gross)	195 HP (145 kW) at 1900rpm
(net)	183 HP (137 kW) at 1900rpm
DIN 6271/1 (gross)	198 PS (145 kW) at 1900rpm
6271/1 (net)	186 PS (137 kW) at 1900rpm
Max. torque ······	81.3kgf m(588lbf ft) at 1500rpm
Bore x stroke ·····	
Piston ·····	8,270cc (505 cu in)
Batteries ·····	2×12V×160 AH
	24V
Alternator ·····	



#### **Hydraulic system**

Main pump
Type Two variable displacement piston pumps
Max. flow
Sub-pump for pilot circuit Gear pump
Cross-sensing and fuel saving pump system
Hydraulic motors
Travel Two speed axial piston motor
with brake valve and parking brake
Swing Axial piston motor with automatic brake
Relief valve setting
Implement circuits330 kgf/cm² (4690 psi)
Travel330 kgf/cm² (4690 psi)
Power Boost (boom, arm, bucket) 360 kgf/cm²(5120 psi)
Swing circuit 265 kgf/cm² (3770 psi)
Pilot circuit 35 kgf/cm² (500 psi)
Service valveInstalled
Hydraulic cylinders
No. of cylinder-bore $\times$ rod $\times$ stroke
Boom : 2 - 140 × 100 × 1465mm (5.5" × 3.9" × 57.7")
Arm : $1-150 \times 110 \times 1765$ mm (5.9" $\times 4.3$ " $\times 69.5$ ")
Bucket : 1 - 140 $\times$ 95 $\times$ 1185mm (5.5" $\times$ 3.7" $\times$ 46.7")



#### **Drives & Brakes**

Drive methodFully hydrostatic ty Drive motorAxial piston motor, in-shoe des Reduction systemPlanetary reduction g	ign
Max. drawbar pull       29500 kgf (65000         Max. travel speed(high)       5.2 km/hr (3.2 n         (low)       3.1 km/hr (1.9 m	nph)
Gradeability	%) isc



#### **Controls**

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

(LH): Swing and	Two joysticks with one safety lever arm, (RH): Boom and bucket(ISO)
Traveling and steering Engine throttle External Lights	Two levers with pedals Electric, Dial type



#### **Swing system**

Swing motor	Axial piston motor
Swing reduction	Planetary gear reduction
Swing bearing lubrication	Grease-bathed
Swing brake	multi wet disc
Swing speed	11.0 rpm

#### 7

#### **Coolant & Lubricant capacity**

(refilling)	1iter	US gal	UK gal
Fuel tank	425.0	112.3	93.5
Engine coolant	50.0	13.2	11.0
Engine oil	19.0	5.0	4.2
Swing device	7.0	1.8	1.5
Final drive(each)	11.0	2.9	2.4
Hydraulic system	320.0	84.5	70.4
Hydraulic tank	210.0	55.5	46.2



#### Undercarriage

X-leg type center frame is integrally welded with reinforced box-section track frames. The undercarriage includes lubricated rollers, idlers, track adjusters with shock absorbing spring and sprockets, assembled track chain with trple grouser shoes.

Center frame X-leg t	
Track frame Pentagonal box t	ype
No. of shoes on each side	48
No. of carrier roller on each side	2
No. of track roller on each side	9
No. of rail guides on each side	2



#### **Operating weight (approximate)**

Operating weight, including 6.25m (20'6") boom, 3.05m (10'0") arm, PCSA heaped 1.27m³ (1.66yd³) backhoe bucket, lubricant, coolant, full fuel tank, hydraulic tank and the standard equipment.

Major component weight	
Upperstructure	· 7,040kg (15,520 lb)
Counterweight ·····	4,700kg (10,400 lb)
Mono Boom(with arm cylinder) ·····	2,670kg (5,900 lb)

#### Operating weight

Shoes (Triple grouser)	Operating weight	Ground pressure
600mm	28900kg	0.55kgf/cm <sup>2</sup>
(23.6")	(63710lb)	(7.82psi)
700mm	29480kg	0.48kgf/cm²
(27.6")	(64990lb)	(6.83psi)
800mm	30060kg	0.43kgf/cm²
(31.5")	(66270lb)	(6.11psi)
900mm	30640kg	0.38kgf/cm²
(35.4")	(67550lb)	(5.40psi)



PCSA heaped

m³ (yd³)

#### **Buckets**



0.79 (1.03)





1.03 (1.35)





1.50 (1.96)



1.73 (2.26)







**●1.16 (1.52)** ▲1.07 (1.40) 1.27 (1.66) 1.46 (1.91)

Сар	acity	Width					Recommen	dation	mm(ft.in)
m³ (	m³ (yd³)		mm (in)		Boom		6250	(20' 6")	
PCSA heaped	CECE heaped	Without side cutters	With side cutters	kg(lb)	Arm	2100 (6′ 11″)	2500 (8′ 2″)	3050 (10′ 0″)	3750 (12′ 4″)
0.79 (1.03)	0.70 (0.92)	890 (32)	1010 (39.8)	740 (1630)		•	•	•	•
1.03 (1.35)	0.90 (1.18)	1090 (43)	1210 (47.6)	850 (1870)		•	•	•	
* 1.27 (1.66)	1.10 (1.44)	1290 (50.8)	1410 (55.5)	960 (2120)		•	•		<b>A</b>
1.50 (1.96)	1.30 (1.70)	1490 (58.7)	1610 (63.4)	1020 (2250)		•		<b>A</b>	5
1.73 (2.26)	1.50 (1.96)	1696 (66.8)	200	1120 (2470)		<b>A</b>	<b>A</b>	i <del>A</del> i	-
1.85 (2.42)	1.60 (2.09)	1800 (70.9)	) e.	1160 (2560)		<b>A</b>	_	-	=
▲ 1.07 (1.40)	0.95 (1.24)	1060 (42.0)	9 <del>2</del> 4	1100 (2420)		•	•	•	i i
▲ 1.27 (1.66)	1.10 (1.44)	1220 (48.0)	828	1130 (2490)		•	•		<b>A</b>
▲ 1.46 (1.91)	1.28 (1.67)	1370 (54.0)	9	1260 (2780)		•		<b>A</b>	±1
● 1.16 (1.52)	1.00 (1.05)	1305 (51.4)	SE	1260 (2780)		•	•		<del>=</del> >

: Standard backhoe bucket

: Heavy-duty
 : Rock bucket-Heavy

Applicable for materials with density of  $2,000 \text{ kg}/\text{m}^3$  (3,370 lb/yd³) or less Applicable for materials with density of  $1,600 \text{ kg}/\text{m}^3$  (2,700 lb/yd³) or less Applicable for materials with density of  $1,100 \text{ kg}/\text{m}^3$  (1,850 lb/yd³) or less



#### **Backhoe attachment**

Boom and arms are of all-welded, low-stress, full-box section design. 6.25m(20°6") boom and 2.10m(6'11"), 2.50m(8´2"), 3.05m(10´0"), 3.75m(12´4") arms are available. Buckets are all-welded, high-strength steel implements.









2.10 m (6' 11") **Digging force** 

2.50 m (8' 2")

18100 [19750]

39900 [43530]

\* 3.05 m (10' 0")

13100 [14290]

28880 [31510]

3.75 m (12' 4")

11400 [12440]

25130 [27410]

Δ	Length	mm(ft.in)	2100 (6′ 11″)	2500 (8′ 2″)	* 3050 (10′ 0″)	3750 (12′ 4″)	Remark
Arm	Weight	kg(lb)	1410 (3110)	1390 (3060)	1500 (3310)	1640 (3620)	Kernark
Bucket	SAE	kN kgf lbf	168.7 [184] 17200 [18760] 37920 [41370]				
digging force	ISO	kN kgf lbf	192,2 [209.7] 19600 [21380] 43210 [47140]	192.2 [209.7] 19600 [21380] 43210 [47140]	192.2 [209.7] 19600 [21380] 43210 [47140]	192.2 [209.7] 19600 [21380] 43210 [47140]	[ ]:
Arm	SAE	kN kgf lbf	169.7 [185.1] 17300 [18870] 38140 [41610]	147.1 [160.5] 15000 [16360] 33070 [36080]	123.6 [134.8] 12600 [13750] 27780 [30310]	108.9 [118.8] 11100 [12110] 24470 [26690]	Power Boost
force	ISO	kN	177.5 [193.6]	154.0 [168.0]	128.5 [140.2]	111.8 [122.0]	

lbf Note: Arm weight including bucket cylinder and linkage.

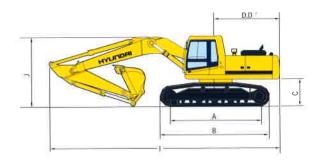
kgf

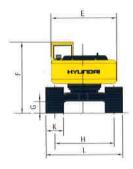
ISO

34610 [37760] \* Standard arm

15700 [17130]

#### Dimensions

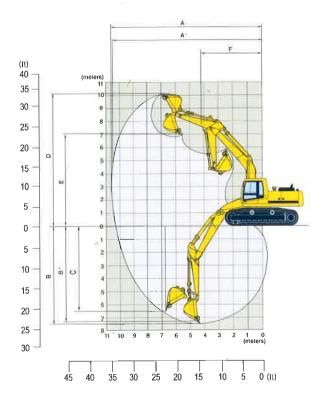




<b>4030</b> (13′ 3″)
4030 (10.07)
<b>4940</b> (16′ 2″)
nterweight <b>1190</b> (3′ 11″)
<b>3200</b> (10′ 6″)
<b>3120</b> (10′ 3″)
ucture <b>2980</b> (9′ 9″)
<b>3010</b> (9′ 11″)
<b>500</b> (1′ 8″)
<b>2600</b> (8′ 6″)

	Boom length		<b>≋ 62</b>	250 (20' 6")	
	Arm length	2100 (6′ 11″)	2500 (8′ 2″)	% 3050 (10′ 0″)	3750 (12′ 4″)
1	Overall length	10700 (35′ 1″)	10650 (34′ 11″)	10560 (34′ 8″)	10630 (34′ 11″)
J	Overall height of boom	3590 (11′ 9″)	3470 (11′ 4″)	3290 (10′ 10″)	3500 (11′ 6″)
K	Track shoe width	<b></b>	700 (27 <sub>-</sub> 6")	800 (31.5″)	900 (35.4")
L	Overall width	3200 (10′ 6″)	3300 (10′ 10″)	3400 (11′ 2″)	3500 (11′ 6″)

#### **Working ranges**



					mm (ft · in
	Boom length		<b></b>	(18' 8'')	
	Arm length	2100 (6′ 11″)	2500 (8' 2")	≅ 3050 (10′0″)	3750 (12′ 4″)
Α	Max. digging reach	10020 (32′ 10″)	10280 (33′ 7*)	10820 (35′ 6″)	11400 (37′ 5″)
Α'	Max. digging reach on ground	9820 (32´3")	10080 (33' 1")	10620 (34′ 10″)	11220 (36′ 10″)
В	Max. digging depth	6440 (21′ 1″)	6840 (22° 5°)	7500 (24′ 7″)	8090 (26' 7")
B'	Max. digging depth (8' level)	6240 (20′ 6″)	6630 (21′ 9″)	7300 (23′ 11″)	7920 (26′ 0″)
С	Max. vertical wall digging depth	6000 (19′ 8″)	5850 (19′ 2″)	6410 (21′ 0″)	7080 (23′ 3″)
D	Max. digging height	10070 (33' 0")	10110 (33° 2°)	10160 (33´4´)	10360 (34′ 0″)
E	Max. dumping height	6940 (22' 9")	7030 (23′ 1″)	7110 (23′ 4″)	7310 (24´0´´)
F	Min. swing radius	4380 (14′ 4″)	4260 (14′ 0″)	4230 (13′ 11″)	4140 (13′ 7″)

X Standard Equipment

Boom: 6.25m (20'6") Arm: 2.1m (6'11")

Bucket: 1.27m³ PCSA heaped Shoe: 600 mm(24") triple grouser with 4.7ton(10,400 lb) counterweight

Bating over-front

►□ Rating over-side or 360 degree

	- 1	/		, / ····			10,10012)		<b>3</b>		ig over side o	
Load p	Load point				Load	radius				A	t max. read	ch
height m(ft)		3.0 m	(10.0 ft)	4.5 m (	(15.0 ft)	6.0 m (	20.0 ft)	7.5 m (	(25.0 ft)	Ca	Reach	
				8				m (ft )				
7.5 m <b>(25.0 ft)</b>	kg lb					*5760 * <b>12700</b>	*5760 <b>*12700</b>		1	*5290 *11660	4470 <b>9850</b>	8,01 ( <b>26.3</b> )
6.0 m <b>(20.0 ft)</b>	kg lb					*6090 <b>*13430</b>	*6090 * <b>13430</b>	*5900 *1 <b>3010</b>	4830 <b>10650</b>	*5380 * <b>11860</b>	3570 <b>7870</b>	8.90 <b>(29.2)</b>
4.5 m (15.0 ft)	kg lb			*8940 *1 <b>9710</b>	*8940 * <b>19710</b>	*7040 * <b>15520</b>	6910 <b>15230</b>	*6210 <b>*13690</b>	4710 <b>10380</b>	5150 <b>11350</b>	3120 <b>6880</b>	9.42 <b>(30.9)</b>
3.0 m (10.0 ft)	kg lb			*11660 <b>*25710</b>	9960 21 <b>960</b>	*8270 * <b>18230</b>	6440 <b>14200</b>	*6800 *1 <b>4990</b>	4490 <b>9900</b>	4870 1 <b>0740</b>	2910 <b>6420</b>	9.64 <b>(31.6)</b>
1.5 m (5.0 ft)	kg lb			*13520 <b>*29810</b>	9270 <b>20440</b>	*9370 <b>*20660</b>	6050 <b>13340</b>	7160 <b>15790</b>	4290 <b>9460</b>	4860 <b>10710</b>	2880 <b>6350</b>	9.58 <b>(31.4)</b>
Ground Line	kg lb			*14060 <b>*31000</b>	9060 <b>19970</b>	10010 <b>22070</b>	5830 <b>12850</b>	7010 <b>15450</b>	4150 9150	5130 <b>11310</b>	3050 <b>6720</b>	9.23 ( <b>30.3</b> )
-1.5 m <b>(-5.0 ft)</b>	kg lb	*13470 <b>*29700</b>	*13470 <b>*29700</b>	*13770 * <b>30360</b>	9080 <b>20020</b>	9940 <b>21910</b>	5770 <b>12720</b>	6980 <b>15390</b>	4120 <b>9080</b>	5830 <b>12850</b>	3490 <b>7690</b>	8.57 (28.1)
-3.0 m (-10.0 ft)	kg lb	*17570 <b>*38740</b>	*17570 <b>*38740</b>	*12710 * <b>28020</b>	9260 <b>20410</b>	*9440 <b>*20810</b>	5870 <b>12940</b>		1	*6180 *1 <b>3620</b>	4490 <b>9900</b>	7.47 <b>(24.5)</b>
-4.5 m <b>(-15.0 ft)</b>	kg lb	*14150 *31200	*14150 <b>*31200</b>	*10330 * <b>22770</b>	9660 <b>21300</b>							

Boom: 6.25m (20' 6") Bucket: 1.27m3 PCSA heaped

Arm : 2.50m (8' 2") Shoe: 600 mm(24") triple grouser with 4.7ton(10,400 lb) counterweight

Load p	oint				At	At max. reach								
heigh		1.5 m (5.0 ft)		3.0 m (10.0 ft)		4.5 m (15.0 ft)		6.0 m (20.0 ft)		7.5 m (	25.0 ft)	Cap	Reach	
m(ft)														m (ft )
7,5 m (25.0 ft)	kg Ib											*4880 <b>*10760</b>	4230 <b>9330</b>	8.34 <b>(27.4)</b>
6.0 m (20.0 ft)	kg lb									*5470 * <b>12060</b>	4940 <b>10890</b>	*5020 *11070	3420 <b>7540</b>	9.19 <b>(30.2)</b>
4.5 m (15.0 ft)	kg Ib					*8180 <b>*18030</b>	*8180 * <b>18030</b>	*6610 * <b>14570</b>	*6610 <b>*14570</b>	*5880 * <b>12960</b>	4780 <b>10540</b>	4950 <b>10910</b>	2990 <b>6590</b>	9,69 <b>(31.8)</b>
3.0 m (10.0 ft)	kg lb					*10910 * <b>24050</b>	10210 <b>22510</b>	*7890 <b>*17390</b>	6550 <b>14440</b>	*6530 * <b>14400</b>	4550 <b>10030</b>	4680 <b>10320</b>	2790 <b>6150</b>	9.90 ( <b>32.5</b> )
1,5 m (5.0 ft)	kg Ib					*13040 * <b>28750</b>	9410 <b>20750</b>	*9080 <b>*20020</b>	6120 <b>13490</b>	7190 <b>15850</b>	4320 <b>9520</b>	4650 <b>10250</b>	2750 <b>6060</b>	9.84 <b>-(32.3)</b>
Ground Line	kg lb					*13950 * <b>30750</b>	9080 <b>20020</b>	*9870 *21760	5850 <b>12900</b>	7020 <b>15480</b>	4160 <b>9170</b>	4880 <b>10760</b>	2890 <b>6370</b>	9.51 <b>(31.2)</b>
-1.5 m (-5.0 ft)	kg Ib			*14370 * <b>31680</b>	*14370 <b>*31680</b>	*13930 * <b>30710</b>	9030 <b>19910</b>	9910 <b>21850</b>	5740 <b>12650</b>	6950 <b>15320</b>	4090 <b>9020</b>	5480 <b>12080</b>	3270 <b>7210</b>	8.87 <b>(29.1)</b>
-3.0 m (-10.0 ft)	kg lb	*16270 <b>*35870</b>	*16270 *35870	*18700 <b>*41230</b>		*13110 * <b>28900</b>	9160 <b>20190</b>	*9690 <b>*21360</b>	5800 <b>12790</b>			*6310 * <b>13910</b>	4100 <b>9040</b>	7.82 <b>(25.7)</b>
-4.5 m (-15.0 ft)	kg lb			*15620 <b>*34440</b>	*15620 <b>*34440</b>	*11170 * <b>24630</b>	9490 <b>20920</b>							

Boom: 6.25m (20′ 6″) Arm: 3.05m (10′ 0″) Bucket: 1.27 m³ PCSA heaped Shoe: 600 mm(24") triple grouser with 4.7ton(10,400 lb) counterweight

Load po	Load point				5	Loa	ad rad	ius						At max. reach			
		1.5 m	(5.0 ft)	3.0 m (10.0 ft)		4.5 m (15.0 ft)		6.0 m (20.0 ft)		7.5 m (25.0 ft)		9.0 m (30.0 ft)		Capacity		Reach	
height m(ft)							<b>I</b>									m (ft )	
7.5 m (25.0 ft)	kg lb			i										*4460 *9830	3740 <b>8250</b>	8.94 ( <b>29.3</b> )	
6.0 m (20.0 ft)	kg lb			1						*4910 *10820	*4910 *1 <b>0820</b>			*4600 <b>*10140</b>	3080 <b>6790</b>	9,74 <b>(32.0)</b>	
4.5 m (15.0 ft)	kg lb							*5960 * <b>13140</b>		*5390 *11880	4840 <b>10670</b>			4530 <b>9990</b>		10.20 (33.5)	
3.0 m (10.0 ft)	kg lb			*9910 * <b>21850</b>	*9910 * <b>21850</b>	*9820 <b>*21650</b>	*9820 * <b>21650</b>	*7280 * <b>16050</b>		*6090 * <b>13430</b>	4580 <b>10100</b>	*4140 * <b>9130</b>	3280 <b>7230</b>	4290 <b>9460</b>	2530 <b>5580</b>	10,40 ( <b>34.1</b> )	
1.5 m (5.0 ft)	kg lb			1		*12250 <b>*27010</b>	9550 <b>21050</b>	*8590 *1 <b>8940</b>	6160 <b>13580</b>	*6830 * <b>15060</b>	4320 <b>9520</b>	*4900 *10800		4250 <b>9370</b>	2490 <b>5490</b>	10.35 ( <b>34.0</b> )	
Ground Line	kg lb			19590 121140	*9520 <b>*21140</b>	13580 29940	9070 <b>20000</b>	*9550 *21050		6980 <b>15390</b>	4130 <b>9080</b>	*4310 *9500	3050 <b>6720</b>	4430 <b>9770</b>		10.04 (32.9)	
-1.5 m (-5.0 ft)	kg lb	*10390 * <b>22910</b>	*10390 * <b>22910</b>	*13470 * <b>29700</b>	*13470 * <b>29700</b>	*13920 * <b>30690</b>	8910 <b>19640</b>	9830 <b>21670</b>	5660 <b>22420</b>	6860 1 <b>5120</b>	4010 <b>8840</b>			4900 <b>10800</b>	2880 <b>6350</b>	9.44 (31.0)	
-3.0 m (-10.0 ft)	kg lb	*14060 *31000		*18180 * <b>40080</b>	*18180 * <b>40080</b>	*13440 <b>*29630</b>	8970 <b>19780</b>	9830 <b>21670</b>	5660 <b>22420</b>	6880 1 <b>5170</b>	4030 <b>8880</b>	30		5880 <b>12960</b>	3510 <b>7740</b>	8.48 ( <b>27.8</b> )	
-4.5 m <b>(-15.0 ft)</b>	kg lb	*18380 * <b>40520</b>	*18380 * <b>40520</b>	*17190 *3 <b>7900</b>	*17190 <b>*37900</b>	*11970 <b>*26390</b>	9220 <b>20330</b>	*8750 * <b>19290</b>		į				*5960 * <b>13140</b>		6.97 <b>(22.9)</b>	

1. Lifting capacity are based on SAE J1097, ISO 10567.
2. 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.

Boom: 6.25m (20'6") Arm: 3.75m (12'4")

Bucket: 1.27 m³ PCSA heaped Shoe: 600 mm(24") triple grouser with 4.7ton(10,400 lb) counterweight

ชื่ Rating over-front ษอ Rating over-side or 360 degree

Load po	oint					Loa	d radi	us						At	each	
	unner.	1.5 m (5.0 ft)		3.0 m (10.0 ft)		4.5 m (	4.5 m (15.0 ft)		6.0 m (20.0 ft)		7.5 m (25.0 ft)		9.0 m (30.0 ft)		acity	Reach
height m(ft)									<b>-</b>		<del>i</del>					m (ft )
7.5 m (25.0 ft)	kg Ib										4			*3930 <b>*8660</b>	3230 <b>7120</b>	9.67 ( <b>31.7</b> )
6.0 m (20.0 ft)	kg lb									*4160 <b>*9170</b>	*4160 * <b>9170</b>	*2370 * <b>5220</b>	*2370 * <b>5220</b>	*4090 <b>*9020</b>	2700 <b>5950</b>	10.40 (34.1)
4.5 m (15.0 ft)	kg lb									*4710 * <b>10380</b>		*3720 * <b>8200</b>		4060 <b>8950</b>		10.83 <b>(35.5)</b>
3.0 m (10.0 ft)	kg Ib			*13490 *29740	*13490 <b>*29740</b>	*8320 *1 <b>8340</b>	*8320 *1 <b>8340</b>	*6410 * <b>14130</b>	*6410 <b>*14130</b>	*5470 * <b>12060</b>		*4740 *1 <b>0450</b>		3850 <b>8490</b>	4920	11.02 (36.2)
1.5 m (5.0 ft)	kg lb			*9980 * <b>22000</b>	*9980 * <b>22000</b>	*11050 *24360		*7850 * <b>17310</b>	6270 <b>13820</b>	*6300 *1 <b>3890</b>	4350 <b>9590</b>	5320 <b>11730</b>		3810 <b>8400</b>	4810	10:97 (36.0)
Ground	kg lb	*6470 *1 <b>4260</b>		*10300 *22710		*12950 *28420	9170 <b>20220</b>	*9020; *19890	5860 <b>12920</b>	6980 1 <b>5390</b>		5170 <b>11400</b>		3950 <b>8710</b>		10.68 (35.0)
-1.5 m (-5.0 ft)	kg lb	*9310 * <b>20530</b>	*9310		*12760 <b>*28130</b>	*13720 <b>*30250</b>	8860 <b>19530</b>	*9730 * <b>21450</b>	5620 <b>12390</b>	6800 <b>14990</b>		5080 <b>11200</b>		4300 <b>9480</b>		10.12 (33.2)
-3.0 m (-10.0 ft)	kg lb	*12290 * <b>27090</b>			*16240 *35800	*13690 <b>*30180</b>		*9710 * <b>21410</b>	5540 <b>12210</b>	6750 <b>14880</b>	3900 <b>8600</b>		i i	5020 <b>11070</b>	6480	9.25 ( <b>30.3</b> )
-4.5 m (-15.0 ft)	kg lb	*15740 <b>*34700</b>				*12770 <b>*28150</b>		*9310 * <b>20530</b>	5620 <b>12390</b>		8			*5780 *1 <b>2740</b>		7.92 <b>(26.0)</b>

Notes: 1, Lifting capacity are based on SAE J1097, ISO 10567.
2. 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.

#### **HYUNDAI CRAWLER EXCAVATOR R290LC-7**



#### Standard Equipment

ISO standard cab

- · 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
- · Hot & cool box
- · Accessory box & Ash-tray

Computer Aided Power Optimization(New CAPO) system

- · 2-power mode, 3-work mode, 2-user mode
- · Auto deceleration & one touch deceleration system
- · Auto warm up system
- · Auto overheat prevention system

Heater (7500kcal/hr / 30000BTU/hr)

Heater & Defroster

Self diagnostic system

Centralized monitoring

· LCD display

Engine speed

Clock & Error code

Gauges

Fuel level gauge

Engine coolant temperature gauge

Hvd. oil temperature gauge

Warning

Engine coolant & Fuel level

Check Engine & CPU

Engine oil pressure

Engine coolant temperature

Hyd. oil temperature

Low battery

Air cleaner closing

Indicator

Power max.

Preheat & Engine warming-up

One touch decel

Removable clean out screen for radiator

Door and cab locks, one key

Two outside rearview mirrors

Fully adjustable suspension seat with seat belt

Slidable joystick, pilot-operated

Automatic swing brake

Removable reservoir tank

Water separator, fuel line

Boom holding system

Arm holding system

Counterweight (4700kg, 10400lb)

mono boom (6.25m, 20' 6") Arm (3.05m, 10'0")

Track shoes (600mm, 23.6")

Track rail guard

Am/Fm radio and cassette

Console box tilting system (LH.)

Three front working light

Electric horn

Batteries (2×12V×160AM)

Battery master switch

#### **Optional Equipment**

Air-conditioner (5000kcal/hr, 20000BTU/hr)

Heater (7500kcal/hr, 30000BTU/hr)

Radio remote switch

Sun visor for cabin inside

Fuel filler pump (36 l/min, 9.5 USgpm)

Beacon lamp

Safety lock valve for boom cylinder

Safety lock valve for arm cylinder

Single acting piping kit (breaker, etc)

Double acting piping kit (cramshell, etc)

Quick coupler piping kit

Accumulator, work equipment lowering

Starting Aid, cold weather

12 volt power supply (DC-DC converter)

Electic. transducer

Overload warning device

Travel arm

Various optional Arms

- · Super short arm (2.10m, 6'11")
- · Short arm (2.50m, 8'2")
- · Long arm (3.75m, 12'4")

Various optional Buckets (PCSA heaped)

- · Standard bucket (1.27m³, 1.66yd³)
- · Narrow bucket (0.79m3, 1.03yd3)
- · Narrow bucket (1.03m³, 1.35yd³)
- · Light duty bucket (1.50m³, 1.96yd³) · Light duty bucket (1.73m3, 2.26yd3)
- · Light duty bucket (1.85m³, 2.42yd³)
- · Heavy duty bucket (1.07m³, 1.40yd³)
- · Heavy duty bucket (1.27m3, 1.66yd3)
- · Heavy duty bucket (1.46m3, 1.91yd3) · Rock bucket (1.16m³, 1.52yd³)

Quick coupler kit

Cabin anti-vandalism kit

Cabin lights

- · Triple grousers shoe (700mm, 27.6")
- · Triple grousers shoe (800mm, 31.5")
- · Triple grousers shoe (900mm, 35.4") Side cowl

· Semi louver type side door Lower frame under cover

Pre heating system

Low noise kit

Tool kit Operator suit