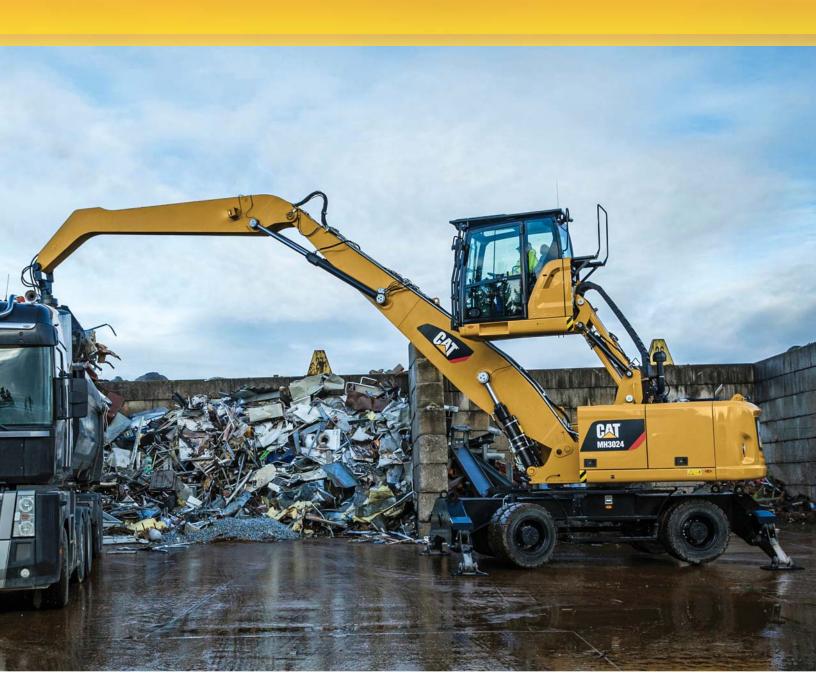
# **MH3024**

# CAT®

Wheel Material Handler 2017



Engine		
Engine Model	Cat® C7.1 A	CERT™
Emissions	U.S. EPA Tie EU Stage IV	
Power (Maximum)		
ISO 9249/SAE J1349 at 1,700 rpm	126 kW	169 hp
ISO 9249/SAE J1349 at 1,700 rpm, metric		171 hp
ISO 14396 at 1,700 rpm (gross)	129.4 kW	174 hp
ISO 14396 at 1,700 rpm (gross), metric		176 hp

vveights		
Operating with Attachment	23 215-	51,180-
	27 470 kg	60,561 lb
Working Ranges (MH boom, stick 5900 mm	[19'4"])	
Maximum Reach (stick pin)	12 485 mm	14'11"
Maximum Height (stick pin)	13 300 mm	43'3"
Drive		
Maximum Travel Speed	25 kph	15.5 mph

#### Introduction

We know that when it comes to material handling equipment, your success depends on high productivity and dependable performance. The MH3024 offers a great compromise between the agility, versatility and performance of a wheeled excavator and the stability, efficiency and power needed to cope with harsh environments and applications of industrial, scrap, waste recycling and bulk handling operations, which call for safe, quality and reliable products, while generating a low operating cost to the owner.

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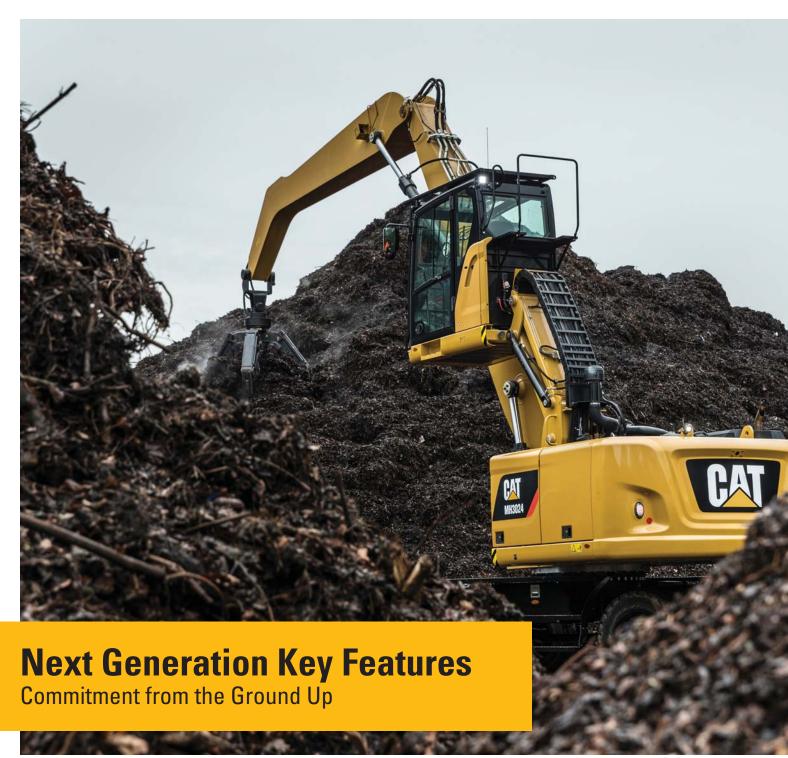
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The new MH3024 is here to help you take on the wide variety of challenges you face every day, more easily and at a lower cost.

Commitment from the Ground Up.





#### **Safety and Comfort Are Not Optional**

- Embedded smart devices help enforce safe behaviors, like the automatic swing lock, brake and axle lock, and safety lever
- The cab contributes to your comfort with limited vibrations and drastically reduced sound levels
- Improved access with new and longer handrails, steps and service platform
- Improved visibility with enlarged glass areas, rear and side cameras and LED working lights



#### Make the Move to the Next Generation

Refinements. From the whole design to the smallest detail. Convenient features, new advanced and transparent technologies, not only to reduce emissions but to further improve your daily experience when working with our products.

#### Made to be Efficient

Recognizing that fuel efficiency is directly affected by hydraulic performance, the hydraulic system in the MH3024 is carefully designed to provide the work needed without wasting fuel. A high capacity hydraulic cooling system keeps operating temperatures well-balanced, resulting in longer component life, higher efficiency and lower repair cost.

#### **Made to Keep Your Costs Down**

Not only does the machine give you all the performance you need, but it does so while providing a great deal of precision, and speed with an absolute minimum fuel consumption – and zero impact on your efficiency.

#### Maintenance: Keep it Simple

Ground level and grouped service points, automatic central greasing, dedicated system compartments and many other features that make your maintenance quick and easy.

#### **Made to Make Operation Easy and Pleasant**

Have a seat, you will be impressed by the quietness and comfort of the cab. Feel relaxed, we help you make sure you're safe.

#### **Integrated Technologies**

Enjoy integrated technologies; they act transparently.

#### Be Flexible to Win

When you add the multiple Cat attachments that help you do all kinds of jobs, you simply won't find a better machine.





# Fuel Efficiency and Reduced Exhaust Emissions

The engine meets Tier 4 Final/Stage IV emission standards, is powerful and efficient, with an optimized 10% fuel consumption improvement versus the previous model and no impact on your productivity. This means less resource consumption and fewer  $CO_2$  emissions.

#### **Quiet Operation**

Outstandingly low sound levels, you won't believe your machine is running.

# Transparent Technologies and Longer Service Intervals

- The Eco Mode, Auto Engine Speed Control and Engine Idle Shutdown help further reduce your overall fuel consumption.
- Product Link<sup>TM</sup> allows remote monitoring of the machine and helps improve overall efficiency.
- Your Cat dealer can help extend service intervals, meaning fewer fluids and disposals, all adding up to lower costs.

#### Biodiesel and Biodegradable Hydraulic Oil

- The MH3024 has the flexibility of running on either ultra-low-sulfur diesel (ULSD) fuel with 15 ppm EPA, 10 ppm EU of sulfur or less or up to B20 biodiesel fuel blended with ULSD.
- Cat BIO HYDO™ Advanced HEES™ reduces the impact on the environment.

#### **Cat Certified Used**

This program is a key element in the range of solutions offered by Caterpillar and Cat dealers to help customers achieve growth at the lowest cost while eliminating waste. Used equipment is inspected, guaranteed and ready for work and customers will benefit from a Caterpillar warranty.

#### **NEW! Blue Angel Certification**

This environmental award – supported by the German Federal Environmental Agency and the Federal Ministry for the Environment, Nature Conservation, Building and Nuclear Safety – recognizes products that protect both people and the environment by reducing noise and emissions. The requirements to be awarded are more stringent than statutory limits for the Americas and European Union.

# **Engine**

### Power, Reliability, and Fuel Economy

#### The Power and Performance You Need

#### **Constant Power Strategy**

Provides a quick response to changing loads, while delivering the same amount of power regardless of operating conditions.

#### A Transparent Emission Solution That Works.

The Cat C7.1 ACERT engine meets today's Tier 4 Final/Stage IV emission standards, and it does so without interrupting your job process. It is designed to be:

- Transparent: no operator intervention
- Durable: fit for life Diesel Particulate Filter
- Efficient: no work interruption, even in case of extended idling time
- **Simple:** minimum maintenance. Longitudinal engine installation, which further simplifies maintenance.

#### **Biodiesel Not a Problem**

The engine can run on up to B20 biodiesel fuel that meets ASTM 6751 standards – all to give you more potential fuel-saving flexibility.

#### **Proven Technology**

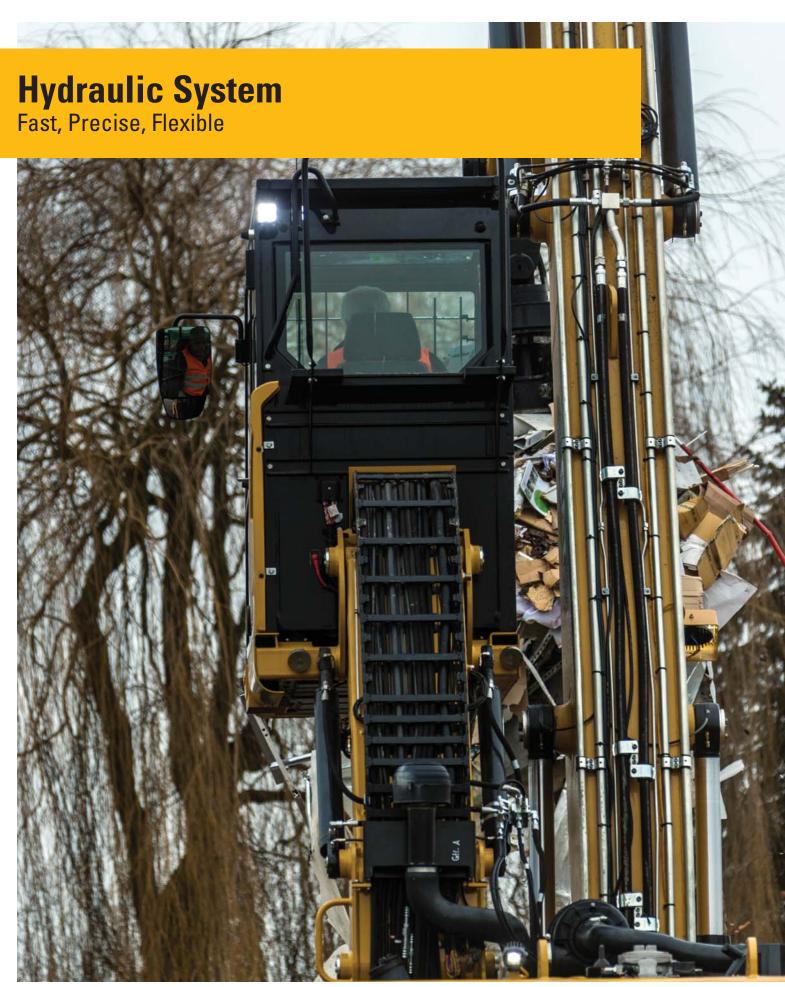
To assure that our technology will meet your expectations for reliable trouble-free service, we subjected these engines and technologies to extensive operating hours of test and validation.





# Built-in Fuel Savers That Add Up

- Automatic Engine Speed Control: lowers engine speed when it is not needed.
- Engine Idle Shutdown: turns the engine off when it's been idling for more than a pre-set amount of time.
- On-Demand Cooling System: variable speed and on-demand fan.
- Enhanced Eco Mode: reduces engine speed while delivering the same power.
- Automatic Shift to Travel Mode when you start driving.
- NEW! Optimized Travel Mode: travel mode rpm levels are set automatically on-demand only to further reduce fuel consumption.



# When it comes to moving material quickly, you need efficient hydraulics – the type the MH Series can deliver.

#### **Efficient Design, Smart and Fast**

- Simple Design The hydraulic valve compartment and routings offer a simple and clean design to help ensure durability.
- Smart Main Hydraulics The system allows reducing the load on the engine when not needed, which translates into lower fuel consumption.
- Dedicated Swing Pump A closed hydraulic circuit is dedicated to the swing only. Having two separate pumps, one for the swing and the second for the other functions allows faster and smoother combined movements.

#### **Control Like No Other**

- Electronic Pump Control Controllability is one of the main attributes of the MH3024, and one of the key contributors to this is the Electronic Pump Control (EPC) that's designed to improve response time and precision. It puts flow exactly where you need it, when you need it, which means a much smoother operation and greater efficiency.
- Adjustable Hydraulic Sensitivity Allows you to adjust the aggressiveness of the machine according to the application.
- Stick Regeneration Circuit Increases efficiency and helps enhance controllability for higher productivity of straight sticks with linkage.









#### **Well Balanced Cooling Package**

The hydraulic oil cooler is mounted side-by-side with the engine radiator and the air-to-air aftercooler (ATAAC). Located separately from the engine and featuring a well-balanced sizing, the new cooling package offers unprecedented up-times even in difficult environments.

# **Structure – Elevated Cab and Frame**

Strength, Flexibility and Mobility







#### High Visibility – 2400 mm (94.5 in) Elevated Cab

The hydraulic cab riser is designed to be:

- Stable Wide lift arms, deep box-sectioned design, strong top and bottom links and retractable hydraulic cylinders used to raise the cab for greater stability.
- Fast Two heavy-duty hydraulic cylinders provide quick and controlled up and down travel.
- Comfortable The parallelogram design of the linkage allows the cab to remain level at all ranges of motion.
   Cab movement is also slowed as it reaches the end of the riser stroke, with no sudden start/stop effect.
- Safe The cab can be lowered using either a lever inside the cab or one on the frame at ground level in the event of a hydraulic malfunction.



# Effective hydraulic line routing, transmission protection and heavy-duty axles make the Cat undercarriages perfect for material handler applications. Three different undercarriages are available to provide the stability you need for your applications:

- Material Handling The Material Handling undercarriage with four welded outriggers is ideal when extra stability is needed.
- Material Handling with Dozer Blade An optional expansion to the Material Handling Undercarriage includes an additional dozer blade mounted ahead of the front stabilizers to be used to push material commonly encountered in waste and millyard applications.
- The standard undercarriage allows for different kinds of stabilizers and blades to be attached either to the front or to the rear.



**Undercarriage Options** 

The front axle offers wide oscillating and steering angles. The transmission is mounted directly on the rear axle for protection and optimum ground clearance. The drive shaft offers long service intervals.

#### **Advanced Disc Brake System**

The disc brake system acts directly on the hub instead of the drive shaft to avoid planetary gear backlash. This minimizes the rocking effect associated with working free on wheels.

#### **Driveline Concept**

The driveline design effectively utilizes engine torque and power to provide a comfortable ride with improved smoothness.

Travel mode rpm levels are set automatically and "on-demand only" to further reduce fuel consumption.











# **SmartBoom**

### Allow Your Operator to Fully Concentrate on Production

The unique Cat SmartBoom significantly enhances operator comfort and job efficiency by reducing stress and vibrations transmitted to the machine. Loading is more productive and more fuel efficient as the return cycle is reduced while the boom down function does not require pump flow.

# **Front Linkage**

No Compromise on Durability

You know that a material handler works only as good as its front linkage is able to handle the job. The MH3024's booms and sticks are purpose built for the loads encountered in material handling applications.

#### **MH Boom**

MH boom includes high pressure hydraulic lines for opening and closing functionality and medium pressure lines for implement rotation.

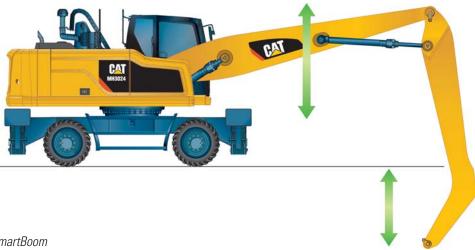
#### MH Sticks

MH sticks are equipped with high and medium pressure auxiliary lines. The 4900 mm (16'1") and 5900 mm (19'4") Drop Nose Sticks offer the reaching and lifting capabilities required for typical MH applications, while the 4800 mm (15'9") Straight Stick is the best solution when additional attachment functionality is needed.

#### **Special Applications**

The MH3024 offers the ability to combine the hydraulic cab riser with a traditional excavator front linkage. This combination has been proven in transfer station, mining, and millyard applications.

Standard sticks are available in combination with a variable adjustable (VA) or one-piece boom.



## **Smart Features**

### **Easier than Ever**

#### **Joystick Steering (Optional)**

Keep both hands on your joysticks even when you need to reposition the machine while simultaneously moving the implements.

#### **Swing and Auto Travel Lock**

No need for the operator to bend to engage the swing lock pin.

- · Just press a button,
- Align the upper to the lower frame,
- Enjoy the ride: a green indicator confirms the swing and the implements have been automatically locked.
- NEW! The swing lock can be applied independently from the implements lock at low speed (below 5 kph/3.1 mph).

#### **Integrated Pin Code**

No need to buy an optional security system to protect your equipment against theft.

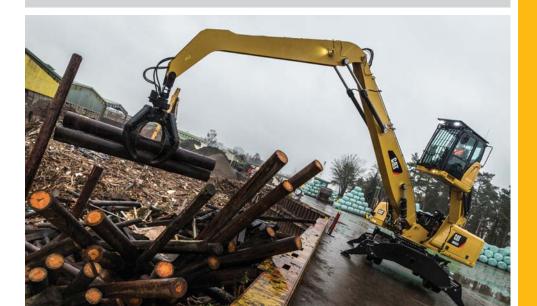
- The pin code is integrated into the monitor (standard)
- Entering the right code allows the engine to start

The Machine Security System (MSS – optional) adds even more protection when needed.

#### **Cruise Control**

No need to press the pedal all the time.

- Choose the very speed you wish
- Press the quick access button on the monitor
- · Enjoy the ride





# **Load and Go Auto Axle Lock**

Presses the Pedal for You, Reducing the Number of Actions You Need to Do

The machine automatically detects when the service brake and axle need to be locked (like when working), or unlocked (roading), hence removing the need for the operator to systematically press the pedal. Brake and axle are released automatically by pressing the travel pedal again.

# **Premium Comfort**

### **Keeps Operators Productive All Shift Long**



#### Designed for the operator, our cabs are unique.

#### **Ergonomic Layout**

- Frequently used switches are centralized, kept to the minimum and ideally located close to the joysticks.
- Storage compartments are useful ... when well designed. Several areas provide sufficient room to store a hard hat, a drink, phone, or keys.

#### **Comfortable Seat Options**

Our seats provide all the comfort needed for a long day of work, including FULL adjustment. All seats are heated and air suspended. Automatic weight adjustment and ventilated seats are available.

#### **Safety Is Not Optional**

FOPS cabs, seat belt alarm, safety lever, sideview camera ... among others.

#### **Details That Make the Difference**

Have a look at the cab; you will see it is through details that we improve pleasure of operating.

#### **Smart Controls to Reduce Fatigue**

- Features like SmartBoom or joystick steering will be precious to increase your productivity.
- New technologies that work transparently like the swing and auto travel lock or the automatic brake and axle lock, reduce the number of tasks you need to do.

#### **Plug, Charge and Play Your Devices**

- The 12V 10A power supply socket is conveniently located for charging your laptop, or a tablet.
- A CD/MP3 radio with speakers and USB port is available.









For Ease of Operation

#### A Cab Just for You - Fully Adjustable

- · Seat armrests, in height and angle
- Steering column adjustment, not only tilting fore/aft but also in height
- Hydraulic sensitivity of the machine to make it more or less aggressive
- NEW! Joystick and left pedal controls assignments: can be set up as desired and per tool
- NEW! Optional advanced joystick offering more controls (two sliders, five buttons each)
- · Automatic air conditioning
- NEW! Optional heated mirrors are now also electrically adjustable from the cab



#### **Incredibly Low Sound Levels, Less Fatigue**

Increased cab pressure, preventing from dust entry, combined with the cab design contributes to reducing sound.

#### **Outstanding Visibility: See the difference!**

- All glass areas have been drastically increased
- Standard LED working lights and halogen front roading lights
- Standard LED dome light
- Standard rearview AND sideview wide angle cameras
- Wide angle mirrors for a better visibility even down to the ground
- Parallel intermittent (four speeds) wipers covering the whole windshield

#### **NEW! Standard LED Lights for BOTH Cameras to See What's Going on Around, Day or Night**

The rear camera is integrated into the counterweight for enhanced protection.

#### **NEW! Split-Screen View of BOTH Cameras on the Same Monitor**

The views from both cameras are displayed side by side on the additional wide color monitor for better visibility at first glance.

#### **Large Color Machine Monitor**

Easy to read and in local language, the high resolution LCD monitor will keep you aware of any important information. "Quick Access" buttons allow a quick selection of favorite functions. The tool select function lets you preset up to ten different hydraulic attachments for quick tool changes.

# **Serviceability**

### When Uptime Counts

#### **Convenient Access Built In**

You can reach routine maintenance items like fuel and engine oil filters and fluid taps at ground level while fuel and DEF tank are accessible from the safety of the slip-resistant new service foldable step. Compartments feature wide composite service doors, designed to be more resistant to shocks, which all include gas struts to facilitate the opening.

#### A Smart Design for Any Temperature

The side-by-side coolers and axial fan design allows greater cooling performance. The system is completely separated from the engine compartment to reduce noise and heat, and all radiators are gathered in the same compartment while featuring easy-to-clean cores with a tilting device that requires no tool to unlock.

- The optional Cooling Protection Package includes a fine mesh for enhanced radiator protection and an engine air precleaner.
- The optional Waste Handling Package adds a reversing fan rotation function with adjustable intervals and a vibrating grill on the cooling hood.
   This vibration together with the reversed airflow direction will shake accumulated particles off the mesh.

#### A Fresh Idea

Ventilation inside the cab allows outside air to enter through a fresh air filter. The filter is located on the side of the cab to make it easy to reach, and it is protected by a lockable door that can be opened with the ignition key.

#### **Lube and Fuel Features**

An automatic lubrication system is a time-saving standard feature for greasing the whole uppercarriage. Greasing points for the undercarriage are kept to a minimum and grouped. An electric refueling pump is also available. The hose is stored in a dedicated tray, for more cleanliness. Add in the electric lift pump removing the need to prime the system manually, the standard fuel and water separator and you get a machine that does the fastidious maintenance works for you.

#### Keep it simple.









# **Integrated Technologies**

It Pays to Know



# CAT CONNECT









Cat Connect makes smart use of technology and services to improve your job site efficiency. Using the data from technology-equipped machines, you'll get more information and insight into your equipment and operations than ever before.

Cat Connect technologies offer improvements in these key areas:



**Equipment Management** – increase uptime and reduce operating costs.



**Productivity** – monitor production and manage job site efficiency.



**Safety** – enhance job site awareness to keep your people and equipment safe.

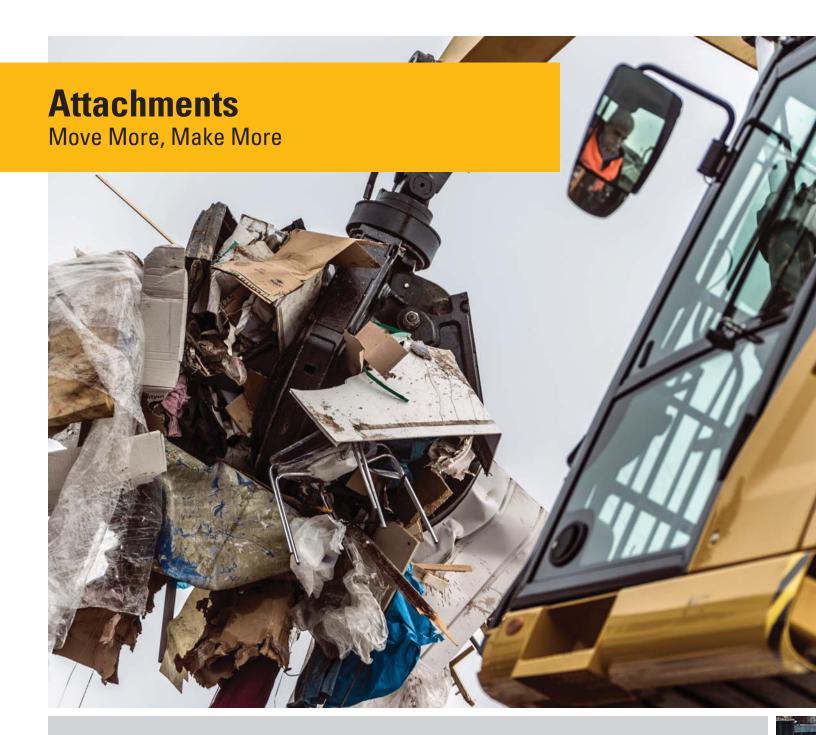
Featured Cat Connect technologies include the following:

#### Link

Link technologies provide wireless capability to machines to enable two-way transfer of information collected by on-board sensors, control modules, and other Cat Connect technologies.

#### **Manage Your Machine Remotely**

Cat Product Link is a system that is deeply integrated into the machine monitoring system to take the guesswork out of managing your equipment. The system tracks location, hours, fuel usage, productivity, idle time, and diagnostic codes and shares it with you through VisionLink® to help you maximize efficiency, improve productivity, and lower operating costs.

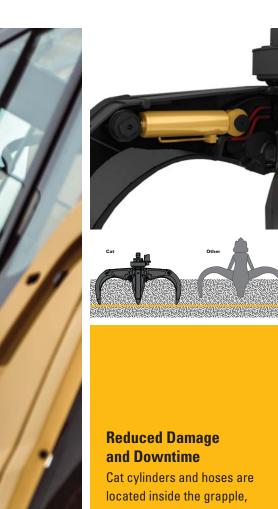


#### New! Optional 15 kW Cat Generator with Solid State Controller

If your attachment or application needs additional power for operation, the MH3024 can come equipped with an optional 15 kW solid state generator. Experience enhanced sorting ability through the proprietary solid state generator control. The genset is capable of producing enough power to operate up to a 1.4 m (4.6 ft) diameter magnet. The optional solid state genset would be placed in the upper frame for ease of maintenance without obstructing other machine components.

With the operator friendly material sorting control enables the machine operator to turn the magnet current on and off at quick intervals without initiating the actual "drop" or "reverse current" cycle of the magnet which completely and quickly cleans the material off of the magnet during normal production handling.

This proprietary generator system is designed, sold and serviced by Caterpillar and Cat dealers worldwide.



### solution for the MH3024. Choose one for your Cat machine for maximum performance.

Productive and Perfectly Matched

Loading and unloading is foundational to your productivity. Grapples are sized right for the MH3024. They are designed for maximum penetration into the pile. The full

When productivity, reliability and stability are important, Cat attachments are the perfect

**Attachment Solutions for Industrial and Recycling Applications** 

power of your machine is utilized to provide fast open/close times and powerful closing force. Full, 360° rotation systems allow precise placement. Together, a MH3024 and Cat grapple allow you to move volumes with minimal time and effort.

#### **Built for Severe Material**

Cat grapples are built to take on the material you move. Hydraulic components are protected from damage, yet easily accessed for routine maintenance. Areas that dig and penetrate are made of high quality, wear resistant material to keep them in working condition. Components that pivot and move are engineered to the latest standards for a long life. Cat grapples last for a positive impact to your bottom line.

#### **Orange Peel Grapples**

The perfect solution for scrap yards, recycling plants and transfer stations. These grapples are available with 4 or 5 tines, in capacities from 600 L (0.78 yd $^3$ ) to 800 L (1.05 yd $^3$ ). Several shell choices allow further customization of your grapple to the specific material you work with.

Cat cylinders and hoses are located inside the grapple, protected against cutting and scoring from scrap impact.
Four exposed connector lines to the machine are guarded – protecting them from damage.







#### **Get the Most from Your Machine**

You can easily expand all the possibilities the MH3024 offers by utilizing a straight stick linkage and combining it with any of the variety of Cat attachments for excavators. In this case, a quick coupler will bring the ability to quickly change attachments. In this case, a quick coupler will bring the ability to quickly change attachments. Ten hydraulic pump flow and pressure settings can be preset within the monitor, eliminating the need to adjust the hydraulics each time a tool is changed. Attachment changes have never been easier!

Contact your local Cat dealer to learn more about the specific grapple choices available in your region

# Safety

### Your Safety Is NOT Optional

#### **Embedded Features**

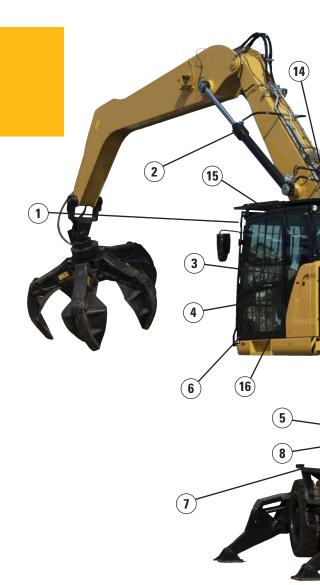
Smart embedded devices help enforce safe behavior:

- Safety seat belt and warning indicators (monitor)
- Automatic swing lock
- Automatic brake and axle lock
- Safety lever, preventing exit when the implements are not locked out
- Emergency shut off switch and battery disconnect switch
- Travel alarm
- Lowering check valves
- NEW! Quick coupler control switch, ISO 13031 compliant





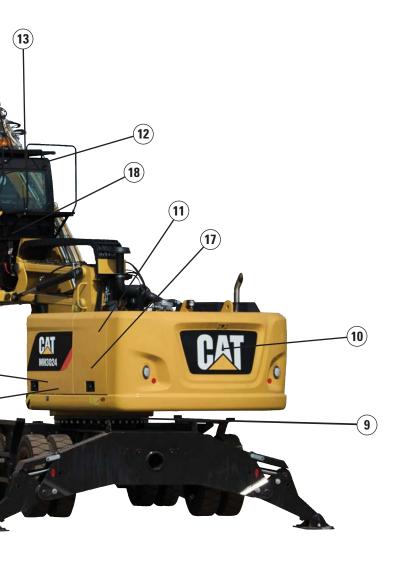




#### **Cab Ingress**

We bring a solution to allow you to safely climb into the cab:

- Three longer access steps, aligned with the cab entry
- Additional step integrated into the skirt, directly below the cab door
- Anti-skid plates on all walkways and steps reducing slipping hazards
- Tiltable console to make sure the way in and out is free of obstacles
- New! Optional Easy Cab Access Package featuring a rigid ladder mounted on the rear axle (right side) for straight access into the cab from the ground



- 1) Laminated windshield and skylight window
- 2) Lowering check valves
- 3) Safety seat belt indicator
- 4) Safety lever
- 5) Emergency shut-off switch
- 6) Automatic brake and axle lock
- 7) Punched, anti-slippery walking surfaces
- 8) Battery disconnect switch
- 9) Swing and implement electronic lock
- 10) Travel alarm
- 11) All doors equipped with gas strut cylinders
- 12) Emergency hammer and exit
- 13) Sound proofing
- 14) Beacon available
- 15) FOPS cab and top/front guards compatibility
- 16) Safety lever to lower the cab, either from the ground or directly from the cab
- 17) Foldable service platform
- 18) Cab Advanced Pre-Filtration System (optional)

#### Safe and Quiet Cab

The cab provides you with a safe environment. It also contributes to your comfort with limited vibrations and low sound levels.

#### **Great Views**

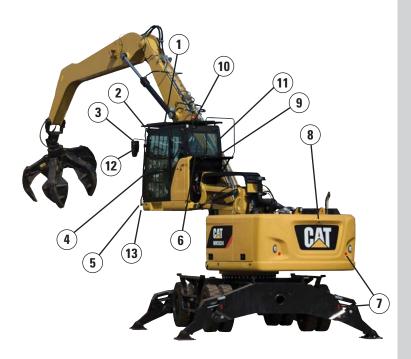
- Enlarged glass gives you excellent visibility to the front, top, rear, and sides, even to the right
- Standard rearview camera gives you a clear field of view behind the machine
- Standard sideview camera, to check nothing is hidden to you from the front right hand side to the rear of the machine
- NEW! Monitor split-screen to easily check cameras rearview and sideview on the same display
- Lenses of all the cameras are wide angle and heated
- All mirrors are wide angle and allow view not only around the machine but also to the ground

#### **New! Safety Options for Specific Applications**

- Impact Resistant One-Piece Windshield and skylight, 10 mm (0.4") thick, fulfills EN356 P5A standards.
- High Impact Resistant fixed Windshield (two-parts) and skylight, 26 mm (1") thick, fulfills EN356 P8B standards.
- Advanced Cab Pre-Filtration Package A cab pre-filtration package reduces dust entry and air contamination.
   It includes:
  - an integrated air precleaner, which also extends filters life
  - a fresh air filtration system with H13 and ABEK1 Hg filters against odor and gas
  - a recirculation filtration system, with a H13 filter

# **Unmatched Visibility**

### Make Sure Nothing Is Hidden to You



**Visibility all around is critical**, especially for machines working and driving in industrial job sites.

- 1) Increased skylight and windshield glass area
- 2) Standard LED lights for all working lights
- 3) Optional electrically adjustable and heated mirrors
- 4) Great left hand side visibility with all glass door
- 5) Halogen front roading lights
- 6) Wide rear window
- 7) Red reflectors, on counterweight and rear blade/outriggers
- 8) Standard wide angle rearview camera with LED light
- 9) Standard wide angle sideview camera with LED light
- 10) Split-screen display of both cameras on the same monitor
- 11) Large right hand side window
- 12) Mirrors, wide angle, with additional lower mirror for ground visibility
- 13) High visibility 2400 mm (94.5 in) elevated cab

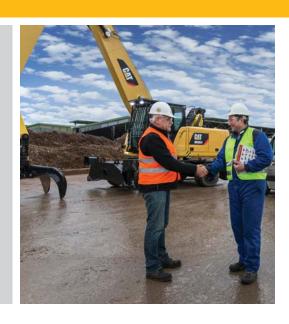
# **Complete Customer Care**

Your Cat Dealer Will Support You Like No Other

#### **Support You Can Count On**

From helping you to choose the right machine to knowledgeable on-going support, Cat dealers provide the best-in-sales and services.

- Best long-term investment with financing options and services
- Productive operation with training programs
- Preventive maintenance and guaranteed maintenance contracts
- Uptime, with best-in-class parts availability
- Repair, rebuild, or replace? Your dealer can help evaluate the best option.



Engine		
Engine Model	Cat C7.1 ACERT <sup>(1)</sup>	
Ratings	1,700 rpm	
Engine Gross Power (Maximum)		
ISO 14396	129.4 kW	174 hp
ISO 14396 (metric)		176 hp
Net Power (Rated) (2)		
ISO 9249/SAE J1349	126 kW	169 hp
ISO 9249/SAE J1349 (metric)		171 hp
80/1269/EEC	126 kW	169 hp
Net Power (Maximum)		
ISO 9249/SAE J1349	126 kW	169 hp
ISO 9249/SAE J1349 (metric)		171 hp
80/1269/EEC	126 kW	169 hp
Bore	105 mm	4.1 in
Stroke	135 mm	5.3 in
Displacement	7.01 L	427.8 in <sup>3</sup>
Maximum Torque at 1,400 rpm	830 N·m	612 lbf-ft
Number of Cylinders	6	
Number of Cylinders	6	

- (1) Meets Tier 4 Final/Stage IV emission standards.
- (2) Rated speed 1,700 rpm. Constant power from 1,500-1,700 rpm.
- Net power advertised is the power available at the flywheel when engine is equipped with air cleaner, CEM exhaust gas aftertreatment, alternator, and cooling fan running at intermediate speed.
- No derating required up to 3000 m (9,842 ft) altitude. Automatic derating occurs after 3000 m (9,842 ft).

Transmission		
Forward/Reverse		
1st Gear	8.0 kph	5 mph
2nd Gear	25.0 kph	15.5 mph
Creeper Speed		
1st Gear	3.0 kph	1.9 mph
2nd Gear	8.0 kph	5 mph
Drawbar Pull	127.0 kN	28,551 lbf
Maximum Gradeability (at 25 000 kg/55,115 lb)	60%	

Swing Mechanism		
Maximum Swing Speed	8.8 rpm	
Maximum Swing Torque	59.6 kN·m	43,958 lbf-ft

Undercarriage		
Axle Ground Clearance*	325 mm	12.8 in
Maximum Steering Angle	35.0°	
Oscillation Axle Angle	±5.0°	
Minimum Turning Radius		
Outside of Tire	6800 mm	22.3 ft
End of VA Boom	7800 mm	23.3 ft
End of One-Piece Boom	9300 mm	27.9 ft
End of MH Boom (with 5.9 m/19'4" drop nose stick)	9800 mm	32.1 ft

\*Dimensions for standard and MG undercarriage. For machines fitted with 11.00-20 pneumatic tires, add 35 mm (1.4 in).

Service Refill Capacities		
Fuel Tank (total capacity)	420 L	111 gal
Diesel Exhaust Fluid Tank	34.5 L	9.1 gal
Cooling System	46.9 L	12.4 gal
Engine Crankcase	18.5 L	4.9 gal
Rear Axle Housing (differential)	14 L	3.7 gal
Front Steering Axle (differential)	10.5 L	2.8 gal
Final Drive	2.5 L	0.7 gal
Powershift Transmission	2.5 L	0.7 gal

Hydraulic System		
Tank Capacity	200 L	52.8 gal
System	365 L	96.4 gal

Hydraulic System: Maximum Pressure		
Implement Circuit		
Normal	350 bar	5,076 psi
Heavy Lift	370 bar	5,366 psi
Travel Circuit	350 bar	5,076 psi
Auxiliary Circuit		
High Pressure	350 bar	5,076 psi
Medium Pressure	210 bar	3,046 psi
Swing Mechanism	340 bar	4,931 psi

Hydraulic System: Maximum Flow		
Implement/Travel Circuit	340 L/min	90 gal/min
Auxiliary Circuit		
High Pressure	250 L/min	66 gal/min
Medium Pressure	49 L/min	12.9 gal/min
Swing Mechanism	118 L/min	31 gal/min

Weights		
Operating Weights*	24 685- 26 165 kg	54,421- 57,684 lb
MH Boom		_
MH Undercarriage, Straight Stick	26 150 kg	57,651 lb
MH Undercarriage, 5900 mm/19'4" Drop Nose Stick	25 770 kg	56,813 lb
Standard Undercarriage**, Straight Stick	26 165 kg	57,684 lb
One-Piece Boom		
Standard Undercarriage**, 2900 mm/9'6" Stick	24 685 kg	54,421 lb
VA Boom		
Standard Undercarriage**, 2900 mm/9'6" Stick	25 250 kg	55,667 lb
Sticks***		
Digging – 2500 mm (8'2")	1005 kg	2,216 lb
Digging – 2900 mm (9'6")	1085 kg	2,392 lb
Straight – 4800 mm (15'9")	1465 kg	3,230 lb
Drop Nose – 4900 mm (16'1")	875 kg	1,929 lb
Drop Nose – 5900 mm (19'4")	1015 kg	2,238 lb
MH Push Blade	675 kg	1,488 lb
Dozer Blade	850 kg	1,874 lb
Solid Tires (delta vs. standard tires)	950 kg	2,094 lb
Counterweight		
Standard	4100 kg	9,039 lb
Optional	5200 kg	11,464 lb

<sup>\*</sup>Operating weight includes solid tires, 5200 kg (11,464 lb) counterweight, full fuel tank, operator, four outriggers undercarriage, and an attachment (1400 kg/3,086 lb). Weight varies depending on configuration.

<sup>\*\*\*</sup>Includes cylinder, bucket linkage, pins and standard hydraulic lines.

Tires	
11.00-20 (dual pneumatic)	
10.00-20 (dual solid rubber)	

Push Blade		
Blade Type	Radial	
Blade Height	920 mm	3.0 ft
Width	2990 mm	9.8 ft

<b>Emissions and Safety</b>	
Engine Emissions	Tier 4 Final/Stage IV
Diesel Exhaust Fluid	Must meet ISO 22241
Fluids (optional)	
Cat Bio HYDO Advanced	Readily biodegradable
	EU Flower eco-label certified
Bio Diesel up to B20	Meets EN 14214 or ASTM D6751 with EN590 or ASTM D975 standard mineral diesel fuels
Vibration Levels	
Maximum Hand/Arm	
ISO 5349:2001	<2.5 m/s <sup>2</sup> <8.2 ft/s <sup>2</sup>
Maximum Whole Body	
ISO/TR 25398:2006	<0.5 m/s <sup>2</sup> <1.6 ft/s <sup>2</sup>
Seat Transmissibility Factor	
ISO 7096:2000-spectral class EM5	<0.7
Standards	
Operator Protective Structure	
Top/Front Guards	FOPS (Falling Object Protective Structure) meets FOPS criteria ISO 10262:1998 and SAE J1356:2008
Cab/Sound Levels	Meets appropriate standards as listed below
Sound Performance	
Operator Sound	
2000/14/EC	71 dB(A)
Spectator Sound	

Sound Performance		
Operator Sound		
2000/14/EC	71 dB(A)	
Spectator Sound		
2000/14/EC	99 dB(A)	

- Operator Sound The operator sound level is measured according to the procedures specified in 2000/14/EC, for a cab offered by Caterpillar, when properly installed and maintained and tested with the door and windows closed.
- Exterior Sound The labeled spectator sound power level is measured according to the test procedures and conditions specified in 2000/14/EC.
- Hearing protection may be needed when operating with an open operator station and cab (when not properly maintained for doors/ windows open) for extended periods or in noisy environment(s).

<sup>\*\*</sup>Standard undercarriage with two sets of outriggers and dual pneumatic tires.

### **Dimensions – With Standard Undercarriage, Two Sets of Outriggers**

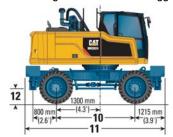
All dimensions are approximate.



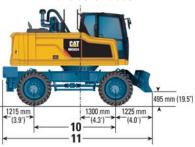


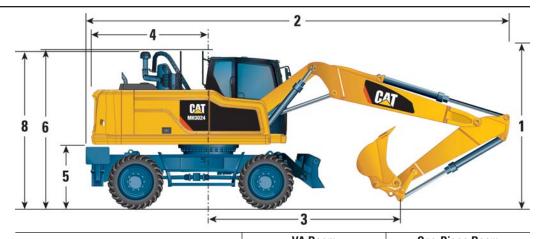


Undercarriage with 2 sets of outriggers



Undercarriage with 1 set of outriggers and dozer blade





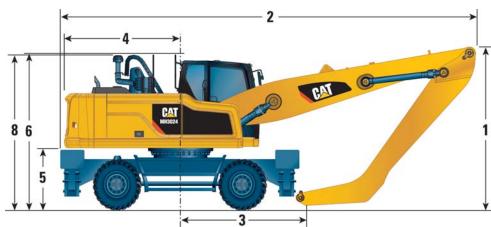
		VA E	oom		(	One-Pie	ce Boo	m
	mm	ft/in	mm	ft/in	mm	ft/in	mm	ft/in
Stick Length	2500	8'2"	2900	9'6"	2500	8'2"	2900	9'6"
1 Shipping Height with Falling Object Guard (highest point between boom and cab)	3375	11'1"	3375	11'1"	3375	11'1"	3375	11'1"
<b>2</b> Shipping Length	9560	31'4"	9545	31'4"	9715	31'10"	9725	31'11"
3 Support Point	3755	12'4"	3525	11'7"	3720	12'2"	3445	11'4"
4 Tail Swing Radius				2825 m	m (9'3'	')		
5 Counterweight Clearance				1310 m	m (4'3'	')		
6 Cab Height with Hydraulic Cab Riser								
Cab Lowered – No Falling Object Guard			3	3245 mr	n (10'7	")		
Cab Lowered – with Falling Object Guard			3	3375 mr	n (11'1	")		
Cab Raised – with Falling Object Guard			5	775 mm	n (18'11	l")		
Cab Raised – without Falling Object Guard			4	645 mr	n (18'6	")		
7 Overall Machine Width								
Width with Outriggers on Ground			3	930 mn	n (12'11	l")		
Width with Outriggers Up				2750 m	m (9'0'	')		
Width with Blade				2750 m	m (9'0'	')		
8 Height of Tray Group Flex			3	360 mr	n (11'0	")		
9 Maximum Outriggers Depth				120 mr	n (4.7"	)		
10 Wheel Base				2750 m	m (9'0'	')		
11 Undercarriage Length								
With 2 Sets of Outriggers Raised			4	5040 mr	n (16'6	")		
With 1 Set of Outriggers and Dozer Blade Raised			5	175 mm	n (16'11	1")		
12 Undercarriage Clearance				325 mm	n (12.8'	')		

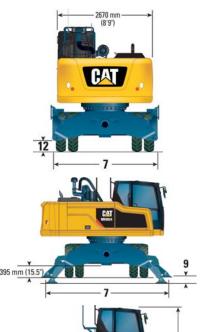
Note: Values are with 11.00-20 pneumatic tires. For machines fitted with solid tires, all vertical dimensions have to be reduced by 35 mm (1.4"). For dimension 9 add 35 mm (1.4").

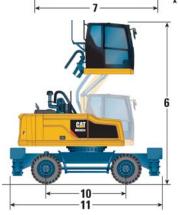
### **Dimensions – With MH Undercarriage**

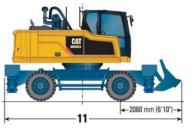
All dimensions are approximate.









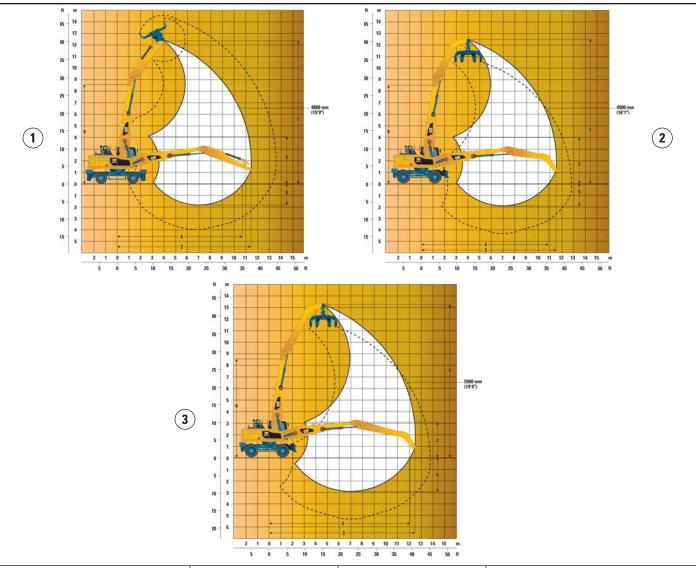


			MH Unde	rcarriage	•	
		МН	Boom 68	00 mm (2	2'4")	
	mm	ft/in	mm	ft/in	mm	ft/in
Stick Length	4800	15'9"	4900	16'1"	5900	19'4"
Stick Type	Strai	ight	Drop	Nose	Drop	Nose
1 Shipping Height with Falling Object Guard (highest point between boom and cab)	3360	11'0"	3600	11'10"	5285*	17'4"*
2 Shipping Length	10 090	33'1"	10 040	32'11"	10 040*	32'11"*
3 Support Point	3085	10'1"	3225	10'7"	3060*	10'0"*
4 Tail Swing Radius			2825 mi	m (9'3")		
5 Counterweight Clearance			1285 mi	m (4'2")		
6 Cab Height with Hydraulic Cab Riser						
Cab Lowered – No Falling Object Guard			3210 mn	n (10'6")		
Cab Lowered – with Falling Object Guard			3340 mm	(10'11"	)	
Cab Raised – with Falling Object Guard			5740 mm	(18'10"	)	
Cab Raised – No Falling Object Guard			5610 mn	n (18'5")		
7 Overall Machine Width						
Width with Outriggers on Ground			4360 (	14'3")		
Width with Outriggers Up			2990 mn	n (9'10")		
Width with the Special Front Push Blade			2990 mn	n (9'10")		
8 Height of Tray Group Flex			3360 mn	n (11'0")		
9 Maximum Outriggers Depth			90 mm	(3.5")		
10 Wheel Base			2750 mi	m (9'0")		
11 Undercarriage Length			5250 mn	n (17'3")		
With MH Undercarriage Front Push Blade			6080 mm	(19'11"	)	
<b>12</b> Undercarriage Clearance			280 mr	n (10")		

\*When the shipping height is over 4 m (13 ft), the stick must be removed for transportation.

Note: Values are with 10.00-20 solid tires. For machine fitted with 11.00-20 pneumatic tires, all vertical dimensions have to be increased by 35 mm (1.4"). For dimension 9 add 35 mm (1.4").

### **Working Ranges**



		(1				(2			3								
			Stan	dard Un	dercarri	iage*				MI	H Under	carriage	·**				
Boom Type		VA B	oom		(	One-Piec	n	MH Boom									
	mm	ft/in	mm	ft/in	mm	ft/in	mm	ft/in	mm	ft/in	mm	ft/in	mm	ft/in			
Stick Length	2500	8'2"	2900	9'6"	2500	8'2"	2900	9'6"	4800	15'9"	4900	16'1"	5900	19'4"			
1 Maximum Height	8910	29'3"	9220	30'3"	7945	26'1"	8165	26'10"	12 425	40'9"	12 505	41'0"	13 300	43'8"			
2 Minimum Dump Height	4530	14'10"	4135	13'7"	4070	13'4"	3675	12'1"	4120	13'6"	4025	13'2"	3090	10'2"			
3 Maximum Reach	8285	27'2"	8675	28'5"	8395	27'7"	8770	28'9"	11 435	37'6"	11 530	37'10"	12 485	41'0"			
4 Maximum Reach at Ground Level	8070	26'6"	8470	27'9"	8185	26'10"	8580	28'2"	10 720	35'2"	10 850	35'7"	12 050	39'6"			
5 Maximum Depth	4565	15'0"	4965	16'3"	4360	14'4"	4760	15'7"	1820	6'0"	1920	6'4"	2925	9'7"			
6 Boom Pin Height	6980	22'11"	6980	22'11"	6570	21'6"	6570	21'6"	8620	28'3"	8620	28'3"	8620	28'3"			

All dimensions refer to sticknose pin.

<sup>\*</sup>Standard undercarriage figures are calculated with pneumatic tires.

<sup>\*\*</sup>MH undercarriage figures are calculated with solid tires.

### **Attachment Offering Guide\***

	Boom Type		One-Pie	ce Boom				МНІ	Boom		
	Counterweight	410 (9,03			0 kg 64 lb)	4100 kg (9.039 lb)	5200 kg (11,464 lb)	4100 kg (9,039 lb)	5200 kg (11,464 lb)	4100 kg (9.039 lb)	5200 kg (11,464 lb)
	Undercarriage/Outriggers	(1			1)	(2)	(2)	(2)	(2)	(2)	(2)
	Stick Length	2500 mm (8'2")	2900 mm (9'6")	2500 mm (8'2")	2900 mm (9'6")	4800 mm (15.9")	4800 mm (15'9")	4900 mm (16.1")	4900 mm (16'1")	5900 mm (19'4")	5900 mm (19'4")
	Stick Type	Straight	Straight	Straight	Straight	Straight	Straight	Drop Nose	Drop Nose	Drop Nose	Drop Nose
	H115Es										
Hydraulic Hammer	H120Es										
	H130Es										
	MP318 CC Jaw										
	MP318 D										
Multi Processor	MP318 P										
	MP318 S										
	MP318 U										
Crusher	P315										
Pulverizer	P215										
Demolition and	G315B					**	**				
Sorting Grapple	G315B WH										
	S320B										
Scrap and Demolition Shear	S325B										
	S340B			İ							
Compactor	CVP75										
Quick Coupler – Pin Grabber Coupler	Cat PG			TI	nis quick co	upler is a ma	tch (straight,	/linkage stic	k).		
Orange Peel Grapple	GSH15B 600 L (0.79 yd3)										
(4 Tines)	GSH15B 800 L (1.04 yd3)										
Orange Peel Grapple	GSH15B 600 L (0.79 yd3)										
(5 Tines)	GSH15B 800 L (1.04 yd <sup>3</sup> )										
(1) With the Outriggers front a					Attachme	ent is a mat	ch				
(2) With the MH undercarriag	e ıll areas. Matches are depender	it on whool			Pin-on on	nly					
material handler configura	tions. Consult your Cat dealer to	determine			Boom mo	unted					
** Demolition Grapple only.	a and for proper attachment ma	atch.			Not recommended						
Domondon Grappie Uniy.					Maximun	n Material	Density 180	0 kg/m³ (3,	000 lb/yd³) (	standard r	naterial)

Maximum Material Density 1200 kg/m³ (2,000 lb/yd³) (light material)

#### **Lift Capacities**

All values are in kg, hydraulic cab riser, attachment: none, with counterweight (5200 kg), heavy lift on.

Load	point height Load over front			Load ov	ver rear		G	☐ Load ov	er side			Load	at maximu	ım reach (s	ticknose/b	oucket pin)	)
	earriage r Standard						<b>Bo</b> c 6.8	om m MF	H			<b>Sti</b> 5.9	ck m MH	I			
			3000 mm			4500 mm			6000 mm			7500 mm			_5_	=6	
	Undercarriage configuration		7	æ		7	æ		7	œ		7	œ		9	<u>.</u>	mm
12 000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down							7200 *7450 7100 *7450 7300 *7450 7250 *7450	7200 *7450 6750 *7450 6550 *7450 6700 *7450	5550 *7450 5350 *7450 5350 *7450 5400 *7450				5400 *5700 5350 *5700 5500 *5700 5450 *5700	5400 *5700 5050 *5700 4900 *5700 5050 *5700	4150 *5700 4000 *5700 4000 *5700 4050 *5700	7090
10 500 mm	MH – stabilizers up – solid tires  MH – stabilizers down – solid tires  Lower (std UC) – f. stabilizer & r. dozer up  Lower (std UC) – f. stabilizer & r. dozer down  Lower (std UC) – f. dozer & r. stabilizer up  Lower (std UC) – f. dozer & r. stabilizer down  Lower (std UC) – 2 sets stabilizers up  Lower (std UC) – 2 sets stabilizers down										5150 *7250 5050 *7250 5200 *7250 5200 *7250	5150 *7250 4850 *7250 4700 *7250 4800 *7250	4000 *7250 3850 5600 3850 5700 3900 6700	3800 *4950 3700 *4950 3850 *4950 3800 *4950	3800 *4950 3550 *4950 3450 *4950 3550 *4950	2900 *4950 2800 4150 2800 4250 2800 *4950	8910
9000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up										5200 *7450 5150 *7450 5300 *7450 5250 *7450	5200 *7450 4900 *7450 4750 *7450 4900 *7450	4050 *7450 3900 5650 3900 5800 3950 6750	3050 *4550 3000 *4550 3100 *4550 3050 *4550	3050 *4550 2850 *4550 2750 *4550 2850 *4550	2300 *4550 2200 3300 2200 3400 2250 4000	10 180
7500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down										5200 *7500 5100 *7500 5250 *7500 5250 *7500	5200 *7500 4850 *7500 4750 *7500 4850 *7500	4050 *7500 3900 5650 3900 5750 3900 6750	2650 *4350 2550 *4350 2650 *4350 2650 *4350	2650 *4350 2450 *4350 2350 4100 2450 4200	1950 4050 1850 2850 1850 2950 1900 3450	11 110
6000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down										5100 *7700 5000 *7700 5150 *7700 5150 *7700	5100 *7700 4750 *7700 4600 *7700 4750 *7700	3950 *7700 3800 5550 3800 5650 3800 6600	2350 *4300 2300 4250 2400 *4300 2350 *4300	2350 *4300 2200 4200 2100 3700 2200 3800	1750 3700 1650 2600 1650 2650 1700 3100	11 760
4500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down							6950 *9500 6900 *9500 7100 *9500 7050 *9500	6950 *9500 6500 *9500 6350 *9500 6500	5350 *9500 5150 7600 5150 7800 5200 9250	4900 *8000 4800 *8000 4950 *8000 4950 *8000	4900 *8000 4600 *8000 4450 7650 4550 7850	3750 7550 3600 5350 3600 5450 3650 6400	2200 4200 2150 4000 2200 *4300 2200 4100	2200 4200 2050 3950 1950 3450 2000 3550	1600 3450 1500 2400 1500 2450 1550 2900	12 200
3000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				10 250 *13 350 10 200 *13 350 10 500 *13 350 10 450 *13 350	10 250 *13 350 9500 *13 350 9250 *13 350 9450 *13 350	7600 *13 350 7350 11 400 7350 11 800 7400 *13 350	6550 *10 250 6450 *10 250 6650 *10 250 6650 *10 250	6550 *10 250 6100 *10 250 5900 *10 250 6100 *10 250	4950 *10 250 4750 7200 4750 7400 4800 8750	4700 *8350 4600 *8350 4750 *8350 4700 *8350	4700 *8350 4350 *8350 4200 7400 4350 7600	3550 7300 3400 5100 3400 5250 3450 6150	2100 4050 2050 3850 2100 4250 2100 3950	2100 4050 1950 3800 1850 3350 1900 3450	1500 3300 1450 2300 1450 2350 1450 2800	12 430
1500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				9300 *14 600 9250 *14 600 9550 *14 600 9500 *14 600	9300 *14 600 8600 *14 600 8300 *14 600 8550 *14 600	6750 *14 600 6500 10 400 6500 10 800 6550 13 200	6100 *10 750 6000 *10 750 6200 *10 750 6150 *10 750	6100 *10 750 5650 *10 750 5450 10 150 5650 10 400	4550 9900 4350 6750 4350 6900 4400 8250	4450 *8500 4350 8300 4500 *8500 4450 8500	4450 *8500 4100 8100 3950 7100 4100 7300	3300 7000 3150 4850 3150 4950 3200 5900	2050 4000 2000 3800 2050 *4000 2050 3900	2050 4000 1900 3750 1800 3300 1900 3400	1500 3250 1400 2250 1400 2300 1400 2750	12 480
0 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	*4050 *4050 *4050 *4050 *4050 *4050 *4050 *4050	*4050 *4050 *4050 *4050 *4050 *4050 *4050 *4050	*4050 *4050 *4050 *4050 *4050 *4050 *4050 *4050	8600 *14 600 8500 *14 600 8800 *14 600 8750 *14 600	8600 *14 600 7850 *14 600 7600 *14 600 7850 *14 600	6100 *14 600 5800 9650 5800 10 000 5900 12 350	5700 *10 750 5600 *10 750 5800 *10 750 5800 *10 750	5700 *10 750 5300 *10 750 5100 9650 5250 9950	4150 9450 3950 6350 3950 6500 4000 7850	4200 *8400 4100 8050 4250 *8400 4200 8250	4200 *8400 3900 7850 3750 6850 3850 7050	3100 6750 2950 4600 2950 4750 2950 5650	5000	5100	2700	

<sup>\*</sup>Limited by hydraulic rather than tipping load.

Lift capacity ratings are based on ISO 10567:2007, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. The load point is the center line of the bucket pivot mounting pin on the stick. The oscillating axle must be locked. Lifting capacities are based on the machine standing on a firm uniform supporting surface. For lifting capacity including bucket and/or quick coupler, the respective weight has to be subtracted from above values. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

 $Always\ refer\ to\ the\ appropriate\ Operation\ and\ Maintenance\ Manual\ for\ specific\ product\ information.$ 

#### **Lift Capacities**

All values are in lb, hydraulic cab riser, attachment: none, with counterweight (11,470 lb), heavy lift on.

Load	I point height Load over front		Ţ	Load ov	ver rear		F	☐ Load ov	er side			Load	at maximu	ım reach (s	sticknose/l	oucket pin)	
	<b>carriage</b> r Standard						<b>Bo</b> c 22'-	om 4" MH	[			<b>Sti</b> c	ck 4" MH				
S <sub>T</sub>			10 ft			15 ft			20 ft			25 ft			*	=0	
	Undercarriage configuration	<b>-</b>	P	ŒP		7	œ		7	œ	4	P	GP		7	Œ	ft
40 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer own Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down							15,300 *15,600 15,200 *15,600 *15,600 *15,500 *15,600	15,300 *15,600 14,300 *15,600 13,900 *15,600 14,300 *15,600	11,800 *15,600 11,400 *15,600 11,400 *15,600 11,500 *15,600				12,700 *12,900 12,600 *12,900 *12,900 *12,900 *12,900 *12,900	12,700 *12,900 11,900 *12,900 11,600 *12,900 11,900 *12,900	9,800 *12,900 9,400 *12,900 9,400 *12,900 9,500 *12,900	22.31
35 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down										11,000 *15,300 10,800 *15,300 11,200 *15,300 11,100 *15,300	11,000 *15,300 10,300 *15,300 10,000 *15,300 10,300 *15,300	8,500 *15,300 8,200 12,000 8,200 12,200 8,300 14,300	8,700 *11,000 8,500 *11,000 8,700 *11,000 8,700 *11,000	8,700 *11,000 8,100 *11,000 7,800 *11,000 8,000 *11,000	6,600 *11,000 6,300 9,400 6,300 9,600 6,400 *11,000	28.67
30 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up										11,200 *16,300 11,000 *16,300 11,300 *16,300 11,300 *16,300	11,200 *16,300 10,500 *16,300 10,200 *16,300 10,500 *16,300	8,700 *16,300 8,400 12,200 8,400 12,400 8,500 14,500	6,900 *10,100 6,700 *10,100 6,900 *10,100 6,900 *10,100	6,900 *10,100 6,400 *10,100 6,200 *10,100 6,400 *10,100	5,200 *10,100 5,000 7,500 5,000 7,600 5,000 8,900	33.07
25 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down										11,200 *16,300 11,000 *16,300 11,300 *16,300 *16,300	11,200 *16,300 10,500 *16,300 10,200 *16,300 10,400 *16,300	8,700 *16,300 8,400 12,100 8,400 12,400 8,400 14,500	5,900 *9,700 5,700 *9,700 5,900 *9,700 5,900 *9,700	5,900 *9,700 5,400 *9,700 5,200 9,100 5,400 9,400	4,400 9,100 4,200 6,400 4,200 6,500 4,200 7,700	36.22
20 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up										11,000 *16,700 10,800 *16,700 11,100 *16,700 11,000 *16,700	11,000 *16,700 10,300 *16,700 10,000 *16,700 10,200 *16,700	8,500 16,700 8,100 11,900 8,100 12,200 8,200 14,200	5,200 *9,500 5,100 9,400 5,300 *9,500 5,200 *9,500	5,200 *9,500 4,900 9,300 4,700 8,200 4,800 8,500	3,900 8,200 3,700 5,700 3,700 5,800 3,700 6,900	38.48
15 ft	The stabilizers up—solid tires  MH – stabilizers up—solid tires  MH – stabilizers down – solid tires  Lower (std UC) – f. stabilizer & r. dozer up  Lower (std UC) – f. stabilizer & r. dozer down  Lower (std UC) – f. dozer & r. stabilizer up  Lower (std UC) – f. dozer & r. stabilizer down  Lower (std UC) – 2 sets stabilizers up  Lower (std UC) – 2 sets stabilizers down							15,000 *20,700 14,800 *20,700 15,300 *20,700 15,200 *20,700	15,000 *20,700 14,000 *20,700 13,600 *20,700 14,000 *20,700	11,500 *20,700 11,100 16,400 11,100 16,900 11,200 19,900	10,600 *17,400 10,400 *17,400 10,700 *17,400 10,600 *17,400	10,600 *17,400 9,900 *17,400 9,600 16,500 9,800 16,900	8,100 16,200 7,800 11,500 7,800 11,800 7,900 13,800	4,900 9,300 4,700 8,800 4,900 *9,500 4,900 9,000	4,900 9,300 4,500 8,700 4,300 7,700 4,500 7,900	3,600 7,600 3,400 5,300 3,400 5,400 3,400 6,400	39.96
10 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				22,100 *28,900 22,000 *28,900 22,600 *28,900 22,500 *28,900	22,100 *28,900 20,500 *28,900 19,900 *28,900 20,400 *28,900	16,500 *28,900 15,800 24,600 15,800 25,400 16,000 *28,900	14,100 *22,200 13,900 *22,200 14,400 *22,200 14,300 *22,200	14,100 *22,200 13,200 *22,200 12,800 *22,200 13,100 *22,200	10,700 *22,200 10,300 15,500 10,300 15,900 10,400 18,900	10,100 *18,100 9,900 *18,100 10,200 *18,100 10,100 *18,100	10,100 *18,100 9,400 18,000 9,100 15,900 9,400 16,300	7,600 15,700 7,300 11,000 7,300 11,300 7,400 13,300	4,600 9,000 4,500 8,500 4,700 9,400 4,600 8,700	4,600 9,000 4,300 8,300 4,100 7,400 4,200 7,600	3,400 7,300 3,200 5,100 3,200 5,200 3,200 6,200	40.78
5 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				20,100 *31,700 19,900 *31,700 20,600 *31,700 20,400 *31,700	20,100 *31,700 18,500 *31,700 17,900 *31,700 18,400 *31,700	14,600 *31,700 14,000 22,400 14,000 23,200 14,100 28,300	13,200 *23,300 13,000 *23,300 13,400 *23,300 13,300 *23,300	13,200 *23,300 12,200 *23,300 11,800 21,800 12,200 22,300	9,800 21,300 9,400 14,500 9,400 14,900 9,500 17,800	9,500 *18,500 9,300 17,800 9,700 *18,500 9,600 18,300	9,500 *18,500 8,900 17,400 8,600 15,300 8,800 15,700	7,100 15,100 6,800 10,400 6,800 10,700 6,900 12,700	4,500 8,800 4,400 8,300 4,600 *8,900 4,500 8,600	4,500 8,800 4,200 8,200 4,000 7,200 4,100 7,500	3,300 7,200 3,100 5,000 3,100 5,100 3,100 6,000	40.94
0 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – Z sets stabilizers up Lower (std UC) – 2 sets stabilizers up	*9,200 *9,200 *9,200 *9,200 *9,200 *9,200 *9,200	*9,200 *9,200 *9,200 *9,200 *9,200 *9,200 *9,200	*9,200 *9,200 *9,200 *9,200 *9,200 *9,200 *9,200	18,500 *31,700 18,300 *31,700 18,900 *31,700 18,800 *31,700	18,500 *31,700 17,000 *31,700 16,400 *31,700 16,900 *31,700	13,200 *31,700 12,500 20,800 12,500 21,500 12,700 26,500	12,300 *23,300 12,100 *23,300 12,500 *23,300 12,500 *23,300	12,300 *23,300 11,400 *23,300 11,000 20,800 11,300 21,400	9,000 20,400 8,600 13,600 8,600 14,000 8,700 16,900	9,100 *18,200 8,900 17,300 9,200 *18,200 9,100 17,700	9,100 *18,200 8,400 16,900 8,100 14,700 8,300 15,200	6,700 14,500 6,300 10,000 6,300 10,200 6,400 12,200				

<sup>\*</sup>Limited by hydraulic rather than tipping load.

Lift capacity ratings are based on ISO 10567:2007, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. The load point is the center line of the bucket pivot mounting pin on the stick. The oscillating axle must be locked. Lifting capacities are based on the machine standing on a firm uniform supporting surface. For lifting capacity including bucket and/or quick coupler, the respective weight has to be subtracted from above values. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

Always refer to the appropriate Operation and Maintenance Manual for specific product information.

#### **Lift Capacities**

All values are in kg, hydraulic cab riser, attachment: none, with counterweight (5200 kg), heavy lift on.

Loa	d point height Load over fro	ont		Ψı	oad ove	r rear			E Loa	nd over si	ide			Lo	ad at max	cimum re	ach (sticl	knose/bu	ıcket pin)	,
	<b>carriage</b> r Standard							_	<b>oom</b> .8 m l	МН					t <b>ick</b> 9 m N	ИΗ				
S <sub>T</sub>			4500 mm	ı		6000 mm			7500 mm			9000 mm		1	0 500 mn	ı			=	
_ <u></u>	Undercarriage configuration		P	æ	4	P	ŒP		P	ŒP		7	G-		ng l	<b>₫₽</b>		P	œ.	mm
12 000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers down Lower (std UC) – 2 sets stabilizers down																*7800 *7800 *7800 *7800 *7800 *7800 *7800 *7800	*7800 *7800 *7800 *7800 *7800 *7800 *7800 *7800	6550 *7800 6300 *7800 6300 *7800 6400 *7800	5190
10 500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				7150 *9150 7050 *9150 7250 *9150 7200 *9150	7150 *9150 6650 *9150 6500 *9150 6650 *9150	5500 *9150 5300 7800 5300 8000 5350 *9150	4900 *6300 4850 *6300 4950 *6300 4950 *6300	4900 *6300 4600 *6300 4450 *6300 4600 *6300	3800 *6300 3600 5350 3600 5450 3650 *6300							4900 *6300 4850 *6300 4950 *6300 4950 *6300	4900 *6300 4600 *6300 4450 *6300 4600 *6300	3750 *6300 3600 5350 3600 5450 3650 *6300	7500
9000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up				7250 *9250 7150 *9250 7350 *9250 7300 *9250	7250 *9250 6750 *9250 6600 *9250 6750 *9250	5600 *9250 5400 7900 5400 8100 5450 *9250	5050 *8050 4950 *8050 5100 *8050 5100 *8050	5050 *8050 4750 *8050 4600 7800 4700 8000	3900 7700 3750 5500 3750 5600 3800 6550							3700 *5700 3650 *5700 3750 *5700 3700 *5700	3700 *5700 3450 *5700 3350 *5700 3450 *5700	2850 5650 2700 4050 2700 4100 2750 4850	8980
7500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				7200 *9300 7100 *9300 7300 *9300 7250 *9300	7200 *9300 6700 *9300 6550 *9300 6700 *9300	5550 *9300 5350 7850 5350 8050 5400 *9300	*8000 *8000 4950 *8000 5100 *8000 *8000	5050 *8000 4700 *8000 4600 7800 4700 8000	3900 7700 3750 5500 3750 5600 3800 6550	3750 6950 3650 6600 3800 *7000 3750 6800	3750 6950 3500 6500 3400 5750 3500 5900	2850 5700 2750 4050 2750 4150 2750 4850				3100 *5400 3000 *5400 3150 *5400 3100 *5400	3100 *5400 2900 5400 2800 4800 2850 4950	2350 4750 2250 3350 2250 3450 2250 4050	10 020
6000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up				7000 *9700 6950 *9700 7100 *9700 7100 *9700	7000 *9700 6550 *9700 6350 *9700 6550 *9700	5400 *9700 5200 7650 5200 7850 5250 9250	4950 *8200 4850 *8200 5000 *8200 5000 *8200	4950 *8200 4650 *8200 4500 7700 4600 7900	3800 7550 3650 5400 3650 5500 3700 6450	3700 6900 3600 6550 3750 *7050 3700 6750	3700 6900 3450 6450 3350 5700 3450 5850	2850 5650 2700 4000 2700 4100 2750 4800	2850 5400 2800 5100 2900 5650 2850 5200	2850 5400 2650 5000 2550 4450 2650 4550	2150 4400 2050 3100 2050 3200 2050 3750	2750 5200 2650 4900 2750 *5300 2750 5000	2750 5200 2550 4800 2450 4250 2550 4400	2050 4250 1950 3000 1950 3050 2000 3600	10 740
4500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	10 550 *13 100 10 500 *13 100 10 800 *13 100 10 750 *13 100	10 550 *13 100 9800 *13 100 9500 *13 100 9750 *13 100	7900 *13 100 7600 11 700 7600 12 100 7650 *13 100	6700 *10 250 6650 *10 250 6800 *10 250 6800 *10 250 6800 *10 250	6700 *10 250 6250 *10 250 6100 *10 250 6250 *10 250	5100 *10 250 4900 7350 4900 7550 4950 8950	4800 *8400 4700 *8400 4850 *8400 4800 *8400	4800 *8400 4450 *8400 4300 7500 4450 7700	3650 7400 3500 5200 3500 5350 3550 6250	3600 6800 3550 6450 3650 *7100 3650 6650	3600 6800 3350 6350 3250 5600 3350 5750	2750 5550 2600 3950 2600 4000 2650 4750	2850 5350 2750 5050 2850 5600 2850 5200	2850 5350 2650 5000 2550 4400 2600 4550	2100 4350 2000 3100 2000 3150 2050 3700	2550 4800 2450 4550 2550 5050 2550 4650	2550 4800 2350 4500 2250 3950 2350 4050	1900 3950 1800 2750 1800 2800 1800 3350	11 220
3000 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	9750 *14 450 9650 *14 450 9950 *14 450 9900 *14 450	9750 *14 450 9000 *14 450 8700 *14 450 8950 *14 450	7150 *14 450 6850 10 850 6850 11 200 6950 13 650	6350 *10 800 6250 *10 800 6450 *10 800 6400 *10 800	6350 *10 800 5900 *10 800 5700 10 400 5850 10 650	4750 10 150 4550 6950 4550 7150 4600 8500	*8600 *8600 4500 8450 4650 *8600 4600 *8600	4600 *8600 4250 8250 4100 7250 4250 7450	3450 7150 3300 5000 3300 5100 3350 6050	3500 6700 3400 6350 3550 7050 3500 6500	3500 6700 3250 6200 3150 5500 3250 5650	2650 5450 2500 3800 2500 3900 2550 4600	2750 5300 2700 5000 2800 5550 2800 5100	2750 5300 2550 4900 2500 4350 2550 4450	2050 4300 1950 3000 1950 3100 2000 3650	2400 4600 2350 4350 2450 4850 2400 4450	2400 4600 2250 4300 2150 3800 2200 3900	1800 3750 1700 2650 1700 2700 1700 3200	11 470
1500 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	8950 *14 950 8850 *14 950 9150 *14 950 9100 *14 950	8950 *14 950 8250 *14 950 7950 *14 950 8200 *14 950	6450 *14 950 6150 10 000 6150 10 350 6200 12 750	5950 *10 950 5850 *10 950 6050 *10 950 6000 *10 950	5950 *10 950 5500 *10 950 5350 9950 5500 10 200	4400 9750 4200 6550 4200 6750 4250 8100	4350 *8600 4300 8200 4400 *8600 4400 8400	4350 *8600 4050 8000 3900 7050 4050 7200	3250 6950 3100 4800 3100 4900 3150 5850	3400 6550 3300 6200 3400 6900 3400 6350	3400 6550 3150 6100 3050 5350 3100 5500	2500 5300 2400 3700 2400 3800 2450 4500	2700 5200 2650 4900 2750 5500 2700 5050	2700 5200 2500 4850 2400 4250 2500 4400	2000 4250 1900 2950 1900 3050 1950 3600	2350 *4400 2300 4300 2400 *4400 2350 *4400	2350 *4400 2200 4250 2100 3750 2200 3850	1750 3700 1650 2600 1650 2650 1650 3150	11 520
0 mm	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up	8450 *10 200 8350 *10 200 8650 *10 200 8600 *10 200	8450 *10 200 7750 *10 200 7450 *10 200 7700 *10 200	6000 *10 200 5700 9500 5700 9850 5750 *10 200	5650 *10 450 5550 *10 450 5750 *10 450 5750 *10 450	5650 *10 450 5250 *10 450 5050 9600 5200 9850	4150 9400 3950 6250 3950 6450 4000 7800	4200 *8150 4100 8000 4250 *8150 4200 *8150	4200 *8150 3900 7800 3750 6850 3850 7050	3100 6750 2950 4600 2950 4750 3000 5650	3300 6450 3200 6100 3300 *6450 3300 6250	3300 6450 3050 5950 2950 5250 3000 5400	2400 5200 2300 3600 2300 3700 2350 4350	2650 *4950 2600 4850 2700 *4950 2650 *4950	2650 *4950 2450 4800 2350 4200 2450 4350	1950 4200 1850 2900 1850 2950 1900 3550				

<sup>\*</sup>Limited by hydraulic rather than tipping load.

Lift capacity ratings are based on ISO 10567:2007, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. The load point is the center line of the bucket pivot mounting pin on the stick. The oscillating axle must be locked. Lifting capacities are based on the machine standing on a firm uniform supporting surface. For lifting capacity including bucket and/or quick coupler, the respective weight has to be subtracted from above values. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

 $Always\ refer\ to\ the\ appropriate\ Operation\ and\ Maintenance\ Manual\ for\ specific\ product\ information.$ 

#### **Lift Capacities**

All values are in lb, hydraulic cab riser, attachment: none, with counterweight (11,470 lb), heavy lift on.

Loa	d point height Load over fro	nt		Ψ,	Load ove	rrear			Loa	d over si	de			Lo	ad at max	imum re	ach (stic	knose/bu	icket pin)	)
	<b>carriage</b> r Standard							_	oom 2'4" N	1H					i <b>ck</b> 5'1" M	Н				
> <sub>T</sub>			15 ft			20 ft			25 ft			30 ft			35 ft			4	=	
<u>*T</u>	Undercarriage configuration		7	æ	<b>A</b>	P	Œ.	4	P	ŒP	4	7	ŒP		P	<b>F</b>	<b>A</b>	P	Œ.	ft
40 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up	*19,000 *19,000 *19,000 *19,000 *19,000 *19,000 *19,000	*19,000 *19,000 *19,000 *19,000 *19,000 *19,000 *19,000	17,500 *19,000 16,900 *19,000 16,900 *19,000 17,100 *19,000													*18,000 *18,000 *18,000 *18,000 *18,000 *18,000 *18,000	*18,000 *18,000 *18,000 *18,000 *18,000 *18,000 *18,000	16,400 *18,000 15,800 *18,000 15,800 *18,000 15,900 *18,000	15.65
35 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				15,300 *19,500 15,100 *19,500 15,500 *19,500 15,400 *19,500	15,300 *19,500 14,300 *19,500 13,900 *19,500 14,200 *19,500	11,800 *19,500 11,300 16,700 11,300 17,100 11,400 *19,500										11,300 *14,100 11,100 *14,100 11,400 *14,100 11,400 *14,100	11,300 *14,100 10,600 *14,100 10,200 *14,100 10,500 *14,100	8,700 *14,100 8,300 12,300 8,300 12,600 8,400 *14,100	23.95
30 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – Z sets stabilizers up Lower (std UC) – 2 sets stabilizers down Lower (std UC) – 2 sets stabilizers down				15,500 *20,200 15,300 *20,200 15,800 *20,200 15,700 *20,200	15,500 *20,200 14,500 *20,200 14,100 *20,200 14,500 *20,200	12,000 *20,200 11,600 16,900 11,600 17,400 11,700 *20,200	10,800 *17,600 10,600 *17,600 11,000 *17,600 10,900 *17,600	10,800 *17,600 10,100 *17,600 9,800 16,700 10,100 17,100	8,400 16,500 8,000 11,800 8,000 12,000 8,100 14,100							8,400 *12,700 8,200 *12,700 8,400 *12,700 8,400 *12,700	8,400 *12,700 7,800 *12,700 7,500 *12,700 7,800 *12,700	6,400 *12,700 6,100 9,100 6,100 9,300 6,200 10,900	29.07
25 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down				15,500 *20,300 15,300 *20,300 15,700 *20,300 15,600 *20,300	15,500 *20,300 14,500 *20,300 14,100 *20,300 14,400 *20,300	*20,300 *20,300 11,500 16,900 11,500 17,300 11,600 20,300	10,900 *17,500 10,700 *17,500 11,000 *17,500 10,900 *17,500	10,900 *17,500 10,200 *17,500 9,800 16,700 10,100 17,200	8,400 16,500 8,100 11,800 8,100 12,100 8,100 14,100	8,000 14,900 7,900 14,200 8,100 *15,300 8,100 14,500	8,000 14,900 7,500 13,900 7,300 12,400 7,500 12,700	6,100 12,200 5,900 8,700 5,900 8,900 5,900 10,400				6,900 *12,000 6,700 *12,000 7,000 *12,000 6,900 *12,000	6,900 *12,000 6,400 *12,000 6,200 10,700 6,400 11,000	5,200 10,600 5,000 7,500 5,000 7,700 5,100 9,000	32.64
20 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up				15,100 *21,000 14,900 *21,000 15,300 *21,000 15,300 *21,000	15,100 *21,000 14,100 *21,000 13,700 *21,000 14,100 *21,000	11,600 *21,000 11,200 16,500 11,200 16,900 11,300 19,900	10,700 *17,800 10,500 *17,800 10,800 *17,800 10,700 *17,800	10,700 *17,800 10,000 *17,800 9,700 16,500 9,900 16,900	8,200 16,300 7,900 11,600 7,900 11,900 7,900 13,900	8,000 14,900 7,800 14,100 8,000 *15,300 8,000 14,500	8,000 14,900 7,400 13,900 7,200 12,300 7,400 12,600	6,100 12,200 5,800 8,700 5,800 8,900 5,900 10,400	6,100 11,500 6,000 10,900 6,200 *12,100 6,100 11,200	6,100 11,500 5,700 10,800 5,500 9,500 5,700 9,800	4,600 9,500 4,400 6,700 4,400 6,800 4,400 8,000	6,100 11,500 5,900 10,900 6,100 *11,700 6,100 11,100	6,100 11,500 5,700 10,700 5,500 9,500 5,600 9,700	4,600 9,400 4,300 6,600 4,300 6,800 4,400 8,000	35.10
15 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	22,700 *28,400 22,600 *28,400 23,200 *28,400 23,100 *28,400	22,700 *28,400 21,100 *28,400 20,500 *28,400 21,000 *28,400	17,000 *28,400 16,400 25,200 16,400 26,000 16,600 *28,400	14,500 *22,200 14,300 *22,200 14,700 *22,200 14,600 *22,200	14,500 *22,200 13,500 *22,200 13,100 *22,200 13,500 *22,200	11,000 *22,200 10,600 15,900 10,600 16,300 10,700 19,200	10,300 *18,300 10,100 *18,300 10,400 *18,300 10,400 *18,300	10,300 *18,300 9,600 *18,300 9,300 16,100 9,600 16,600	7,900 15,900 7,500 11,200 7,500 11,500 7,600 13,500	7,800 14,700 7,600 13,900 7,900 *15,400 7,800 14,300	7,800 14,700 7,300 13,700 7,000 12,100 7,200 12,400	5,900 12,000 5,600 8,500 5,600 8,700 5,700 10,200	6,100 11,500 5,900 10,900 6,100 12,100 6,100 11,200	6,100 11,500 5,700 10,700 5,400 9,500 5,600 9,700	4,600 9,400 4,300 6,600 4,300 6,800 4,400 8,000	5,600 10,600 5,400 10,000 5,600 11,200 5,600 10,300	5,600 10,600 5,200 9,900 5,000 8,800 5,200 9,000	4,200 8,700 4,000 6,100 4,000 6,200 4,000 7,400	36.75
10 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	21,000 *31,300 20,900 *31,300 21,500 *31,300 21,400 *31,300	21,000 *31,300 19,400 *31,300 18,800 *31,300 19,300 *31,300	15,500 *31,300 14,800 23,400 14,800 24,200 15,000 29,300	13,700 *23,400 13,500 *23,400 13,900 *23,400 13,800 *23,400	13,700 *23,400 12,700 *23,400 12,300 22,300 12,700 22,900	10,300 21,900 9,900 15,000 9,900 15,400 10,000 18,300	9,900 *18,700 9,700 18,200 10,000 *18,700 9,900 18,600	9,900 *18,700 9,200 17,800 8,900 15,600 9,200 16,100	7,500 15,400 7,100 10,800 7,100 11,000 7,200 13,000	7,500 14,400 7,400 13,600 7,600 15,200 7,600 14,000	7,500 14,400 7,000 13,400 6,800 11,800 7,000 12,100	5,700 11,700 5,400 8,200 5,400 8,400 5,500 9,900	6,000 11,400 5,800 10,700 6,000 12,000 6,000 11,000	6,000 11,400 5,500 10,600 5,300 9,300 5,500 9,600	4,400 9,300 4,200 6,500 4,200 6,700 4,300 7,900	5,300 10,200 5,200 9,600 5,400 10,700 5,300 9,900	5,300 10,200 4,900 9,500 4,700 8,400 4,900 8,600	3,900 8,300 3,700 5,800 3,700 5,900 3,800 7,000	37.63
5 ft	MH – stabilizers up – solid tires MH – stabilizers down – solid tires Lower (std UC) – f. stabilizer & r. dozer up Lower (std UC) – f. stabilizer & r. dozer down Lower (std UC) – f. dozer & r. stabilizer up Lower (std UC) – f. dozer & r. stabilizer down Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers up Lower (std UC) – 2 sets stabilizers down	19,300 *32,400 19,100 *32,400 19,700 *32,400 19,600 *32,400	19,300 *32,400 17,800 *32,400 17,200 *32,400 17,700 *32,400	13,900 *32,400 13,300 21,600 13,300 22,300 13,400 27,400	12,900 *23,800 12,600 *23,800 13,100 *23,800 13,000 *23,800	12,900 *23,800 11,900 *23,800 11,500 21,400 11,900 21,900	9,100 14,200 9,100 14,600 9,200	9,400 18,600 9,200 17,700 9,500 *18,600 9,500 18,100	9,400 18,600 8,800 17,200 8,400 15,100 8,700 15,600	7,000 14,900 6,700 10,300 6,700 10,600 6,800 12,600	7,300 14,100 7,100 13,300 7,400 14,900 7,300 13,700	7,300 14,100 6,800 13,100 6,500 11,500 6,700 11,900	5,400 11,400 5,200 8,000 5,200 8,200 5,200 9,700	5,800 11,200 5,700 10,600 5,900 11,800 5,800 10,900	5,800 11,200 5,400 10,400 5,200 9,200 5,400 9,500	4,300 9,100 4,100 6,400 4,100 6,500 4,100 7,700	5,200 *9,700 5,100 9,500 5,200 *9,700 5,200 *9,700	5,200 *9,700 4,800 9,300 4,600 8,200 4,800 8,500	3,800 8,200 3,600 5,700 3,600 5,800 3,700 6,900	37.83
0 ft	MH - stabilizers up - solid tires MH - stabilizers up - solid tires MH - stabilizers down - solid tires Lower (std UC) - f. stabilizer & r. dozer up Lower (std UC) - f. stabilizer & r. dozer down Lower (std UC) - f. dozer & r. stabilizer up Lower (std UC) - f. dozer & r. stabilizer down Lower (std UC) - 2 sets stabilizers up Lower (std UC) - 2 sets stabilizers down	18,200 *23,900 18,000 *23,900 18,600 *23,900 18,500 *23,900	18,200 *23,900 16,700 *23,900 16,100 *23,900 16,600 *23,900	12,900 *23,900 12,300 20,500 12,300 21,200 12,500 *23,900	12,200 *22,700 12,000 *22,700 12,400 *22,700 12,300 *22,700	12,200 *22,700 11,300 *22,700 10,900 20,600 11,200 21,200	8,900 20,200 8,500 13,500 8,500 13,900 8,600	9,100 *17,700 8,900 17,200 9,200 *17,700 9,100 17,700	9,100 *17,700 8,400 16,800 8,100 14,700 8,300 15,100	6,700 14,500 6,400 10,000 6,400 10,200 6,400 12,200	7,100 13,800 6,900 13,100 7,100 *13,900 7,100 13,400	7,100 13,800 6,600 12,900 6,300 11,300 6,500 11,600	5,200 11,200 5,000 7,800 5,000 7,900 5,000 9,400	5,700 *10,500 5,600 10,500 5,800 *10,500 5,700 *10,500	5,700 *10,500 5,300 10,300 5,100 9,100 5,300 9,400	4,200 9,000 4,000 6,300 4,000 6,400 4,000 7,600	5,7 00	3,000	5,000	

<sup>\*</sup>Limited by hydraulic rather than tipping load.

Lift capacity ratings are based on ISO 10567:2007, they do not exceed 87% of hydraulic lifting capacity or 75% of tipping load. The load point is the center line of the bucket pivot mounting pin on the stick. The oscillating axle must be locked. Lifting capacities are based on the machine standing on a firm uniform supporting surface. For lifting capacity including bucket and/or quick coupler, the respective weight has to be subtracted from above values. The use of a work tool attachment point to handle/lift objects, could affect the machine lift performance.

Always refer to the appropriate Operation and Maintenance Manual for specific product information.

### **MH3024 Standard Equipment**

#### **Standard Equipment**

Standard equipment may vary. Consult your Cat dealer for details.

#### **ELECTRICAL**

- Alternator, 115A
- Heavy Duty maintenance free batteries
- Lighting
- -Boom and stick LED working light
- One LED light on the counterweight for the rear camera, and one on the right for the sideview camera
- -Cab LED interior dome light
- -Roading lights, two front, halogen
- -Roading lights, two rear, LED
- Working LED lights, cab mounted (two front and one rear), compatible with Falling Object Guards
- · Main shut-off switch
- Signal/warning horn

#### **ENGINE**

- Cat C7.1 ACERT technology engine meets Tier 4 Final/Stage IV emission standards
- Aftertreatment technologies including the Cat Clean Emission Module (Cat CEM) package
- Air filter
- 3000 m (9,842 ft) altitude capability without de-rate
- Automatic Engine Speed Control (AESC), including One Touch Low Idle
- Engine Idle Shutdown (EIS)
- · Automatic starting aid
- Fuel filter
- Fuel/water separator with water in fuel switch
- 48° C (188.8° F) ambient cooling capability without de-rate
- Power mode selector
- Electric fuel priming pump

#### **HYDRAULICS**

- Adjustable hydraulic sensitivity
- Cat XTTM-6 ES hoses
- Control circuits (standard and optional, depending on boom/stick/linkage choice):
- Medium pressure
- Two-way, medium pressure circuit, for rotating or tilting of attachments
- · Heavy lift mode
- · Load-sensing hydraulic system
- · Quick disconnect couplings
- · Separate swing pump
- · Stick regeneration circuit
- Electronic Pump Control (EPC)
- Boom Lowering Check Valve (BLCV), including overload warning device
- Stick Lowering Check Valve (SLCV)

(continued on next page)

### MH3024 Standard Equipment

#### **Standard Equipment** (continued)

Standard equipment may vary. Consult your Cat dealer for details.

#### **OPERATOR STATION**

- Additional color monitor for cameras, split-screen display for both cameras' view
- · Adjustable armrests
- Air conditioner, heater and defroster with automatic climate control
- Beverage cup/can holder
- · Bolt-on top/front guards capability
- Bottle holder
- Bottom mounted, intermittent (four speeds), parallel wiping system, covering upper and lower windshield glass
- CD/MP3 radio (12V) including speakers and 12V converter
- · Coat hook
- · Cruise control system
- Floor mat, washable, with storage compartment
- Fully adjustable suspension seat
- Hydraulic cab riser
- Instrument panel and gauges, full graphic and color display
- Information and warning messages in local language
- Gauges for fuel and DEF levels, engine coolant and hydraulic oil temperature
- Filters/fluids change interval, working hours
- Indicators for headlights, turning signal, low fuel, engine dial setting
- -Clock with 10-day backup battery
- Interior LED lighting with door switch
- Joysticks, pilot operated with one proportional slider
- · Laminated front windshield
- Left side console, tiltable, with lock out for all controls
- Cigarette lighter (24V)

- Literature holder in right console
- Mobile phone holder
- · Parking brake
- Pin code type engine start prevention, integrated into the monitor
- Power supply, 12V-10A
- Rear window (tempered glass)/emergency exit, with hammer
- Retractable seat belt, integrated into the seat
- · Seat belt indicator and alarm
- · Skylight, laminated glass
- Sliding door windows
- Steering column, adjustable angle and height
- Step, integrated into the skirt
- Storage area suitable for a lunch box
- · Sunshade for windshield and skylight
- Safety lever, integrated into the left console
- Sealed cab, with positive filtered, variable speed ventilation

#### **UNDERCARRIAGE**

- · Automatic brake and axle lock
- Automatic swing and implement lock
- · Creeper speed
- Four wheel drive
- Heavy-duty axles, advanced travel motor, adjustable braking force and disc brake system
- Oscillating front axle, lockable, with remote greasing point
- Steps, wide, left and right
- Tool boxes, left and right, in undercarriage
- · Two-speed hydrostatic transmission
- One-piece drive shaft, with 1,000 hours greasing intervals

#### **OTHER EQUIPMENT**

- Auto-lube system (implements and swing gear)
- · Automatic swing brake
- · Capability to add auxiliary hydraulic circuit
- Cat Electronic Technician capability (ET)
- Counterweight, 4100 kg (9,039 lb)
- Door locks and cap locks with Cat one-key security system
- Mirrors, wide angle, frame and cab
- Product Link
- Cameras
  - Rear mounted wide angle camera, integrated into the counterweight
- Right side wide angle camera, mounted on the cooling hood
- S·O·S<sup>SM</sup> Quick Sampling valves for engine oil, hydraulic oil and coolant
- Engine emergency shutoff switch
- · Spacer rings for tires
- Cooling package, fine mesh screen, and engine air precleaner

#### **Optional Equipment**

Optional equipment may vary. Consult your Cat dealer for details.

#### **AUXILIARY CONTROLS AND LINES**

- · Auxiliary boom and stick lines
- Control circuits (standard and optional, depending on boom/stick/linkage choice):
- -Tool control/multi function
  - One/two-way high pressure for hammer application or opening and closing of an attachment
  - Programmable flow and pressure for up to 10 attachments selection via monitor
- Quick coupler circuit and lines for Cat Pin Grabber coupler, controlled by a dedicated switch
- SmartBoom

#### **HYDRAULICS**

• Cat BIO HYDO Advanced HEES biodegradable hydraulic oil

#### **FRONT LINKAGE**

- VA boom, 5440 mm (17'10"):
- -Straight stick
  - 2500 mm (8'2")
  - 2900 mm (9'6")
- One-Piece boom, 5650 mm (18'6"):
- -Straight stick
  - 2500 mm (8'2")
  - 2900 mm (9'6")
- Material Handling boom, 6800 mm (22'4"):
- -Drop nose MH stick
  - 4900 mm (16'1")
- 5900 mm (19'4")
- -Straight MH stick
- 4800 mm (15'9")

#### **ELECTRICAL**

- Travel alarm
- Rotating beacon
- · Generator, 15 kW
- Kit, generator, 15 kW\*\*

#### **OPERATOR STATION**

- · Top/front guards
- Joystick steering
- Advanced joysticks, with two proportional sliders
- Pedal HPF/Hammer for auxiliary operation
- Seat, adjustable high-back, with vertical and horizontal air-suspension and head rest
  - Automatic weight adjustment, mechanical lumbar support, passive climate system, seat cushion length/angle adjustment and heated seat (Comfort)
  - Automatic height and weight adjustment, active climate system, premium microfiber seat fabric, pneumatic lumbar support, seat cushion length and angle adjustment and adjustable dampening, heated and ventilated (Deluxe)
- Visor for rain protection
- Windshield
- One-piece, impact resistant, laminated windshield and skylight (EN356 P5A standards, 10 mm/0.4 in)
- 70/30 split, openable. Two-parts split, fixed, high impact resistant, with skylight (EN356 P8B standards, 26 mm/1 in).
- Mirrors, electrically adjustable and heated, frame and cab

#### **TIRES**

- Dual pneumatic 11.00-20
- Dual solid rubber, 10.00-20

#### **UNDERCARRIAGE**

- MH undercarriage with four welded outriggers
- MH undercarriage with four welded outriggers and front mounted blade
- Standard undercarriage, with outriggers (front and/or rear), dozer blade (front or rear)
- · Easy Cab Access package with ladder

#### **OTHER EQUIPMENT**

- · Bucket linkages
- Cat Machine Security System
- Counterweight, 5200 kg (11,464 lb)
- Hydraulic quick coupler
- Maximum speed 20 kph (12.5 mph) or 25 kph (15.5 mph)\*
- Refueling pump with dedicated tray for the hose
- Waste Handling package, adds a reversing fan and vibrating grill to the cooling protection package
- Kit, Waste Handling package
- Cab pre-filtration system
- Attachments (see p. 28)
- \*25 kph (15.5 mph) not compatible with solid tires
- \*\*Available starting 2017

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