

WHEEL LOADERS
4.0 – 7.5 YD³

DOOSAN[®]



	Bucket Capacity		Operating Weight	Rated Power
	Heaped, ISO / SAE			
DL 300-5K	4.2 yd³	3.2 m³	41,484 lb. (18 980 kg)	271 hp (202 kW)
DL 350-5K	4.8 yd³	3.7 m³	43,451 lb. (19 750 kg)	271 hp (202 kW)
DL 420-5	5.5 yd³	4.2 m³	50,783 lb. (23 035 kg)	345 hp (257 kW)
DL 450-5	6.3 yd³	4.8 m³	56,868 lb. (25 795 kg)	345 hp (257 kW)
DL 550-5	7.5 yd³	5.7 m³	69,897 lb. (31 705 kg)	380 hp (283 kW)



Images of Doosan units may show other than standard equipment or new T4-compliant models.

While Doosan is a relatively young brand in the North American construction equipment market, the organization has a heritage in equipment manufacturing that goes back to 1937. And since 2005, we've grown to become the fifth largest construction equipment manufacturer in the world.



Today, Doosan Infracore Construction Equipment America (DICEA) and its affiliates are industry leaders in the engineering, manufacturing and marketing of construction equipment, including:

- Skid-Steer Loaders
- Excavators
- Wheel Loaders
- Articulated Dump Trucks
- Attachments
- Air Compressors
- Lighting Systems
- Generators
- Compact Construction Equipment
- Engine Power Systems

Building Your Tomorrow Today

Beyond its products for the construction industry, Doosan Infracore Support Business (ISB) segments include forklifts, material handling, machine tools, castings, forgings, construction, engineering, power generation, water treatment and desalination, plus renewable energy.

Your North American Partners.

With our network of dealers and a company infrastructure that spans North America, we can fully support your equipment from coast to coast.



PERFORMANCE

With tremendous lift height and capacity, along with enough torque to bite into the toughest materials, Doosan wheel loaders go a step beyond scooping, carrying and loading. It's your ticket to making harder work easier, longer days more enjoyable, and every minute more productive and profitable.



Optimized Engine Horsepower

A finely-tuned horsepower curve and increased torque make you the picture of productivity. The SCR catalyst system reduces emissions.



Outstanding Traction and Pushing Power

Doosan axles are carefully designed to work with the model you choose, maximizing your traction for easy maneuverability and providing excellent pushing power to take a big, satisfying bite out of any pile.

Limited Slip Differential allows the wheel with the most traction to receive the proper torque, providing superior tractive effort and maneuverability in tough terrain.



Lift Capacity

The ability to take on big heavy loads is critical for doing more work in less time. Doosan doesn't let you down. Load-sensing, closed-center hydraulics provide superior lift capacities for every model size.

Hydraulic Locking Front Differential (opt*)

locks the front wheels together, providing superior traction for driving over loose, slippery terrain or pushing into big, heavy piles.

**Standard on the DL550-5*

Self-Adjusting Brakes increase performance and minimize maintenance. If needed, a technician can easily check the brakes and adjust externally. The brake piping is integrated with the axle housing to protect it from jobsite debris damage.

Engine Power Modes

Choose from three different engine power modes to change machine performance for job conditions or to reduce fuel consumption.

Power Mode delivers the highest level of performance for fast loading and travel to finish loads of heavy-duty work in less time.

Normal Mode is ideal for general work conditions and optimal fuel consumption.

Economy Mode minimizes fuel consumption and engine sound levels for comfortable, economical light-duty work.

Planetary Final Drives

The planetary final drives transfer torque to the wheels through the transmission and differential. They enable higher travel speeds and great torque reduction. The outboard, hub-mounted design makes maintenance easy.



Features mean nothing if your machine can't do more in a day. It all comes down to productivity – and nobody understands that better than Doosan.



FNR Joystick

Direction changes don't get any simpler than this. Once activated, just depress the joystick buttons to switch back and forth from forward, neutral and reverse. You don't have to remove your hands from the controls, which increases your performance and reduces fatigue.

Tier 4 (T4) Compliant

Optimized to provide more power output with reduced fuel consumption, Doosan wheel loaders are designed with T4 compliant engines to reduce air pollution.



Cooled Exhaust Gas Recirculation (CEGR)

CEGR recycles a portion of the engine exhausts to reduce oxygen (O) and lower the temperature in the combustion chamber. This reduces nitrogen oxide (NO_x) emissions.

Diesel Oxidation Catalyst (DOC)

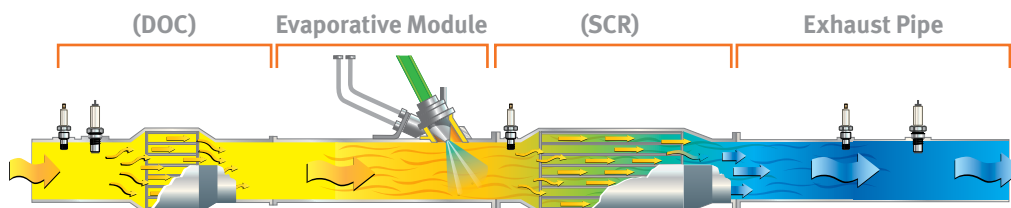
In the DOC, carbon monoxide (CO) and particulate matter (PM) emissions are transformed into harmless water (H₂O) and carbon dioxide (CO₂).

Evaporative Module

In the evaporative module, or mixing pipe, diesel exhaust fluid (DEF) solution is injected in small doses and mixed with hot exhaust gases, decomposing it into urea (CO(NH₂)₂) and water vapor, which then catalyzes into carbon dioxide and ammonia (NH₃).

Selective Catalyst Reduction (SCR)

In the SCR canister, nitrogen oxide (NO_x) mixes with ammonia, and a chemical reaction takes place resulting in nitrogen (N) and water vapor emitting from the system. The SCR canister also acts as the silencer or muffler.





Fast Cycle Times

The entire Doosan wheel loader lineup is carefully engineered for a perfect balance of speed and controllability – so you get optimal production. Variable displacement piston pumps in all models allow Doosan wheel loaders to power through difficult jobs with minimal fuel consumption and multifunction operation of the lift arm and bucket.

Diesel Exhaust Fluid (DEF)

DEF is a solution of pure urea and deionized water. A minimum level of DEF is required for proper machine operation, and the DEF supply tank is heated for proper operation in cold weather. DEF is available from your Doosan dealer in various container sizes.

(DEF Tank)

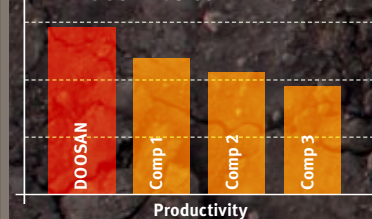


Optional Load Isolation System

The load isolation system, sometimes referred to as “ride control,” cushions the lift arm while traveling over rough terrain, minimizing the amount of material spillage while carrying a load and reducing operator fatigue. It also comes in handy when your customers pay for material by the bucket.



FUEL EFFICIENCY DOOSAN VS COMPETITORS



Fuel Efficiency

Fuel use is a significant cost of operation, and Doosan efficiently delivers more work for the money. In our fuel efficiency tests against equivalent machines from other manufacturers, the Doosan wheel loader consistently moved more material per gallon of fuel.

Whether you're loading a small truckload or moving a mountain of material, Doosan delivers amazing results in less time.



Return to Dig

Sensors on the lift arm and bucket linkage allow you to change your “return to dig” setting from inside the cab. The cylinders and cutting edge return to the same position every time, enabling more efficient, consistent work.

Lift Kickout

Set the maximum lift height for working inside buildings or other areas with height restrictions. Simply pull back on the control joystick to override.

Transmission Modes

With three separate transmission modes, you can choose the transmission you want for the working conditions you face, making it easy to tailor performance for better productivity.



Transmission Optimization is a key feature of the automatic transmission modes. It calibrates different shift points to tailor the amount of power and engine torque per gear. When you engage either Auto 1-4 or Auto 2-4 in Economy Mode, the automatic transmission shifts at the optimal point for increased fuel efficiency. In Power Mode or Normal Mode, the transmission shift point occurs 20 percent later — allowing more torque and power within each gear range.

Manual is ideal when the job requires precise speed control.

Auto 1-4 automatically shifts up when you need more speed and downshifts when the job demands more power or torque. It's excellent for heavy-duty applications.

Auto 2-4 with Manual Kickdown gives you automatic shifting between gears 2 through 4, with a manual downshift into first gear when you need it. It provides the best performance for less demanding work conditions.

Transmission Cutout

Need more engine power for lift arm speed? In lower gears, simply depress the left brake pedal to disengage the transmission. Disengage transmission cutout with your switch panel to start moving on an incline with greater ease.

Torque Converter

The torque converter improves power train efficiency in load and carry operations, which contributes to improved fuel efficiency.

The Optional Torque Converter Lockup Clutch

enables nearly 100 percent torque transfer directly from the engine to the transmission, for quicker acceleration and climbing uphill. Engaged via a dash-mounted switch, it increases productivity up to 20 percent in stockpiling applications and improves gear shifting for faster cycle times during truck loading and boasts high-gear performance during load-and-carry operations.

Auto Idle

The standard auto idle feature automatically reduces the engine RPM to standby idle a few seconds after the steering wheel, gearshift control lever and accelerator cease movement. This reduces noise, improves jobsite communications and saves fuel. When you move the controls, the loader automatically returns to working idle.

Auto Shutdown

When enabled, the engine will shut down after idle time reaches a specified elapsed time (three to 60 minutes).

An Optional Hydraulic Coupler

increases your productivity with non-hydraulic attachments, such as the pallet fork, saving you time by enabling you to switch from one attachment to the next without leaving the cab.

Increased Lift Height

Increased Reach

Z-Bar Lift Arm Linkage is designed for heavy lifting in loading applications, with geometry that enables rapid bucket movement and proper angle positioning in every situation.

Standard Z-Bar has excellent break-out forces for easier digging and penetration into tough materials — and it increases the lifting capacity of every Doosan loader.

High Lift Z-Bar is optional and is designed for applications requiring the highest possible dumping height. It's ideal for cement plants, scrap, mulch or wastewater transfer stations.

DURABILITY / RELIABILITY

Doosan builds its machines so they're ready to work when you are. Whether it's solid construction, heavy-duty parts and materials or innovative features that keep you on the job with fewer service intervals, your wheel loader ranks among the toughest and most profitable machines in the industry.

Axle Oil Cooler

(optional DL420-5, DL500-5) For certain applications, such as long-distance load carrying or high-ambient temperature conditions, the optional axle cooler improves reliability.





Tough, Rigid Frame

Each frame section is designed to maximize the life of the machine. Thick steel plates, cross members and gussets join to form a strong, durable articulation joint that stands up to years of difficult work.



Double Roller Articulation Joint Bearing

To create an articulation pivot point with superior strength, tough double roller bearings are used at both the top and bottom hinge points between the front and rear frames.



Large Center Driveline Bearing

An oversized bearing, vented to prevent over greasing, increases durability of the front drive shaft.



All-Steel Panels

Access panels on Doosan wheel loaders allow easy maintenance access. But more than that, they're durable formed-metal parts that protect critical engine, hydraulic and electrical components.



Lift Arm Pin Protection

Lift arm pins are protected with bushings and dust covers to increase pin life and reduce maintenance.

Variable Speed Cooling Fan

The variable speed fan slows and speeds up as required by the work demands of your loader. In lighter-duty conditions, the coolant temperature is low and the fan slows – saving fuel and extending the cooling system's life.



Reversible Cooling Fan

By pressing a console switch, the cooling fan can be reversed to assist in keeping the cooling system clean in extremely dusty applications. Press it to keep the machine running at optimal temperature. You can also set it to auto reverse for a few minutes at a time at different intervals – at 30, 60, 90 or 120 minutes depending on work conditions.

Separate Cooling and Engine Compartments

Doosan isolates the wheel loader engine from the cooling system. This design increases cooling capacity and extends the life of your engine components.



Exhaust Heat Exchanger

As exhaust leaves the muffler on your Doosan wheel loader, it enters a larger external riser pipe with rain shield. This design creates a vacuum that pulls hot air out of the engine compartment, making your engine and cooling system run more efficiently.

Thick Lift Arm Plates

Thick, solid-steel lift arm plates provide maximum durability in harsh conditions – along with improved lift capacities and a narrower arm design that increases your visibility.

COMFORT

Doosan understands the close connection between comfort and productivity. You can't push your performance to the limit when you're uncomfortable. The Doosan cabin is packed from floor to ceiling with high-end comfort that makes every operator more productive and satisfied on the job.

Quiet Operation

A quiet operating environment plays a big part in keeping operators comfortable and focused on the job. Noise levels in the cabin stay below a comfortable 71 decibels, thanks to the variable speed cooling fan, double-walled muffler, soundproof materials throughout the engine compartment and tightly sealed and pressurized cabin.

Excellent Visibility

Large front and rear glass surface areas provide an excellent view to the loader workgroup and jobsite. Narrow corner pillars and small window joints increase visibility to the front of the machine. Heated mirrors provide aid during cold temperatures.

Electric Steering Option

Optional electric steering allows you to control direction and steer the machine with easy-to-operate switches on the left arm rest, providing extra operator comfort during repetitive cycle operations.

Easy Entry and Exit

Grab handles and offset steps with slip-resistant surfaces provide easy access to the cabin and easy exit when work is finished. A 180-degree swinging door that can lock to the open position provides a wide opening to move in and out of the machine. Inside, ample floor space gives you room to work and exceptional comfort.

Ergonomic Controls

All controls are located within easy reach for intuitive, easy operation, from the steering wheel and joystick to the switches for optional equipment.



Optional Rearview Camera

Provides you with an additional means of viewing the machine's surroundings, allowing for increased productivity.

Heated Mirrors

Heated mirrors melt frost and snow quickly to provide visibility aid during operation.

Automotive-Style Heat and Air Conditioning

High-capacity heating and cooling vents and an easy-to-control temperature keep you comfortable all year long. Automatic temperature control senses and adjusts to the temperature setting automatically. A memory function returns it to your preferred temperature if you shut the machine off and restart later.

Easy-to-Read LCD Display Panel

An easy-to-read LCD display panel is placed within easy view for monitoring critical machine data and receiving machine warnings.



Standard Radio with CD-Player and Player Input

Tune into your favorite over-the-air stations, or take your favorite digital music format with you to make every hour on the job more enjoyable.

Adjustable Comfort

The standard air suspension seat has multiple adjustment points, allowing you to select the most comfortable position.

- A Seat Height
- B Seat Fore/Aft
- C Back Recline
- D Lumbar Support
- E Armrest Angle
- F Seat Heater
- G Headrest Up/Down



EASY MAINTENANCE

You can't avoid regular maintenance, but you can make it easier to do. That's how Doosan approaches its wheel loader design. Excellent durability, centrally-located maintenance points, onboard diagnostic systems and easy component access deliver low-effort maintenance and long-lasting performance.

Swing-Out Fan

The cooling system, located at the rear to take in cooler and cleaner air, is mounted on a hinge to provide trouble-free access to the cooler group. The rear screen flips up and the fan swings out, enabling easy cleaning and service.

Easy Component Access

Big, easy-to-open access covers and fold-up panels provide fast, ground-level access to critical engine and hydraulic components. When it's easy to reach and service components, you save time on maintenance and reduce your operating costs.

Remote Drain Ports

Easy-to-access remote drain valves make for fast, convenient exchanges of engine oil and cooling system coolant.



Doosan Telematics

Doosan's Telematics provides machine intelligence through a device that comes standard on all Doosan machines. The device communicates wirelessly through either cellular or satellite communication. Machine information can be viewed via the CoreTMS website, which then allows you to assess various aspects of your Doosan machine.

Key benefits include:

- Review maintenance schedules
- Maximize machine utilization & uptime
- Improve operator efficiency & training
- Monitor fuel use & efficiency
- Theft prevention alerts



Sight Glass for Major Fluid Levels

Sight glasses on the machine provide quick, easy fluid-level checks. All it takes is a quick visual check to know if your fluid reservoirs are properly filled.



Color-Coded, Labeled Wiring and Hydraulic Hoses

Strategically labeled wiring enables plug-and-play installation for electrical accessories, such as the rotating beacon. It also allows quicker, easier electrical troubleshooting of the electrical and hydraulic systems.

Self-Diagnostics

The LCD monitor helps you monitor critical systems in real time. Plus, you can access historical machine alerts right from the screen in the cabin. Hydraulic pressures previously monitored with remote check ports are now viewable on the main display monitor to improve serviceability.



Doosan Monitoring System with Laptop Access

The Doosan Monitoring System is a diagnostic program that gives your dealer's technician a direct communications link with your wheel loader. During operation, it monitors all critical data and provides a complete history of operation and a real-time log of machine failures. Armed with information like this, your dealer service personnel can fix issues fast – and you can get back to work.

DEF Tank Fill

An easy DEF fluid fill ensures your T4-compliant Doosan machine operates at its full potential with fewer harmful emissions. DEF is available from your Doosan dealer in various container sizes.



Centralized Lubrication Points

For a long-lasting machine, daily maintenance is critical. Remote grease points make it easier to lubricate hard-to-reach pins on the lift arm and articulation system. Daily greasing happens on the ground – and it's more likely to get done.



Automatic Central Lubrication System (optional)

Provides automatic lubrication to 23 locations via a user-set timing interval. Metering valves throughout the machine apply the proper amount of grease to each point.

VERSATILITY

Doosan equipment is optimized for attachment versatility to help you do more. Our tough attachments are matched to your machine's operator weight and load settings – so you can rely on epic productivity with every job



Selectable Engine Power Modes

The Doosan wheel loader has three engine power modes — ECO, Normal and Power — to further adapt your loader's performance to the application and deliver the right balance of power and fuel economy.

Auxiliary Hydraulics (3rd Valve)

For hydraulic attachments, such as the multi-purpose bucket, an auxiliary line for hydraulic attachments comes standard.





Hydraulic Quick Coupler

Change your wheel loader attachments quickly and easily. Two different coupler styles allow you to easily match attachments to the machine.

Boom Float

The boom float allows your bucket to follow the ground contours, which saves you time and protects productivity when backdragging during snow removal.



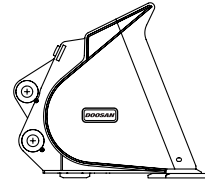
General Purpose Bucket



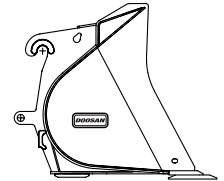
With a sloped bottom for maximum filling and material retention, this is the perfect bucket for day-to-day material handling. Capacities range from 4 to 6.5 yd³.

Available for DL300-3, DL350-3, DL420-3, DL450-3 and DL550-3 wheel loaders. All available with bolt-on cutting edge or teeth.

Pin-On



Quick Coupler



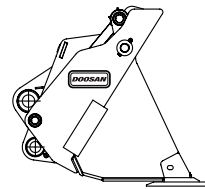
Multi-Purpose Bucket



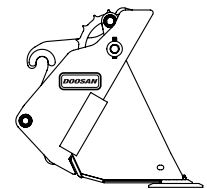
Leveling, dozing, digging, grappling, loading and dumping – this multi-purpose bucket is ready for whatever you've got. Capacities from 3.5 to 4 yd³.

Available for DL300-3 and DL350-3 wheel loaders. All available with bolt-on cutting edge or teeth.

Pin-On



Quick Coupler



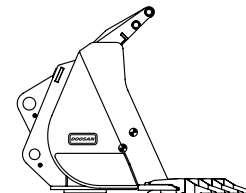
Rock Bucket



Severe digging is no problem for this tough bucket. Spade nose style. Weld-on teeth come standard. Capacities from 4 to 6 yd³.

Available for DL420-3, DL450-3 and DL550-3 wheel loaders.

Pin-On

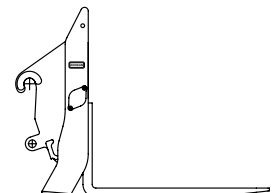


Pallet Fork



Easily lift, carry and place materials. Pallet forks with 72" forks available for DL300-3, DL350-3, DL420-3, DL450-3 and DL550-3 wheel loaders.

Quick Coupler



Quick couplers are available in two designs – JRB and ISO style.

For more information on Doosan attachments, refer to the Doosan Wheel Loader Attachment literature.

General Specs

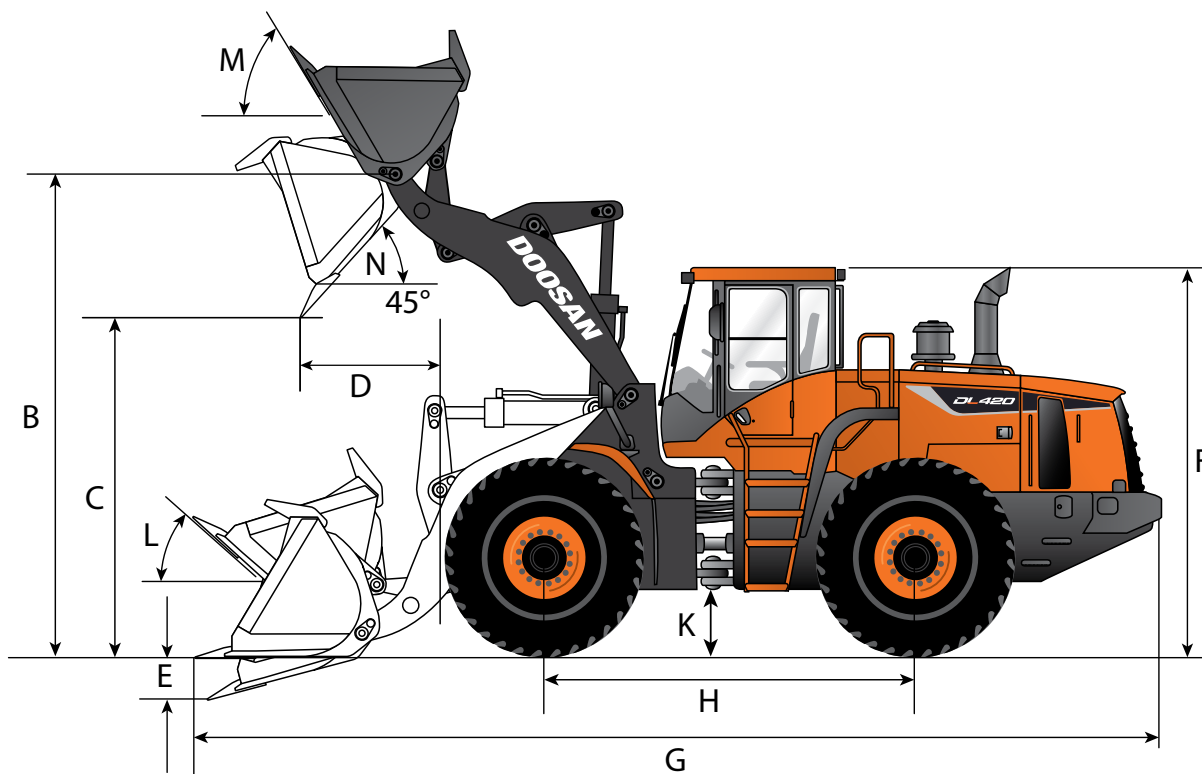
			DL300-5K Standard (US10)	DL350-5K Standard (US10)	DL420-5 Standard (US10)	DL450-5 Standard (US10)	DL550-5 Standard (US10)
ENGINE							
MAKE			Doosan	Doosan	Scania	Scania	Scania
MODEL			DL08	DL08	DC13	DC13	DC13
NUMBER OF CYLINDERS	INLINE		6	6	6	6	6
RATED POWER, GROSS <i>(per SAE J1995)</i>	hp (kW) @ rpm		270 (202) @ 1800	275 (202) @ 1800	345 (257) @ 1800	345 (257) @ 1800	380 (283) @ 1800
MAXIMUM TORQUE, GROSS <i>(per SAE J1995)</i>	ft.-lb. (Nm) @ rpm		940 (1275) @ 1400	940 (1275) @ 1400	1,180 (1520) @ 1400	1,180 (1520) @ 1400	1,302 (1520) @ 1400
PISTON DISPLACEMENT	in³ (L)		466 (9.3)	466 (9.3)	775 (12.7)	775 (12.7)	775 (12.7)
BORE AND STROKE	in. x in. (mm x mm)		5.1 x 5.5 (130 x 140)	5.1 x 5.5 (130 x 140)	5.1 x 6.3 (130 x 160)	5.1 x 6.3 (130 x 160)	5.1 x 6.3 (130 x 160)
STARTER	V, hp (Kw)		24, 8 (6)	24, 8 (6)	24, 8 (6)	24, 8 (6)	24, 8 (6)
BATTERY (2)	V, AH, CCA		12, 200, 1300	12, 200, 1300	12, 200, 1300	12, 200, 1300	12, 150, 1050
ALTERNATOR	V, amp		28, 100	28, 100	28, 100	28, 100	28, 100
AIR CLEANER			Double Element	Double Element	Double Element	Double Element	Double Element
HYDRAULICS							
MAIN PUMPS	gpm (L/min)		38 (145)	38 (145)	70.3 (266)	70.3 (266)	55.5 (210)
SYSTEM PRESSURE <i>(WORK)</i>	psi (kg/cm2)		3626 (255)	3626 (255)	3989 (280)	3989 (280)	3989 (280)
SYSTEM PRESSURE <i>(STEER)</i>	psi (kg/cm2)		3046 (214)	3046 (214)	2901 (204)	2901 (204)	2901 (204)
BOOM SPEED	UP	sec.	5.8	5.9	6	6.3	6.4
	DOWN	sec.	3.2	3.5	3	3	4.2
BUCKET SPEED	CROWD	sec.	2.4	2	2.3	2.3	2.1
	DUMP	sec.	1.6	1.4	1.7	1.6	1.4
TRANSMISSION SPEEDS							
TRAVEL SPEED - FORWARD (4)	mph (km/h)		3.9 / 7.3 / 14.5 / 22.4 (6.2 / 11.7 / 23.3 / 36.0)	3.8 / 7.1 / 14.3 / 22.4 (6.1 / 11.5 / 23.0 / 36.0)	4.5 / 7.6 / 11.5 / 22.4 (7.2 / 12.1 / 18.5 / 36.0)	4.0 / 7.6 / 11.9 / 22.4 (6.5 / 12.2 / 19.1 / 36.0)	3.9 / 7.3 / 11.6 / 22.4 (6.3 / 11.8 / 18.6 / 36)
TRAVEL SPEED - REVERSE (3)	mph (km/h)		4.2 / 7.3 / 16.8 (6.7 / 11.8 / 27.1)	4.0 / 7.3 / 17.1 (6.5 / 11.7 / 27.5)	4.5 / 7.6 / 11.5 (7.2 / 12.2 / 18.5)	4.0 / 7.5 / 16.4 (6.5 / 12.1 / 26.4)	3.9 / 7.3 / 16.1 (6.3 / 11.8 / 25.9)
MAXIMUM GRADE	% (°)		51 (27)	51 (27)	51 (27)	58 (30)	58 (30)
ENVIRONMENT							
SOUND LEVEL <i>(per ISO 6395)</i>	dB(A)		107	106	105	106	107
CABIN SOUND LEVEL <i>(per ISO 6394)</i>	dB(A)		73	71	71	73	72
REFILL CAPACITIES							
FUEL TANK	gal. (L)		64 (241)	64 (241)	73 (277)	89 (336)	117 (441)
DIESEL EXHAUST FLUID TANK	gal. (L)		10 (38)	10 (38)	16 (60)	16 (60)	16 (60)
COOLING SYSTEM <i>(RADIATOR)</i>	gal. (L)		13 (50)	13 (50)	16 (60)	16 (60)	16 (60)
ENGINE OIL	gal. (L)		9 (34)	9 (34)	10 (39)	10 (39)	12 (45)
TRANSMISSION	gal. (L)		14 (54)	14 (54)	14 (54)	14 (54)	14 (54)
FRONT AXLE	gal. (L)		11 (42)	11 (42)	11 (42)	11 (42)	16.5 (62.5)
REAR AXLE	gal. (L)		11 (42)	11 (42)	11 (42)	11 (42)	16.9 (64)
HYDRAULIC SYSTEM	gal. (L)		48 (180)	61 (230)	61 (230)	61 (230)	65 (247)
HYDRAULIC CYLINDERS							
STEERING (2)	BORE x ROD x STROKE	in. x in. x in. (mm x mm x mm)	3.1 x 1.6 x 17.7 (80 x 40 x 450)	3.9 x 2 x 17.7 (100 x 50 x 450)	3.9 x 2 x 17.7 (100 x 50 x 450)	3.9 x 2 x 17.7 (100 x 50 x 450)	4.3 x 2.4 x 18.3 (110 x 60 x 465)
LIFT (2)	BORE x ROD x STROKE	in. x in. x in. (mm x mm x mm)	5.5 x 3.1 x 32.7 (140 x 80 x 831)	5.9 x 3.7 x 31.5 (150 x 95 x 800)	6.7 x 4.1 x 31.1 (170 x 105 x 789)	6.7 x 4.1 x 31.1 (170 x 105 x 789)	7.5 x 4.1 x 35 (190 x 105 x 890)
Bucket (1)	BORE x ROD x STROKE	in. x in. x in. (mm x mm x mm)	7.1 x 4.1 x 20.3 (180 x 105 x 515)	7.1 x 4.1 x 21.1 (180 x 105 x 535)	7.5 x 4.7 x 23.2 (190 x 120 x 590)	7.5 x 4.7 x 23.2 (190 x 120 x 590)	8.7 x 5.1 x 24 (220 x 130 x 610)

NOTE — Where applicable, dimensions are in accordance with Society of Automotive Engineers (SAE) and ISO standards. Specifications and design are subject to change without notice. Images of Doosan wheel loaders may show other than standard equipment. All dimensions are shown in inches. Respective metric dimensions are enclosed by parentheses. Doosan Construction Equipment is manufactured with a Quality Management System that is in compliance with ISO 9001:2008.

All dimensions are given for Doosan wheel loaders equipped with standard tires.

Operational Data

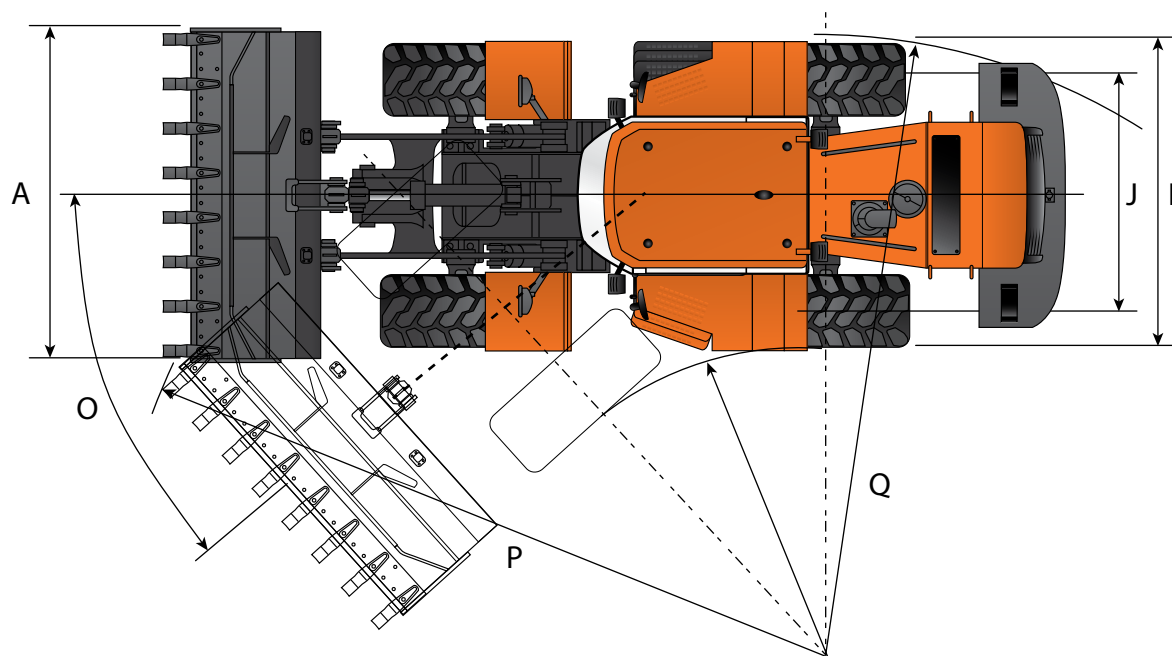
			DL300-5K		DL350-5K		DL420-5	
			Standard (US10)	High Lift (US20)	Standard (US10)	High Lift (US20)	Standard (US10)	High Lift (US20)
DIMENSION & WORKING RANGE								
BUCKET CAPACITY, HEAPED ISO / SAE		yd3 (m3)	4.2 (3.2)*		4.8 (3.7)*		5.5 (4.2)*	
BUCKET WIDTH	A	ft. in. (mm)	9' 6" (2920)		9' 10" (3000)		10' 9" (3290)	
HINGE PIN HEIGHT, MAXIMUM	B	ft. in. (mm)	13' (3975)	14' 10" (4530)	13' 8" (4170)	15' 4" (4695)	14' (4280)	15' 6" (4745)
DUMP HEIGHT (45°) - FULLY RAISED	C	ft. in. (mm)	9'4" (2845)	11'1" (3395)	10' (3040)	11' 8" (3565)	10' 1" (3075)	11' 9" (3585)
DUMP REACH (45°) - FULLY RAISED	D	ft. in. (mm)	3' 9" (1160)	3' 10" (1185)	4' (1220)	4' 8" (1425)	4' 1" (1240)	4' 4" (1310)
DIGGING DEPTH	E	ft. in. (mm)	5" (125)	10" (250)	4" (90)	10" (235)	6" (150)	8" (185)
OVERALL HEIGHT, ROPS CABIN	F	ft. in. (mm)	11' 4" (3475)		11' 4" (3475)		11' 7" (3535)	
OVERALL LENGTH	G	ft. in. (mm)	26' 6" (8095)	28' 2" (8605)	27' 3" (8320)	29' 4" (8960)	28' 7" (8720)	30' 9" (9395)
WHEEL BASE	H	ft. in. (mm)	10' 5" (3200)		10' 9" (3300)		11' 5" (3500)	
WIDTH AT TIRES	I	ft. in. (mm)	9' 1" (2776)		9' 1" (2776)		9' 9" (2984)	
TREAD WIDTH	J	ft. in. (mm)	7' (2150)		7' (2150)		7' 6" (2300)	
GROUND CLEARANCE	K	ft. in. (mm)	1' 6" (460)		1' 4" (430)		1' 7" (495)	
MAX. TILT ANGLE ON GROUND		°	45		45		45	
MAX. TILT ANGLE AT CARRY POSITION	L	°	49	51	48	51	48	51
MAX. TILT ANGLE AT FULLY RAISED	M	°	61	57	64	63	63	64
MAX. DUMP ANGLE (FULLY RAISED)	N	°	45		45		46	
STEERING ANGLE, MAXIMUM	O	°	40		40		40	
EXTERNAL RADIUS, BUCKET EDGE	P	ft. in. (mm)	21' (6405)	21' 9" (6650)	21' 8" (6615)	22' 8" (6915)	22' 10" (6955)	23' 1" (7035)
EXTERNAL RADIUS, OUTSIDE TIRE	Q	ft. in. (mm)	19' (5800)		19' 10" (6050)		21' 7" (6570)	
TIRE SIZE			23.5-25		23.5-25		26.5-25	
OPERATING WEIGHT		lb. (kg)	41,844 (18 980)	42,869 (19 445)	43,541 (19 750)	44,743 (20 295)	50,783 (23 035)	51,919 (23 550)
STATIC TIPPING LOAD (STRAIGHT)		lb. (kg)	33,061 (15 380)	26,918 (12 210)	34,855 (15 810)	27,470 (12 460)	40,256 (18 260)	32,320 (14 660)
STATIC TIPPING LOAD (AT FULL TURN)		lb. (kg)	29,194 (13 580)	23,766 (10 780)	30,776 (13 960)	24,251 (11 000)	35,550 (16 125)	28,550 (12 950)
BREAKOUT FORCE		lbf. (kgf)	37,767 (17 131)	36,643 (16 621)	36,869 (16 723)	35,969 (16 315)	47,209 (21 414)	45,186 (20 496)



Operational Data *continued*

			DL450-5		DL550-5	
			Standard (US10)	High Lift (US20)	Standard (US10)	High Lift (US20)
DIMENSION & WORKING RANGE						
BUCKET CAPACITY, HEAPED ISO / SAE		yd3 (m3)	6.3 (4.8)*		7.5 (5.7)*	
BUCKET WIDTH	A	ft. in. (mm)	10' 9" (3277)		11' 2" (3405)	
HINGE PIN HEIGHT, MAXIMUM	B	ft. in. (mm)	14' 9" (4500)	16' 4" (4985)	15' 8" (4795)	17' 1" (5220)
DUMP HEIGHT (45°) - FULLY RAISED	C	ft. in. (mm)	10' 7" (3240)	12' 2" (3730)	11' 2" (3405)	12' 6" (3830)
DUMP REACH (45°) - FULLY RAISED	D	ft. in. (mm)	4' 2" (1280)	4' 10" (1480)	4' 7" (1400)	5' 3" (1620)
DIGGING DEPTH	E	ft. in. (mm)	4" (105)	10" (270)	3" (80)	8" (205)
OVERALL HEIGHT, ROPS CABIN	F	ft. in. (mm)	11' 9" (3581)		12' 5" (3785)	
OVERALL LENGTH	G	ft. in. (mm)	30' (9155)	32' (9755)	31' 9" (9680)	33' 7" (10 255)
WHEEL BASE	H	ft. in. (mm)	11' 7" (3550)		12' 1" (3700)	
WIDTH AT TIRES	I	ft. in. (mm)	9' 9" (2984)		14' 7" (4458)	
TREAD WIDTH	J	ft. in. (mm)	7' 6" (2300)		7' 11" (2420)	
GROUND CLEARANCE	K	ft. in. (mm)	1' 5" (455)		1' 6" (480)	
MAX. TILT ANGLE ON GROUND		°	45	44	43	
MAX. TILT ANGLE AT CARRY POSITION	L	°	50	51	48	50
MAX. TILT ANGLE AT FULLY RAISED	M	°	66	63	67	62
MAX. DUMP ANGLE (FULLY RAISED)	N	°	45		47	
STEERING ANGLE, MAXIMUM	O	°	40		40	
EXTERNAL RADIUS, BUCKET EDGE	P	ft. in. (mm)	23' 6" (7160)	24' 4" (7420)	24' 8" (7515)	25' 6" (7790)
EXTERNAL RADIUS, OUTSIDE TIRE	Q	ft. in. (mm)	21' 5" (6540)		21' 5" (6540)	
TIRE SIZE			26.5-25		29.5-25	
OPERATING WEIGHT		lb. (kg)	56,868 (25 795)	57,618 (26 135)	69,897 (31 705)	71,617 (32 485)
STATIC TIPPING LOAD (STRAIGHT)		lb. (kg)	45,228 (20 515)	42,902 (19 460)	53,175 (24 120)	43,453 (19 710)
STATIC TIPPING LOAD (AT FULL TURN)		lb. (kg)	39,937 (18 115)	37,875 (17 180)	46,947 (21 295)	38,371 (17 405)
BREAKOUT FORCE		lbf. (kgf)	51,930 (23 555)	51,256 (23 249)	55,303 (25 085)	56,877 (25 799)

* Bucket Type = Pin-On, General Purpose with Bolt-On Cutting Edge



Standard/Optional Equipment

	DL300-5K	DL350-5K	DL420-5	DL450-5	DL550-5
ENGINE					
Emissions (EPA)	T4	T4	T4	T4	T4
High Pressure Common Rail (HPCR)	•	•	•	•	•
Cooled Exhaust Gas Recirculation (CEGR)	•	•	•	•	•
Exhaust Brake	•	•	•	•	•
Selective Catalyst Reduction (SCR)	•	•	•	•	•
Diesel Exhaust Fluid (DEF)	•	•	•	•	•
Fuel Filter with Water Separator	•	•	•	•	•
Coolant Recovery tank	•	•	•	•	•
Dual Element Dry-Type Air Filter with Evacuator	•	•	•	•	•
Pre Cleaner	•	•	•	•	•
Electronic Engine Control (ECU)	•	•	•	•	•
Auto-Idle (Working to Standby)	•	•	•	•	•
Overheat & Low Oil Pressure Engine Protection	•	•	•	•	•
Cooling Fan - Radiator, Variable Speed	•	•	•	•	•
Cooling Fan - Radiator, Automatic Reversible	•	•	•	•	•
Block Heater	■	■	■	■	■
HYDRAULIC					
Variable Displacement Axial Piston Pump	•	•	•	•	•
Closed-Center System	•	•	•	•	•
Pilot-Operated Control Valves	•	•	•	•	•
Remote Test Ports	•	•	•	•	•
Spring Applied Hydraulic Release Brake	•	•	•	•	•
Auxiliary Hydraulics (3rd Valve)	•	•	•	•	•
Automatic Boom/Lift Kick-Out, Adjustable (in cab)	•	•	•	•	•
Automatic Return-to-Dig Position, Adjustable	•	•	•	•	•
Boom Float	•	•	•	•	•
Load Isolation System	■	■	■	■	■
ELECTRICAL					
System Voltage - 24V	•	•	•	•	•
Alternator - 24V, 100 Amp	•	•	•	•	•
2 x 12V Batteries, 200 AH Reserve Capacity	•	•	•	•	•
Blade Type Fuse Panel	•	•	•	•	•
Main Circuit Breaker	•	•	•	•	•
Light, Work (Halogen): Front (2), Rear (2)	•	•	•	•	•
Light, Headlights (High/Low Beams) (2)	•	•	•	•	•
Light, Stop, Tail & Direction Indicators	•	•	•	•	•
Rotating Beacon	■	■	■	■	■
Hour Meter	•	•	•	•	•
Rear View Camera	■	■	■	■	■
Laptop Service Port	•	•	•	•	•
Self-Diagnostics System	•	•	•	•	•
Telematics	•	•	•	•	•

	DL300-5K	DL350-5K	DL420-5	DL450-5	DL550-5
CABIN					
Steel, All-Weather & Sound Suppressed	•	•	•	•	•
ROPS (ISO 3471)	•	•	•	•	•
Front & Rear Window with Wiper/Washer	•	•	•	•	•
Tinted Safety Glass	•	•	•	•	•
Visor, Retractable	•	•	•	•	•
Defrost	•	•	•	•	•
Lockable Doors	•	•	•	•	•
Seat - Air Suspension - 2" (51 mm) Seat Belt - Adjustable Height & Recline - Adjustable Arm Rests - Adjustable Fore/Aft	•	•	•	•	•
Seat - Heater	•	•	•	•	•
3" (76 mm) Seat Belt	■	■	■	■	■
Control Stand - Sliding (Fore/Aft)	•	•	•	•	•
Storage	•	•	•	•	•
Mirror, Rear View (1)	•	•	•	•	•
Mirrors, Exterior (2) Heated	•	•	•	•	•
Fully Automatic HVAC w/ Ambient Temperature Sensor	•	•	•	•	•
Multi-Function LCD	•	•	•	•	•
Cigarette Lighter	•	•	•	•	•
AM/FM Stereo with CD Player & MP3 Port	•	•	•	•	•
Speakers (2)	•	•	•	•	•
Antenna, Roof-Mounted	•	•	•	•	•
Power Socket, 12V	•	•	•	•	•
Beverage Holder	•	•	•	•	•
Hot/Cold Compartment	•	•	•	•	•
Interior Light	•	•	•	•	•
CONTROLS					
Adjustable steering column - Tilting - Telescoping	•	•	•	•	•
Electric Steering (Left Armrest Joystick)	■	■	■	■	■
Throttle Pedal (Accelerator)	•	•	•	•	•
Brake Pedal, Right	•	•	•	•	•
Brake Pedal, Left (Transmission Kick Out)	•	•	•	•	•
Gear Selector (FnR)	•	•	•	•	•
Joystick Control	•	•	•	•	•
Finger Tip Control (3 Lever)	■	■	■	■	■
Switches, Console-Mounted - Starter (Key) - Parking Brake - Pilot Cutoff - Transmission Cutoff - Work Light - Reversible Cooling Fan	•	•	•	•	•
Power Mode (P, S, E)	•	•	•	•	•
Transmission Mode	•	•	•	•	•
Wiper Control Panel	•	•	•	•	•
Audio Control Panel	•	•	•	•	•

• Standard Equipment

■ Optional Equipment

- N/A

Standard/Optional Equipment *continued*

	DL300-5K	DL350-5K	DL420-5	DL450-5	DL550-5
FRAME & DRIVELINE					
Z-Bar Lift Arm	•	•	•	•	•
Z-Bar Lift Arm, High Lift	■	■	■	■	■
Steering Cylinder, Double-Acting (2)	•	•	•	•	•
Transmission, Automatic - Power Shift - (4F / 3R Speed)	•	•	•	•	•
Transmission, Automatic - Power Shift - (5F / 3R Speed)	■	■	■	■	■
Torque Converter	•	•	•	•	•
Torque Converter, Lock-Up Clutch	■	■	■	■	■
Differential, Front - Limited Slip	•	•	•	•	—
Differential, Front - Hydraulic Locking	■	■	■	■	•
Differential, Rear - Limited Slip	•	•	•	•	•
Hydraulic Power Steering	•	•	•	•	•
Outboard Planetary Axles	•	•	•	•	•
Fixed Front Axle	•	•	•	•	•
Oscillating Rear Axle	•	•	•	•	•
Axle Oil Cooler	■	■	■	■	■
Parking Brake, Spring-Applied Hydraulic-Release	•	•	•	•	•
Sealed, Self-Adjusting Brakes	•	•	•	•	•
Tires, 23.5R25 Radial	•	•	—	—	—
Tires, 23.5R25 Bias	■	■	—	—	—
Tires, 26.5R25 Radial	—	—	•	•	—
Tires, 26.5R25 Bias	—	—	■	■	—
Tires, 29.5R25 Radial	—	—	—	—	•
Tires, 29.5R25 Bias	—	—	—	—	■

	DL300-5K	DL350-5K	DL420-5	DL450-5	DL550-5
DISPLAY MONITOR & WARNINGS					
Buzzer - Engine Oil Pressure - Coolant Temperature - Transmission Overheat	•	•	•	•	•
Gauges - Fuel Level - DEF Level - Engine Coolant Temperature - Transmission Oil Temperature - Engine RPM - Speedometer - Transmission Gear Indicator - Battery Voltage - ECO - Digital Clock - Trip Meter - Hour Meter - Total Operation Time - Fuel Consumption	•	•	•	•	•
Warning & Indicator Lights - Seat Belt - Error Code - SCR Warning - Check Engine - Engine Oil Pressure - Engine Pre-Heat Engaged - Radiator Coolant Level & Temperature - Air Filter - Fuel Level - DEF Level - Water in Fuel - Battery Charge - Lights (High, Main, Work, Beacon) - Direction Signal - Emergency Steering - Hydraulic Oil Temperature - Hydraulic Charge Pressure Warning - Hydraulic Pilot Filter - Hydraulic Return Filter - Transmission Mode - Transmission Warning - Transmission Lock-Up - Transmission Oil Temp - Transmission Gear Indicator - Brake Fluid Pressure Warning - Reverse Fan Indicator - Mirror Heat Indicator - Parking Brake Indicator	•	•	•	•	•
Back-Up Alarm	•	•	•	•	•
OTHER					
Centralized Lubrication	•	•	•	•	•
Automatic Lubrication System	■	■	■	■	■
Handrails & Service Platforms	•	•	•	•	•
Skid-Resistant Steps & Service Platforms	•	•	•	•	•
Drawbar and Pin	•	•	•	•	•
Wheel Chocks	•	•	•	•	•
Rear Fender, Full	■	■	■	■	■
Additional Counterweight * Additional counterweight is standard on all High Lift machines.	■	■	■	■	■
Manuals - Operation & Maintenance - Parts - AEM Safety Manual	•	•	•	•	•
Telematics, Three-Year Subscription	•	•	•	•	•
Vandalism Protection - Lockable Panels - Lockable Fluid Fill Points - Anti-Theft Protection (Password)	•	•	•	•	•
Remote Drain Ports (Engine & Hydraulic Oil)	•	•	•	•	•

• Standard Equipment
 ■ Optional Equipment
 — N/A

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