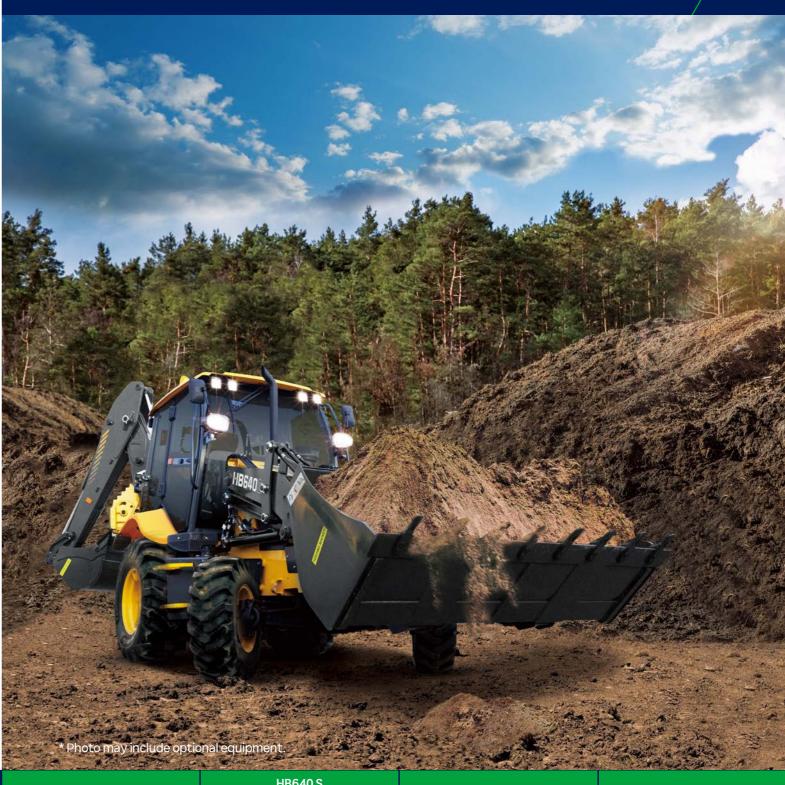


Head Office(Sales Office)

11F, GLOBAL R&D CENTER, 477 BUNDANG SUSEO-RO, BUNDANG-GU, SEONGNAM-SI, GYEONGGI-DO, 13553, KOREA

PLEASE CONTACT

# HB640 HYUNDAI BACKHOE LOADER



HB640 S/C Perkins E/G, Tier III HB640 S Perkins E/G, Tier III, 4-wheel Steering System

HB640 S/C Kirloskar E/G, Tier II HB640 S/C Kirloskar E/G, Tier III



### PRIDE AT WORK

Hyundai strives to build state-of-the art earthmoving equipment to give every operator maximum performance, more precision, versatile machine preferences and proven quality. Take pride in your work with a Hyundai!

## POWERFUL AND RELIABLE ENGINE

- PERKINS 1104D-44TA engine with EU NRMM 97/68/EC, EURO III A
- KIRLOSKAR 4R 1040Twith EU STAGE II regulation built for power, reliability and efficiency

## COMFORTABLE OPERATION

- Up-level cabin with ROPS / FOPS certified design for safe operation
- Tilting, adjustable steering column
- Hinged-type windows for excellent ventilation
- Ergonomic design and location of gauges, switches and levers for quick and easy use
- Suspension seat with full adjustment for improved operator comfort

## ADVANCED PERFORMANCE SYSTEM

- Adjustable flow control system (AFCS) optimizes the travel power of the machine when traveling on the highway
- Smooth Ride Control (SRC) system reduced cycle times, higher productivity and better fuel efficiency
- 4-wheel steering system offers Maneuverability, Stability, Turning radius, Versatility and Efficiency

## BEST IN SEGMENT PRODUCTIVITY

- 15% higher breakout force
- · 4% larger bucket capacity
- 10% more traction
- Highest bucket reach with various loader and backhoe attachments

#### **EXCELLENT VISIBILITY**

- One piece rounded windshield for wide span of view
- Well designed loader frame offers excellent visibility

#### **SEVICEABILITY**

- Tilt-up hood provides easy access to engine compartment
- All greasing and filter points accessible from ground level for safety and reduce maintenance time
- Single layer cooling compartment-Easy to clean



<sup>\*</sup> Photo may include optional equipment.

## **OUTSTANDING PERFORMANCE**





### Advanced performance system

- Adjustable flow control system (AFCS) optimizes the travel power of the machine when traveling on the highway.
- Smooth Ride Control (SRC) system reduced cycle times, higher productivity and better fuel efficiency

#### **Best in Segment Productivity**

- 15% higher breakout force.
- 4% larger bucket capacity.
- 10% more traction.
- Highest bucket reach with various loader and backhoe attachments.

#### Four Wheel Drive Standard

Four wheel drive system improves mobility and loader performance in ground conditions underfoot and can be activated on-the-go.

#### 4-Wheel Steering System Option

Designed to offer greater vehicle maneuverability while parking at low speeds and on tight off-road trails. The system increases low-speed agility and allows the driver to achieve a tighter turn circle or narrow spaces. Also designed to help improve vehicle stability when towing a trailer.

#### Smooth Ride Control System Option

Ride control system is available for improved operator comfort. Ride control reduces bounce and shock when traveling on the job site. The system is designed to minimize loader lift bounce when traveling over rough terrain to reduce material spillage and improve travel with a full bucket. The operator can engage ride control by flipping the switch on the side console. Ride control improves job site productivity, operator comfort and overall safety. Smooth Ride Control (SRC) system reduced cycle times, higher productivity and better fuel efficiency.

#### **Powerful and Reliable Engine**

- PERKINS 1104D-44TA engine with EU NRMM 97/68/EC, EURO III A
- KIRLOSKAR 4R 1040Twith EU STAGE II regulation built for power, reliability and efficiency.

#### **Working Lamp**

4x4 LED Working lamp as standard provides excellent view in any operating environment

#### **Top level of Bucket Capacity**

1.26m3 bucket for loader, 0.22m3 bucket for backhoe as standard offer 5-10% larger cpapacity than any competitors.

## ENHANCED HYDRAULIC MECHANISM

Innovative hydraulic technologies make the HB640 series fast, smooth and easy to control.

#### Carlisle Brake U.S.A



#### Hydro control / Walvoil (Italy) Valve



#### World Famous Carraro (Italy) Axle



#### **Feature**

96 HP Proven Kirloskar Engine 4R1040T, Euro II, 100HP Perkins Engine 1104D-44TA EU IIIA.

#### Advantage

Most reliable, powerful.

#### Benefit

Fuel efficient engine in off highway application.





**World famous** 

#### Single Layer Radiator Cooler (Germany) SBS - Side by Side



#### World Famous Carraro(Italy) Transmission





#### **Feature**

Engine has wet liners in Cylinders.

#### Advantage

Easy & cheaper to repair.

#### Benefit

Very Low Repair cost vis a vis JCB where engine has to be replace as can not be repaired.

#### **Ergonomic design for operators**

- Great vision with curved windshield.
- Plenty of legroom minimizes fatigue and allows the operator to work un-interrupted for long hours.
- A fully adjustable seat (Air-suspension) combined with ergonomically positioned controls.

#### **Excellent Visibility**

One-piece rounded front glass and large windows around the cab provide the operator with a full 360 degree range of visibility. Wide upper front window good visibility to cutting edge of bucket for loader. Sloped and narrow bonnet is designed for easy and safe work with the front loader.

#### Climate Control System Option

A full heating, defrosting system keeps the operator comfortable with 15 air vents placed throughout the cab. Air conditioning system as an option well placed air vents within front, back and sides of seat provides operator with optimum temperature.



#### **Power Shift Transmission**

Standard power shift transmission provides fast, easy and efficient operation. A convenient gear/shift selector allows for gear selection and forward, neutral or reverse direction.



#### **Brakes**

Oil immersed wet disc brakes are individually actuated by two separated brake pedals. Brakes are self adjusting for improved service life.



#### Side Console with Full Instrumentation

In the HB640 series cab, all gauges switches and levers are conveniently located for easy access. Whether in the loader position or the backhoe position, the operator can easily reach all controls.



#### **Operator Comfort**

HB640 series backhoe loaders are designed for the operator's comfort. The steering column and backhoe control tower can be tilted and adjusted for convenient operation. Deluxe, joystick levers, conveniently located switches and an AM/FM radio with mp3 input provide the pleasant operation. Hinge-type side windows can be opened for improved ventilation. Additionally, front and rear windshield wipers are equipped for excellent visibility during bad weather conditions.













## **COMFORTABLE OPERATION**

Hyundai's deluxe design cabin maximizes operator comfort. World class cabin with great visibility, comfort, convenient and safety features.



#### **Quick and Easy Maintenance**

Tilt-up hood provides easy access to the engine compartment.
The one-piece hood tilts away for easy ground access to all critical services and grease points for maintenance and operator safety.

#### **Integrated Safety Bar**

An integrated safety bar and locking pin are an integral part of the bucket cylinder, and guarantee operator safety when servicing.



#### Visible Hydraulic Oil Sight gauge

The hydraulic oil sight guage is installed on the side of the hydraulic tank for the convenient inspection from on ground level.



### **SPECIFICATIONS**

	SPECIFICAT	IONS	UNIT	HB64 (TIE	0 S/C :R3)	HB640 S 4WS(TIER3)	HB640 S/C (TIER2)	HB640 S/C (TIER3)
	ENGINE I	HORSE POWER	HP		100		96	90
	OPERATING STANDARD		kgf	8,500		8,870	8,5	500
	WEIGHT(SS)	MAXIMUM	kgf	9,240		9,610		240
GENERAL	OPERATING	STANDARD	kgf	7,7		,	7,780	
	WEIGHT(CP) MAXIMUM		kgf	8,520 NA		8,520		
	DIGGING DEPTH(SS)		mm	STD DIPPER = 4,770 TELESCOPIC D				
	DIGGING DEPTH(CP)		mm		STD DIPPER =			
			-			4,020 TELESCOFICE		SKAR
ENGINE	MAKE MODEL				PERKINS			1
			-		1104D-44TA		4R1040T	4R1040TA1
	POWER	GROSS	HP/RPM		100/2,200		96/2,200	90/2,200
		NET	HP/RPM		86.5/2,200		86/2,200	80/2,200
ENGINE	TORQUE	GROSS	Nm/RPM		410/1,400		375/1,400	350/1,400
	NO.OF	CYLINDERS	EA	4				
	DISPLACEMENT		liter	4.4		4.	16	
	ASI	PIRATION	_	Turbocharged +Intercooled		Turbocharged	Turbocharged	
			4140				+Intercooled	
ELECTRICALS		ERNATOR	AMP		120		9	0
	В	ATTERY	V-CCA			12V X 1050CCA		
DRIVE LINE		4WD	-		I	STD		
	CEAR	CHIET TYPE		Automatic with manual	Manual synchro	Automatic with	Manual synchro	Manual synchro
	GEAR	SHIFT TYPE	-	manual power shift option	shift option	manual power shift option	shift option	shift option
TM				Forward Max:38.8	Forward Max:41	Forward Max:36	Forward Max:40	Forward Max:40
	TRAV	EL SPEEDS	km/h	Reverse Max:20.3	Reverse Max:20.3	Reverse Max:18	Reverse Max:20.3	Reverse Max:20.3
	11044	LE OI LEDO	Killyll	(3rd Gear	(3rd Gear	(3rd Gear	(3rd Gear	(3rd Gear
				recommended)	recommended)	recommended) Four wheel power	recommended)	recommended)
						steering		
	QTF	ER TYPE		Two whool power steering with 3 modes		Two wheel power steering		
	SILLKTIFL			TWO WHEET PE	(Circular		The missiperior sceening	ower secening
				mode and Two wheel steer mode)				
		FRONT(4WD)	_	Normal				
AXLE		FRONT						
		OSCILLATION ANGLE	Deg	±7				
	DIFFERENTIAL LOCK	REAR -		Hydraulically				
				Hydraulically actuated controlled by actuated		Hydraulically actu	ated controlled by	
			-	foot operated s	witch -Optional	controlled by foot operated	foot operated switch -Optional	
				switch -standard				
	EDONT			12.5/80x18-12PR 16.9x28-12PR		12.5/80x18-12PR		
TIRE	FRONT 4WD			Optional:400x70_20-16PR		Optional:400x70_20-16PR		
			-	16.9x28-12PR Optional:19.5LX24-12PR 16.9x28-12PR		16.9x28-12PR Optional:19.5LX24-12PR		
	c	ERVICE	_	орсюнат. 15.	JEAZ4 IZFR	Wot discs	орцопа. 15.	JLAZ4 IZFR
BRAKE		ARKING			1.4	Wet discs	nd.	
	P	AKKING	-	12.5/80x18-12PR,	400x70 20-16PR,	/et discs-Hand operate 16.9x28-12PR	12.5/80x18-12PR,	400x70 20-16PR
T. 15	TYRES (	COMBINATION	-	16.9x28-12PR	16.9x28-12PR	16.9x28-12PR 16.9x28-12PR	12.5/80X18-12PR, 16.9x28-12PR	16.9x28-12PR
TURNING DIAMETER	UNBRAKED (	OUTSIDE OF TIRE)	mm	9,150	9,530	11,300	9,150	9,530
DIMIVIL I EK		R CLEARNCE	mm	11,800	12,000	13,100	11,800	12,000
			-	11,000	12,000	,	11,000	12,000
	SYSTEM TYPE			Open Center				
HYD.SYSTEM	MAIN PUMP TYPE		-	Gear pump				
TITD.OTOTEW	PUMF	CAPACITY	LPM			145 @2,200 rpm		
	MAIN REL	EIF PRESSURE	kg cm^2(bar)	234.5(230)				
	FUEL TANK		liter	145				
	COOLING SYSTEM		liter	15				
				10 TO 12		12		
	ENGINE OIL WITH FILTER		liter	16(Automatic with	10 TO 12 12 TO 13	16(Automatic with	1	
		4WD TOTAL	liter	manual power shift	(manual synchro	manual power shift	12 TO 13(manual sv	nchro shift option)
SERVICE		SYSTEM		option)	shift option)	option)		
REFILL	4WD FRONT	DIFFERENTIAL	liter	6	.5	8.5	6	.5
CAPA.	AXLE	HUB REDUCERS	liter	1.25 ea	ch side	1.35 each side	1.25 ea	ich side
		DIFFERENTIAL	liter			14		
	REAR AXLE HUB REDUCERS		liter	1.5 each side				
-	HYD.SYSTEM TOTAL			1.5 each side				
			liter					
	HYD.TANK WITH FILTER		liter			100(Refill capacity)		

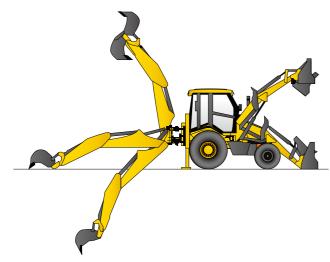
### **EXCAVATOR & LOADER PREFORMANCE**

Unit: mm (ft·in)

	BACKHOE LOADER SIDE SHIFT		BACKHOE LOADER CENTER PIVOT	
	HB640			
	Retraction STD	Telescopic Dipper (option)	Retraction STD	Telescopic Dipper
	Meters	Meters		(option)
STANDARD GP BUCKET CAPACITY	0.22 m <sup>3</sup>			
MAXIMUM DIG DEPTH	4.77 m	5.83 m	4.82 m	5.93 m
REACH GROUND LEVEL TO REAR WHEEL CENTRE	6.77 m	7.8 m	6.77 m	7.8 m
REACH GROUND LEVEL TO SLEW CENTRE	5.47 m	6.5 m	5.47 m	6.5 m
REACH AT FULL HEIGHT TO SLEW CENTRE	2.82 m	3.61 m	2.82 m	3.61 m
STABILIZER SPREED			3.87 m	3.87 m
MAXIMUM WORKING HEIGHT	5.98 m	6.89 m	6.17 m	7.04 m
MAXIMUM LOAD OVER HEIGHT	4.19 m	5.19 m	4.48 m	5.36 m
REACH OVER THE SIDE FROM STABILIZER			3.6	62 m
GROUND CLEARANCE			360	) mm
BUCKET ROTATION- POWER	201° SQUARE CUT BUCKET			
BUCKET TEAR OUT FORCE	6,320 Kgf			
DIPPER TEAR OUT FORCE	3,580 Kgf			
LIFT CAPACITY TO BUCKET PIVOT AT FULL REACH (WITHOUT BUCKET FITTED)	1,642 Kgs			

	STANDARD BUCKET WITHOUT LINK BRACKET	6 IN 1 BUCKET WITHOUT LINK BRACKET	
	Meters	Meters	
BUCKET CAPACITY	1.26 m <sup>3</sup>	1.1 m³	
DUMP HEIGHT	2.96 m	2.96 m	
LOAD OVER HEIGHT	3.39 m	3.39 m	
PIN HEIGHT	3.61 m	3.61 m	
PIN FORWARD REACH	0.42 m	0.54 m	
REACH AT GROUND	1.47 m	1.75 m	
MAX.REACH AT FULL HEIGHT	1.28 m	1.44 m	
REACH AT FULL HEIGHT BKT DUMPED	0.89 m	1.17 m	
BELOW GROUND LEVEL DIG DEPTH	0.1 m	0.16 m	
ROLL BACK AT GROUND	50°	50°	
DUMP ANGLE	45°	45°	
WIDTH OVER BUCKET	2.35 m	2.43 m	
SHOVEL BREAK OUT FORCE	8,793 kgf	8,793 kgf	
LOADER ARM BREAK-OUT FORCE	5,642 kgf	5,642 kgf	
PAY LOAD	2,000 kgf	2,000 kgf	
LIFTING CAPACITY AT LOADER ARM HOOK PIN (Additional Information-If required we can provide)	3,600 kgf	3,600 kgf	

### **DIMENSIONS**



	HB640	HB640 4WS	
	Meters	Meters	
OVERALL LENGTH	6.04 m	6.04 m	
WHEELBASE	2.22 m	2.22 m	
KING POST TRAVEL	1.18 m	1.18 m	
MINIMUM GROUND CLEARANCE	0.48 m	0.48 m	
SLEW GROUND CLEARANCE	0.65 m	0.65 m	
HEIGHT TO TOP OF BONNET	1.99 m	1.99 m	
HEIGHT TO TOP OF CABIN	2.94 m	2.96 m	
OVERALL HEIGHT	3.71 m	3.71 m	
TRACK WIDTH - REAR	1.69 m	1.8 m	
TRACK WIDTH - FRONT	1.93 m	1.93 m	
WIDTH OVER BUCKET	2.43 m	2.43 m	
SIDE REACH TO CENTRE LINE OF MACHINE	6.04 m	6.04 m	
TYRE OUTER TO OUTER	2.24 m	2.37 m	

### **BACKHOE ATTACHMENTS**

PRODUCT	HB640 BUCKET			
DESCRIPTION	SPECIFICATION			
DESCRIPTION	Width(w)(mm)	Volume(m³)	No. of Teeth	
22_BACHOE_BUCKET	620	0.22	4	
26_BACHOE_BUCKET	758	0.26	5	
TRENCH_BACKHOE_BUCKET	390	0.1	3	

### **CAPACITIES**

BL 85	
Oill flow, I/min(gpm)	60-90 (15.85-23.80)
Impact rate, bpm	530-1,000
Operating pressure, bar(psi)	120-150 (1,450-2,175)
Back pressure acceptance, bar(psi)	30 (435)
Maximum hydraulic input power, kw	23
Piston accumulator gas pressure(min, at operating temperature 60-70°C and maximum hydraulic input power), bar(psi)	12 (174)
Piston accumulator gas pressure(max(optimum), at operating temperature 60-70°C), bar(psi)	16.5 (239)
Pressure relief valve on carrier, bar(psi)	180 (2,610)

### **OPTIONS LIST**

OPTION AIR SUSPENSION SEAT	With adjustable headrest and armrest , short back rest with el	lectrical air suspension			
3 SIDE OPEN CABIN	Canopy and front windshield with wiper. 4 Front+4 Rear working lamps 3 side open ROPS / FOPS cabin.				
	ROPS / FOPS meets ISO 3,471 and ISO 3,449				
SMOOTH RIDE CONTROL SYSTEM (SRS)	Operating range from 350-450 mm to 1,550-1,650 mm				
COLD START KIT (ONLY FOR PERKINS ENGINE)	WITHOUT GLOW PLUGS-(-10°C WITH 15W40 OIL VISCOSITY) WITH GLOW PLUGS-(-20°C WITH 10W OIL VISCOSITY)				
SIDE OPEN ENGINE BONNET	Engine bonnet opened				
CLOSED ENGINE BONNET	Without insulation				
CLOSED ENGINE BONNET WITH INSULATION	With polyethylene foam insulation. For very cold countries (some CIS countries) where ambient temperature remains less than - 5 for good period of year.				
CLOSED ENGINE BONNET WITH PERFORATED BONNET	With perforated meshed screen. For warmer condition markets and better appearance.				
DIFFERENTIAL LOCK PROVISION IN AXLE	Hydraulically actuated controlled by foot operated switch				
PILOT OPERATED BACKHOE JOYSTICKS					
MECHANICAL OPERATED BACKHOE JOYSTICKS					
BACKHOE OPERATION MECHANISM ISO +	One can abase sither of the 2 entires for book has energing	Availaba in pilat in etiak as wall as			
BACKHOE OPERATION MECHANISM SAE +	One can choose either of the 3 options for backhoe operation. mechanical joystick.	Availabe II I pilot Joys LICK as Well as			
BACKHOE OPERATION MECHANISM SAE CROSS					
FRONT WHEEL FENDERS (FRONT MUDGUARD)					
PRE CLEANER-Ejective	Protection from extreme dusty environment, used in middle e dusty climate	ast where machines operate in extreme			
Front Tyre-400x70_20 (Suitable axle)	Ply rating 16 PR				
Rear tyre-16.9x28-12PR	Ply rating 12 PR				
OIL SUITABLE FOR SUB ZERO TEMPERATURES	HVLP 32 GRADE (-40°C TO 60°C)				
BEACON LIGHT					
	758 MM BACKHOE BUCKET WITH 5 NUMBERS OF TEETH-0.26 m <sup>3</sup>	WIDTH-758 mm VOLUME-0.26 m³ NO OF TEETH-5			
	390 MM BACKHOE TRENCH BUCKET WITH 3 NUMBERS OF TEETH-0.1 m <sup>3</sup>	WIDTH-390 mm VOLUME-0.1 m³ NO OF TEETH-3			
BACKHOE BUCKET	EXTENDED TELESCOPIC DIPPER	Telescopic cylinder with an extended length of 1.1 meters			
	ROCK BREAKER ATTACHMENT PROVISION - BREAKER LINE (RBA)				
	BULL ROCK BREAKER (BL85) EPIROC MAKE	Equivalent to Epiroc model EC 81 / LB 400 Impact rate=530-1,000 bpm Oil flow=60-90 lpm			
	MECHANICAL QUICK HITCH ATTACHMENT (FOR BACKHOE)	Mechanically operated			
	6 IN 1 LOADER BUCKET	WIDTH-2,430 mm VOLUME-1.1 m <sup>3</sup> NO OF TEETH-8			
	FORKLIFT	Lift capacity:1,200 Kg			
	ROLL OVER FORKS ON GENERAL PURPOSE BUCKET	Lift capacity: 1,800 kg at a lifting height of 1.5 meters			
	6 IN 1 LOADER BUCKET WITH ROLL OVER FORKS	WIDTH-2,430 mm VOLUME-1.1 m <sup>3</sup> NO OF TEETH-8 With roll over fork			
LOADER BUCKET	GRABBING FORK BUCKET	WIDTH-2,350 mm VOLUME-1.3 m <sup>3</sup> NO OF TEETH-8			
	LOG FORK BUCKET	Fork max opening-1,120 mm			
	SUGAR CANE GRABBER	Grabber max opening-1,400 mm			
	HDHV (HIGH DUMP HIGH VOLUME BKT)	WIDTH-2,350 mm VOLUME-2.1 m³ NO OF TEETH-8			
	QUICK HITCH ATTACHMENT (BQRSL)	Mechanically operated			
	CONCRETE MIXER ATTACHEMENT	Bucket capacity-600 litres			

\*Disclaimer: Certain functions may not be available depending on regional regulations and machine specifications. For more information, please contact your authorized Hyundai dealer.