#### **BIIOC - BIISC - BACKHOE LOADERS**



# YOUR PERFORMING PARTNER



# NEW C SERIES, IN-BUILT VERSATILITY

The new C series backhoe loaders from New Holland represent a huge step forward in operator comfort and productivity. The new cab design delivers an enhanced operator experience and increased productivity, with 10% more space and vastly improved clearance when sniveling the seat for backhoe operation, new rear side windows and hugely improved in-cab storage capacity. New Holland backhoe loaders are your versatile choice for loading, grading, grabbing, lifting, excavating, digging, planting, post hole boring and, much more. You have ample choice of loader and backhoe specifications.

The 4.5 litre turbocharged engines for the new machines are provided by FPT Industrial, a world-wide leader in the design, production and sale of powertrains for industrial applications.

The new C Series will be an asset for the many operations needing a loader with its excellent versatility. It is ideal for a variety of applications other than moving bulk materials, including grading and levelling, grabbing heavy objects such as tree trunks or concrete pillars, and has the traction and power to move heavy materials and objects.





New in-cab cool box Mechanical Powershuttle or Automatic PowerShift™ transmission New F-N-R switch on the loader multi function lever

# WELCOME ABOARD, COMFORT GUARANTEED

The all new class leading C series cab gives you more: more space, more storage, more glass area, more comfort and a host of new features. The cab is now wider, making it easier to turn the seat when switching from front loader work to backhoe use. New rear side windows provide better visibility while the redesigned right side console improves ergonomy and control layout, regardless of what direction you are working in. Storage capacity has been significantly increased with the addition of two lockable compartments, two bottle holders, four open trays and a ventilated cooling box. Operator convenience is improved thanks to the two USB ports for charging mobile devices, Bluetooth radio and mobile phone holder. In-cab noise levels have been reduced by further enhancing operator comfort.

A high grip floor covering comes as standard to help prevent the operator slipping when entering with muddy footwear. Large retractable sunshades, cup holders, glove box and a deluxe pneumatic heated seat are included and to top it off, the engine exhaust pipe is located to the right side of the cab to provide a clear view of the loader arm.



- Improved clearance and legroom when transitioning to operate the backhoe
- A choice of entry level mechanical and deluxe heated pneumatic suspension seats are available
- · Low in-cab noise level
- · Good visibility is a key design priority: C Series backhoe loaders benefit from extremely slim cab pillars, front and rear



- · Key controls mounted on the side allow operation from both forward and backhoe seat positions
- The dashboard is easy to read with the seat in either its forward or reverse position
- · Optional immobiliser system protects against theft and unauthorised use



- Single multifunction proportional control lever for all loader controls
- 4in1 or 6in1 bucket opening, differential lock and transmission de-clutch functions are also activated from the lever
- New F-N-R switch on the multifunction lever for easy direction changes



- Backhoe joystick towers adjust in all directions for the most comfortable position
- New rear side windows in addition to the slim cab pillars allow better visibility when using the backhoe



- Powerful heating and ventilation with standard air conditioning ensures operator comfort throughout the day
- Repositioned ventilation switches are easily accessible regardless of working position





An abundance of in-cab storage
New speedometer option on the steering wheel console



- New USB port
- Bluetooth radio and phone holder
- Up-and-over rear window, light and easy to open and close

## POWERSHIFT™ OR POWERSHUTTLE, YOU DECIDE

New Holland offers its backhoe loaders with two- or four-wheel drive and a choice of Powershuttle forward / reverse mechanical transmission or automatic PowerShift<sup>™</sup>. The all-wheel steer B115C has equal size front and rear wheels with selectable front, all-wheel and crab steer modes.





#### The right front axle for the job

- The heavy duty 4WD front axle has an open differential
- A tight turn radius can be maintained in all conditions



#### The right rear axle for the job

• The rear axle on all two-wheel steer models is fitted with a fully locking rear differential, engaged via a button on the loader joystick



#### Mechanical four-speed Powershuttle

- Floor mounted gear lever with steering column mounted electro-hydraulic forward / reverse shuttle
- Four gears with transmission de-clutch button incorporated in the gear lever
- Affordable, dependable and easy to use
- Ideal choice where the backhoe will see more use than the frontloader



#### Automatic four-speed PowerShift™

- Steering column mounted lever for shuttle and speed selection
- Fully modulated gear shifting with speed matching F-N-R switch on the loader multifunction lever
- Ease of use matched to low maintenance requirements
- · Ideal transmission choice for extensive front loader duties
- Loader joystick fitted with transmission de-clutch button to divert full power to hydraulics as required
- · Selectable two or four-wheel drive



#### Four-wheel steer BII5C

New Holland B115C model can be operated in one of three steering modes:

- · Conventional front-wheel steering is ideal for normal loading and transport applications
- · Four-wheel steer delivers excellent manoeuvrability with no impact on stability
- Crab steer is ideal for working close to a trench or obstacle and can be useful when working over sensitive terrain to reduce traffic
- The four-wheel steer B115C delivers excellent traction with limited slip differentials in both the front and rear axles. Power is automatically
  diverted to all wheels in adverse conditions with no need for any operator input
- The self-adjusting oil immersed immersed disc brakes are designed to deliver a dependable performance. Mounted within the reduction hubs, the brakes can be easily serviced with no need to strip the axle

# VERSATILITY AT YOUR SERVICE



#### Front loader - Choose SLA Straight Arm or TC Tool Carrier loader designs

#### SLA Straight Loader Arm features:

- Hydraulic auto self-levelling
- Higher lift capacity
- Greater lift height

#### TC Tool Carrier loader arm features:

- Mechanical parallel lift and lower
- Greater reach than straight arm
- Ideal for pallet and loading duties



#### **Common standard loader features**

- Auto-glide loader suspension
  - automatically activates above/below 3 preset speeds
  - improves material retention over uneven terrain
  - enables faster load cycle times
  - higher travel speeds for reduced journey times
- Return to dig and float modes
- · Choice of standard, 4in1 or 6in1 buckets
- · All buckets have bolt-on teeth for easy renewal



#### Versatile bucket options

- Versatile 4in I bucket is suitable for such as dozing and grading, bulk materials handling and can work as a grab
- The 6in I design adds adjustable forks for pallet work, lifting open loads and working with a strop









#### Backhoe

#### Standard features include:

- · Curved arm design for easier loading over trailer sides and obstacles
- · Long life pivots with ground level greasing points
- · Wide pad stabilisers with adjustable footing
- Powerful bucket and dipper breakout for optimum performance

#### Key backhoe specification choices include:

- Fixed or extendable dipper arm option
- Mechanical or hydraulic side shift option
- Direct fit or quick coupler bucket choice
- Object handling kit available to allow handling of suspended items

#### **Mechanical controls**

- Conventional mechanical controls for the backhoe provide good feedback and response from the hydraulics
- Stabilizer controls are now located right next to the backhoe control levers, improving ergonomics

#### **Pilot controls**

- With full proportional control, pilot backhoe control joysticks are fully adjustable
- Selectable ISO or SAE operating patterns
- New joystick rocker switch to control the dipper extension

#### Hydraulic side shift

- Hydraulic side shift allows precise backhoe positioning and enables the operator to optimise bucket visibility when excavating a trench or working alongside an obstacle
- Hydraulic side shift in combination with the rubber stabilizer pads is the ideal solution to reduce ground damage

## HYDRAULICS TO MEET EVERY DEMAND

New Holland backhoe loaders are offered with a choice of hydraulic pump designs to match the precise requirements of end users. In addition, an auxiliary hydraulic circuit is available for powering attachments such as hydraulic breakers and soil augers. Two hydraulic pump designs are offered:

#### Twin gear pump

- Simple
- Constant flow
- Fast warm up
- Straightforward service and maintenance
- · For general use. Suits applications with limited roading

#### Variable displacement pump

- Only active when there is a demand for oil
- Flow rate proportional to demand
- Reduces fuel consumption
- Reduced oil temperature due to flow on demand
- Ideal for intensive backhoe operation and frequent roading



- A variable displacement hydraulic pump only delivers flow on demand, saving fuel when roading and in applications such as dozing and grading
- The optional auxiliary hydraulic circuit is ideally suited to working soil augers, large grabs and hydraulic breakers

# POWERFUL ECONOMY AND EASY MAINTENANCE

#### **FPT Multijet Engine**

The FPT engine delivers a big performance in a small package with the lowest maintenance cost in the market:

- The air intake system with centrifugal pre-filter reduces the cleaning intervals
- High turbulence piston and air intake manifold
- High pressure multi-injection common rail for a perfect air-fuel mix and greater burning efficiency
- Mechanical Injection Pump for 580V ensures high power combined with an easy to mantain and serve injection system
- Viscous fan: no power is wasted with its low cooling demands

#### FPT: a leader in engine technologies.

- Fiat invented the «Common Rail» technology in the 80s
- Fiat Power Train produces over 600.000 industrial engines per year

• Our engines are used not only in earthmoving equipment but also in trucks, agricultural equipment, marine and military applications.

#### Chassis

All backhoe models benefit from a full frame chassis, its exceptional strength diverting all stress through the robust frame with no load on the engine or transmission.

- Robot welded full length frame chassis
- No stress on engine or transmission
- Plate reinforced stress points
- Cast backhoe slider interface
- Open design to facilitate maintenance





A key to equipment performance and longevity is routine care. New Holland has designed the backhoe loader so it takes the minimum of time to carry out routine checks with easy access to all key fuel, engine, transmission and hydraulic filters, and all engine servicing can be done from one sided of the machine for added convenience. Extensive New Holland's widespread dealer network will deliver expert and efficient support for your peace of mind.

- One piece hood for full engine access
- · All key daily checks grouped together on one side
- Battery disconnect and remote jump start terminals easily accessible
- All key lubrication points on the loader and backhoe have ground level access
- Key service items accessible from ground level makes the job faster and safer
- · Maintenance-free disc brakes are standard



SPECIFICATIONS					
		BI	10C	BI	15C
ENGINE					
Make and Model		FPT NEF - I	F4HE9484C	FPT NEF -	F4HE9484C
Injection system			High Pressure	Common Rail	
Emissions level				er 3	
# of cylinders				4	
Bore / Stroke	mm		104 >	< 132	
Displacement / Compression ratio	ltr		4.5 / 17	7.5 to	
Engine rated Power (ISO 14396)	Kw(hp)		82 (110) @	) 2200 rpm	
Maximum torque (ISO 14396)	Nm		516@1	400 rpm	
Engine speeds	rpm		2200 (rated speed at full load) /	950-1000 (low speed at no load)	
TRANSMISSION					
Туре		Powershuttle 4WD	Powershift 4WD	Powershift 4	IWD - IWS
-7F-					
Model		Carraro TLB1 MPB 4WD	Carraro TLB2 MPB 4WD	Carraro TLE	2 MPB 4WS
Forward travel speeds	kph	6 - 10 -	21 - 40	6 - 10 -	22 - 39
Reverse travel speeds	kph	7 - 12 - 26 - 47*	*only for Powershuttle	7 - 12 -	26 - N/A
FRONT AXLE					
Model		4WD He	eavy duty	4WD with limite	ed slip differential
Oscillation		+/-	°	+/-	8°
REAR AXLE					
Model		Carraro with Differ	28.50FR rential lock		26.43FR lip differential
BRAKES		with Diller		with inflited s	
Service brakes			word D diago and side	Hydraulic fo	ot operated,
		Hydraulic foot opera	ated, 2 discs per side		per side
Parking brakes			Mechanically actuated wet brake	pack on transmission output shaft	
TIRES		1			
Front			r 20"		or 28"
Rear		26" or 28	3" or 30"	24" c	or 28"
STEERING				-	
Туре				wer Steering	
System pressure / Displacement	bar/cc		180	/ 160	
Turning radius 4WD (external radius)	mm	4300 with brakes off8180 mm in 2WS mode with 6820 mm in 2WS mode with 3600 with brakes on3600 with brakes on4810 mm in 4WS mode with		node with brakes on;	
HYDRAULIC SYSTEM					
Туре		Load sensing closed center hydraulic system with twin gear pump	Load sensing closed center hydraulic system with variable displacement pump	Load sensing closed center hydraulic system with twin gear pump	Load sensing closed center hydraulic system with variable displacement pump
Flow (@ 2200 rpm)	l/min	167	15 to 165	167	15 to 165
Pressure	bar			)5	
SERVICE CAPACITIES	1.00				
Engine oil	1		13	3.6	
Transmission oil 2WD/4WD	I		20	).8	
Front axle 4WD oil	I	9.	.6	I	.8
Rear axle oil	I	17	<b>7.8</b>	12	2.3
Hydraulic oil	Ι		13	32	
Fuel tank	1		13	32	
Coolant	Ι		2	4	
ELECTRICAL SYSTEM					
Voltage			12	2V	
Battery			Single: 95 Ah 900 A or Do	ouble: 60 Ah, 600 A (each)	
Alternator			120	) A	
САВ					
Certification			ROPS	/ FOPS	
Air Conditioning			Opt	ional	
Storage compartments capacity				ckable, cooling box	
Speedometer			Opt	ional	
Bluetooth radio			Opt	ional	
NOISE					
Internal (cab)	dB(A)			7	
External	dB(A)			03	



		BH	0C	BII	0C
LOADER	LOADER		TOOL CARRIER LOADER ARM		OADER ARM
(4WD configuration)		Std bucket 4x1 bucket		Std bucket 4x1 bucket	
A Maximum dump height under bucket at 45°	mm	2606	2665	2711	2733
B Dump Reach at full height	mm	844	771	815	757
C Maximum height pin mm		3461		3498	
F Dump angle	۰	43	3	4	0
M Below ground level digging depth	mm	166	139	105	158
Maximum lifting capacity @ ground level	kg	567	70	4970	4745
Maximum lifting capacity @ max height	kg	367	78	3553	3290
Loader breakout force	daN	30	3015		25
Bucket breakout force	daN	4062	4076	6340	6220

		BIIOC				
ВАСКНОЕ		IN-LINE CYLINDER				
		STD DIPPER	EXTENDABLE DIPPER	STD DIPPER	EXTENDABLE DIPPER	
Backhoe size	ft	ļ	14 15		5	
Swinging angle	۰		18	80		
I Maximum reach from swing center	mm	5579	6313	5831	6965	
J Maximum operating height	mm	5425	6173	5616	6348	
K Maximum loading height	mm	3658	4424	3867	4601	
L Maximum digging depth	mm	4385	5627	4666	5881	
R Bucket rotation	٥	203				
Bucket breakout force	daN	4745				
Dipper breakout force	daN	3767	2592	3358	2389	

					BII0C		
0\	<b>ERALL DIMENSIONS</b>						
G	Boom height (transport position)	mm	3800	3882		3800	3882
0	Wheel base	mm			2183		
Р	Cab height	mm			2859		
	Overall width with standard loader bucket	mm	23	40		239	4
	Minimum ground clearence	mm			337		

		BIIOC
Operating weight range	Kg	8080 - 9220

Operating weight is subject to machine configuration and attachment options



		BII	5C		
LOADER		TOOL CARRIER LOADER ARM			
(4WD configuration)		Std bucket	4x l bucket		
A Maximum dump height under bucket at 45°	mm	2708	2619		
B Dump Reach at full height	mm	799	587		
C Maximum height pin	mm	34	78		
F Dump angle	۰	56			
M Below ground level digging depth	mm	93	127		
Maximum lifting capacity @ ground level	kg	4770	4580		
Maximum lifting capacity @ max height	kg	3380	3075		
Loader breakout force	daN	3554	3536		
Bucket breakout force	daN	5411	5497		

			B115C	
D	ВАСКНОЕ		IN-LINE C	YLINDER
D			STD DIPPER	EXTENDABLE DIPPER
	Backhoe size	ft	1	5
	Swinging angle	۰	81	30
1	Maximum reach from swing center	mm	5831	6965
J	Maximum operating height	mm	5616	6348
К	Maximum loading height	mm	3867	4601
L	Maximum digging depth	mm	4666	5881
R	Bucket rotation	۰	203	
	Bucket breakout force	daN	59	71
	Dipper breakout force	daN	3225	2389

			BII	5C	
0\	OVERALL DIMENSIONS				
G	Boom height (transport position)	mm	3922	4013	
0	Wheel base	mm	22	00	
Р	Cab height	mm	29	64	
Q	Overall width with standard loader bucket	mm	24	52	
	Minimum ground clearence	mm	45	0	

		B115C
Operating weight range	Kg	8800 - 9310

Operating weight is subject to machine configuration and attachment options





The New Holland dealer network is, in itself, the best guarantee of continued productivity for the machines it delivers to its customers. New Holland service technicians are fully equipped to resolve all maintenance and repair issues, with each and every service point providing the high standards of New Holland's stringent quality guidelines.

The New Holland global parts network ensures fast, reliable, replacement parts for less downtime increased productivity and, of course, profitable operation for its customers.

#### Learn more at www.newholland.com





#### AT YOUR OWN DEALERSHIP

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