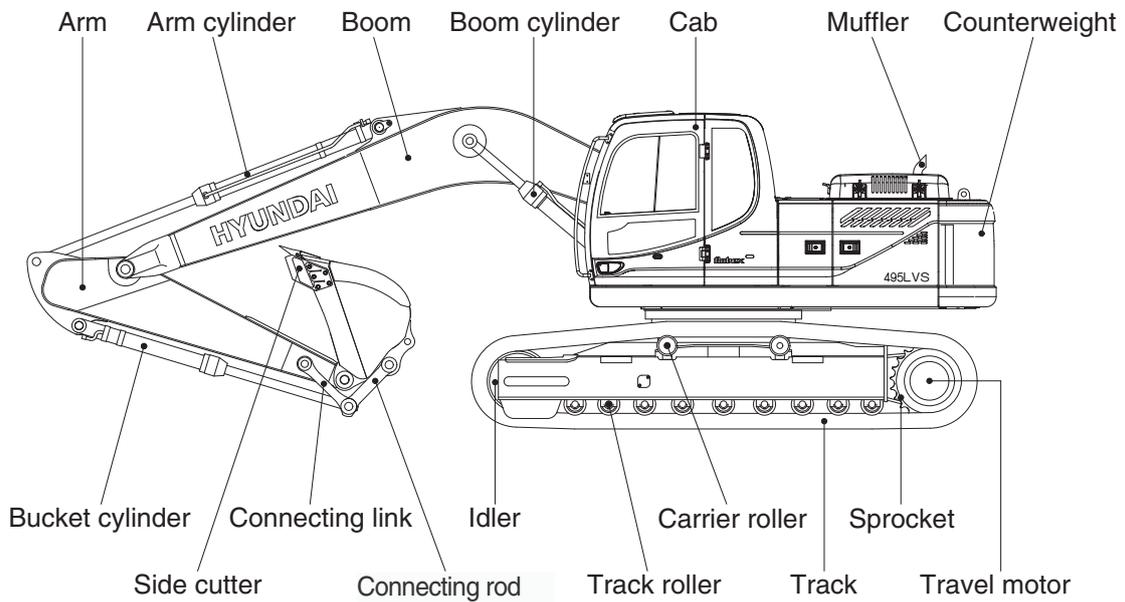
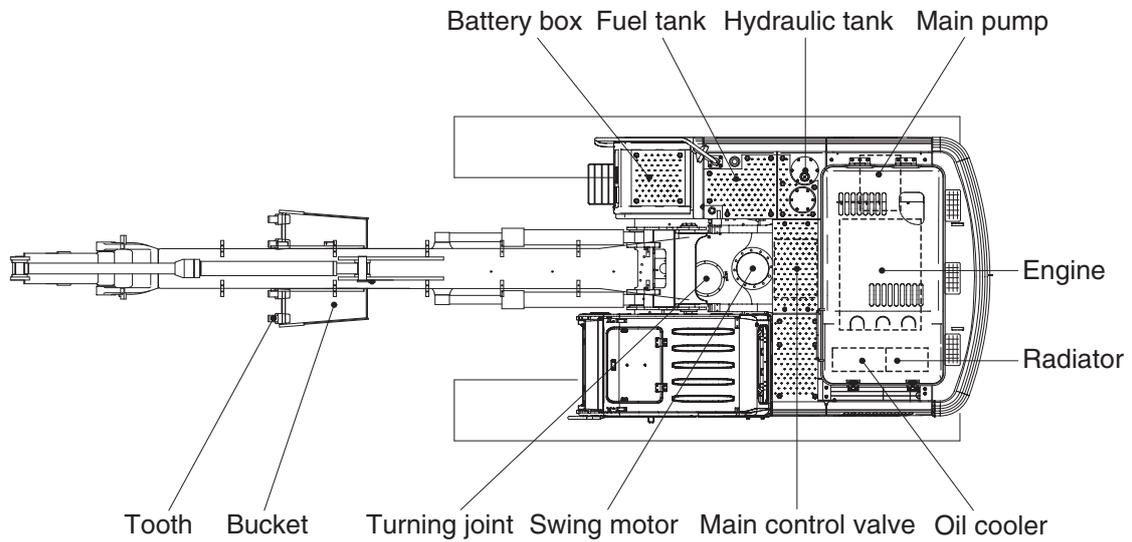


SPECIFICATIONS

1. MAJOR COMPONENT

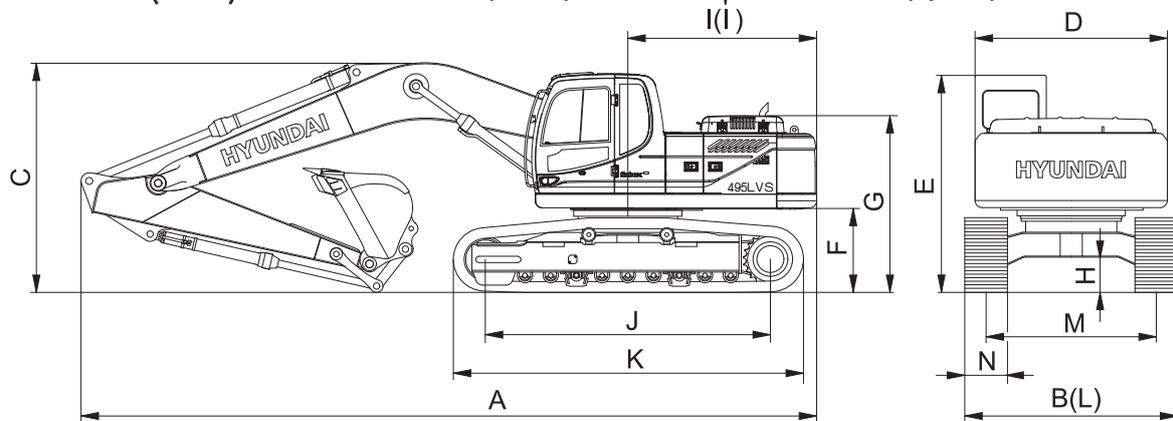


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2. SPECIFICATIONS

1) R495LVS

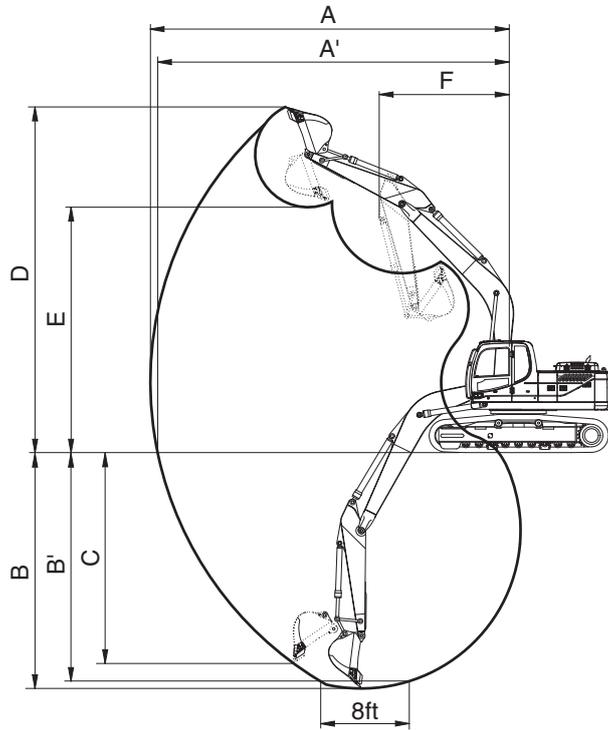
- 6.55 m (21' 6") BOOM and 2.40 m (7' 10") ARM
- 6.55 m (21' 6") BOOM and 2.90m (9' 6") ARM and 2.5m³ BUCKET(option)



Description		Unit	Specification
Operating weight		kg (lb)	49600 (109349)
Bucket capacity (SAE heaped), standard		m ³ (yd ³)	3.20 (4.19)
Overall length	A	mm (ft-in)	11840 (38' 10")
Overall width, with 600mm shoe	B		3340 (10' 11")
Overall height	C		3980 (13' 0")
Superstructure width	D		2980 (9' 9")
Overall height of cab	E		3190 (10' 6")
Ground clearance of counterweight	F		1247 (4' 1")
Engine cover height	G		2770 (9' 1")
Minimum ground clearance	H		524 (1' 9")
Rear-end distance	I		3695 (12' 1")
Rear-end swing radius	I'		3725 (12' 3")
Distance between tumbler	J		4470 (14' 8")
Undercarriage length	K		5430 (17' 10")
Undercarriage width	L		3340 (10' 11")
Track gauge	M		2740 (8' 12")
Track shoe width, standard	N		600 (24")
Travel speed (low/high)			km/hr (mph)
Swing speed		rpm	8.8
Gradeability		Degree (%)	35 (70)
Ground pressure (600 mm shoe)		kgf/cm ² (psi)	0.86 (12.23)
Max traction force		kg (lb)	42800 (94358)

3. WORKING RANGE

1) R495LVS [6.55 m (21' 6") BOOM]



Description		2.40m (7' 10") Arm , 2.90m(9' 6") option
Max digging reach	A	10634mm(34' 11")
Max digging reach on ground	A'	10415mm(34' 2")
Max digging depth	B	6444mm(21' 1")
Max digging depth (8 ft level)	B'	6263mm(20' 6")
Max vertical wall digging depth	C	4617mm(15' 1")
Max digging height	D	10036mm(32' 11")
Max dumping height	E	6824mm(22' 5")
Min swing radius	F	4749mm(15' 7")
Bucket digging force	SAE	241.1[263.1] kN
		24585[26820] kgf
		54201[59128] lbf
	ISO	279.3[304.7] kN
		28481[31070] kgf
		62789[68496] lbf
Arm digging force	SAE	277.3[302.5] kN
		28277[30848] kgf
		62339[68006] lbf
	ISO	288.1[314.2] kN
		29378[32049] kgf
		64767[70655] lbf

[] : Power boost

4. WEIGHT

1) R495LVS

Item	R495LVS	
	kg	lb
Upperstructure assembly	20000	44090
Main frame weld assembly	4430	9770
Engine assembly	940	2070
Main pump assembly	190	420
Main control valve assembly	420	930
Swing motor assembly	230	510
Hydraulic oil tank assembly	450	990
Fuel tank assembly	270	600
Counterweight	9700	21385
Cab assembly	490	1080
Lower chassis assembly	19000	41890
Track frame weld assembly	7060	15570
Swing bearing	720	1590
Travel motor assembly	440	970
Turning joint	50	110
Track recoil spring	310	680
Idler	250	551
Carrier roller	40	88
Track roller	80	180
Track-chain assembly (600 mm standard triple grouser shoe)	2700	5950
Front attachment assembly (6.55 m boom, 2.40 m arm, 3.20 m ³ SAE heaped bucket)	7889	17392
Front attachment assembly (6.55 m boom, 2.90 m arm, 2.50 m ³ SAE heaped bucket) opt	—	—
6.55m boom assembly	3470	7650
2.40 m arm assembly 2. 90m arm (opt)	1563	3446
3.20 m ³ SAE heaped bucket 2. 50m ³ bucket (opt)	2856	6296
Boom cylinder assembly	830	1830
Arm cylinder assembly	370	816
Bucket cylinder assembly	402	886
Bucket control rod assembly	155	340

5. LIFTING CAPACITIES

1) R495LVS

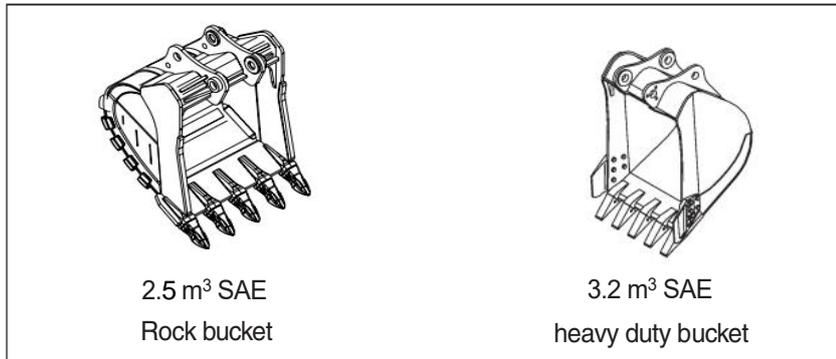
(1) 6.55 m (21' 6") boom, 2.40 m (7' 10") arm equipped with 3.20 m³ (SAE heaped) bucket and 600 mm (24") triple grouser shoe and 9700 kg (21385 lb) counterweight.

LIFT-POINT HEIGHT (m/ft)		LIFTING-POINT RADIUS								AT MAX. REACH			
		3.0m (9.8ft)		4.5m (14.8ft)		6.0m (19.7ft)		7.5m (24.6ft)		CAPACITY		REACH	
												kg	lb
7.5m	kg												
24.6ft	lb												
6.0m	kg					*11450	*11450	*10030	8590	*9820	7870		7.83
19.7ft	lb					*25240	*25240	*22110	18940	*21650	17350		(25.7)
4.5m	kg			*17200	*17200	*12840	12160	*10600	8240	*9740	6600		8.42
14.8ft	lb			*37920	*37920	*28310	26810	*23370	18170	*21470	14550		(27.6)
3.0m	kg					*14380	11250	*11330	7800	*9810	5950		8.71
9.8ft	lb					*31700	24800	*24980	17200	*21630	13120		(28.6)
1.5m	kg					*15450	10540	*11890	7410	*9970	5710		8.73
4.9ft	lb					*34060	23240	*26210	16340	*21980	12590		(28.6)
0.0m	kg			*21360	15900	*15660	10150	*11980	7160	*10180	5860		8.48
0.0ft	lb			*47090	35050	*34520	22380	*26410	15790	*22440	12920		(27.8)
-1.5m	kg	*20400	*20400	*19630	16000	*14860	10060	*11290	7100	*10340	6500		7.95
-4.9ft	lb	*44970	*44970	*43280	35270	*32760	22180	*24890	15650	*22800	14330		(26.1)
-3.0m	kg	*20360	*20360	*16660	16360	*12800	10260			*10270	8010		7.05
-9.8ft	lb	*44890	*44890	*36730	36070	*28220	22620			*22640	17660		(23.1)
-4.5m	kg			*11670	*11670					*9280	*9280		5.63
-14.8ft	lb			*25730	*25730					*20460	*20460		(18.5)

- 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 (standard equipment) located on the back of the bucket.
 4. *indicates load limited by hydraulic capacity.

6. BUCKET SELECTION GUIDE

1) GENERAL BUCKET



2.5 m³ SAE
Rock bucket

3.2 m³ SAE
heavy duty bucket

Capacity		Width		Weight	Recommendation	
					6.55m 21'6" boom	
SAE heaped	CECE heaped	Without side cutter	With side cutter		2.40m (7'10") arm	2.90m (9'6") arm
3.20m ³ (4.19yd ³)	3.00m ³ (3.92yd ³)	2075mm (81.7")	2108mm (83.0")	2856kg (6296lb)	※	
※2.50m ³ (3.27yd ³)	2.19m ³ (2.86yd ³)	1860mm (73.2")	—	2660kg (5864lb)		※

※ : Bucket configuration

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) NUMBER OF ROLLERS AND SHOES ON EACH SIDE

Item	Quantity
	R495LVS
Carrier rollers	2 EA
Track rollers	9 EA
Track shoes	53 EA

3) 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
600mm triple grouser	Standard	A
700mm triple grouser	Option	B
800mm triple grouser	Option	C
900mm triple grouser	Option	C

※ **Table 2**

Category	Applications	Precautions
A	Rocky ground, river beds, normal soil	<ul style="list-style-type: none"> Travel at low speed on rough ground with large obstacles such as boulders or fallen trees
B	Normal soil, soft ground	<ul style="list-style-type: none"> These shoes cannot be used on rough ground with large obstacles such as boulders or fallen trees Travel at high speed only on flat ground Travel slowly at low speed if it is impossible to avoid going over obstacles
C	Extremely, soft ground (Swampy ground)	<ul style="list-style-type: none"> Use the shoes only in the conditions that the machine sinks and it is impossible to use the shoes of category A or B These shoes cannot be used on rough ground with large obstacles such as boulders or fallen trees Travel at high speed only on flat ground Travel slowly at low speed if it is impossible to avoid going over obstacles

8. SPECIFICATIONS FOR MAJOR COMPONENTS

1) ENGINE

Item	Specification
Model	Cummins QSM11
Type	4-cycle turbocharged, charger air cooled diesel engine
Cooling method	Water cooling
Number of cylinders and arrangement	6 cylinders, in-line
Firing order	1-5-3-6-2-4
Combustion chamber type	Direct injection type
Cylinder bore × stroke	125 × 147 mm (4.9" × 5.8")
Piston displacement	10800 cc (659 cu in)
Compression ratio	16.3 : 1
Rated gross horse power (SAE J1995)	362Hp at 1900 rpm (266 kW at 1900 rpm)
Maximum torque	170.8 kgf · m (1235 lbf · ft) at 1400 rpm
Engine oil quantity	38 l (10 U.S. gal)
Dry weight	942 kg (2077 lb)
High idling speed	1900 ± 50 rpm
Low idling speed	850 ± 100 rpm
Rated fuel consumption	161.8 g/Hp · hr at 1900 rpm
Starting motor	Remy (24V-7.2 kW)
Alternator	Delco Remy 24V-90A
Battery	2 × 12V × 200 Ah

2) MAIN PUMP

Item	Specification
Type	Variable displacement tandem axis piston pumps
Capacity	2 × 380 cc/rev
Maximum pressure	330 kgf/cm ² (4690 psi) [360 kgf/cm ² (5124 psi)]
Rated oil flow	2 × 360 l /min (95.1 U.S. gpm / 79.2 U.K. gpm)
Rated speed	1800 rpm

[] : Power boost

3) GEAR PUMP

Item	Specification
Type	Fixed displacement gear pump single stage
Capacity	15 cc/rev
Maximum pressure	35 kgf/cm ² (570 psi)
Rated oil flow	28 l /min (7.1 U.S. gpm / 5.9 U.K. gpm)

4) MAIN CONTROL VALVE

Item	Specification
Type	9 spools
Operating method	Hydraulic pilot system
Main relief valve pressure	330 kgf/cm ² (4690 psi) [360 kgf/cm ² (5124 psi)]
Overload relief valve pressure	400 kgf/cm ² (5690 psi)

[] : Power boost

5) SWING MOTOR

Item	Specification
Type	Axial piston motor
Capacity	142.8 cc/rev
Relief pressure(rated)	300 kgf/cm ²
Braking system	Automatic, spring applied hydraulic released
Braking torque	1192kgf · m (8622 lbf · ft)
Brake release pressure	20.9 kgf/cm ² (297 psi)
Reduction gear type	2 - stage planetary

6) TRAVEL MOTOR

Item	Specification
Type	Axial piston motor
Max working flow	380 /min
Travel pressure	360 kgf/cm ²

7) CYLINDER

Item		Specification
Boom cylinder	Bore dia × Rod dia × Stroke	∅ 170 × ∅ 115 × 1580 mm
	Cushion	Extend only
Arm cylinder	Bore dia × Rod dia × Stroke	∅ 190 × ∅ 130 × 1820 mm
	Cushion	Extend and retract
Bucket cylinder	Bore dia × Rod dia × Stroke	∅ 170 × ∅ 115 × 1370 mm
	Cushion	Extend only

※ Discoloration of cylinder rod can occur when the friction reduction additive of lubrication oil spreads on the rod surface.

※ Discoloration does not cause any harmful effect on the cylinder performance.

8) SHOE

Item		Width	Ground pressure	Link quantity	Overall width
R495LVS	Standard	600 mm (24")	0.86 kgf/cm ² (12.23 psi)	53	3340 mm (10' 11")
	Option	700 mm (28")	0.75 kgf/cm ² (10.65 psi)	53	3440 mm (11' 3")
		800 mm (32")	0.66 kgf/cm ² (9.39 psi)	53	3540 mm (11' 7")
		900 mm (36")	0.59 kgf/cm ² (8.39 psi)	53	3640 mm (11' 11")

9) BUCKET

Item	Capacity		Tooth quantity	Width	
	SAE heaped	CECE heaped		Without side cutter	With side cutter
R495LVS	⊙ 2.50(3.27)	2.19(2.86)	5	1860 (73.2 ")	—
	3.20(4.19)	3.00(3.92)	5	2075 (82")	2108mm(83.0")

⊙ : Rock bucket

9. RECOMMENDED OILS

Use only oils listed below. Do not mix different brand oil.

Please use HYUNDAI genuine oil and grease.

Service point	Kind of fluid	Capacity ℓ (U.S. gal)	Ambient temperature °C (°F)									
			-50 (-58)	-30 (-22)	-20 (-4)	-10 (14)	0 (32)	10 (50)	20 (68)	30 (86)	40 (104)	
Engine oil pan	Engine oil	38 (10)	SAE 5W-40					SAE 30				
			SAE 10W				SAE 10W-30					
			SAE 15W-40									
											SAE 80W-90	
										SAE 85W-140		
Swing drive	Gear oil	7.0×2 (1.8×2)	SAE 80W-90									
Travel drive		12.5 × 2 (3.3×2)	SAE 85W-140									
Hydraulic tank	Hydraulic oil	Tank; 262 (69.2)	ISO VG 15					ISO VG 32				
			ISO VG 46					ISO VG 68 ★				
		System; 486 (128.4)									ASTM D975 NO.1	
										ASTM D975 NO.2		
Fitting (grease nipple)	Grease	As required	NLGI NO.1					NLGI NO.2				
											Ethylene glycol base permanent type (50 : 50)	
Radiator (reservoir tank)	Mixture of antifreeze and soft water★ ¹	50 (13.2)										

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

★ : Use of equipment in Indonesia