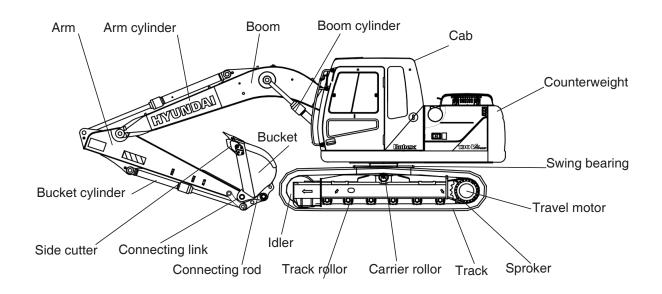
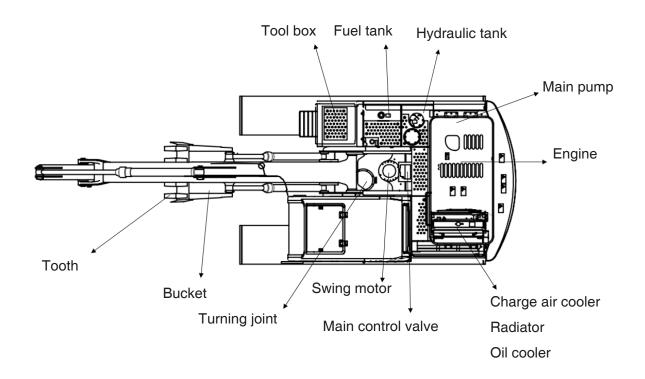
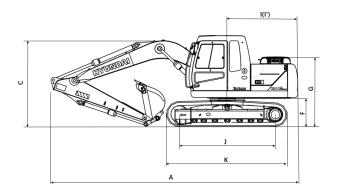
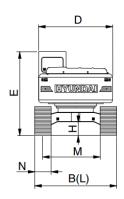
1. MAJOR COMPONENT





2. SPECIFICATIONS

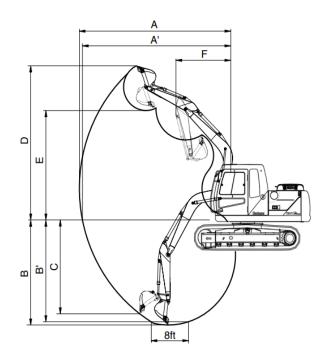




Description		Unit	Specification
Operating weight		kg (lb)	13400 (29541)
Bucket capacity (SAE heaped), standard		m³ (yd³)	0.52(0.68)
Overall length	А		7820 (25' 8")
Overall width, with 500 mm shoe	В		2500 (8' 2")
Overall height	С		2850 (9' 4")
Superstructure width	D		2476 (8' 1")
Overall height of cab	Е		2860 (9' 5")
Ground clearance of counterweight	F		935(3' 11")
Engine cover height	G		2215(7' 3")
Minimum ground clearance	Н	mm (ft-in)	440 (1' 5")
Rear-end distance	I		2000(6' 7")
Rear-end swing radius	ľ		2000 (6' 7")
Distance between tumblers	J		2830 (9' 3")
Undercarriage length	K		3580 (11' 9")
Undercarriage width	L		2500 (8' 2")
Track gauge	М		2000 (6' 7")
Track shoe width, standard	N		500 (20")
Travel speed (low/high)		km/hr (mph)	3.2/5.5(2.0/3.4)
Swing speed		rpm	12.0
Gradeability		Degree (%)	35 (70)
Ground pressure (500 mm shoe)		kgf/cm²(psi)	0.43(6.11)
Max traction force		kg (lb)	13300(29320)

3. WORKING RANGE

·4.60 m (15' 1") BOOM



Description		2.5 m (8' 2") Arm
Max digging reach	А	8330mm (27' 4")
Max digging reach on ground	A'	8180mm (26' 10")
Max digging depth	В	5550 mm (18' 3")
Max digging depth (8ft level)	B'	5340 mm (17' 6")
Max vertical wall digging depth	С	5330 mm (17' 6")
Max digging height	D	8500mm (27' 11")
Max dumping height	Е	6060mm (19' 11")
Min swing radius	F	2650mm (8' 8")
	SAE	87.3[94.8] kN
		8900 [9660] kgf
Bucket digging force		19620 [21300] lbf
Bucket diggling force		102 [110.8] kN
	ISO	10400[11290] kgf
		22930[24890] lbf
		62.8 [68.2] kN
	SAE	6400 [6950] kgf
A.v. avanual fava a		14110[15320] lbf
Arm crowd force		65.7 [71.4] kN
	ISO	6700[7270] kgf
		14770[16040] lbf

[]: Power boost

4. WEIGHT

II	R130VSPRO			
Item	kg	lb		
Upperstructure assembly	5630	12420		
Main frame weld assembly	1160	2560		
Engine assembly	335	739		
Main pump assembly	100	220		
Main control valve assembly	140	310		
Swing motor assembly	120	260		
Hydraulic oil tank assembly	160	350		
Fuel tank assembly	130	290		
Counterweight	2000	4410		
Cab assembly	500	1100		
Lower chassis assembly	5340	11760		
Track frame weld assembly	1590	3510		
Swing bearing	190	410		
Travel motor assembly	480	1060		
Turning joint	50	110		
Track recoil spring and idler	210	460		
Idler	250	550		
Carrier roller	40	90		
Track roller	490	1080		
Track-chain assembly (500 mm standard triple grouser shoe)	1010	2230		
Front attachment assembly (4.6 m boom, 2.5 m arm, 0.52 m³ SAE heaped bucket)	2420	5330		
4.6 m boom assembly	830	1830		
2.5 m arm assembly	435	960		
0.52 m³ SAE heaped bucket	472	1041		
Boom cylinder assembly	130	290		
Arm cylinder assembly	160	350		
Bucket cylinder assembly	100	220		
Bucket control linkage assembly	90	200		

5. LIFTING CAPACITIES

1) 4.60m (15' 1") boom, 2.50 m (8' 2") arm equipped with 0.52 m³ (SAE heaped) bucket and 500 mm (24") triple grouser shoe and 2000 kg (4410 lb) counterweight.

: Rating over-front : Rating over-side or 360 degree

		Load radius							At max. reach			
Load point		1.5 m	.5 m (5.0 ft) 3.0 m (10.0 ft)			4.5 m (15.0 ft) 6.0 m (20.0 ft)		Capacity		Reach		
height		Ū	+	J	+	Ū	=	Ū		J		m(ft)
1 1	kg lb									*2810 *6190	1920 4230	6.69 (21.9)
4.5 m	kg lb							*2770 *6110	2270 5000	2440 5380	1500 3310	7.53 (24.7)
3.0 m	kg			*4930	*4930	*3830	3570	*3380	2190	2170	1310	7.95
1.5 m	lb kg			*10870	*10870 6240	*8440 *5010	7870 3300	*7450 3380	4830 2070	4780 2100	2890 1250	(26.1) 8.03
- /	lb kg			*17700 *8780	13760 5800	*11050 5200	7280 3090	7450 3270	4560 1970	4630 2180	2760 1300	(26.3) 7.77
Line	lb			*19360	12790	11460	6810	7210	4340	4810	2870	(25.5)
1	kg lb	*5740 *12650	*5740 *12650	*9910 *21850	5700 12570	5080 11200	2990 6590	3220 7100	1920 4230	2500 5510	1500 3310	7.15 (23.5)
1	kg lb	*8760 *19310	*8760 *19310	*9040 *19930	5770 12720	5100 11240	3000 6610			3340 7360	2030 4480	6.01 (19.7)
	kg lb			*6590 *14530	6030 13290							

Note: 1. Lifting capacity are based on SAE J1097 and 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 located on the back of the bucket.
- 4. *indicates load limited by hydraulic capacity.
- Lifting capacities are based upon a standard machine conditions. Lifting capacities will vary with different work tools, ground conditions and attachments. The difference between the weight of a work tool attachment must be subtracted. Consult your Hyundai dealer regarding the lifting capacities for specific work tools and attachments.
- A Failure to comply to the rated load can cause possible personal injury or property damage. Make adjustments to the rated load as necessory for non-standard configurations.

6. BUCKET SELECTION GUIDE

1) GENERAL BUCKET



0.52 m³ SAE heaped bucket

Capacity		\A/i	dth		Recommendation
Сар	acity	VVI	Weight		4.60 m (15'1") boom
SAE heaped	CECE heaped	Without side cutter	With side cutter	vveignt -	2 . 5 m arm (8' 2")
0.52m ³ (0.68yd ³)	0.45m ³ (0.59 yd ³)	915 mm (36.0")	1015mm (40.0")	_	Applicable for materials with density of 1600 kg/m³ (2700 lb/yd³) or less

7. UNDERCARRIAGE

1) TRACKS

X-leg type center frame is integrally welded with reinforced box-section track frames. The design includes dry tracks, lubricated rollers, idlers, sprockets, hydraulic track adjusters with shock absorbing springs and assembled track-type tractor shoes with triple grousers.

2) TYPES OF SHOES

			Triple grouser
Model	Shapes		
	Shoe width	mm (in)	500 (20)
R130VS PRO	Operating weight	kg (lb)	13400 (29541)
NISOVS FNO	Ground pressure	kgf/cm² (psi)	0.43(6.11)
	Overall width	mm (ft-in)	2500 (8' 2")

3) NUMBER OF ROLLERS AND SHOES ON EACH SIDE

Item	Quantity
Carrier rollers	1 EA
Track rollers	6 EA
Track shoes	44 EA

4) SELECTION OF TRACK SHOE

Suitable track shoes should be selected according to operating conditions.

Method of selecting shoes

Confirm the category from the list of applications in **table 2**, then use **table 1** to select the shoe. Wide shoes (categories B and C) have limitations on applications. Before using wide shoes, check the precautions, then investigate and study the operating conditions to confirm if these shoes are suitable. Select the narrowest shoe possible to meet the required flotation and ground pressure. Application of wider shoes than recommendations will cause unexpected problem such as bending of shoes, crack of link, breakage of pin, loosening of shoe bolts and the other various problems.

* Table 1

Track shoe	Specification	Category
500 mm triple grouser	Standard	А

X Table 2

Category	Applications	Precautions
А	Rocky ground, river beds, normal soil	 Travel at low speed on rough ground with large obstacles such as boulders or fallen trees

8. SPECIFICATIONS FOR MAJOR COMPONENTS

1) ENGINE

Item	Specification
Model	Cummins F3.8
Туре	4-cycle turbocharged charger air cooled diesel engine
Cooling method	Water cooling
Number of cylinders and arrangement	4 cylinders, in-line
Firing order	1-3-4-2
Combustion chamber type	Direct injection type
Cylinder bore × stroke	102×115 mm
Piston displacement	3760 c c
Compression ratio	17:1
Rated gross horse power (SAE J1995)	115 Hp at 2200 rpm (86 kW at 2200 rpm)
Maximum torque	48 kgf·m (3471 lbf·ft) at 1100 -1700 rpm
Engine oil quantity	11ℓ(2.9 U.S. gal, C l-4)
Dry weight	335 kg (739 lb)
Low idling speed	2200±50 rpm
High idling speed	800±50 rpm
Rated fuel consumption	185.9 g/Hp·hr at 2200 rpm
Starting motor	24V-4.8KW
Alternator	28V-70A
Battery	2×12V×72Ah

2) MAIN PUMP

Item	Specification
Туре	Variable displacement tandem axis piston pumps
Capacity	2 × 72.9 cc/rev
Maximum pressure	350 kgf/cm² [380 kgf/cm²]
Rated oil flow	2×124ℓ/min
Rated speed	1700 rpm

[]: Power boost

3) GEAR PUMP

Item	Specification
Туре	Fixed displacement gear pump single stage
Capacity	15cc/rev
Maximum pressure	40 kgf/cm ²
Rated oil flow	25.5 <i>l</i> /min

4) MAIN CONTROL VALVE

Item	Specification				
Туре	11 spools				
Operating method	Hydraulic pilot system				
Main relief valve pressure	350 kgf/cm² [380 kgf/cm²]				
Overload relief valve pressure	400 kgf/cm ²				

^{[]:} Power boost

5) SWING MOTOR

Item	Specification			
Туре	Axial piston motor			
Capacity	72 cc/rev			
Relief pressure	280 kgf/cm ²			
Braking system	Automatic, spring applied hydraulic released			
Braking torque	640 kgf·m			
Brake release pressure	24 kgf/cm ²			
Reduction gear type	2 - stage planetary			

6) TRAVEL MOTOR

Item	Specification				
Туре	Axial piston motor				
Relief pressure	400 kgf/cm ²				
Capacity (max / min)	77.1/45 cc/rev				
Reduction gear type	Planetary differential				
Braking system	Automatic, spring applied hydraulic released				
Brake release pressure	9.5 kgf/cm ²				
Braking torque	29.5 kgf·m				

7) CYLINDER

Ite	Specification		
Boom cylinder	Bore dia × Rod dia × Stroke	Ø105ר75×1075 mm	
	Cushion	Extend only	
Arm cylinder	Bore dia × Rod dia × Stroke	Ø115ר80×1138 mm	
	Cushion	Extend and retract	
Bucket cylinder	Bore dia × Rod dia × Stroke	Ø100ר70×850 mm	
	Cushion	Extend and retract	

^{*} Discoloration of cylinder rod can occur when the friction reduction additive of lubrication oil spreads on the rod surface.

8) SHOE

Item Width		Ground pressure	Link quantity	Overall width	
R130VSPRO Standard	130VSPRO Standard 500 mm (20") 0.43		44	2500 mm (8' 2")	

9) BUCKET

ltem -		Capa	acity	Tooth	Width		
		SAE heaped	CECE heaped	quantity	Without side cutter	With side cutter	
R130VSPRO	Standard	0.52m3 (0.68 yd3)	0.45 m³ (0.59yd³)	5	915mm (36.0")	1015mm(40.0")	

^{*} Discoloration does not cause any harmful effect on the cylinder performance.

9. RECOMMENDED OILS

Use only oils listed below. Do not mix different brand oil. Please use HYUNDAI genuine oil and grease.

		Capacity Ambient temperature °C(°F)									
Service point Kind of fluid	Capacity ℓ	-50 -3	30 -2	20 -	10	0	10	20	30	40	
			(-58) (-2	22) (-	4) (14)	(32)	(50)	(68)	(86)	(104)
				* 5	SAE 5W	'-40					
					<i>5,</i> (2 0 1 1				0.15.00		
Engine									SAE 30)	
oil pan	Engine oil	11			SAE	10W	V				
							SAE	10W-30			
							0	SAE 15W	<i>I</i> -40		
								DAL 1344	-40		
Swing drive		3.5									
Swing unive		3.5					+ 0	A F 00\A	. 00		
	Gear oil		_			Τ	× S	AE 80W	-90		
Final drive							S	SAE 85W	/-140		
rinai drive		2.2×2									
			★ISO VG 15								
		Tank 124	ISO VG 32								
Hydraulic tank	Hydraulic oil	124		ISO VG 32							_
		System 210		ISO VG 46							
					ISO			VG 68			
			*	ASTM D	975 NO) 1					
Fuel tank	Diesel fuel	270			0,0,10						
								ASTM [0975 NO	.2	
Fitting					* NLC	GI NC	0.1				
(grease nipple)		As required						NII OI NI			
					Τ		NLGI NO).2			
	Mixture of	xture of									
Radiator	antifreeze	15.5		E	thylene	glyco	ol base p	permane	nt type (5	0 : 50)	
(reservoir tank) and so water*		10.0	*	Ethylene	glycol ba	ase p	ermane	nt type (6	60 :40)		

SAE : Society of Automotive Engineers

API : American Petroleum Institute

ISO: International Organization for Standardization

NLGI: National Lubricating Grease Institute **ASTM**: American Society of Testing and Material

★ : Cold region

Russia, CIS, Mongolia

★1 : Soft water

City water or distilled water