

# HIGH ON PERFORMANCE, HIGH ON SAVINGS.

Engine Power: 76 hp (57 kW) | Bucket Capacity: 0.24 - 0.32 cu.m | Operating Weight: 8050 kg



## The New JCB 81 Excavator.

The NEW JCB 81 is engineered for performance and savings. It delivers high fuel efficiency with operational modes for productivity and economy. The robust design with high-quality aggregates assure the reliability and durability of this machine. The advanced telematics technology JCB LiveLink. now, helps you stay connected with your machine. The alerts and reminders increase your machine's uptime. This is the NEW JCB 81 machine with an optimised operating weight that delivers fuel efficiency, excellent operator comfort, 24x7 connectivity for high success and performance.







EXCELLENT FUEL EFFICIENCY



PERFORMANCE & PRODUCTIVITY RE-DEFINED





STAY CONNECTED 24X7 LIVELINK



LOW MAINTENANCE COST



EXCELLENT OPERATOR COMFORT

# RELIABLE AND DURABLE

Rugged upper frame provides durability in tough conditions.



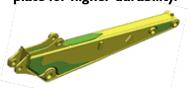
X-type construction of lower frame is for higher strength.



Reinforced boom: Sturdy construction with 3 box sections, strengthened boom base and boom top area.



Strengthened arm:
Reinforced boom end joint,
bucket mounting area & top
plate for higher durability.



IP69 dust & waterproof connectors for electrical harness, for high reliability of electrical system.



Proven hydraulic components and filtration system for longer life







# PERFORMANCE & PRODUCTIVITY REDEFINED

JCB 81 OFFERS YOU CLASS LEADING PRODUCTIVITY.

Excellent bucket and dipper tear-out force results in high output in hard strata.



Travel speed: JCB 81 is equipped with twin travel speeds for varying jobs.



**Tear-out Forces** 

Bucket 5755 kgf

Dipper 4 I 34 kgf





# **EXCELLENT FUEL EFFICIENCY**

OFFERS EXCELLENT FUEL EFFICIENCY TO REDUCE YOUR FUEL COST.

New JCB 81 offers excellent fuel economy with a 10%\* reduction in fuel consumption.





Auto idler for fuel saving, when machine is not at work.

#### Choice of

## Productivity (P) & Economy (E) modes :

**E**: Economy mode - For fuel saving with optimum productivity.

**P**: Productivity mode- Increased productivity through pump flow when higher output is required.



\*T&C Apply

# LOW MAINTENANCE COST

NOW MAINTENANCE HAS BECOME EASIER AND FASTER WITH THE NEW JCB 81.

Class-leading maintenance interval			
Service intervals on bucket operation			
Engine oil, oil filter and fuel filters	Every 500 hours		
Hydraulic main filter	Every 1,000 hours		
Hydraulic oil	Every <b>5,000</b> hours		



Special filtration system extends hydraulic oil life up to 5000 hrs, which reduces the overall maintenance costs.



Radial seal-type air filter elements provide secure and error-free sealing. Filter elements are covered with wire mesh to avoid damage to filter paper during storage, handling and cleaning.



JCB 81 is equipped with robust filtration system having 3 nos. fuel filters and I no. water separator for high life of fuel injection system.

# **ULTIMATE EASE OF**





Compact and the easy-to-handle bonnet is assisted by a gas strut that helps in easy opening and closing. It makes periodic maintenance easy and effortless.

Easy to access periodic checkpoints.

Side by side radiator & cooler for ease of maintenance.

Wire mesh provided to avoid clogging of radiator & oil cooler.

Fuses & relays are located inside the cabin and are easy to access.

Closed type grease bath system for slew gear.



Remote-mounted engine oil filter to allow easy access.

# YOUR SAFETY OUR PRIORITY

JCB 81 OFFERS SAFE WORKING ENVIRONMENT.

### **Equipment safety system:**

Audio-visual alerts provided in instrument panel for the following purpose:

## Air-filter blockage



#### Low coolant level



## **Machine safety:**

Servo isolator lever, over-ride system & swing-lock system provide additional safety against unintended machine operations.



#### Damage protection: Belly guard at lower frame & undercovers for upper frame.



## High visibility: Single right-hand glass

and low bonnet height for high visibility leads to safe operation.



## **Electrical safety:** Battery cover provided.



# **STAY CONNECTED 24X7**

NOW BE ASSURED OF YOUR JCB EXCAVATOR'S SERVICE. OPERATION AND SECURITY WITH THE ADVANCED TELEMATICS SYSTEM CALLED LIVELINK.



# **Security**



Alerts in case the machine is used outside the set hours



Geofencing alerts

# Reports & alerts



Customised reports on machine performance



Safety

Critical health alerts



Easier fleet management

Periodic reports

## **Operation & performance** monitoring



Idle time monitoring



Working hour monitoring

# Proactive maintenance & usage



Maintenance reminders



# **EXCELLENT OPERATOR COMFORT**

# A COMFORTABLE OPERATOR IS A PRODUCTIVE OPERATOR



Large cab with pressed steel construction offers increased internal space and enhanced overall visibility.







High visibility for working at diferent heights through glass provided in front of the cab.



Easy to open roof hatch assisted helps to keep the cab well ventilated.



Cabin is mounted on six viscous mounts to absorb vibrations.



Rubber coated track pedal and foot rests for operator comfort. Front lower glass can be removed for ventilation.

# EXTENDED CARE

# GIVE YOUR MACHINE EXTENDED WARRANTY AND CARE.

- JCB Careplus is an extended warranty programme that comes into effect after the machine standard warranty expires.
- JCB Careplus can be purchased within the 1<sup>st</sup> year from the sale of the machine.
- The programme offers you peace of mind and saves your maintenance cost even after your machine standard warranty expires.





## **BENEFITS OF JCB CAREPLUS**



No limits on number of claims



Preventive maintenance service\*



Nationwide coverage\*



JCB skilled manpower support



Maximum productivity



Maximum uptime



Maximum performance

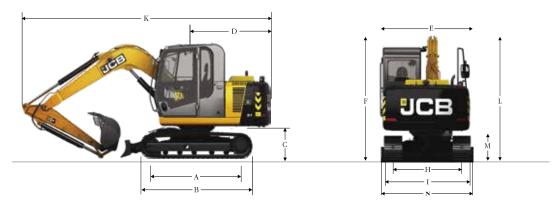


Breakdown cost protection



Better resale value

\*T&C Apply



STATIC DIMENSIONS				
	Track Shoe Width	450 mm	600 mm	
Α	Track length on ground	2.24 m	2.24 m	
В	Undercarriage overall length	2.84 m	2.84 m	
Н	Track gauge	1.70 m	1.70 m	
1	Width over tracks	2.15 m	2.30 m	
К	Transport with mono boom and 2.4 m dipper*	6.23 m	6.23 m	
L	Transport height with mono boom and 2.4 m dipper*	2.77 m	2.77 m	
С	Counterweight clearance	775 mm	775 mm	
D	Tail swing radius	I.84 m	1.84 m	
Е	Width of superstructure*	2.22 m	2.22 m	
F	Height over cab	2.72 m	2.72 m	
N	Dozer blade width (back fill)	2.30 m	2.30 m	
G	Ground clearance	365 mm	365 mm	
M Track height		660 mm	660 mm	
	Dozer blade (optional)			
	Max height (above ground)	366 mm	366 mm	
	Dig depth ( below ground)	243 mm	243 mm	
	Approach angle	26°	26°	
	Width	2.30 m	2.30 m	
	Height	397 mm	397 mm	
Reach in front of tracks		480 mm	480 mm	

WORKING RANGE: JCB 81				
Boom length:		3.7 m		
Dipper length:		I.74 m ( Standard)		
Maximum digging reach	m	6.45		
Maximum digging reach (on ground)	m	6.32		
Maximum digging depth	m	4.08		
Maximum digging height	m	7.1		
Maximum dumping height	m	5.40		
Maximum vertical wall-cut depth	m	3.68		
Minimum swing radius	m	1.84		
Dipper tear-out	kgf	4.13		
Bucket tear out - all machines	kgf	5.76		
Bucket rotation	deg.	184°		

	ENGINE		
Model	Kirloskar 4R 1040 NA		
Gross power	76 hp at 2200 RPM (SAEJ 1995)		
Alternator	85A		

#### TRACK DRIVE

Gradeability : 70% (35 deg.) continuous Travel Speed : High - 5.1 km/hr, Low - 3.1 km/hr

Tractive efforts : 55.1 kN (5600 kgf)

#### **UNDERCARRIAGE**

Track type Sealed and greased Track adjustment Grease cylinder type. Track idler

Sealed and lubricated, with spring enhanced recoil.

Track shoe : 450 mm / 600 mm Rollers and shoes

(each side)

Upper rollers Lower rollers : 5 : 39 Track shoes

SERVICE CAPACITIES		
Fuel tank	164 L	
Engine coolant	23 L	
Engine oil	I4 L	
Track reduction gear (each side)	1.7 L	
Hydraulic system	92 L	
Hydraulic tank	55 L	
Hydraulic tank	73.0 L	

## **HYDRAULIC SYSTEM**

## **Power modes**

**Pumps** 

Variable displacement axial Main pumps

piston type.

Maximum flow : 2 x 70.3 lpm (main).

Servo pump Gear type maximum flow.

Gear type, maximum flow Dozer 21.5 lpm

## Control valve

Relief valve settings

Boom / Arm / 284 bar Bucket

Swing circuit : 225 bar Travel circuit 284 bar

#### **FILTRATION SYSTEM**

In-tank 105 microns, suction strainer. Main return line 10 microns, fibre form element. Pilot line : 10 microns, paper element.

Hydraulic hammer 10 microns reinforced microform

(optional) return element

### **SWING SYSTEM**

Swing motor Axial piston type.

Swing brake Hydraulic braking assisted by

spring applied disc-type parking

Final drive : Planetary reduction.

Swing gear Large diameter, internally toothed

fully sealed grease bath lubricated.

: 12.5 rpm Swing speed

EXCAVATOR BUCKET				
Bucket size	Capacity	Weight		
Max. width toe plate	Sae heaped			
800 mm	0.24 cu.m	318 kg		
950 mm	0.32 cu.m	343 kg		

### **STANDARD EQUIPMENT**

Dozer blade.

FM radio.

USB media player with speakers.

Cab interior light.

HSP pressure test points.

Rock-breaker pipework mounting brackets.

One work light each on boom & tool box.

Upper structure under covers.

Tool kit.

Undercarriage belly guarding.

0.32 cu.m general purpose bucket.

Additional work lights on cab and counterweight.

Laminated glass on front and right hand side of cabin.

LiveLink.

#### **OPTIONAL EQUIPMENT**

Ripper tooth

0.24 cu.m bucket

Rock-breaker (HM390)

Rock-breaker circuit

First aid kit

Fire extinguisher

Air-conditioned cabin

Cab grill (front & top)

Short boom & arm

450mm / 600 mm track shoes