

ENGINE

Model	Case 445T/M3 diesel, Tier III certified	
Type	4-stroke, turbocharged	
Cylinders	4	
Bore/Stroke	4.1 in x 5.2 in (104 mm x 132 mm)	
Displacement	274 in ³ (4.5 L)	
Fuel injection	Direct	
Fuel	#2 Diesel	
Fuel filter	In-line strainer	
Air intake	Cross-flow	
Cooling	Liquid	
Engine speeds (rpm)		
High idle – no load	2415±60	
Rated – full load	2300	
Low idle	1075±75	
Horsepower per SAE J1349		
Gross	90 (67 kW) @ 2300 rpm	
Net	83 (62 kW) @ 2300 rpm	
Peak torque		
@ 1300 rpm	288 lb-ft (390 N·m)	

ENGINE COOLING

Radiator		
Core type	Square wave serpentine	
Core size area	377 in ² (.243 m ²)	
Rows of tubes	4	
Cap pressure	14.0 psi (97.0 kPa)	
Fan		
Diameter	18.9 in (480 mm)	
Ratio	1.09:1	
Water pump		
Style	Integral	
Flow	29.0 gpm (110 L/min)	
Engine lubrication		
Pump	Deep sump with plate cooler and pressurized under-piston nozzles	
Pump operating angle ratings		
Side-to-side	Rated 35°	
Fore and aft	Rated 35°	
Oil filtration	Replaceable, full-flow cartridge	

POWERTRAIN

Drive pump	Tandem, axial piston hydrostatic transmission with integral charge pump driven directly off engine flywheel	
Pump to engine ratio	1:1	
Displacement	0 to 2.81 in ³ (46 cc)	
Pump flow @ high idle engine rpm	29.4 gpm (111 L/min)	
Flow	Bi-directional	
Charge pressure	360 psi (24.8 bar)	
System relief	4350 psi (300 bar)	
Controls	Servo	
Drive motors	Fixed displacement radial piston	
Maximum displacement	28.7 in ³ (470 cc)	
Speed @ high idle engine rpm		
@ max displacement	237 rpm	
Optional high speed	394 rpm	
Torque @ max displacement and relief pressure	1,655 lb-ft (2245 N·m)	
Travel speed mph (km/h)		
Low range	7.0 (11.2)	
High range (optional)	11.4 (18.3)	
Final drive	Single-reduction chain drive	
Drive chain		
Size	ASA #100HV	
Tensile strength	30,000 lb (133 447 N)	
Axles		
One-piece, forged induction-hardened high carbon steel		
Torque @ max displacement and relief pressure	4,170 lb-ft (5653 N·m)	
Diameter	2.0 in (51 mm)	
Length	14.61 in (371 mm)	
Parking brakes	Spring applied, hydraulic release disc	
Engagement	Depress on/off brake button on handle or instrument panel, raise seat bar, get off seat, or stop engine	

HYDRAULIC SYSTEM

Standard equipment pump		
Type	Gear pump	
Displacement	2.2 in ³ /rev (36 cc)	
Pump flow @ rated engine rpm		
Total	21.9 gpm (83 L/min)	
Optional high flow @ rated engine rpm		
Total	37.8 gpm (143.1 L/min)	
Loader control valve	3-spool open-center series with power beyond port	
Relief pressure	3050 psi (210 bar)	
Port relief pressures		
Loader Raise	3120 psi (215 bar)	
Bucket Dump	3800 psi (260 bar)	
Bucket Curl	3350 psi (230 bar)	
Hydraulic lines		
Tubing	37° JIC Flare	
Loop hoses	SAE 100 R12	
Hydraulic oil cooler		
Core type	4 row in line	
Hydraulic filter	6 micron spin-on replaceable element on the return line with warning indicator	

INSTRUMENTATION

Indicators	
Digital Hourmeter	
Fuel level LCD bar graph with alarm	
Warning lights with alarms	
Engine coolant temperature	
Engine oil pressure	
Engine Malfunction	
Hydraulic charge pressure	
Hydraulic filter restriction	
Hydraulic oil temperature	
Warning alarms	
Battery voltage (plus display)	
Indicator light	
Engine preheat	
Parking brake	
Seat bar reminder	

ELECTRICAL SYSTEM

Alternator	95 amp
Starter	2.7 kW
Battery	
12-volt low-maintenance 1125 cold-cranking amps @ 0° F (-18° C)	

OPERATOR ENVIRONMENT

ROPS/FOPS level 1 canopy w/side screens
Tilt ROPS/FOPS
Rear window w/ emergency escape
Instrument panels
Suspension vinyl seat
2 in (51 mm) retractable seat belt
Hand throttle
Foot throttle
Alarm package
Headliner
Top window
Cup holder
Power plug socket
Foot rest
Storage tray
Low effort ergonomic hand controls
Padded seat bar w/integral armrests
Loader control lockout system
Electric parking brake control
Floor cleanout panel

CYLINDERS

Lift cylinder	
Bore diameter	2.5 in (63.5 mm)
Rod diameter	1.5 in (38.1 mm)
Stroke	35.8 in (910 mm)
Closed length	46.8 in (1190 mm)
Bucket cylinder	
Bore diameter	3.0 in (76.2 mm)
Rod diameter	1.5 in (38.1 mm)
Stroke	14.6 in (370 mm)
Closed length	26.9 in (683 mm)

OPERATING WEIGHTS

Unit equipped with 12 x 16.5 Galaxy Beefy Baby II tires, 66 in (1.6 m) foundry/excavating bucket, mechanical attachment coupler, full fuel tank and 165 lb (75 kg) operator	
	7,040 lb (3193 kg)
Shipping weight	6,390 lb (2898 kg)
Add-on weights	
Side cab glass	+70 lb (32 kg)
Lexan® door	+50 lb (22.6 kg)
Glass door w/wiper	+77 lb (35 kg)
Suspension seat	+10 lb (4.5 kg)

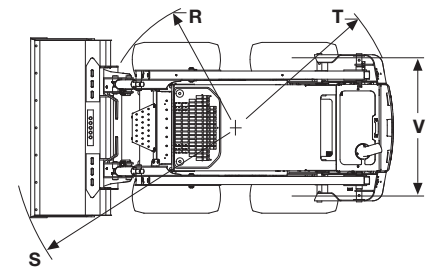
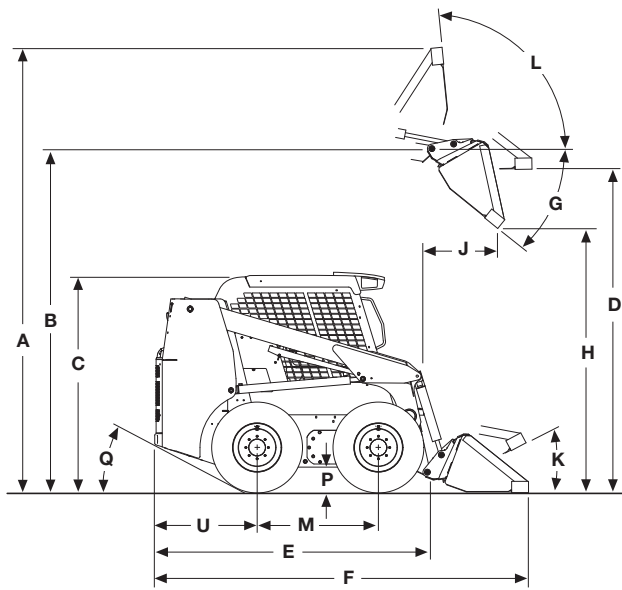
SERVICE CAPACITIES

Fuel tank	22 gal (83.3 L)
Engine oil w/filter	12.7 qt (12 L)
Engine cooling system	3 gal (11.4 L)
Hydraulic system	
Reservoir	7.1 gal (26.8 L)
Total	13.2 gal (50 L)
Chain tanks (per side)	8 qt (7.6 L)

TIRE SELECTION

	Size	Ply Rating	Tread Depth	Tire Width	Width Over Tires	Tire Weight*
Galaxy XD2002	10.00 x 16.5	8	0.59 in (15 mm)	10.7 in (284 mm)	59 in (1.50 m)	52 lb (23.6 kg)
Galaxy XD2002	12.00 x 16.5	10	0.69 in (17 mm)	12.4 in (315 mm)	64 in (1.63 m)	72 lb (32.7 kg)
Galaxy XD2002 (offset wheel)	12.00 x 16.5	10	0.69 in (17 mm)	12.4 in (315 mm)	69 in (1.80 m)	72 lb (32.7 kg)
Galaxy Beefy Baby II	12.00 x 16.5	10	0.81 in (21 mm)	12.4 in (315 mm)	64 in (1.63 m)	82 lb (37.2 kg)
Galaxy Beefy Baby II (offset wheel)	12.00 x 16.5	10	0.81 in (21 mm)	12.4 in (315 mm)	71 in (1.80 m)	82 lb (37.2 kg)
Galaxy Hippo	33/15.50 x 16.5	12	0.81 in (21 mm)	15.2 in (386 mm)	70 in (1.78 m)	94 lb (42.6 kg)
Galaxy Hulk	12.00 x 16.5	12	1.37 in (35 mm)	12.0 in (305 mm)	64 in (1.63 m)	96 lb (43.5 kg)
Galaxy Bulky Hulk	33/15.50 x 16.5	14	1.37 in (35 mm)	15.1 in (384 mm)	70 in (1.78 m)	117 lb (53.1 kg)
Galaxy Solid Flex	12 x 16.5	n/a	.8 in (21 mm)	11 in (279 mm)	61 in (1.54 m)	280 lb (127 kg)
Galaxy Solid Flex (offset wheel)	12 x 16.5	n/a	.8 in (21 mm)	11 in (279 mm)	67 in (1.70 m)	280 lb (127 kg)

NOTE: *Tire weight does not include wheel weight.



DIMENSIONS*

A. Overall operating height	
w/foundry/excavating bucket – short lip	154.0 in (3.91 m)
w/low profile bucket – standard lip	160.6 in (4.08 m)
w/low profile extended bucket – long lip	165.6 in (4.21 m)
Height to	
B. Bucket hinge pin	121.6 in (3.09 m)
C. Top of rollover protective structure	80.0 in (2.03 m)
D. Bottom of level bucket, loader arm fully raised	114.2 in (2.90 m)
Overall length	
E. w/o attachment w/coupler	102.5 in (2.60 m)
F. w/foundry/excavating bucket on ground	129.4 in (3.29 m)
F. w/low profile bucket on ground	135.1 in (3.43 m)
F. w/low profile extended bucket on ground	140.1 in (3.56 m)
G. Dump angle at maximum height	39°
H. Dump height – loader arm fully raised	
w/foundry/excavating bucket	96.0 in (2.44 m)
w/low profile bucket	93.1 in (2.37 m)
w/low profile extended bucket	90.0 in (2.29 m)
J. Dump reach – loader arm fully raised	
w/foundry/excavating bucket	22.8 in (0.58 m)
w/low profile bucket	25.9 in (0.66 m)
w/low profile extended bucket	29.7 in (0.75 m)
Maximum attachment rollback	
K. Bucket on ground	29°
L. Bucket at full height	96°
M. Wheelbase	42.3 in (1.07 m)
Ground clearance	
P. Bottom of belly pan	9.2 in (234 mm)
Q. Angle of departure	28°
Clearance circle front	
R. less bucket	51.8 in (1.32 m)
S. w/66 in (1.68 m) foundry/excavating bucket in carry position	78.7 in (1.95 m)
S. w/66 in (1.68 m) low profile bucket on ground	84.0 in (2.13 m)
S. w/66 in (1.68 m) low profile extended bucket on ground	85.2 in (2.16 m)
T. Clearance circle rear	59.2 in (1.50 m)
U. Rear axle to bumper	37.0 in (0.94 m)
V. Tread width, centerline to centerline	51.8 in (1.32 m)

NOTE: *Equipped with 12.00 x 16.5 Galaxy Beefy Baby II tires.

PERFORMANCE SPECS

Operating load	2,200 lb (998 kg)
Tipping load	4,400 lb (1996 kg)
Breakout force	
Lift cylinder	4,576 lbf (20 355 N)
Bucket cylinder	6,207 lbf (27 610 N)
Dig depth	
w/bucket flat	0.9 in (23.0 mm)
Cycle time	
Raise	4.1 seconds
Lower	2.6 seconds
Dump	1.7 seconds
Rollback	1.9 seconds

NOTE: SAE rated lift capacities.

OPTIONAL BUCKETS

Type	Width inch (m)	Weight lb (kg)	Heaped Capacity ft ³ (m ³)
Foundry/ Excavating	66 (1.6)	370 (168)	15.2 (0.43)
	72 (1.8)	390 (177)	16.7 (0.47)
	78 (2.0)	435 (197)	18.4 (0.52)
Low Profile	66 (1.6)	400 (181)	13.2 (0.37)
	72 (1.8)	425 (193)	14.5 (0.41)
Low Profile Extended	66 (1.6)	434 (197)	15.5 (0.44)
	72 (1.8)	477 (216)	17.1 (0.48)
	78 (2.0)	502 (228)	18.6 (0.53)
Utility/Light Material	72 (1.8)	434 (197)	23.7 (0.67)
	84 (2.1)	497 (225)	27.9 (0.79)
	Heavy-Duty/ Dirt		
66 (1.6)	474 (215)	13.3 (0.37)	
72 (1.8)	501 (227)	14.6 (0.41)	
78 (2.0)	527 (239)	15.9 (0.45)	

STANDARD EQUIPMENT

OPERATOR'S COMPARTMENT

ROPS/FOPS level 1 canopy w/side screens
Tilt ROPS/FOPS
Rear window w/emergency escape
Instrument panels
Suspension vinyl seat
2 in (51 mm) retractable seat belt
Hand throttle
Foot throttle
Alarm package
Headliner
Top window
Cup holder
Power plug socket
Foot rest
Storage tray
Low effort ergonomic hand controls
Padded seat bar w/integral armrests
Loader control lockout system
Electric parking brake control
Floor cleanout panel

LOADER

Radial loader arm design
Mechanical attachment coupler
Loader lift arm support

ENGINE

Case 445T/M3 diesel
Tier III certified
No maintenance belt
Battery disconnect switch w/jumpstart terminals
Side-by-side radiator and oil cooler
Grid heater
Integral engine oil cooling
Fuel filter w/water trap
Dual element air cleaner
95 amp alternator
1125 CCA 12-volt battery

POWERTRAIN

Hydrostatic four wheel drive
Servo controls
ASA #100HS drive chain
SAHR disc parking brakes

HYDRAULICS

Auxiliary hydraulics 3050 psi
(210 bar) – 21.9 gpm (83 L/min)
Hydraulic circuit pedal lock
Loader arm-mounted ISO flat face connectors
Auxiliary function lockout override
Loader function lockout system
Loader lift lockout override
3-spool loader control valve
Heavy-duty oil cooler
Loader arm float position

OTHER

Integral bumper counterweight
Lockable service access hood
Single-point daily servicing
Halogen lights, 2-front, 1-rear
Rear tail lights
Options harness
Battery disconnect switch/jump start terminals

OPTIONAL EQUIPMENT

OPERATOR'S COMPARTMENT

Deluxe cloth suspension seat w/heater and lumbar support
Interior mirror
Electric auxiliary hydraulic control
Glass front door w/wiper & washer
Sliding side windows
3 inch retractable seat belt
Heater and AC
Radio
Demolition door

LOADER

Auxiliary front electric control
Ride control
Pilot controls
Hydraulic attachment coupler
Hydraulic one-way self-leveling

HYDRAULICS

High-flow auxiliary hydraulics
3050 psi (210 bar) – 37.8 gpm (143.1 L/min)
Second auxiliary hydraulics
Attachment case drain plumbing

ENGINE

Coolant block heater

OTHER

2 speed ground drive
Deluxe instrument panel
Road lights
Rotating beacon
Lift hooks
Special paint
Language decals
Factory-installed tires – see page 2
Buckets – see page 3
Bolt-on bucket cutting edges
42 in (1.07 m) and 48 in (1.22 m) pallet forks
Steel tracks

NOTE: All specifications are stated in accordance with SAE Standards or Recommended Practices, where applicable.

NOTE: All engines meet current EPA emissions requirements.

IMPORTANT: Case Construction Equipment Inc. reserves the right to change these specifications without notice and without incurring any obligation relating to such change. Case Construction Equipment Inc. does not warrant the safety or reliability of attachments from other manufacturers.

Case is a registered trademark of CNH America LLC. Any trademarks referred to herein, in association with goods and/or services of companies other than CNH America LLC, are the property of those respective companies.



www.casece.com

