

models 38100S ■ 38124S ■ 38100SHL ■ 38124SHL ■

features

- 38 ton (42 mton) capacity
- 4-section, 100' (30,5 m) proportional booms (38100S/HL)
- 5-section, 124' (37,8 m) proportional booms (38124S/HL)
- 109' 2" (33,3 m) maximum main boom tip height (38100S/HL)
- 132' 4" (40,3 m) maximum main boom tip height (38124S/HL)
- 164' 8" (50,2 m) maximum tip height with telescoping jib (38100S/HL)
- 163' 7" (49,9 m) maximum tip height with fixed jib (38124S/HL)
- 2-section, 30' 5" (9,3 m) to 55' (16,8 m) telescopic jib (38100S/HL)
- 1-section, 31' (9,5 m) fixed length jib (38124S/HL)
- 2-speed planetary hoist with grooved drum
- Anti-two-block system
- Load Moment Indicator (LMI) senses boom hoist cylinder pressure, boom length and boom angle
- Adjustable Out-and-Down outriggers from 7' 2" (2,2 m) to 22' (6,7 m) wide
- System pressure gauge
- Rugged, weatherproof, automotive style electrical system
- Manitowoc CraneCARESM comprehensive support

product guide

contents

Specifications	2
Outline Dimensions	4
38100S Boom/Jib Range Diagrams	6
38100S Boom/Jib Load Charts	7
38124S Boom/Jib Range Diagrams	12
38124S Boom/Jib Load Charts	13
38100SHL Boom/Jib Range Diagrams	18
38100SHL Boom/Jib Load Charts	19
38124SHL Boom/Jib Range Diagrams	24
38124SHL Boom/Jib Load Charts	25
Load Chart Data	30
CraneCARE SM	31



specifications

Upperworks

2

Boom

Booms – Inverted T-cross section. 4- or 5-section telescoping type, extended and retracted proportionally by double-acting hydraulic cylinder and cable-crowd system. Easily replaceable and adjustable high-density nylon slide pads. **38100S** – 4-section 30' 6" (9,3 m) to 100' 0" (30,5 m). Maximum tip height 109' 2" (33,3 m). 2-section, 31' (9,5 m) to 55' (16,8 m) jib. Maximum tip height 164' 8" (50,2 m). **38124S** – 5-Section 31' 1" (9,5 m) to 124' 0" (37,8 m). Maximum tip height 132' 4" (40,3 m). 1-section, 31' (9,5 m) fixed jib. Maximum tip height 163' 7" (49,9 m). **38100SHL** – 4-section 30' 6" (9,3 m) to 100' 0" (30,5 m). Maximum tip height 109' 2" (33,3 m). 2-section, 31' (9,5 m) to 55' (16,8 m) jib. Maximum tip height 164' 8" (50,2 m). **38124SHL** – 5-Section 31' 1" (9,5 m) to 124' 0" (37,8 m). Maximum tip height 132' 4" (40,3 m). 1-section, 31' (9,5 m) fixed jib. Maximum tip height 163' 7" (49,9 m).

Quick Reeve Boom Point – Five high-density nylon sheaves mounted on heavy-duty roller bearings. Two removable pin-type rope guards.

Boom Elevation – Double-acting hydraulic cylinder. Working range from 6° below horizontal to 80° above.

Hoist

Hoist – Theoretical maximum line speed 425 fpm (129,5 mpm). Maximum theoretical bottom-layer line pull 14,300 lb (6 486 kg). Two-speed planetary reducer. Spring-applied, pressure-released internal brake.

Wire Rope – 380' (115,8 m) of 5/8" (16 mm) rotation-resistant wire rope.

Swing System

Externally mounted, double-reduction planetary driven by hydraulic motor. Maximum swing speed 1.5 rpm. Spring-applied hydraulically-released parking brake. Ball-bearing swing circle with external gear. Continuous rotation is standard.

Outriggers

Fully extended, intermediate extension and fully retracted positions. Out-and-Down type with double-acting hydraulic cylinders operated independently for precise leveling. Bubble level located near outrigger controls.

Mounting

Mounting – Lower frame is mounted to chassis by threaded rods and clamp plates. No welding to truck chassis is required.

Lower Frame – Torsion resistant, rigid 4-plate design with integrated outrigger and pedestal.

Rear Underride Protection – Supplied on factory mounted cranes. Fabricated structure mounted under rear of carrier. Complies with Bureau of Motor Carrier Safety Standard 393.86.

Boom Rest – Heavy-duty, removable.

Control System

Single operator platform and seat mounted to turret. Four single-axis crane controls, bubble level and system pressure gauge arranged to ANSI B30.5 standards. The operator station includes engine start/stop, air foot throttle, signal horn, load moment indicator console, boom angle indicator, swing limit indicator, load chart and range diagram.

Hydraulics

Hydraulic System – A 3-section vane pump direct-mounted to power take-off on truck transmission provides 43 gpm (163 lpm) to the hoist, 28 gpm (106 lpm) to the boom hoist and telescope circuit, and 12 gpm (45 lpm) to the swing and outrigger circuit. 100-gallon (379-liter) baffled reservoir includes two 25-micro filters in the return lines. Ball-type shutoff valve and strainer are provided in suction line. All fittings are ORS type and SAE.

Hydraulic Cylinders – All load-holding cylinders are equipped with integral holding valves.

Warning Systems

Anti-Two-Block System – Audible warning and shutoff functions prevent hook from contacting boom point.

Load Moment Indicator (LMI) – Senses boom hoist cylinder pressure, boom length and boom angle. Audio-visual warning indicates overload conditions and overload shutoff feature prevents continuing overload. Operator can access all relative crane configuration and load conditions via display at the operator station.

Back-Up Alarm – Electronic audible motion alarm activated when truck transmission is in reverse gear.

models 38100S, 38124S, 38100SHL, 38124SHL



specifications


General

Electrical – State-of-the-art, weather-resistant components throughout. Automotive style electrical system for easy installation. Designed to withstand high pressure washing and varying climates.

Design/Welding – Design conforms to ANSI B30.5. Welding conforms to AWS D1.1. Tested to SAE 1063 and SAE 765.

Manuals – Operator, service and parts manuals depict correct crane operation, maintenance procedures, and parts listing.

Warranty – 12-month warranty covers parts and labor resulting from defects in material and workmanship.

Warning

1. The operator must read and understand the owner's manual before operating this crane
2. Positioning or operation of crane beyond areas shown on this chart is not intended or approved except where specified in owner's manual.
3. Loaded boom angles at specified boom lengths give only an approximation of the operating radius. The boom angle before loading should be greater to account for deflections. Do not exceed the operating radius for rated loads.
4. The operating radius shown in the jib rating chart is for fully extended boom only. When boom is not fully extended, use only loaded boom angle to determine load rating of jib.
5. For boom angles shown on jib load rating chart, use rating of next lower boom angle.
6. For boom lengths not shown, use rating of next shorter or longer boom length, whichever is less. For radii not shown, use rating of next longer radius.
7. Crane load ratings on outriggers are based on freely suspended loads with the machine leveled and standing on a firm, uniform supporting surface. No attempt shall be made to move a load horizontally on the ground in any direction.
8. Practical working loads depend on supporting surface, wind, and other factors affecting stability such as hazardous surroundings, experience of personnel, and proper handling, all of which must be taken into account by the operator.
9. The maximum load which may be telescoped is limited by hydraulic pressure, boom angle, and boom lubrication. It is safe to attempt to telescope any load within the limits of the load rating chart.

10. Lifting off the main boom point while the swing-around jib is erected is not intended or approved.

11. All load ratings above the heavy line are based on machine structural competence and do not exceed 85% of tipping. Load ratings below are stability limited and do not exceed 85% of tipping.

12. Do not operate a Manitowoc truck-mounted crane or accessories within 10' (3,05 m) of live power lines.

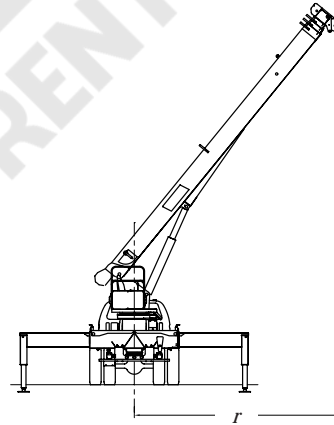
13. This capacity chart is for reference only and must not be used for specific serial number cranes.

Information

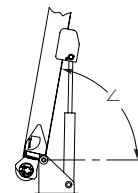
1. Deductions must be made from rated loads for stowed jib, optional attachments, hooks, and loadblocks (see deduction chart). Weights of slings and all other load-handling devices shall be considered a part of the load.
2. Load ratings above the heavy line are structurally limited capacities and do not exceed 85% of tipping. Load ratings below the heavy line are limited by stability and do not exceed 85% of tipping.

Definitions

1. Operating radius (r) is the horizontal distance from the axis of rotation to the center of the vertical hoist line or tackle with load applied (see below).



2. Loaded boom angle (\angle), as shown in the load chart columns headed by \angle , is the included angle between the horizontal and longitudinal axes of the boom base after lifting rated load at rated radius (see below).



NOTE: Due to continuing improvements, Manitowoc Boom Trucks reserves the right to change product specifications without notice.

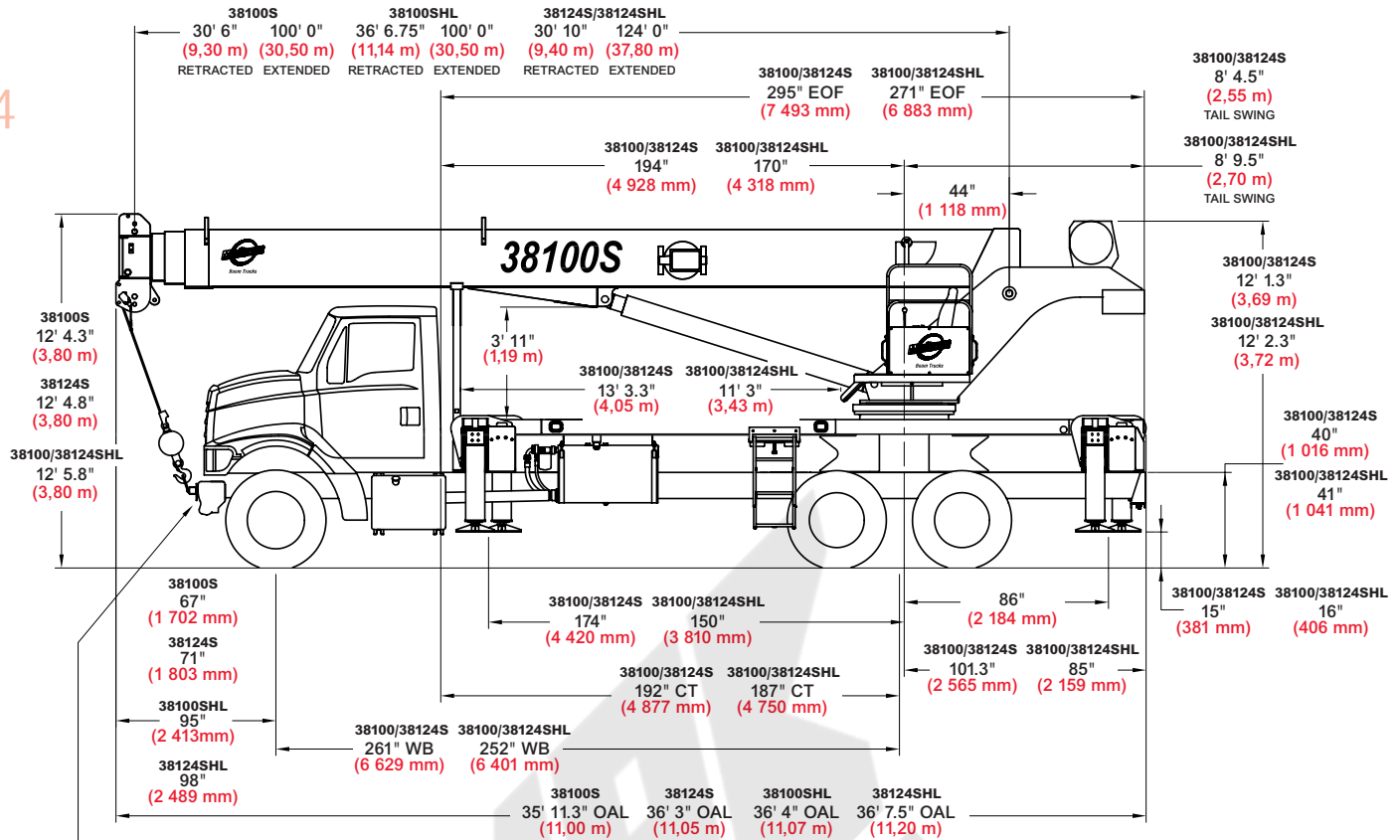
3

models 38100S, 38124S, 38100SHL, 38124SHL



outline dimensions

4



A front center stabilizer is required on installations equipped with the short sub frame (38100SHL & 38124SHL)

Chassis Data				
Minimum Truck Requirements	38100S	38124S	38100SHL	38124SHL
Wheelbase (WB)	261" (6 629 mm)	261" (6 629 mm)	252" (6 401 mm)	252" (6 401 mm)
Cab to Tandem (CT)	192" (4 877 mm)	192" (4 877 mm)	187" (4 750 mm)	187" (4 750 mm)
Cab to End of Frame (EOF)	295" (7 493 mm)	295" (7 493 mm)	271" (6 883 mm)	271" (6 883 mm)
Frame Section Modulus	25.0 in ³ 110,000 psi (758 422 kPa)	25.0 in ³ 110,000 psi (758 422 kPa)	25.0 in ³ 110,000 psi (758 422 kPa)	25.0 in ³ 110,000 psi (758 422 kPa)
Front Axle Gross Weight Rating	18,000 lb (8 165 kg)	18,000 lb (8 165 kg)	20,000 lb (9 072 kg)	20,000 lb (9 072 kg)
Rear Axle Gross Weight Rating	40,000 lb (18 144 kg)	40,000 lb (18 144 kg)	44,000 lb (19 958 kg)	44,000 lb (19 958 kg)
Minimum Truck Axle Weight - Front*	8,000 lb (3 629 kg)	9,200 lb (4 173 kg)	9,800 lb (4 445 kg)	9,800 lb (4 445 kg)
Minimum Truck Axle Weight - Back*	8,300 lb (3 765 kg)	8,300 lb (3 765 kg)	8,000 lb (3 629 kg)	8,000 lb (3 629 kg)
Nominal Frame Width	34" (864 mm)	34" (864 mm)	34" (864 mm)	34" (864 mm)

*Minimum chassis weight is required to meet 85% stability requirements.

Chassis data is general - not for engineering. Some dimensions depend on truck selection.

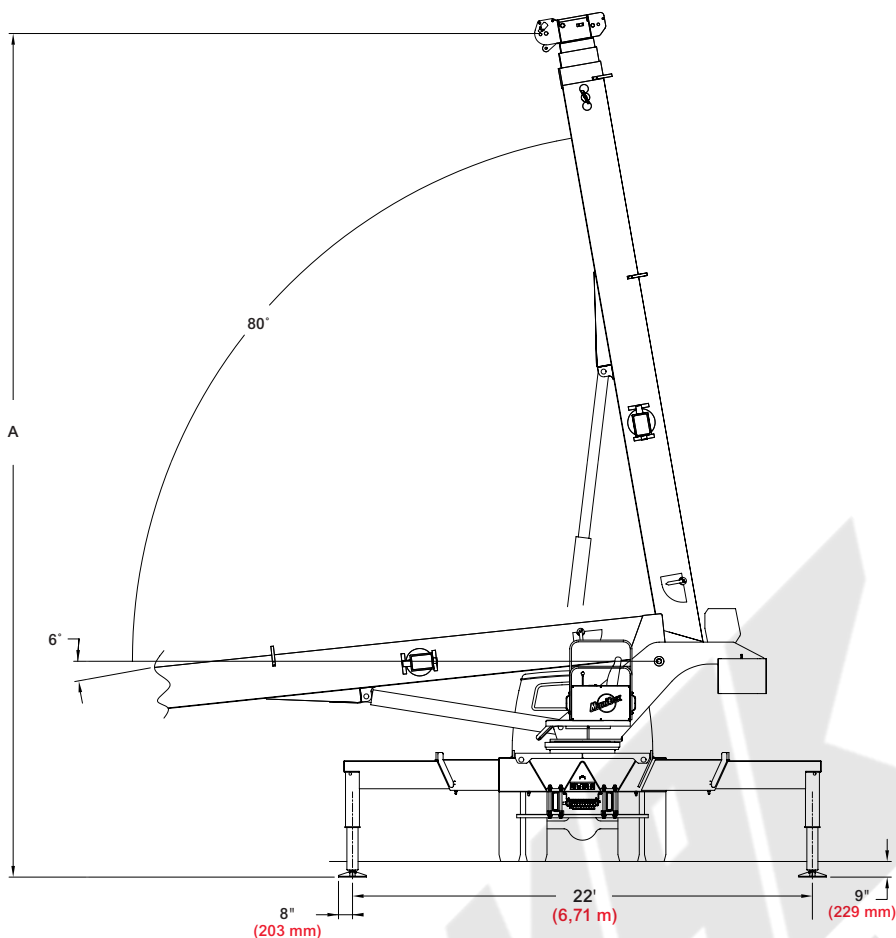
OAH Overall Height
CT Cab to Tandem
CA Cab to Axle
WB Wheel Base
OAL Overall Length
BBC Bumper to Back of Cab
AF Afterframe
EOF End of Frame

models 38100S, 38124S, 38100SHL, 38124SHL



outline dimensions

5



Maximum Tip Height (A)

Configuration	38100S	38124S	38100SHL	38124SHL
	Boom 100' 0" (30,5 m)	Boom 124' 0" (37,8 m)	Boom 100' 0" (30,5 m)	Boom 124' 0" (37,8 m)
Extended Boom	109' 2" (33,3 m)	132' 4" (40,3 m)	109' 2" (33,3 m)	132' 4" (40,3 m)
Fixed or Retracted Jib	140' 0" (42,7 m)	163' 7" (49,9 m)	140' 0" (42,7 m)	163' 7" (49,9 m)
Extended Jib	164' 8" (50,2 m)	-	164' 8" (50,2 m)	-

Weights

	38100S	38124S	38100SHL	38124SHL
Cab Alone	575 lb (261 kg)	575 lb (261 kg)	575 lb (261 kg)	575 lb (261 kg)
Crane- With Out Cab	29,733 lb (13 487 kg)	31,329 lb (14 211 kg)	35,826 lb (16 251 kg)	37,246 lb (16 895 kg)
10' (3,1 m) Flat Bed	1000 lb (454 kg)	1000 lb (454 kg)	-	-
8' (2,4 m) Flat Bed	-	-	750 lb (340 kg)	750 lb (340 kg)
30' 6" (9,3 m) Fixed Jib	1,126 lb (511 kg)	-	1,126 lb (511 kg)	-
31' (9,5 m) Fixed Jib	-	850 lb (386 kg)	-	850 lb (386 kg)
30' 6"-55' (9,3 m - 16,8 m) Telescopic Jib	1,754 lb (796 kg)	-	1,754 lb (796 kg)	-

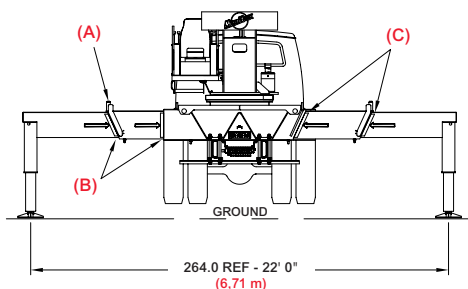
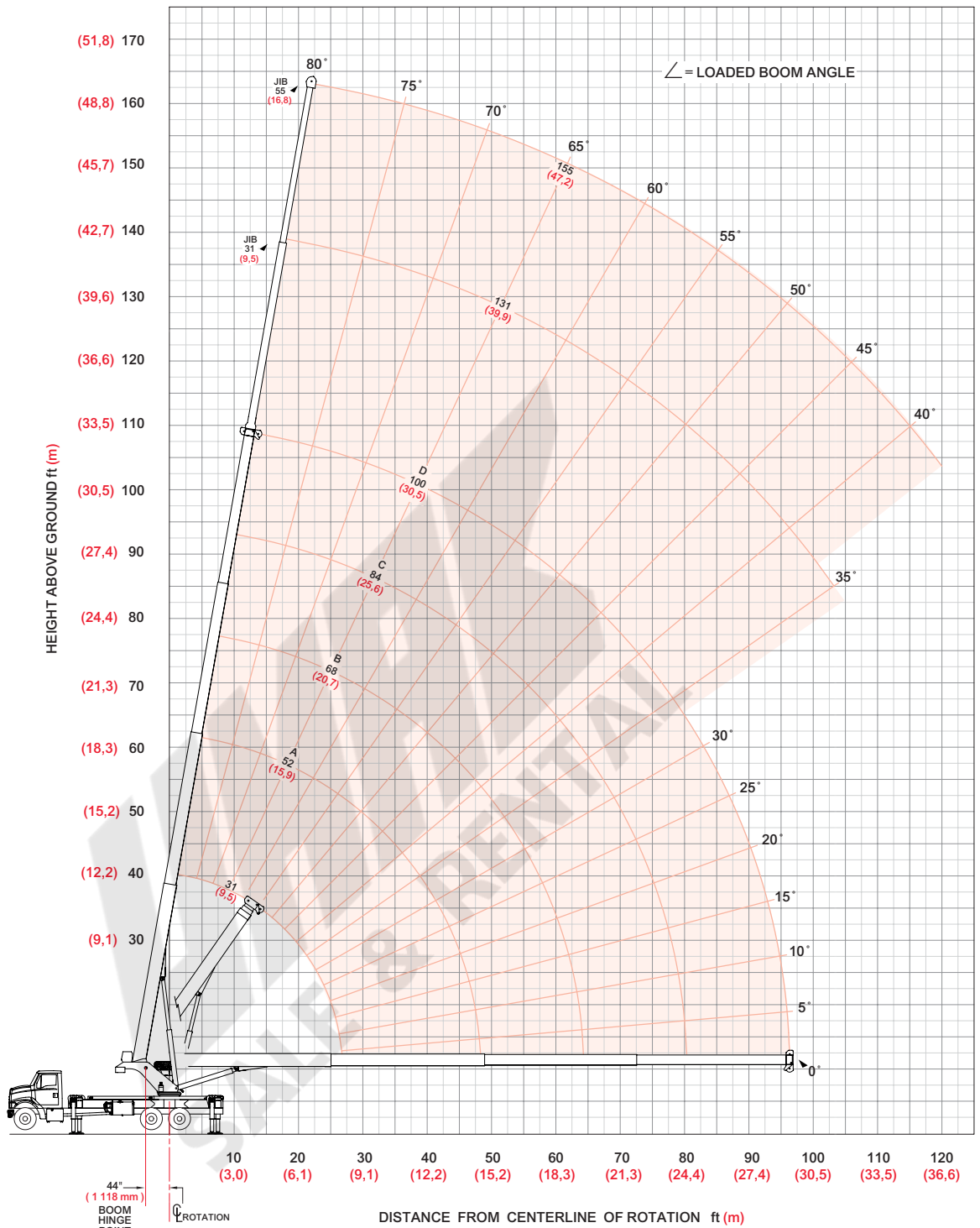
models 38100S, 38124S, 38100SHL, 38124SHL



boom/jib range diagram

38100S Range Diagram - Fully Extended

6



- (A) Pins must be disengaged for this outrigger configuration
- (B) These marks indicate when beams are fully extended
- (C) All outrigger beams must be extended to mark

NOTE: Use this chart only when all outriggers are fully extended.

model 38100S



boom/jib load charts

38100S Load Ratings Fully Extended Outrigger Spread

38100S Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		Telescopic Jib			Boom/Jib ft (m)
	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	55 (16,8)	31 (9,5)	55 (16,8)	55 (16,8)						
Operating Radius ft (m)																					Operating Radius ft (m)					
5 (1,5)	74° 76,000 (34 473)																				5 (1,5)					
8 (2,4)	68° 61,000 (27 669)																				8 (2,4)					
10 (3,1)	64° 52,860 (23 977)	76° 31,500 (14 288)																			10 (3,1)					
12 (3,7)	60° 47,000 (21 319)	73° 31,500 (14 288)	78° 31,500 (14 288)																		12 (3,7)					
15 (4,6)	53° 40,280 (18 271)	70° 31,500 (14 288)	76° 31,500 (14 288)	79° 23,700 (10 750)																	15 (4,6)					
20 (6,1)	40° 30,660 (13 907)	64° 28,680 (13 009)	71° 26,820 (12 165)	76° 20,600 (9 344)	79° 14,000 (6 350)																20 (6,1)					
25 (7,6)	20° 22,380 (10 151)	58° 23,230 (10 537)	67° 22,160 (10 052)	72° 18,300 (8 301)	76° 13,500 (6 123)																25 (7,6)					
30 (9,1)		51° 17,230 (7 815)	62° 17,450 (7 915)	69° 15,870 (7 199)	73° 12,820 (5 815)																30 (9,1)					
35 (10,7)		43° 13,370 (6 065)	57° 13,590 (6 164)	65° 13,720 (6 223)	70° 11,380 (5 162)																35 (10,7)					
40 (12,2)		34° 10,660 (4 835)	52° 10,910 (4 949)	61° 11,030 (5 003)	67° 10,160 (4 608)																40 (12,2)					
45 (13,7)		22° 8,440 (3 828)	46° 8,710 (3 951)	57° 8,850 (4 014)	64° 8,940 (1 055)																45 (13,7)					
50 (15,2)			39° 7,060 (3 202)	52° 7,200 (3 266)	60° 7,290 (3 307)																50 (15,2)					
55 (16,8)			32° 5,790 (2 626)	48° 5,930 (2 690)	57° 6,010 (2 726)																55 (16,8)					
60 (18,3)			22° 4,760 (2 159)	43° 4,910 (2 227)	53° 4,990 (2 263)																60 (18,3)					
65 (19,8)				37° 4,080 (1 851)	49° 4,160 (1 887)																65 (19,8)					
70 (21,3)				31° 3,390 (1 538)	45° 3,470 (1 574)																70 (21,3)					
75 (22,9)				22° 2,800 (1 270)	40° 2,890 (1 311)																75 (22,9)					
80 (24,4)				7° 2,280 (1 034)	35° 2,390 (1 084)																80 (24,4)					
85 (25,9)					30° 1,960 (889)																85 (25,9)					
90 (27,4)					22° 1,580 (717)																90 (27,4)					
95 (29,0)					11° 1,230 (558)																95 (29,0)					
100 (30,5)																					100 (30,5)					
105 (32,0)																					105 (32,0)					
110 (33,5)																					110 (33,5)					
115 (35,1)																					115 (35,1)					
120 (36,6)																					120 (36,6)					
Deduction*	590 (268)	350 (159)	270 (122)	220 (100)	180 (82)																					
Deduction**	890 (404)	530 (240)	400 (181)	330 (150)	280 (127)																					

7

model 38100S

*for stowed fixed jib
**for stowed telescopic jib

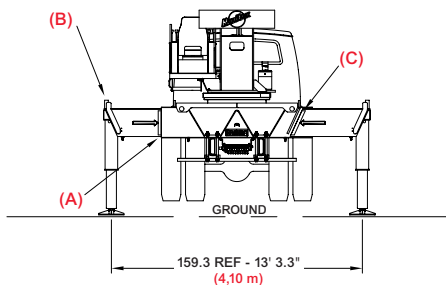
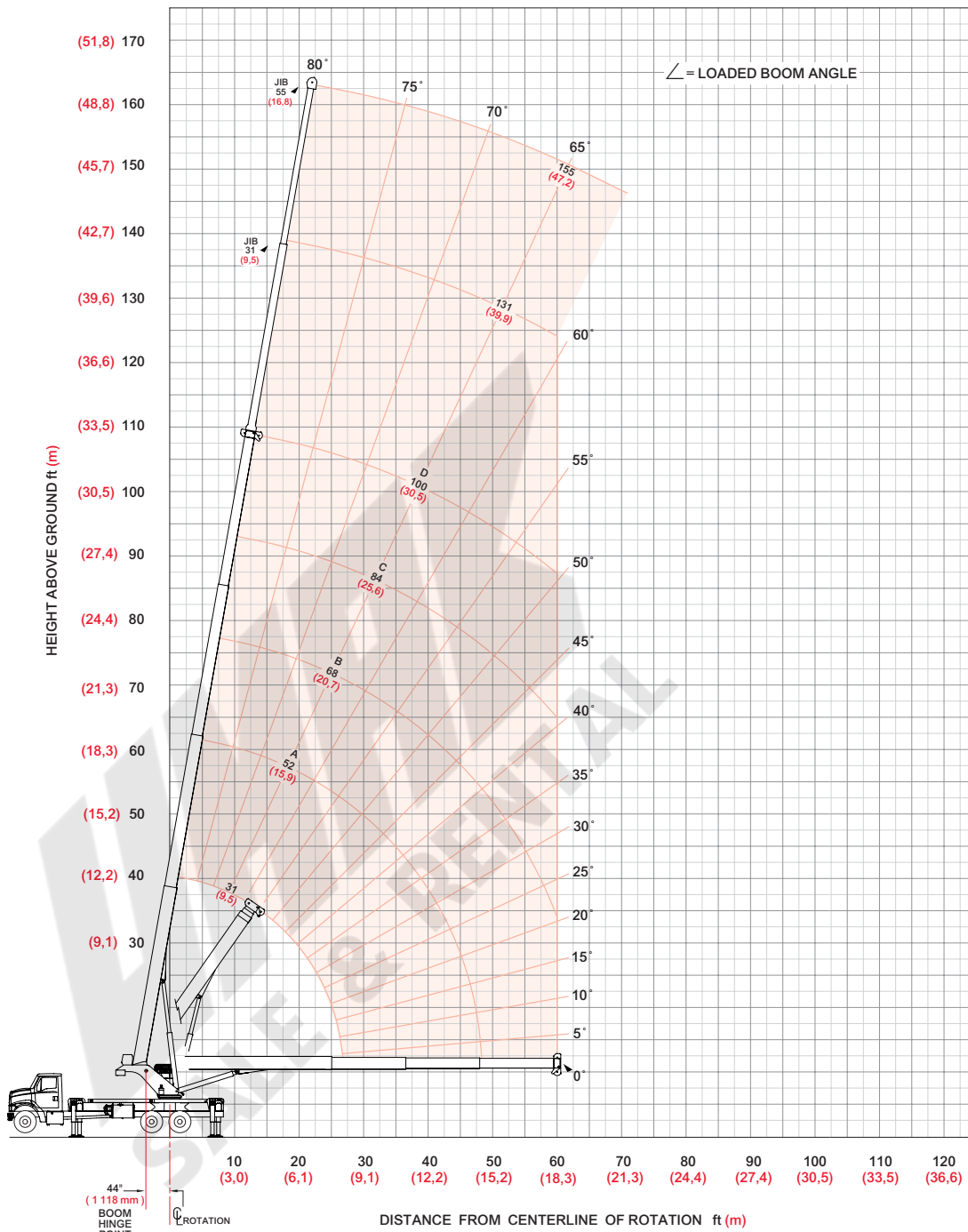
Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



boom/jib range diagram

8

38100S Range Diagram - Intermediate



- (A) Mark indicates beam is fully extended
- (B) Pins must be engaged in this outrigger configuration
- (C) All outrigger beams must be extended to mark

NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are in the intermediate position.

model 38100S



boom/jib load charts

9

38100S Load Ratings Intermediate Outrigger Spread

38100S Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		Telescopic Jib				Boom/Jib ft (m)
	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	55 (16,8)	31 (9,5)	55 (16,8)	31 (9,5)	55 (16,8)						
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	Operating Radius ft (m)				
5 (1,5)	74°	76,000 (34 473)																					5 (1,5)				
8 (2,4)	68°	61,000 (27 669)																					8 (2,4)				
10 (3,1)	64°	52,860 (23 977)	76°	31,500 (14 288)																			10 (3,1)				
12 (3,7)	60°	43,730 (19 836)	73°	31,500 (14 288)	78°	31,500 (14 288)																	12 (3,7)				
15 (4,6)	53°	26,300 (11 929)	70°	27,320 (12 392)	76°	27,650 (12 542)	79°	23,700 (10 750)															15 (4,6)				
20 (6,1)	40°	14,620 (6 632)	64°	15,460 (7 013)	71°	15,730 (7 135)	76°	15,890 (7 208)	79°	14,000 (6 350)													20 (6,1)				
25 (7,6)	20°	9,240 (4 191)	58°	10,060 (4 563)	67°	10,290 (4 667)	72°	10,430 (4 731)	76°	10,530 (4 776)													25 (7,6)				
30 (9,1)			51°	6,960 (3 157)	62°	7,180 (3 257)	69°	7,310 (3 316)	73°	7,400 (3 357)	77°	7,300 (3 311)	77°	7,000 (3 175)									30 (9,1)				
35 (10,7)			43°	4,950 (2 245)	57°	5,170 (2 345)	65°	5,290 (2 400)	70°	5,370 (2 436)	75°	5,710 (2 590)	75°	5,290 (2 400)	78°	4,000 (1 814)							35 (10,7)				
40 (12,2)			34°	3,530 (1 601)	52°	3,750 (1 701)	61°	3,870 (1 755)	67°	3,950 (1 792)	73°	4,250 (1 928)	73°	3,830 (1 737)	76°	3,850 (1 746)							40 (12,2)				
45 (13,7)			22°	2,470 (1 120)	46°	2,700 (1 225)	57°	2,820 (1 279)	64°	2,900 (1 315)	71°	3,180 (1 442)	71°	2,760 (1 252)	74°	3,540 (1 606)							45 (13,7)				
50 (15,2)					39°	1 890 (857)	52°	2,010 (912)	60°	2,090 (948)	69°	2,360 (1 070)	69°	1 930 (875)	73°	2,690 (1 220)							50 (15,2)				
55 (16,8)					32°	1,250 (567)	48°	1,370 (621)	57°	1,440 (653)	66°	1,700 (771)	66°	1,270 (576)	71°	2,020 (916)							55 (16,8)				
60 (18,3)					22°	720 (327)	43°	850 (386)	53°	920 (417)	64°	1,170 (531)	64°	740 (336)	69°	1,470 (667)							60 (18,3)				
65 (19,8)														67°	1,020 (463)								65 (19,8)				
70 (21,3)														65°	640 (290)								70 (21,3)				
Deduction*		590 (268)		350 (159)		270 (122)		220 (100)		180 (82)																	
Deduction**		890 (404)		530 (240)		400 (181)		330 (150)		280 (127)																	

*for stowed fixed jib

**for stowed telescopic jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

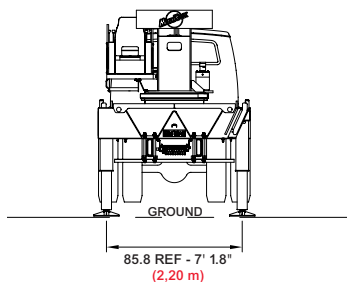
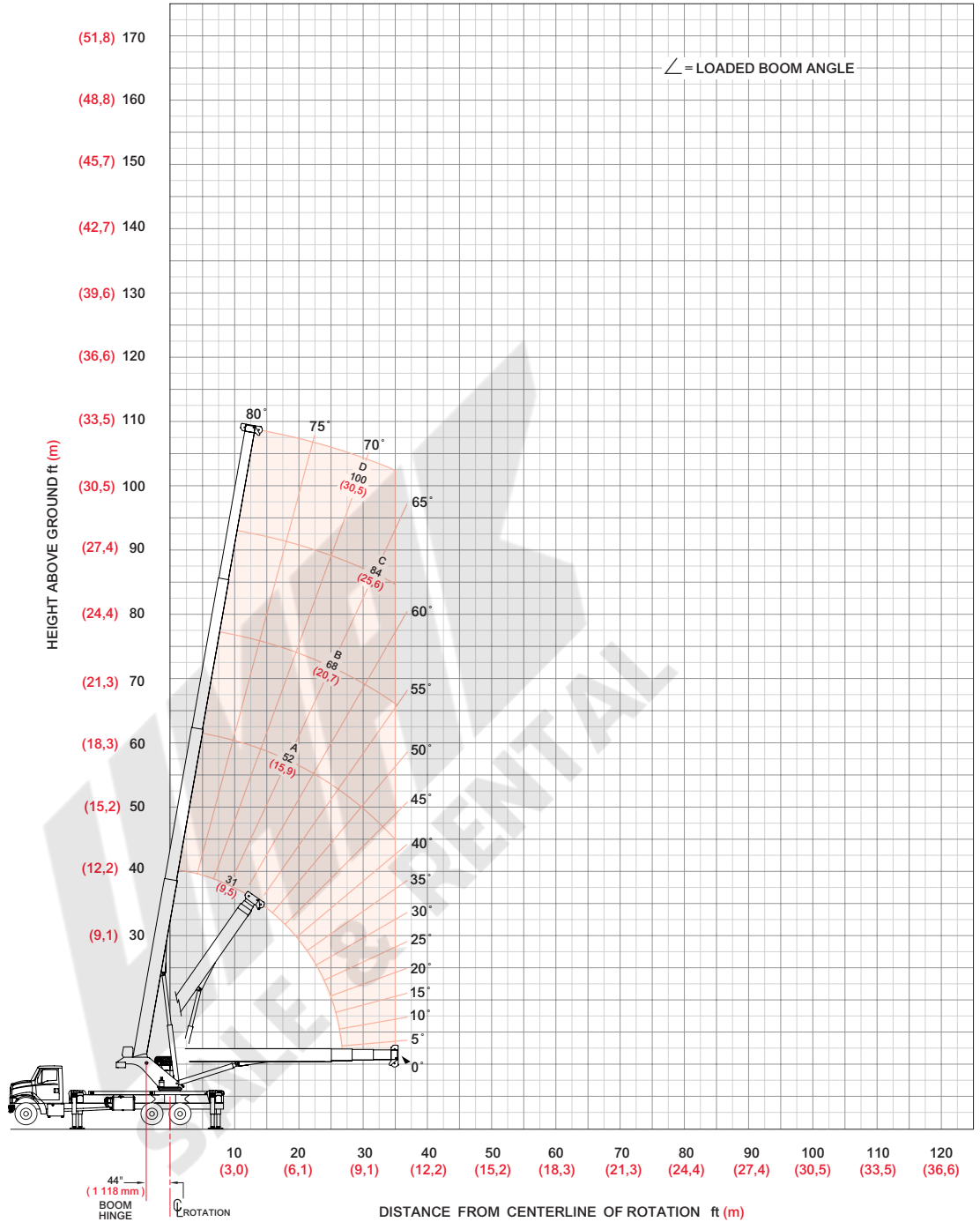
model 38100S



boom/jib range diagram

10

38100S Range Diagram - Fully Retracted



NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are fully retracted.

model 38100S



boom/jib load charts

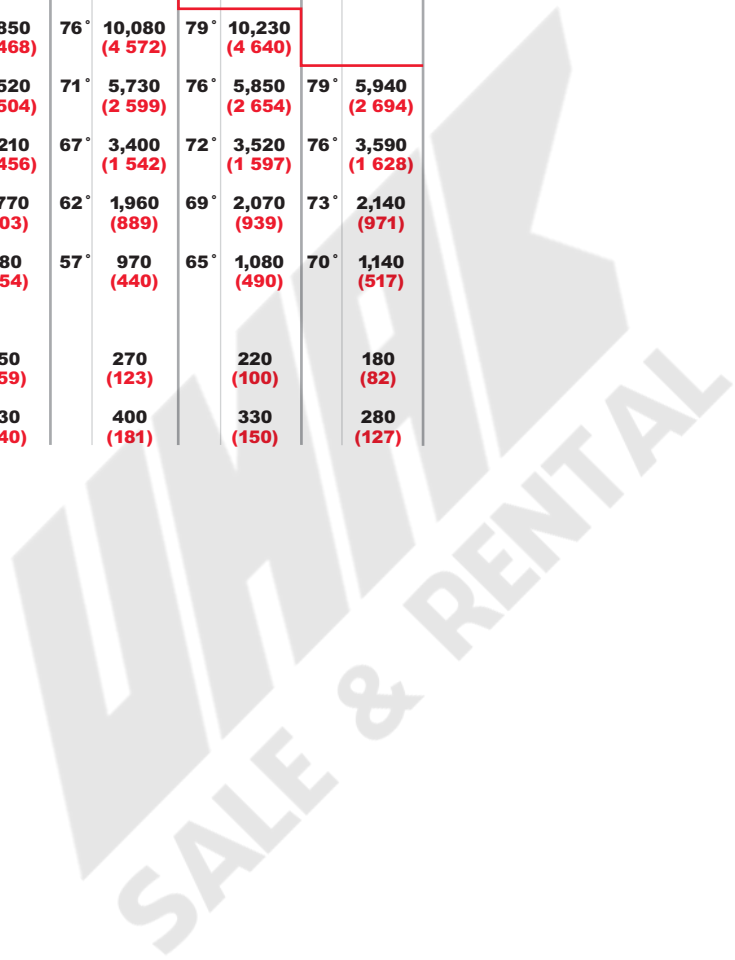
11

38100S Load Ratings Fully Retracted Outrigger Spread

Boom/Jib ft (m)	A		B		C		D	
	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)			
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)
5 (1,5)	74°	76,000 (34 473)						
8 (2,4)	68°	31,150 (14 129)						
10 (3,1)	64°	19,970 (9 058)	76°	20,890 (9 476)				
12 (3,7)	60°	14,080 (6 387)	73°	14,900 (6 759)	78°	15,170 (6 881)		
15 (4,6)	53°	9,110 (4 132)	70°	9,850 (4 468)	76°	10,080 (4 572)	79°	10,230 (4 640)
20 (6,1)	40°	4,840 (2 195)	64°	5,520 (2 504)	71°	5,730 (2 599)	76°	5,850 (2 654)
25 (7,6)	20°	2,510 (1 139)	58°	3,210 (1 456)	67°	3,400 (1 542)	72°	3,520 (1 597)
30 (9,1)			51°	1,770 (803)	62°	1,960 (889)	69°	2,070 (939)
35 (10,7)			43°	780 (354)	57°	970 (440)	65°	1,080 (490)
Deduction*		590 (268)	350 (159)	270 (123)	220 (100)	220 (100)	180 (82)	180 (82)
Deduction**		890 (404)	530 (240)	400 (181)	330 (150)	330 (150)	280 (127)	280 (127)

*for stowed fixed jib

**for stowed telescopic jib



model 38100S

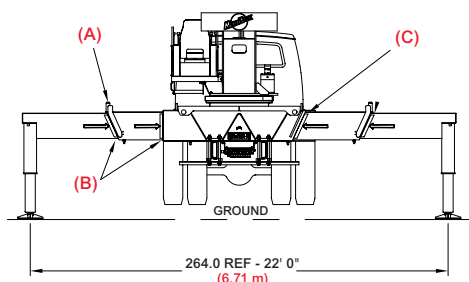
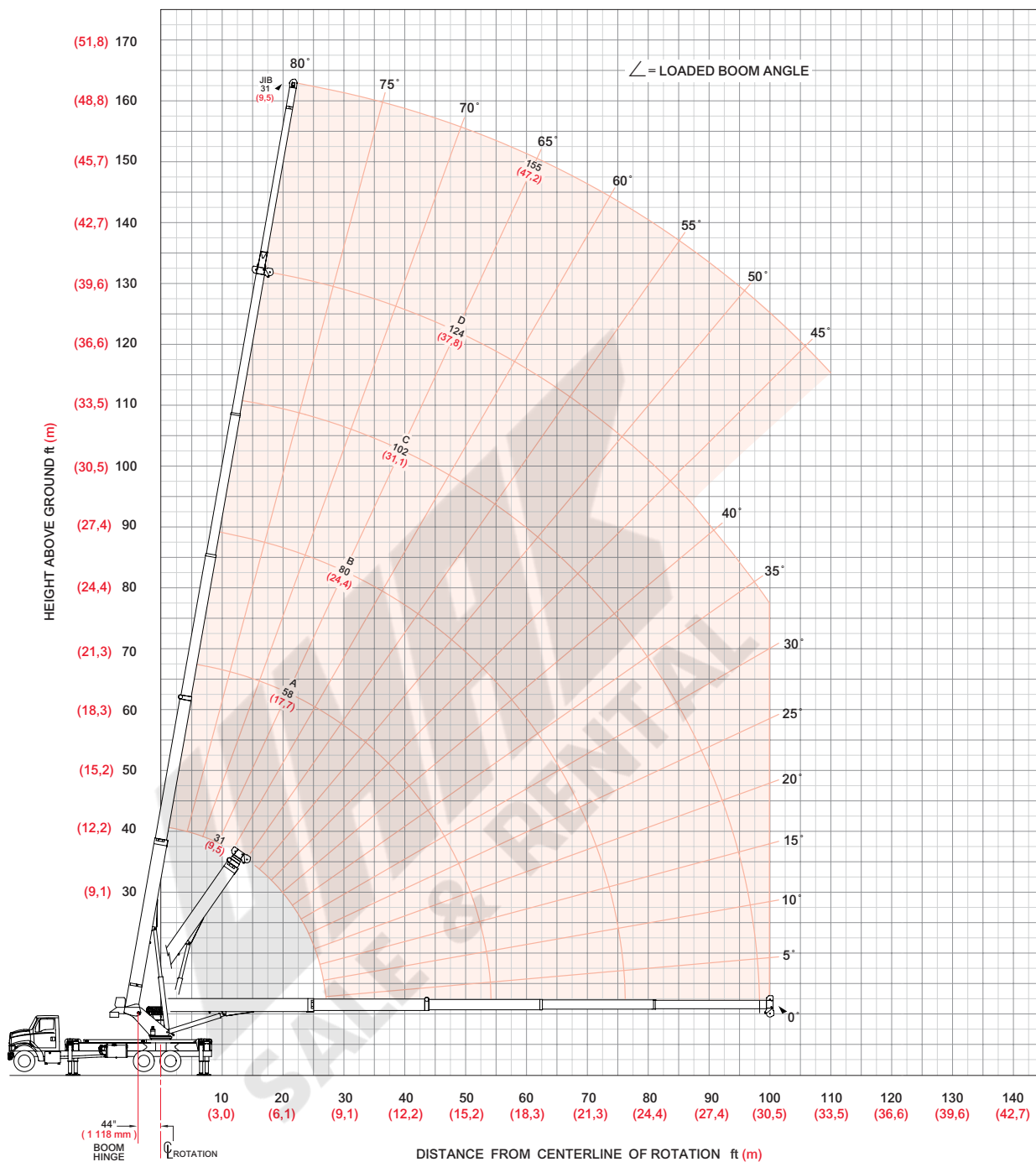
Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



boom/jib range diagram

12

38124S Range Diagram - Fully Extended



- (A) Pins must be disengaged for this outrigger configuration
- (B) These marks indicate when beams are fully extended
- (C) All outrigger beams must be extended to mark

NOTE: Use this chart only when all outriggers are fully extended.

model 38124S



boom/jib load charts

13

38124S Load Ratings Fully Extended Outrigger Spread

38124S Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib																
	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)		
Operating Radius ft (m)																													Operating Radius ft (m)								
5 (1,5)	75°	76,000 (34 473)																																			5 (1,5)
8 (2,4)	69°	60,500 (27 442)																																		8 (2,4)	
10 (3,1)	64°	52,550 (23 836)																																		10 (3,1)	
12 (3,7)	60°	46,600 (21 137)	75°	25,000 (11 340)																																12 (3,7)	
15 (4,6)	53°	39,600 (17 962)	73°	25,000 (11 340)	79°	21,500 (9 752)																														15 (4,6)	
20 (6,1)	40°	30,300 (13 744)	67°	25,000 (11 340)	75°	19,700 (8 936)	80°	14,500 (6 577)																												20 (6,1)	
25 (7,6)	22°	23,070 (10 464)	62°	22,840 (10 360)	71°	18,200 (8 255)	77°	13,500 (6 123)	80°	8,450 (3 833)																										25 (7,6)	
30 (9,1)			56°	18,670 (8 649)	67°	16,250 (7 371)	74°	12,820 (5 815)	78°	8,150 (3 697)	80°	4,000 (1 814)																								30 (9,1)	
35 (10,7)			49°	14,450 (6 554)	63°	14,540 (6 595)	71°	11,380 (5 162)	75°	7,800 (3 538)	78°	3,850 (1 746)																								35 (10,7)	
40 (12,2)			42°	11,190 (5 076)	59°	11,490 (5 212)	68°	10,160 (4 608)	72°	7,280 (3 302)	76°	3,700 (1,678)																								40 (12,2)	
45 (13,7)			34°	8,820 (4 000)	54°	9,110 (4 132)	65°	9,250 (4 196)	70°	6,780 (3 075)	74°	3,550 (1 610)																								45 (13,7)	
50 (15,2)			23°	7,030 (3 189)	50°	7,340 (3 329)	61°	7,480 (3 393)	67°	6,160 (2 794)	72°	3,400 (1 542)																								50 (15,2)	
55 (16,8)					44°	5,970 (2 708)	58°	6,110 (2 771)	65°	5,540 (2 513)	70°	3,250 (1 474)																								55 (16,8)	
60 (18,3)					39°	4,880 (2 214)	54°	5,020 (2 277)	62°	5,000 (2 268)	68°	3,080 (1 397)																								60 (18,3)	
65 (19,8)					32°	3,980 (1 805)	50°	4,130 (1 873)	59°	4,200 (1 905)	66°	2,910 (1 320)																								65 (19,8)	
70 (21,3)					24°	3,230 (1 465)	46°	3,390 (1 538)	56°	3,460 (1 569)	64°	2,750 (1 247)																								70 (21,3)	
75 (22,9)					12°	2,580 (1 170)	42°	2,760 (1 252)	53°	2,830 (1 284)	62°	2,600 (1 179)																								75 (22,9)	
80 (24,4)							37°	2,220 (1 007)	50°	2,300 (1 043)	60°	2,460 (1 116)																								80 (24,4)	
85 (25,9)							32°	1,750 (794)	47°	1,840 (835)	58°	2,260 (1 025)																								85 (25,9)	
90 (27,4)							25°	1,340 (608)	43°	1,430 (649)	55°	1,850 (839)																								90 (27,4)	
95 (29,0)							17°	970 (440)	40°	1,070 (485)	53°	1,490 (676)																								95 (29,0)	
100 (30,5)									35°	750 (340)	51°	1,170 (531)																								100 (30,5)	
105 (32,0)											48°	880 (399)																								105 (32,0)	
110 (33,5)											45°	620 (281)																								110 (33,5)	
Deduction*		450 (204)		240 (109)		180 (82)		140 (64)		120 (54)																											

*for stowed fixed jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

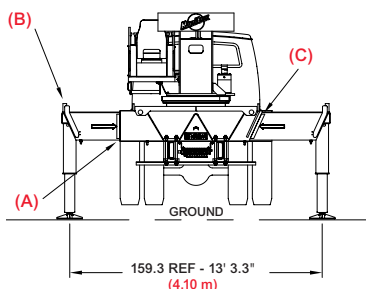
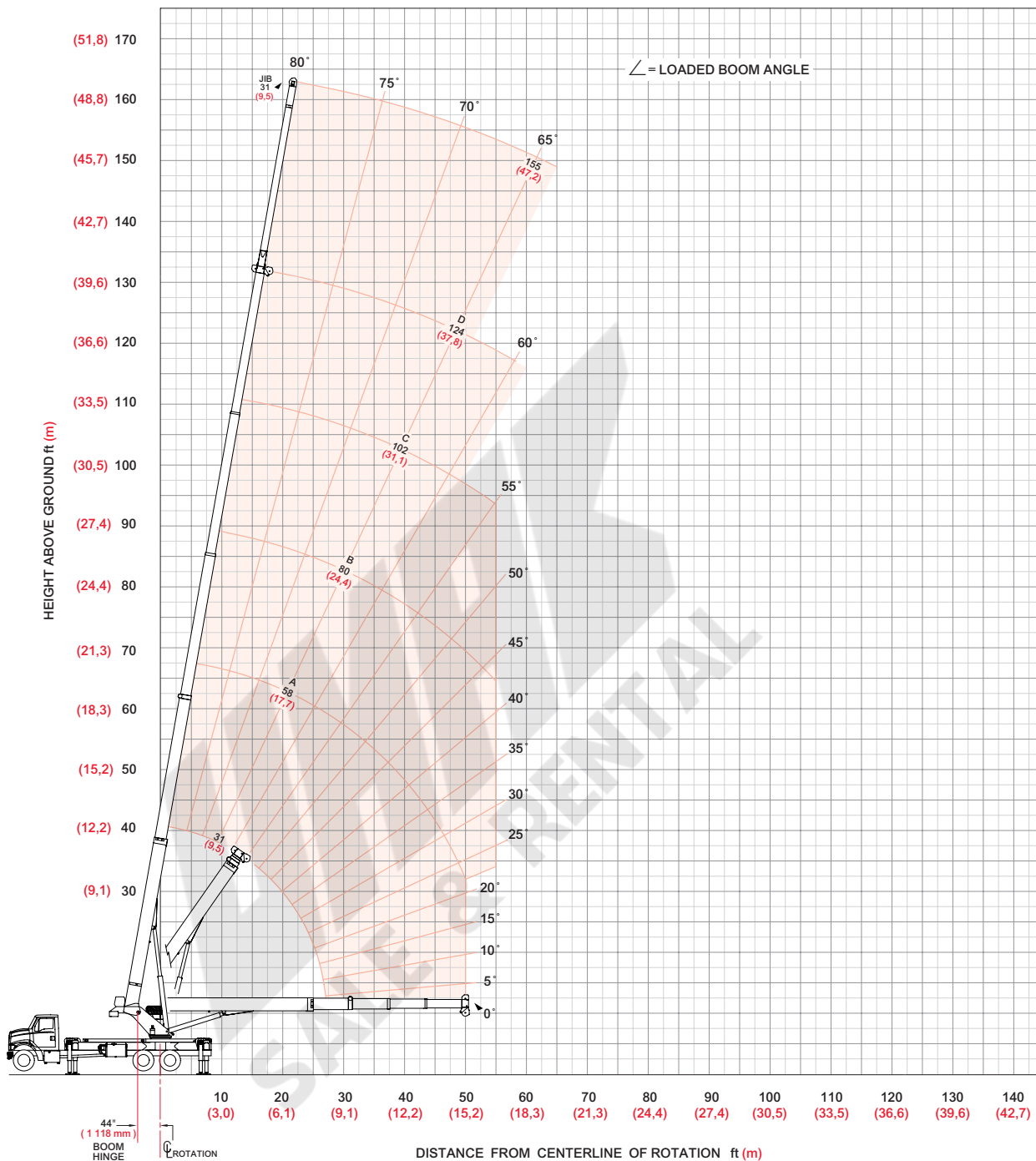
model 38124S



boom/jib range diagram

14

38124S Range Diagram - Intermediate



- (A) Mark indicates beam is fully extended
- (B) Pins must be engaged in this outrigger configuration
- (C) All outrigger beams must be extended to mark

NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are in the intermediate position.

model 38124S



boom/jib load charts

15

38124S Load Ratings Intermediate Outrigger Spread

38124S Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		
	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	
Operating Radius ft (m)																							Operating Radius ft (m)
5 (1,5)	75°	76,000 (34 473)																					5 (1,5)
8 (2,4)	69°	60,500 (27 442)																					8 (2,4)
10 (3,1)	64°	52,550 (23 836)																					10 (3,1)
12 (3,7)	60°	46,340 (21 019)	75°	25,000 (11 340)																			12 (3,7)
15 (4,6)	53°	27,730 (12 578)	73°	25,000 (11 340)	79°	21,500 (9 752)																	15 (4,6)
20 (6,1)	40°	15,230 (6 908)	67°	16,300 (7 394)	75°	16,590 (7 525)	80°	14,500 (6 577)															20 (6,1)
25 (7,6)	22°	9,460 (4 291)	62°	10,520 (4 772)	71°	10,780 (4 890)	77°	10,920 (4 953)	80°	8,450 (3 833)													25 (7,6)
30 (9,1)			56°	7,210 (3 270)	67°	7,450 (3 379)	74°	7,580 (3 438)	78°	7,650 (3 470)	80°	4,000 (1 814)											30 (9,1)
35 (10,7)			49°	5,050 (2 291)	63°	5,300 (2 404)	71°	5,420 (2 458)	75°	5,480 (2 486)	78°	3,850 (1 746)											35 (10,7)
40 (12,2)			42°	3,540 (1 606)	59°	3,780 (1 715)	68°	3,900 (1 769)	72°	3,960 (1 796)	76°	3,700 (1 678)											40 (12,2)
45 (13,7)			34°	2,410 (1 093)	54°	2,660 (1 207)	65°	2,780 (1 261)	70°	2,840 (1 288)	74°	3,250 (1 474)											45 (13,7)
50 (15,2)			23°	1,530 (694)	50°	1,800 (816)	61°	1,910 (866)	67°	1,980 (898)	72°	2,370 (1 075)											50 (15,2)
55 (16,8)					44°	1,110 (503)	58°	1,230 (558)	65°	1,290 (585)	70°	1,680 (762)											55 (16,8)
60 (18,3)										62°	730 (331)	68°	1,110 (503)										60 (18,3)
65 (19,8)												66°	640 (290)										65 (19,8)
Deduction*		450 (204)		240 (109)		180 (82)		140 (64)		120 (54)													

*for stowed fixed jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

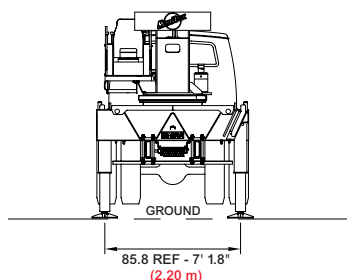
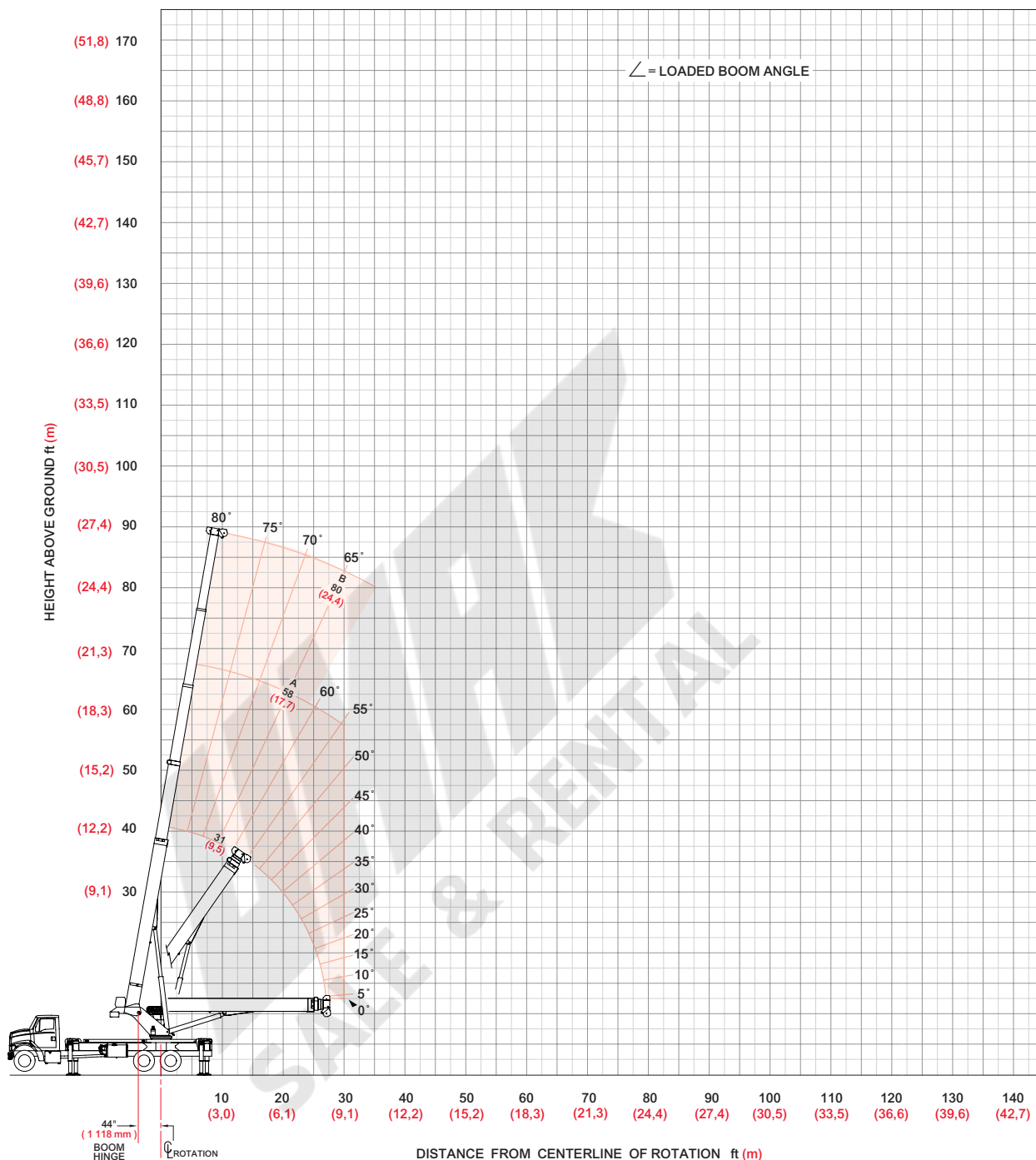


model 38124S

boom/jib range diagram

16

38124S Range Diagram - Fully Retracted



NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are fully retracted.

model 38124S



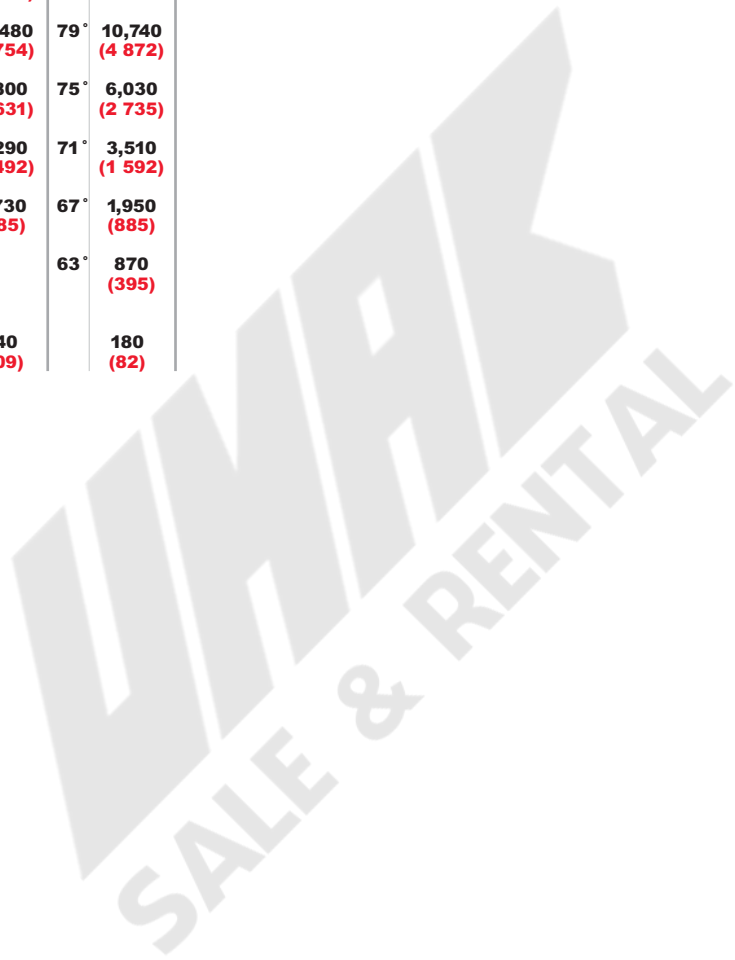
boom/jib load charts

17

**38124S Load Ratings Fully Retracted
Outrigger Spread**

Boom/Jib ft (m)	A		B			
	31 (9,5)	58 (17,7)	80 (24,4)			
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)		
5 (1,5)	75°	76,000 (34 473)				
8 (2,4)	69°	33,420 (15 159)				
10 (3,1)	64°	21,320 (9 671)				
12 (3,7)	60°	14,960 (6 786)	75°	15,960 (7 239)		
15 (4,6)	53°	9,570 (4 341)	73°	10,480 (4 754)	79°	10,740 (4 872)
20 (6,1)	40°	4,930 (2 236)	67°	5,800 (2 631)	75°	6,030 (2 735)
25 (7,6)	22°	2,390 (1 084)	62°	3,290 (1 492)	71°	3,510 (1 592)
30 (9,1)			56°	1,730 (785)	67°	1,950 (885)
35 (10,7)					63°	870 (395)
Deduction*		450 (204)		240 (109)		180 (82)

*for stowed fixed jib



model 38124S

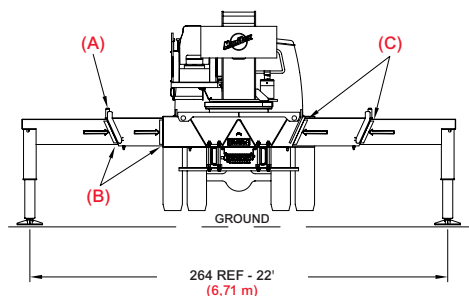
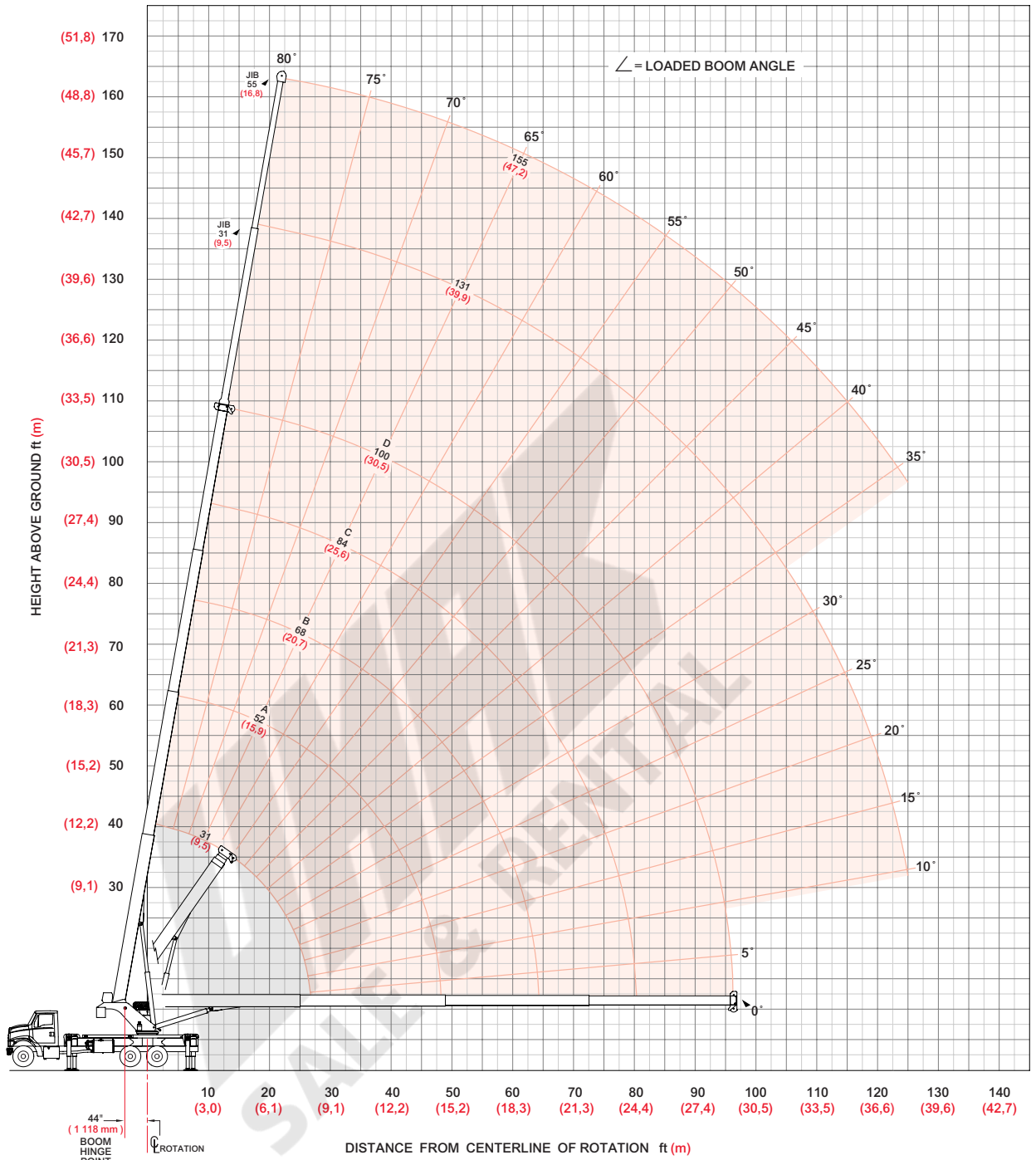
Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



boom/jib range diagram

38100SHL Range Diagram - Fully Extended

18



- (A) Pins must be disengaged for this outrigger configuration
- (B) These marks indicate when beams are fully extended
- (C) All outrigger beams must be extended to mark

NOTE: Use this chart only when all outriggers are fully extended.

model 38100SHL



boom/jib load charts

38100SHL Load Ratings Fully Extended Outrigger Spread

38100SHL Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		Telescopic Jib				Boom/Jib ft (m)
	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	55 (16,8)	31 (9,5)	55 (16,8)	31 (9,5)	55 (16,8)	Operating Radius ft (m)					
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	Operating Radius ft (m)				
5 (1,5)	74°	76,000 (34 473)																					5 (1,5)				
8 (2,4)	68°	61,000 (27 669)																					8 (2,4)				
10 (3,1)	64°	52,860 (23 977)	76°	31,500 (14 288)																			10 (3,1)				
12 (3,7)	60°	47,000 (21 319)	73°	31,500 (14 288)	78°	31,500 (14 288)																	12 (3,7)				
15 (4,6)	53°	40,280 (18 270)	70°	31,500 (14 288)	76°	31,500 (14 288)	79°	23,700 (10 750)															15 (4,6)				
20 (6,1)	40°	31,870 (14 456)	64°	28,680 (13 009)	71°	26,820 (12 165)	76°	20,600 (9 344)	79°	14,000 (6 350)													20 (6,1)				
25 (7,6)	20°	24,430 (11 081)	58°	23,830 (10 809)	67°	22,160 (10 052)	72°	18,300 (8 300)	76°	13,500 (6 123)													25 (7,6)				
30 (9,1)			51°	20,400 (9 253)	62°	19,080 (8 655)	69°	15,870 (7 199)	73°	12,820 (5 815)	77°	7,300 (3 311)	77°	7,000 (3 175)									30 (9,1)				
35 (10,7)			43°	15,980 (7 248)	57°	16,200 (7 348)	65°	13,950 (6 328)	70°	11,380 (5 162)	75°	7,100 (3 221)	75°	6,800 (3 084)	78°	4,000 (1 814)							35 (10,7)				
40 (12,2)			34°	12,890 (5 847)	52°	13,110 (5 947)	61°	12,350 (5 602)	67°	10,160 (4 608)	73°	6,620 (3 003)	73°	6,240 (2 830)	76°	3,850 (1 746)							40 (12,2)				
45 (13,7)			22°	10,610 (4 813)	46°	10,840 (4 917)	57°	10,960 (4 971)	64°	9,370 (4 250)	71°	6,060 (2 749)	71°	5,670 (2 572)	74°	3,700 (1 678)							45 (13,7)				
50 (15,2)					39°	9,090 (4 123)	52°	9,220 (4 182)	60°	8,430 (3 824)	69°	5,550 (2 517)	69°	5,150 (2 336)	73°	3,550 (1 610)							50 (15,2)				
55 (16,8)					32°	7,710 (3 497)	48°	7,830 (3 552)	57°	7,620 (3 456)	66°	5,100 (2 313)	66°	4,690 (2 127)	71°	3,310 (1 501)							55 (16,8)				
60 (18,3)					22°	6,580 (2 985)	43°	6,710 (3 044)	53°	6,790 (3 080)	64°	4,680 (2 123)	64°	4,210 (1 910)	69°	3,090 (1 402)							60 (18,3)				
65 (19,8)							37°	5,780 (2 622)	49°	5,860 (2 658)	61°	4,210 (1 910)	61°	3,740 (1 696)	67°	2,900 (1 315)							65 (19,8)				
70 (21,3)							31°	5,000 (2 268)	45°	5,070 (2 300)	59°	3,800 (1 724)	59°	3,330 (1 510)	65°	2,710 (1 229)							70 (21,3)				
75 (22,9)							22°	4,320 (1 960)	40°	4,410 (2 000)	56°	3,440 (1 560)	56°	2,970 (1 347)	63°	2,550 (1 157)							75 (22,9)				
80 (24,4)							7°	3,730 (1 692)	35°	3,830 (1 737)	53°	3,120 (1 415)	53°	2,660 (1 207)	61°	2,400 (1 089)							80 (24,4)				
85 (25,9)									30°	3,320 (1 506)	50°	2,840 (1 288)	50°	2,370 (1 075)	59°	2,270 (1 030)							85 (25,9)				
90 (27,4)									22°	2,880 (1 306)	47°	2,590 (1 175)	47°	2,120 (962)	56°	2,080 (943)							90 (27,4)				
95 (29,0)									11°	2,470 (1 120)	43°	2,350 (1 066)	43°	1,890 (857)	54°	1,890 (857)							95 (29,0)				
100 (30,5)											40°	2,150 (975)	40°	1,690 (767)	52°	1,710 (776)							100 (30,5)				
105 (32,0)											36°	1,960 (889)	36°	1,500 (680)	49°	1,540 (699)							105 (32,0)				
110 (33,5)											32°	1,760 (798)	32°	1,300 (590)	46°	1,390 (630)							110 (33,5)				
115 (35,1)											27°	1,500 (680)	27°	1,090 (494)	43°	1,250 (567)							115 (35,1)				
120 (36,6)											21°	1,270 (576)	21°	850 (386)	40°	1,120 (508)							120 (36,6)				
125 (38,0)											13°	1,040 (472)	13°	630 (286)	37°	1,000 (454)							125 (38,0)				
Deduction*		590 (268)		350 (159)		270 (122)		220 (100)		180 (82)																	
Deduction**		890 (404)		530 (240)		400 (181)		330 (150)		280 (127)																	

19

model 38100SHL

*for stowed fixed jib
**for stowed telescopic jib

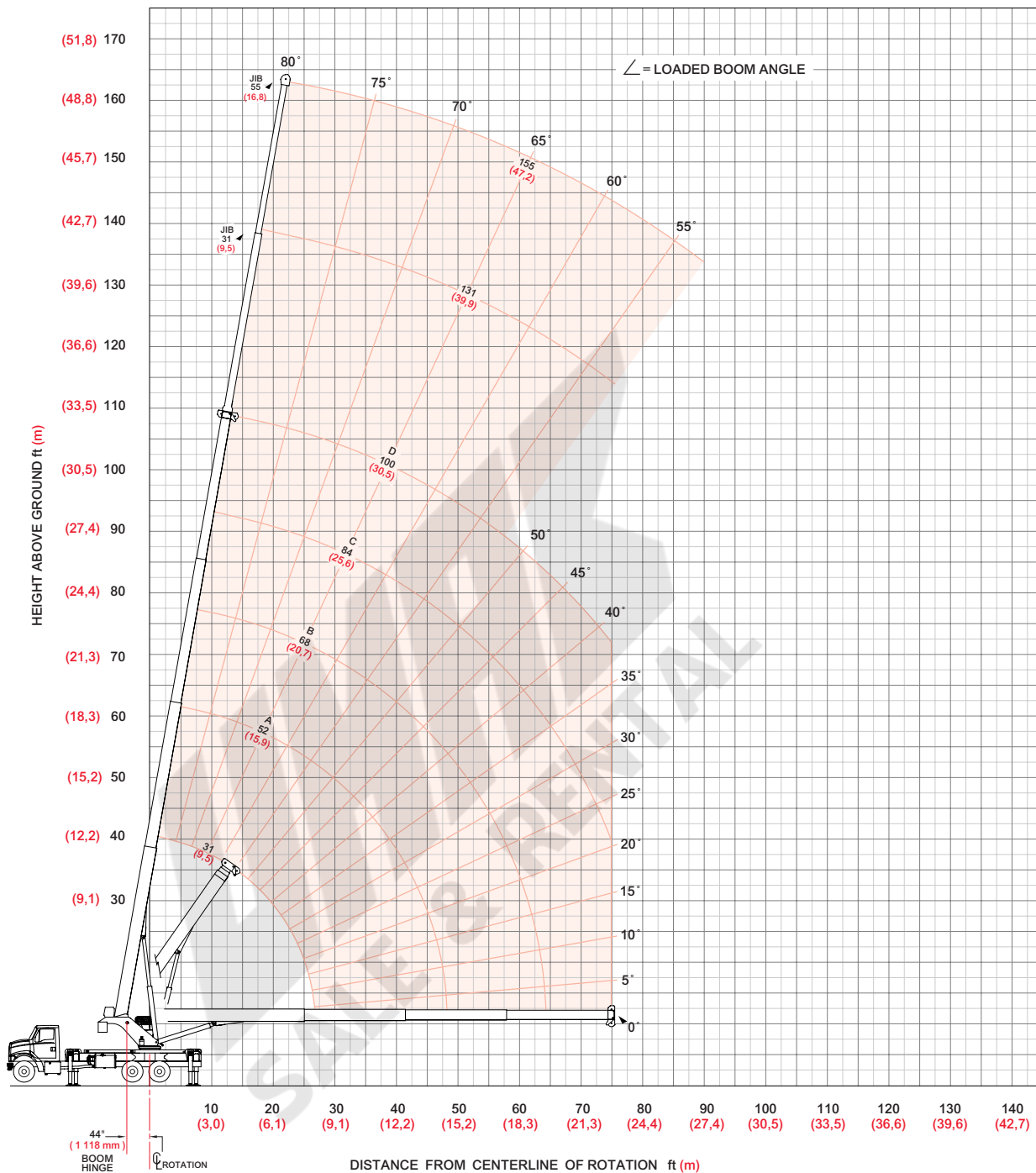
Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



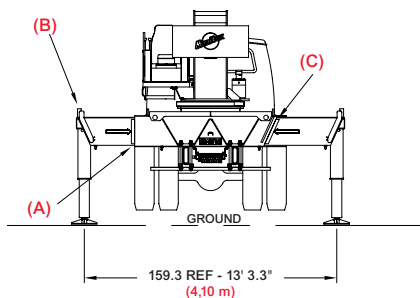
boom/jib range diagram

20

38100SHL Range Diagram - Intermediate



model 38100SHL



- (A) Mark indicates beam is fully extended
- (B) Pins must be engaged for this outrigger configuration
- (C) All outrigger beams must be extended to mark

NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are in the intermediate position.



boom/jib load charts

21

38100SHL Load Ratings Intermediate Outrigger Spread

38100SHL Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		Telescopic Jib			Operating Radius ft (m)
	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	52 (15,9)	68 (20,7)	84 (25,6)	100 (30,5)	31 (9,5)	55 (16,8)	Boom/Jib ft (m)			
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)	Operating Radius ft (m)	
5 (1,5)	74°	76,000 (34 473)																							5 (1,5)	
8 (2,4)	68°	61,000 (27 669)																							8 (2,4)	
10 (3,1)	64°	52,860 (23 977)	76°	31,500 (14 288)																					10 (3,1)	
12 (3,7)	60°	46,980 (21 310)	73°	31,500 (14 288)	78°	31,500 (14 288)																			12 (3,7)	
15 (4,6)	53°	35,350 (16 034)	70°	31,500 (14 288)	76°	31,500 (14 288)	79°	23,700 (10 750)																	15 (4,6)	
20 (6,1)	40°	20,280 (9 199)	64°	21,130 (9 584)	71°	21,390 (9 702)	76°	20,600 (9 344)	79°	14,000 (6 350)															20 (6,1)	
25 (7,6)	20°	13,360 (6 060)	58°	14,180 (6 432)	67°	14,410 (6 536)	72°	14,560 (6 604)	76°	13,500 (6 123)															25 (7,6)	
30 (9,1)			51°	10,200 (4 627)	62°	10,420 (4 726)	69°	10,550 (4 785)	73°	10,640 (4 826)	77°	7,300 (3 311)	77°	7,000 (3 175)											30 (9,1)	
35 (10,7)			43°	7,620 (3 456)	57°	7,830 (3 552)	65°	7,960 (3 611)	70°	8,040 (3 647)	75°	7,100 (3 221)	75°	6,800 (3 084)	78°	4,000 (1 814)									35 (10,7)	
40 (12,2)			34°	5,800 (2 631)	52°	6,020 (2 731)	61°	6,140 (2 785)	67°	6,220 (2 821)	73°	6,520 (2 957)	73°	6,100 (2 767)	76°	3,850 (1 746)									40 (12,2)	
45 (13,7)			22°	4,450 (2 018)	46°	4,680 (2 123)	57°	4,790 (2 173)	64°	4,870 (2 209)	71°	5,150 (2 336)	71°	4,730 (2 145)	74°	3,700 (1 678)									45 (13,7)	
50 (15,2)					39°	3,640 (1 651)	52°	3,760 (1 706)	60°	3,830 (1 737)	69°	4,100 (1 860)	69°	3,680 (1 669)	73°	3,550 (1 610)									50 (15,2)	
55 (16,8)					32°	2,810 (1 275)	48°	2,940 (1 334)	57°	3,010 (1 365)	66°	3,270 (1 483)	66°	2,840 (1 288)	71°	3,310 (1 501)									55 (16,8)	
60 (18,3)					22°	2,130 (966)	43°	2,270 (1 030)	53°	2,340 (1 061)	64°	2,590 (1 175)	64°	2,160 (980)	69°	2,890 (1 311)									60 (18,3)	
65 (19,8)							37°	1,710 (776)	49°	1,780 (807)	61°	2 020 (916)	61°	1,590 (721)	67°	2,320 (1 052)									65 (19,8)	
70 (21,3)							31°	1,240 (562)	45°	1,310 (594)	59°	1,550 (703)	59°	1,120 (508)	65°	1,830 (830)									70 (21,3)	
75 (22,9)							22°	830 (376)	40°	910 (413)	56°	1,440 (517)	56°	710 (322)	63°	1,420 (644)									75 (22,9)	
80 (24,4)															61°	1,060 (481)									80 (24,4)	
85 (25,9)															59°	750 (340)									85 (25,9)	
90 (27,4)															56°	480 (218)									90 (27,4)	
Deduction*		590 (268)		350 (159)		270 (122)		220 (100)		180 (82)																
Deduction**		890 (404)		530 (240)		400 (181)		330 (150)		280 (127)																

*for stowed fixed jib
**for stowed telescopic jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

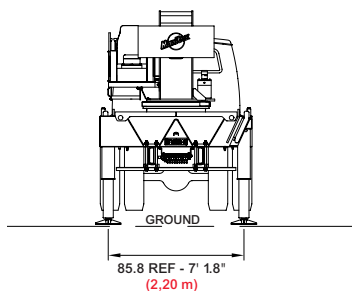
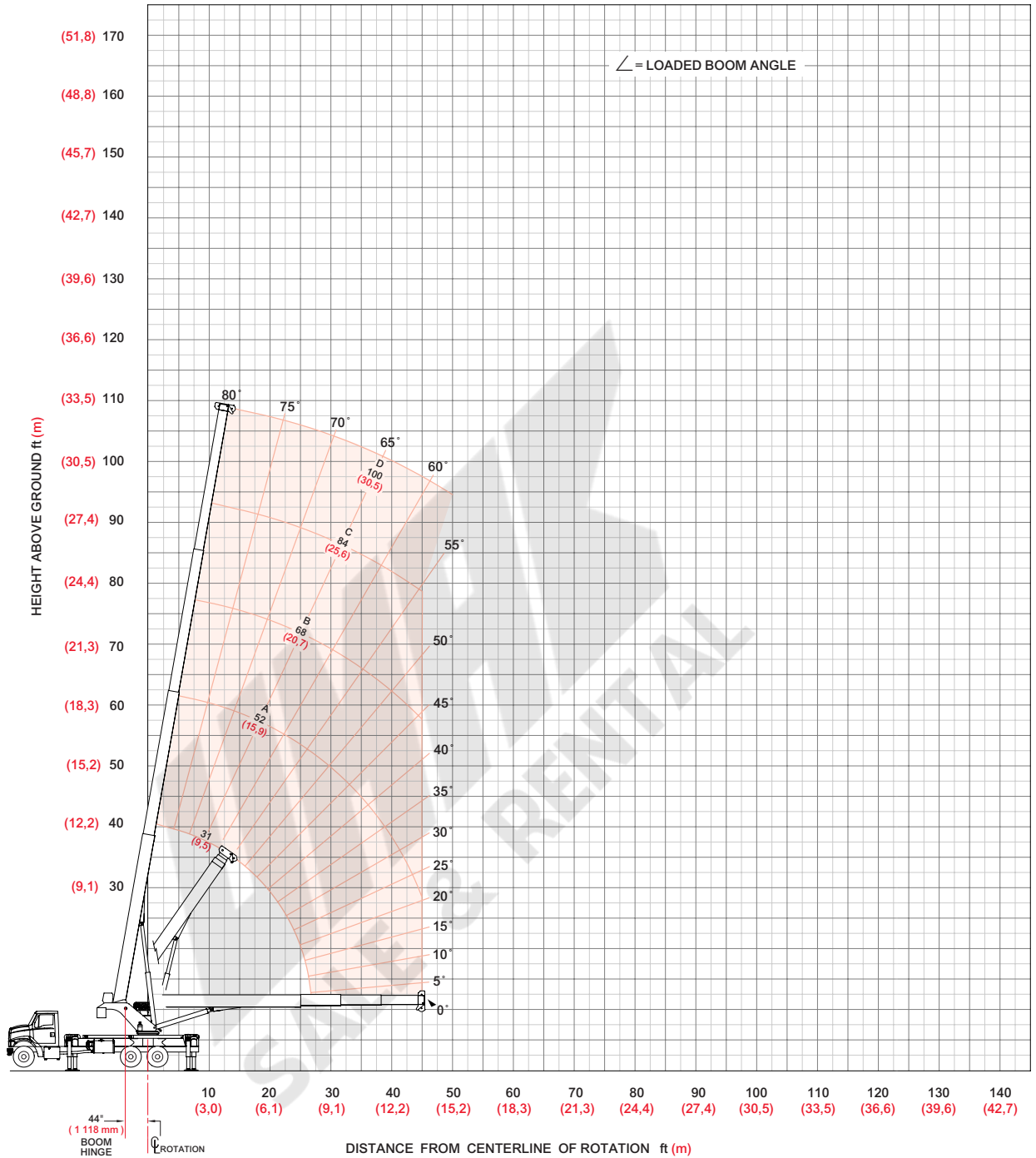
model 38100SHL



boom/jib range diagram

22

38100SHL Range Diagram - Fully Retracted



NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are fully retracted.

model 38100SHL



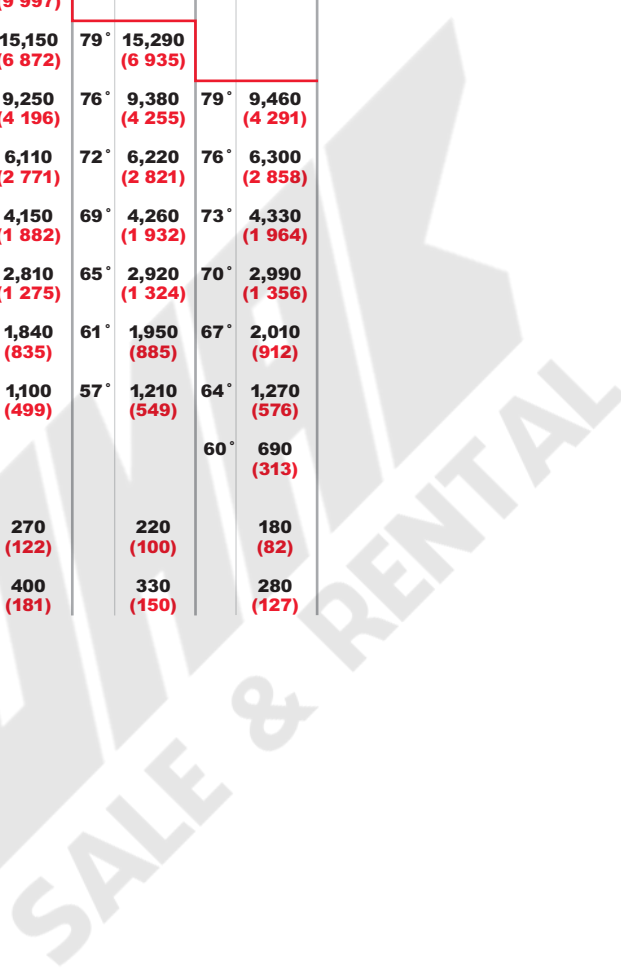
boom/jib load charts

23

38100SHL Load Ratings Fully Retracted Outrigger Spread

Boom/Jib ft (m)	A		B		C		D	
	31 (9,5)	52 (16,1)	68 (20,7)	84 (25,6)	100 (30,5)			
Operating Radius ft (m)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)	∠ lb (kg)
5 (1,5)	74° 76,000 (34 473)							
8 (2,4)	68° 44,230 (20 062)							
10 (3,1)	64° 28,970 (13 141)	76° 29,900 (13 562)						
12 (3,7)	60° 20,950 (9 503)	73° 21,770 (9 875)	78° 22,040 (9 997)					
15 (4,6)	53° 14,180 (6 432)	70° 14,910 (6 763)	76° 15,150 (6 872)	79° 15,290 (6 935)				
20 (6,1)	40° 8,360 (3 792)	64° 9,040 (4 100)	71° 9,250 (4 196)	76° 9,380 (4 255)	79° 9,460 (4 291)			
25 (7,6)	20° 5,210 (2 362)	58° 5,910 (2 681)	67° 6,110 (2 771)	72° 6,220 (2 821)	76° 6,300 (2 858)			
30 (9,1)		51° 3,960 (1 796)	62° 4,150 (1 882)	69° 4,260 (1 932)	73° 4,330 (1 964)			
35 (10,7)		43° 2,620 (1 188)	57° 2,810 (1 275)	65° 2,920 (1 324)	70° 2,990 (1 356)			
40 (12,1)		34° 1,640 (744)	52° 1,840 (835)	61° 1,950 (885)	67° 2,010 (912)			
45 (13,7)		22° 890 (404)	46° 1,100 (499)	57° 1,210 (549)	64° 1,270 (576)			
50 (15,2)					60° 690 (313)			
Deduction*	590 (268)	350 (159)	270 (122)	220 (100)	180 (82)			
Deduction**	890 (404)	530 (240)	400 (181)	330 (150)	280 (127)			

*for stowed fixed jib
**for stowed telescopic jib



model 38100SHL

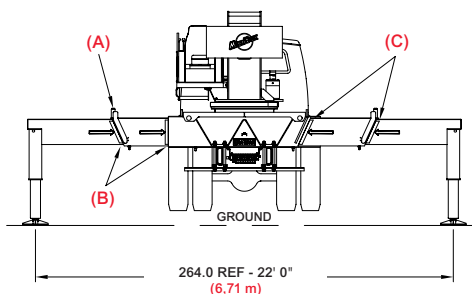
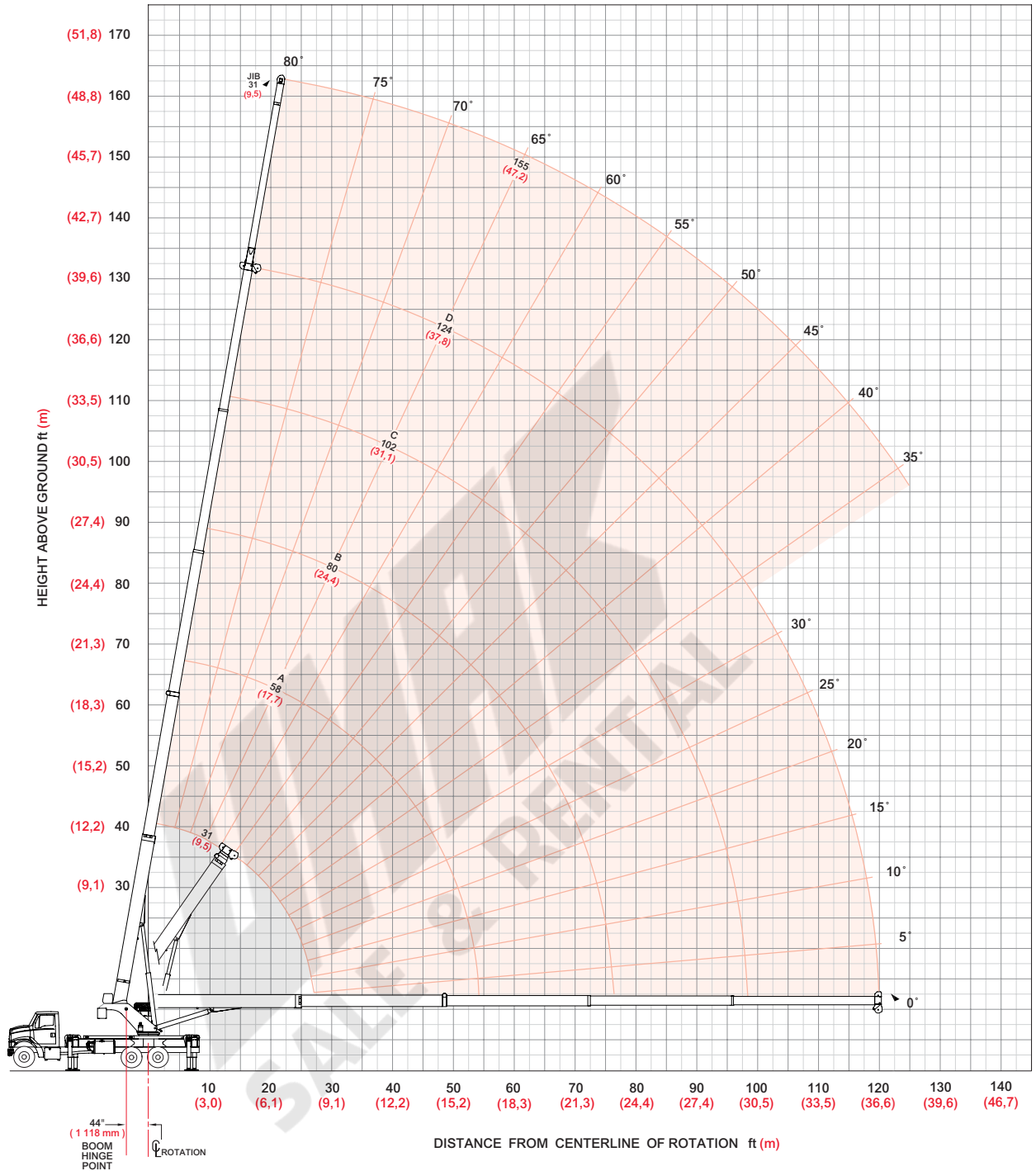
Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



boom/jib range diagram

38124SHL Range Diagram - Fully Extended

24



- (A) Pins must be disengaged for this outrigger configuration
- (B) Mark indicates beam is fully extended
- (C) Outrigger beams must be extended to mark

NOTE: Use this chart only when all outriggers are fully extended.

model 38124SHL



boom/jib load charts

25

38124SHL Load Ratings Fully Extended Outrigger Spread

38124SHL Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib		
	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	
Operating Radius ft (m)																							Operating Radius ft (m)
5 (1,5)	75° 76,000 (34 473)																						5 (1,5)
8 (2,4)	69° 60,500 (27 442)																						8 (2,4)
10 (3,1)	64° 52,550 (23 836)																						10 (3,1)
12 (3,7)	60° 46,600 (21 137)	75° 25,000 (11 340)																					12 (3,7)
15 (4,6)	53° 39,600 (17 962)	73° 25,000 (11 340)	79° 21,500 (9 752)																				15 (4,6)
20 (6,1)	40° 31,330 (14 211)	67° 25,000 (11 340)	75° 19,700 (8 936)	80° 14,500 (6 577)																			20 (6,1)
25 (7,6)	22° 24,100 (10 932)	62° 22,840 (10 360)	71° 18,200 (8 255)	77° 13,500 (6 123)	80° 8,450 (3 833)																		25 (7,6)
30 (9,1)		56° 19,550 (8 868)	67° 16,250 (7 371)	74° 12,820 (5 815)	78° 8,150 (3 697)	80° 4,000 (1 814)																	30 (9,1)
35 (10,7)		49° 16,100 (7 303)	63° 14,540 (6 595)	71° 11,380 (5 162)	75° 7,800 (3 538)	78° 3,850 (1 746)																	35 (10,7)
40 (12,2)		42° 12,900 (5 851)	59° 13,070 (5 928)	68° 10,160 (4 608)	72° 7,280 (3 302)	76° 3,700 (1 678)																	40 (12,2)
45 (13,7)		34° 10,540 (4 781)	54° 10,800 (4 899)	65° 9,370 (4 250)	70° 6,780 (3 075)	74° 3,550 (1 610)																	45 (13,7)
50 (15,2)		23° 8,720 (3 955)	50° 9,000 (4 082)	61° 8,430 (3 824)	67° 6,160 (2 794)	72° 3,400 (1 542)																	50 (15,2)
55 (16,8)			44° 7,570 (3 434)	58° 7,620 (3 456)	65° 5,540 (2 513)	70° 3,250 (1 474)																	55 (16,8)
60 (18,3)			39° 6,400 (2 903)	54° 6,530 (2 962)	62° 5,000 (2 268)	68° 3,080 (1 397)																	60 (18,3)
65 (19,8)			32° 5,430 (2 463)	50° 5,570 (2 527)	59° 4,520 (2 050)	66° 2,910 (1 320)																	65 (19,8)
70 (21,3)			24° 4,610 (2 091)	46° 4,760 (2 159)	56° 4,090 (1 855)	64° 2,750 (1 247)																	70 (21,3)
75 (22,9)			12° 3,900 (1 769)	42° 4,060 (1 842)	53° 3,700 (1 678)	62° 2,600 (1 179)																	75 (22,9)
80 (24,4)				37° 3,470 (1 574)	50° 3,350 (1 520)	60° 2,460 (1 116)																	80 (24,4)
85 (25,9)				32° 2,940 (1 334)	47° 3,020 (1 370)	58° 2,320 (1 052)																	85 (25,9)
90 (27,4)				25° 2,480 (1 125)	43° 2,560 (1 161)	55° 2,170 (984)																	90 (27,4)
95 (29,0)				17° 2,060 (934)	40° 2,150 (975)	53° 1,930 (875)																	95 (29,0)
100 (30,5)					35° 1,790 (812)	51° 1,720 (780)																	100 (30,5)
105 (32,0)					31° 1,460 (662)	48° 1,530 (694)																	105 (32,0)
110 (33,5)					25° 1,160 (526)	45° 1,350 (612)																	110 (33,5)
115 (35,1)					18° 880 (399)	43° 1,200 (544)																	115 (35,1)
120 (36,6)						40° 1,020 (463)																	120 (36,6)
125 (38,0)						36° 800 (363)																	125 (38,0)
Deduction*	450 (204)	240 (109)	180 (82)	140 (64)	120 (54)																		

*for stowed fixed jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

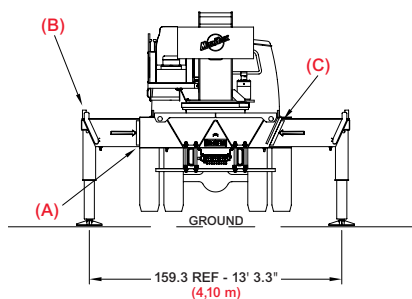
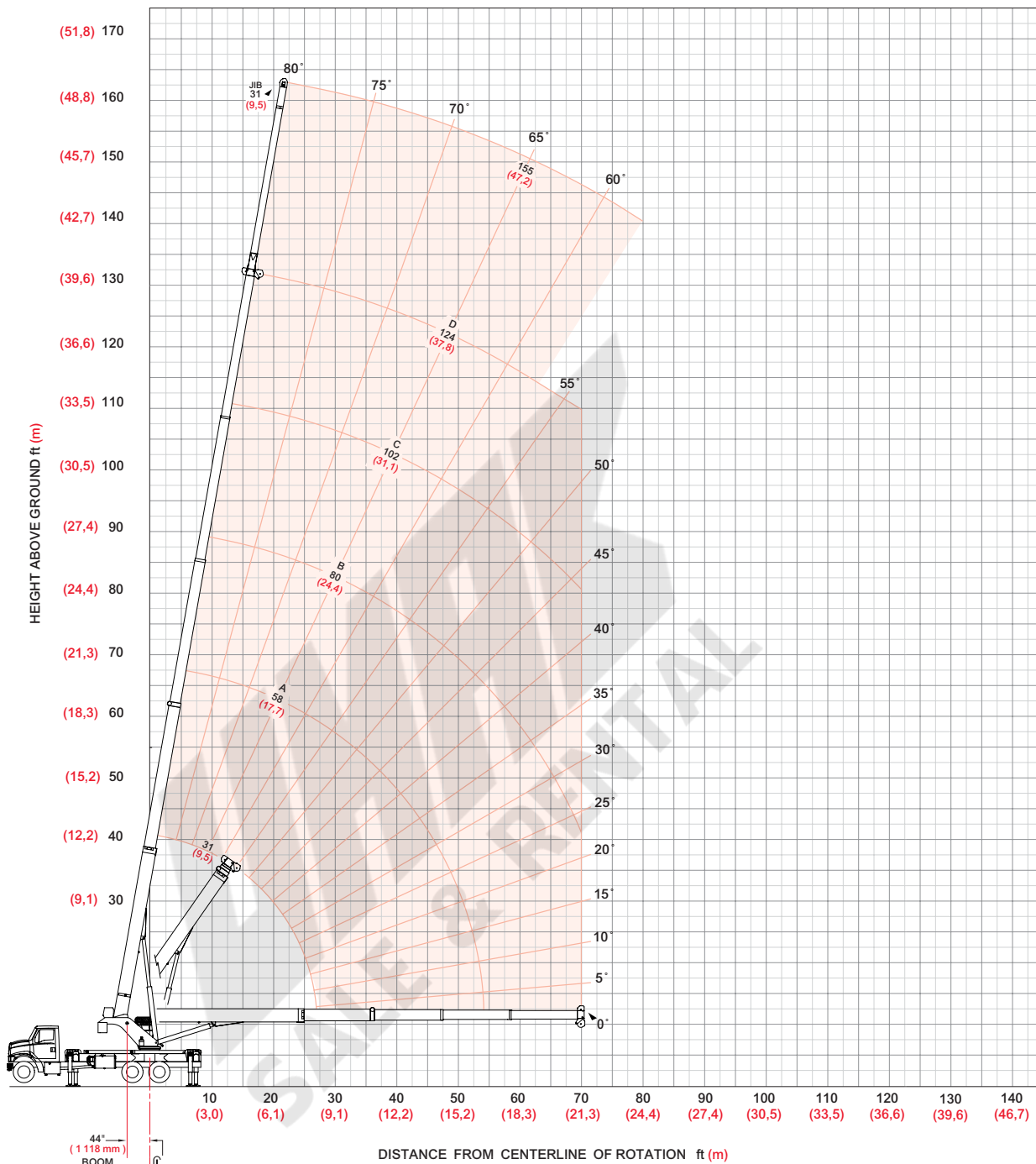
amodel 38124SHL



boom/jib range diagram

26

38124SHL Range Diagram - Intermediate



- (A) Mark indicates beam is fully extended
- (B) Pins must be engaged in this outrigger configuration
- (C) All outrigger beams must be extended to mark

NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are in the intermediate position.

model 38124SHL



boom/jib load charts

27

38124SHL Load Ratings Intermediate Outrigger Spread

38124SHL Jib Load Ratings

Boom/Jib ft (m)	A					B					C					D					Fixed Jib			
	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)	124 (37,8)	31 (9,5)	58 (17,7)		
Operating Radius ft (m)																							Operating Radius ft (m)	
5 (1,5)	75°	76,000 (34 473)																					5 (1,5)	
8 (2,4)	69°	60,500 (27 442)																					8 (2,4)	
10 (3,1)	64°	52,550 (23 836)																					10 (3,1)	
12 (3,7)	60°	46,600 (21 137)	75°	25,000 (11 340)																			12 (3,7)	
15 (4,6)	53°	36,000 (16 329)	73°	25,000 (11 340)	79°	21,500 (9 752)																	15 (4,6)	
20 (6,1)	40°	20,410 (9 258)	67°	21,480 (9 743)	75°	19,700 (8 936)	80°	14,500 (6 577)																20 (6,1)
25 (7,6)	22°	13,230 (6 001)	62°	14,290 (6 482)	71°	14,550 (6 600)	77°	13,500 (6 123)	80°	8,450 (3 833)														25 (7,6)
30 (9,1)			56°	10,170 (4 613)	67°	10,420 (4 726)	74°	10,540 (4 781)	78°	8,150 (3 697)	80°	4,000 (1 814)												30 (9,1)
35 (10,7)			49°	7,490 (3 397)	63°	7,740 (3 511)	71°	7,860 (3 565)	75°	7,800 (3 538)	78°	3,850 (1 746)												35 (10,7)
40 (12,2)			42°	5,610 (2 545)	59°	5,860 (2 658)	68°	5,980 (2 712)	72°	6,040 (2 740)	76°	3,700 (1 678)												40 (12,2)
45 (13,7)			34°	4,220 (1 914)	54°	4,470 (2 028)	65°	4,580 (2 077)	70°	4,650 (2 109)	74°	3,550 (1 610)												45 (13,7)
50 (15,2)			23°	3,120 (1 415)	50°	3,390 (1 538)	61°	3,510 (1 592)	67°	3,570 (1 619)	72°	3,400 (1 542)												50 (15,2)
55 (16,8)					44°	2,540 (1 152)	58°	2,660 (1 207)	65°	2,720 (1 234)	70°	3,110 (1 411)												55 (16,8)
60 (18,3)					39°	1,840 (835)	54°	1,970 (894)	62°	2,030 (921)	68°	2,410 (1 093)												60 (18,3)
65 (19,8)					32°	1,260 (572)	50°	1,390 (630)	59°	1,450 (658)	66°	1,830 (830)												65 (19,8)
70 (21,3)					24°	770 (349)	46°	900 (408)	56°	970 (440)	64°	1,340 (608)												70 (21,3)
75 (22,9)											62°	920 (417)												75 (22,9)
80 (24,3)											60°	560 (254)												80 (24,3)
Deduction*		450 (204)		240 (109)		180 (82)		140 (64)		120 (54)														

*for stowed fixed jib

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.

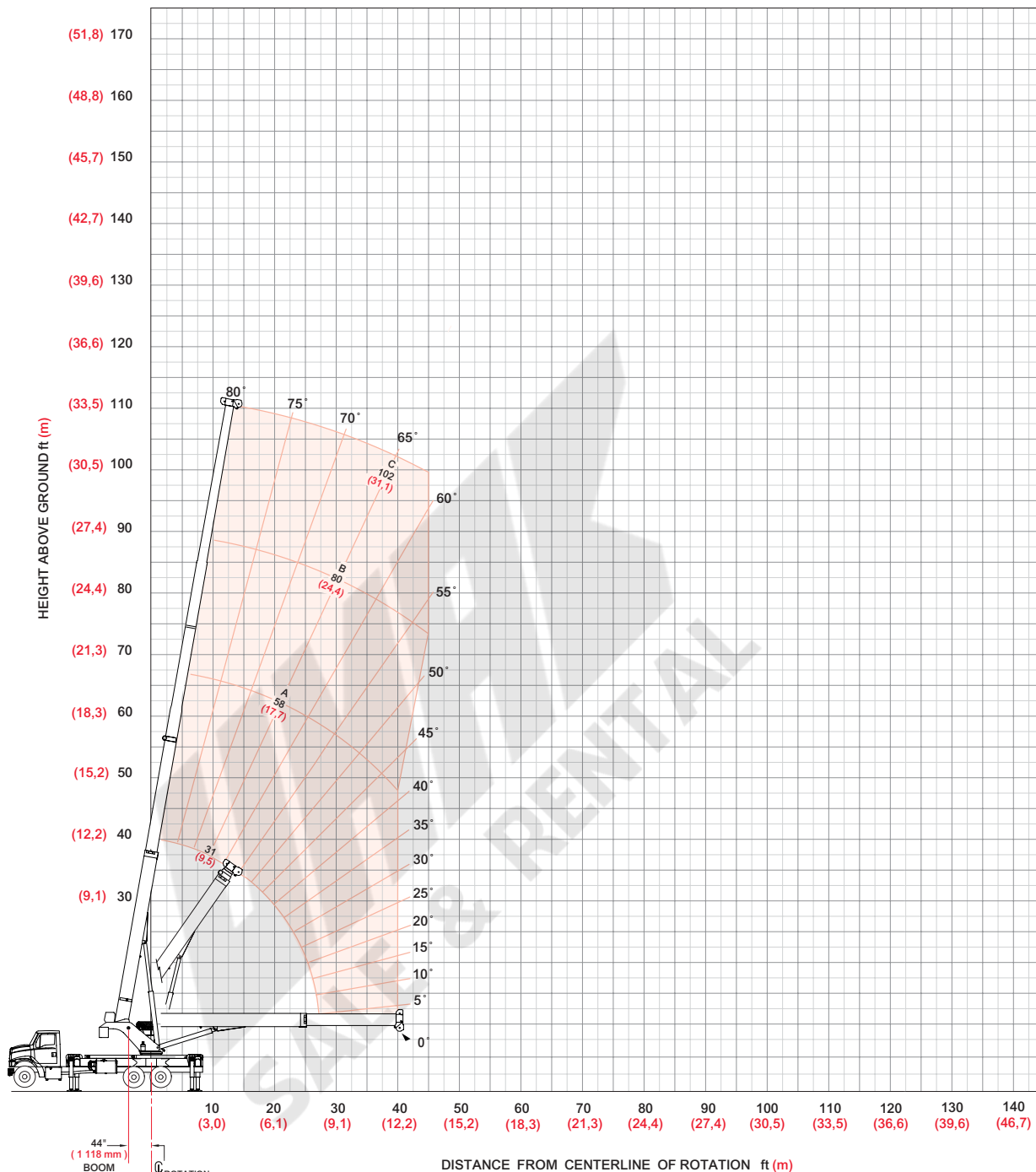
model 38124SHL



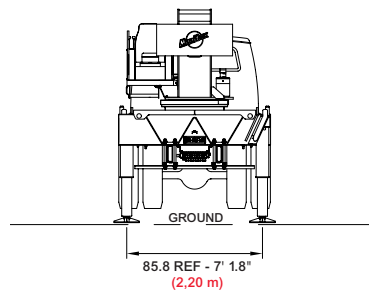
boom/jib range diagram

28

38124SHL Range Diagram - Fully Retracted



model 38124SHL



NOTE: Lifting personnel with crane in this outrigger configuration is strictly prohibited. Use only fully extended outrigger configuration when lifting personnel.

Use this chart only when all outriggers are fully retracted.

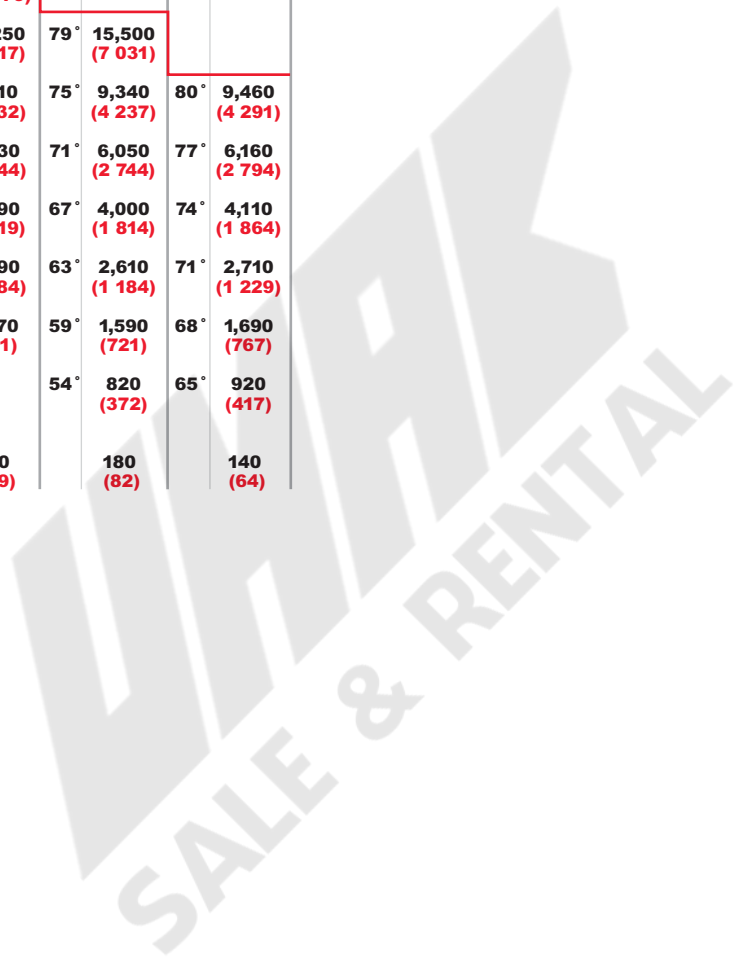


boom/jib load charts

38124SHL Load Ratings Fully Retracted Outrigger Spread

Boom/Jib ft (m)	A		B		C			
	31 (9,5)	58 (17,7)	80 (24,4)	102 (31,1)				
Operating Radius ft (m)	∠	lb (kg)	∠	lb (kg)	∠	lb (kg)		
5 (1,5)	75°	76,000 (34 473)						
8 (2,4)	69°	45,710 (20 734)						
10 (3,1)	64°	29,790 (13 513)						
12 (3,7)	60°	21,410 (9 711)	75°	22,420 (10 170)				
15 (4,6)	53°	14,330 (6 500)	73°	15,250 (6 917)	79°	15,500 (7 031)		
20 (6,1)	40°	8,240 (3 738)	67°	9,110 (4 132)	75°	9,340 (4 237)	80°	9,460 (4 291)
25 (7,6)	22°	4,930 (2 236)	62°	5,830 (2 644)	71°	6,050 (2 744)	77°	6,160 (2 794)
30 (9,1)			56°	3,790 (1 719)	67°	4,000 (1 814)	74°	4,110 (1 864)
35 (10,7)			49°	2,390 (1 084)	63°	2,610 (1 184)	71°	2,710 (1 229)
40 (12,2)			42°	1,370 (621)	59°	1,590 (721)	68°	1,690 (767)
45 (13,7)					54°	820 (372)	65°	920 (417)
Deduction*		450 (204)		240 (109)		180 (82)		140 (64)

*for stowed fixed jib



model 38124SHL

Meets ANSI B30.5 Requirements - Do not operate crane or accessories within 10' (3.05m) of live power lines.
NOTICE: This capacity chart is for reference only and must not be used for lifting purposes.



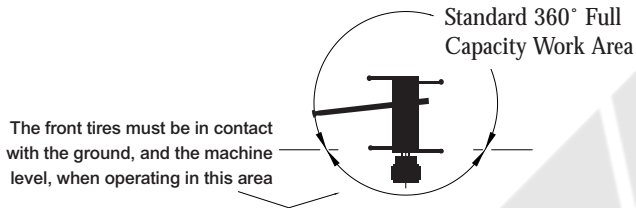
load chart data

30

Deductions

Auxiliary Block	50 lb (23 kg)
Overhaul Ball	See manufacturer's nameplate
15 Ton Single Sheave Load Block	See manufacturer's nameplate
40 Ton 4-Sheave Load Block	See manufacturer's nameplate
Hose Reel	260 lb (118 kg)
Swing Around Jib (stowed)	See load rating chart

Area of Operation



Allowable Line Pull

1 Part Line	2 Part Line	3 Part Line	4 Part Line	5 Part Line	6 Part Line	7 Part Line	8 Part Line
9,080 lb (4 119 kg)	18,160 lb (8 237 kg)	27,240 lb (12 356 kg)	36,320 lb (16 474 kg)	45,400 lb (20 593 kg)	54,480 lb (24 712 kg)	63,560 lb (28 830 kg)	72,640 lb (32 949 kg)
9,500 lb (4 309 kg)	19,000 lb (8 618 kg)	28,500 lb (12 297 kg)	38,000 lb (17 237 kg)	47,500 lb (21 546 kg)	57,000 lb (25 855 kg)	66,500 lb (30 164 kg)	76,000 lb (34 473 kg)

5/8" 6 x 25 IWRC (3.5:1 SF) – 33,250 lb Min Breaking Strength
 5/8" Rotation Resistant (5.0:1 SF) – 45,400 lb Min Breaking Strength

Warning

Anti-two-block system must be in good operating condition before operating crane. Refer to the owner's manual. Keep at least three wraps of load line on the drum at all times.

models 38100S, 38124S, 38100SHL, 38124SHL



CraneCARESM

CraneCARE is Manitowoc Boom Trucks' complete service and support program. Incorporated into this program are service training, immediate parts availability, professional field service, and technical support and documentation. CraneCARE is available for every one of the thousands of cranes still operating all over the world.

That's dedication and devotion that you won't get anywhere else.

That's **CraneCARE**.

Service Training

A certified Manitowoc Boom Trucks service specialist works with you in your training facility or in the field to ensure that you know how to achieve maximum performance, dependability, and years from your cranes.

A reputable Manitowoc Boom Trucks Service technician comes to you to provide valuable training to all distributors on the crane's LMI system.

Parts Availability

Genuine Manitowoc Boom Trucks replacement parts may be obtained through your MBT distributor on a regular basis.

Hydraulic Test Kit with Case – Part No. 499792-9

- Small national O-ring kit
- Pressure gauges
- Fluke multi-meter
- Hydraulic flow meters
- Multi-load grease gun
- 6-drawer tool box
- 17-piece wrench set

Field Service

Factory-trained service experts are always ready to help maintain your crane's peak performance.

For a worldwide listing of dealer locations, please consult our website at: www.manitowocbt.com.

Technical Support

Manitowoc Boom Trucks' dealer network and factory personnel are available 24 hours a day, 7 days a week, 365 days a year to answer your technical questions and more.

For a worldwide listing of dealer locations, please consult our website at: www.manitowocbt.com.

Technical Documentation

Manitowoc Boom Trucks boast an extensive, easy-to-understand library of documentation.

A complete set of Operator's parts and service manuals are included with each crane.

Additional copies are available through your Authorized Manitowoc Boom Trucks Distributor.



31

models 38100S, 38124S, 38100SHL, 38124SHL





Backed by Manitowoc Boom Trucks,
part of Manitowoc Crane Group

CraneCARESM

CraneCARE is Manitowoc Boom Trucks' complete service and support program. Incorporated into this program are service training, immediate parts availability, professional field service, and technical support and documentation. CraneCARE is available for every one of the thousands of cranes still operating all over the world. That's dedication and devotion that you won't get anywhere else. That's CraneCARE.



Manitowoc Boom Trucks

Manitowoc Boom Trucks
3000 South Austin Avenue
P.O. Box 1609
Georgetown, TX, USA 78627-1609
Telephone 512-942-3000
Facsimile 512-863-3776
www.manitowocbt.com

Load Rating Chart

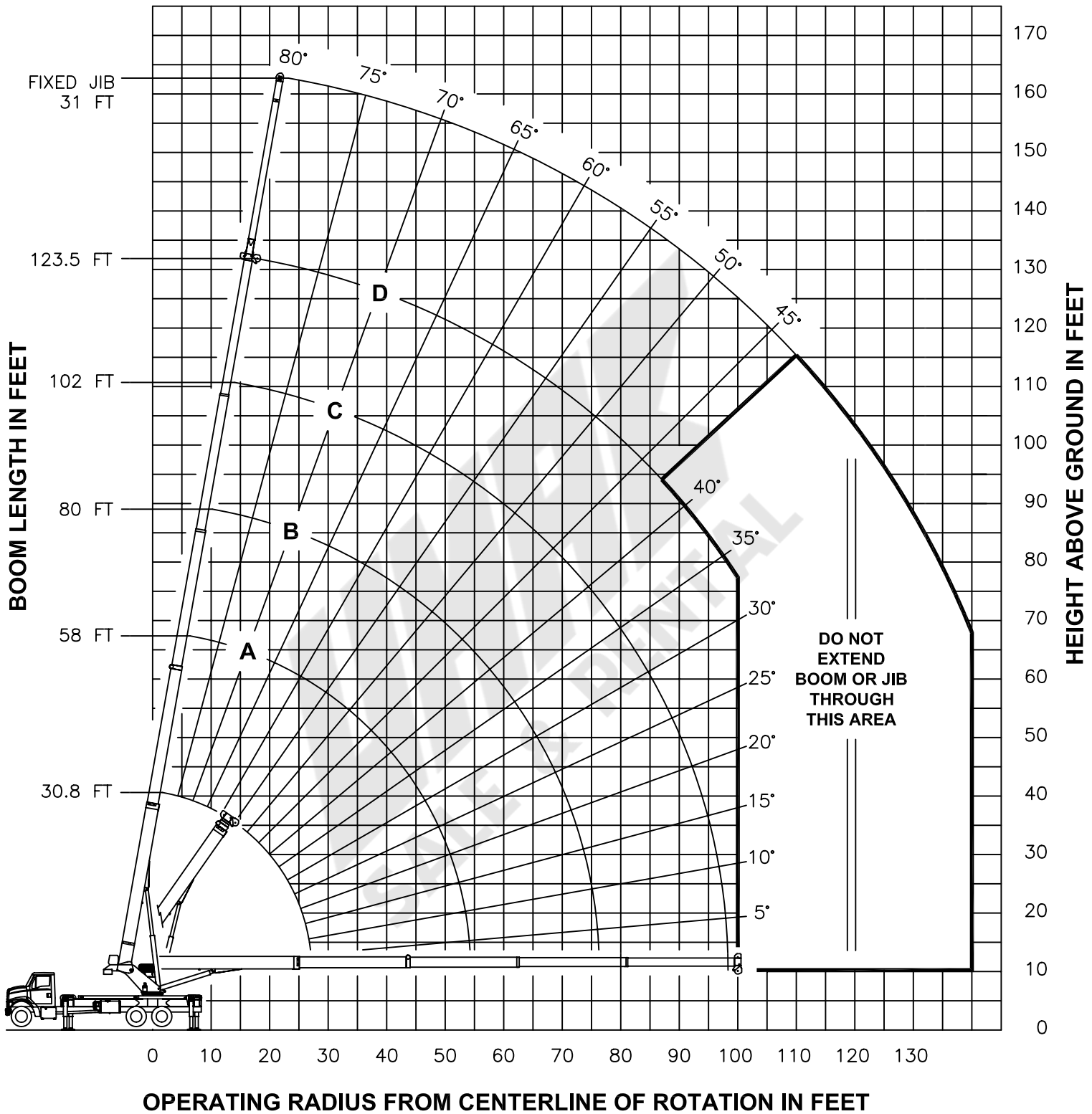
Model 38124S



© Manitex 2000

NOTE: Additional copies of this Load Rating Chart can be purchased from your Manitex Distributor. When ordering, use the part number shown in the bottom left corner of this page.

RANGE DIAGRAM -FULLY EXTENDED OUTRIGGER CONFIGURATION-

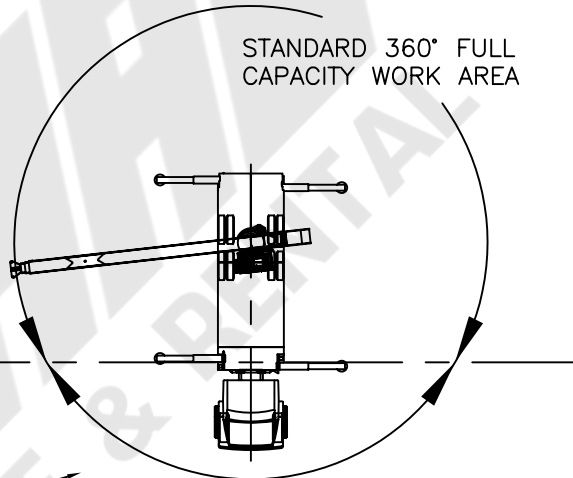


ALLOWABLE LINE PULL								WARNING
1 PART LINE	2 PART LINE	3 PART LINE	4 PART LINE	5 PART LINE	6 PART LINE	7 PART LINE	8 PART LINE	
								<p>ANTI-TWO-BLOCK SYSTEM MUST BE IN GOOD OPERATING CONDITION BEFORE OPERATING CRANE.</p> <p>REFER TO THE OWNER'S MANUAL.</p> <p>KEEP AT LEAST 3 WRAPS OF LOAD LINE ON THE DRUM AT ALL TIMES.</p>
9080 LBS	18160 LBS	27240 LBS	36320 LBS	45400 LBS	54480 LBS	63560 LBS	72640 LBS	5/8" ROT RESISTANT (5.0:1 SF) - 45400 LBS MIN BREAKING STRENGTH
9500 LBS	19000 LBS	28500 LBS	38000 LBS	47500 LBS	57000 LBS	66500 LBS	76000 LBS	5/8" 6 X 25 IWRC (3.5:1 SF) - 33250 LBS MIN BREAKING STRENGTH

AREA OF OPERATION

WARNING:

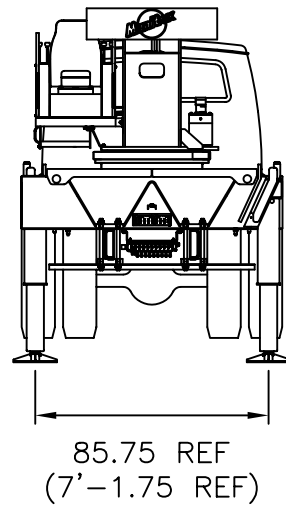
THE FRONT TIRES MUST BE IN CONTACT WITH THE GROUND, AND THE MACHINE LEVEL, WHEN OPERATING IN THIS AREA.



DEDUCTIONS FROM RATED LOADS FOR LOAD HANDLING DEVICES SUPPLIED BY MANITOWOC BOOM TRUCKS, INC.

AUXILIARY BLOCK ----- 50 LBS
 OVERHAUL BALL ----- SEE OVERHAUL BALL MANUFACTURER NAMEPLATE
 LOAD BLOCK ----- SEE BLOCK MANUFACTURER NAMEPLATE
 HOSE REEL ----- 260 LBS
 SWING AROUND JIB (STOWED) ----- SEE LOAD CHART

**USE THIS CHART ONLY
WHEN ALL OUTRIGGERS
ARE FULLY RETRACTED**



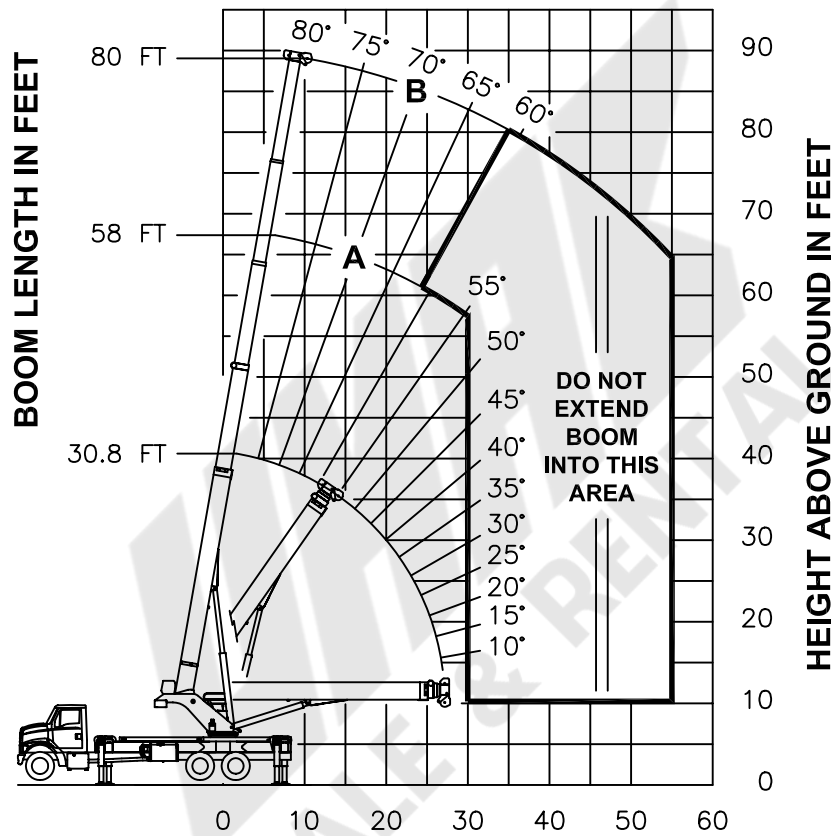
-FULLY RETRACTED OUTRIGGER CONFIGURATION-

LOAD RATINGS IN LBS WITH ALL OUTRIGGERS FULLY RETRACTED LMI CODE #13						
OPERATING RADIUS FT	LOADED BOOM ANGLE	BOOM LENGTH AND MARKER	A		B	
			BOOM ANGLE	BOOM LENGTH	BOOM ANGLE	BOOM LENGTH
			30.8 FT	58 FT	80 FT	
5	75	76000				
8	69	33420				
10	64	21320				
12	60	14960	75	15960		
15	53	9570	73	10480	79	10740
20	40	4930	67	5800	75	6030
25	22	2390	62	3290	71	3510
30			56	1730	67	1950
35					63	870
			450 LBS	240 LBS	180 LBS	DEDUCTIONS FOR STOWED JIBS

CRANE RENTAL

NO JIBS ARE TO
BE ERECTED IN
THIS OUTRIGGER
CONFIGURATION

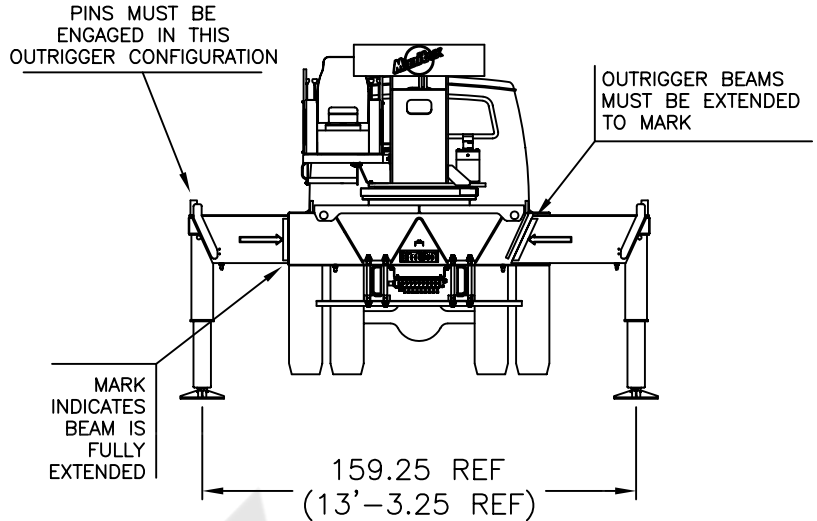
RANGE DIAGRAM - FULLY RETRACTED OUTRIGGER CONFIGURATION -



OPERATING RADIUS FROM CENTERLINE OF ROTATION IN FEET

NOTE : LIFTING PERSONNEL WITH CRANE IN THIS OUTRIGGER CONFIGURATION IS STRICTLY PROHIBITED. USE ONLY FULLY EXTENDED OUTRIGGER CONFIGURATION WHEN LIFTING PERSONNEL.

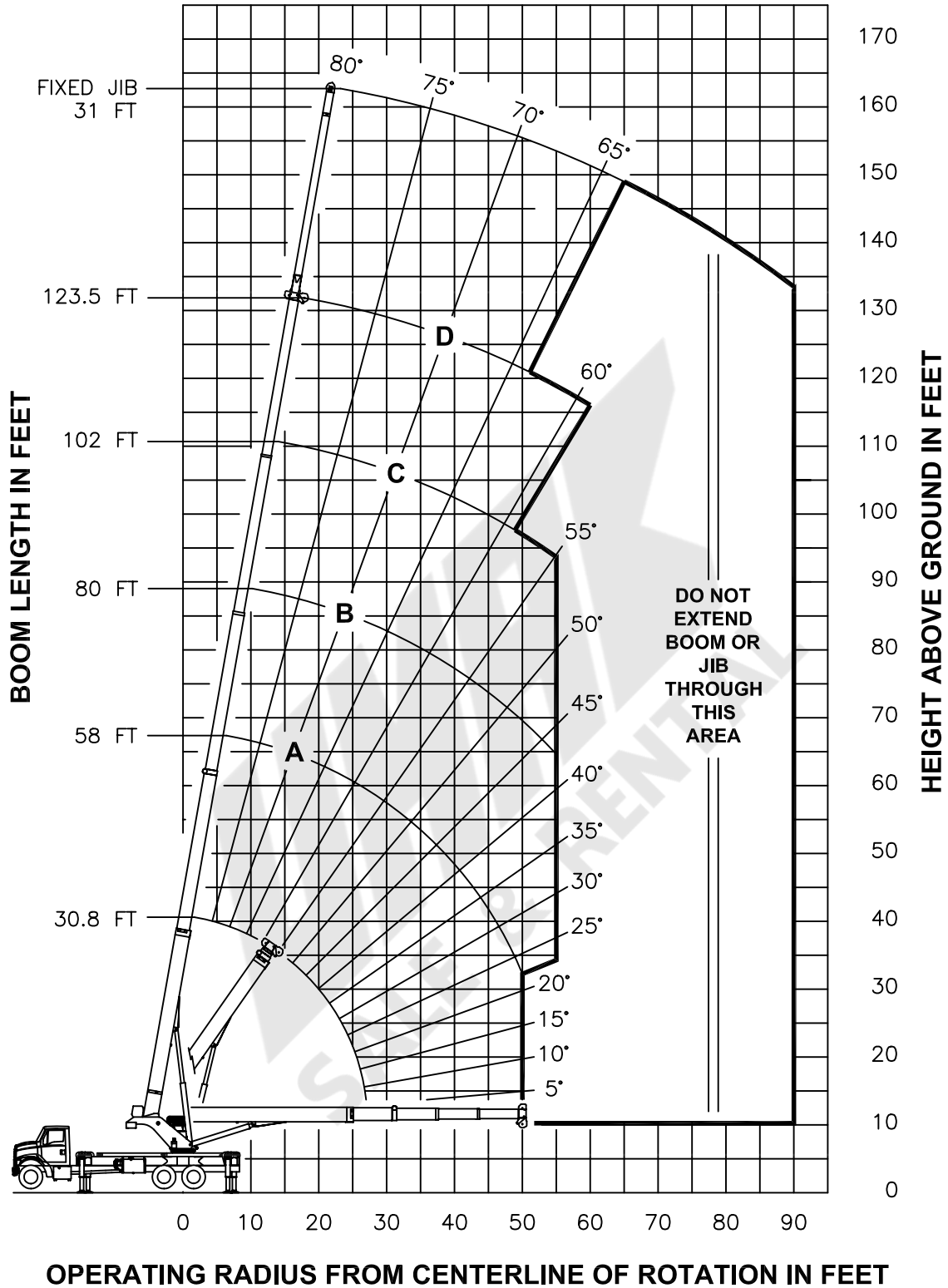
USE THIS CHART ONLY WHEN ALL OUTRIGGERS ARE IN THE INTERMEDIATE POSITION



- INTERMEDIATE OUTRIGGER CONFIGURATION -

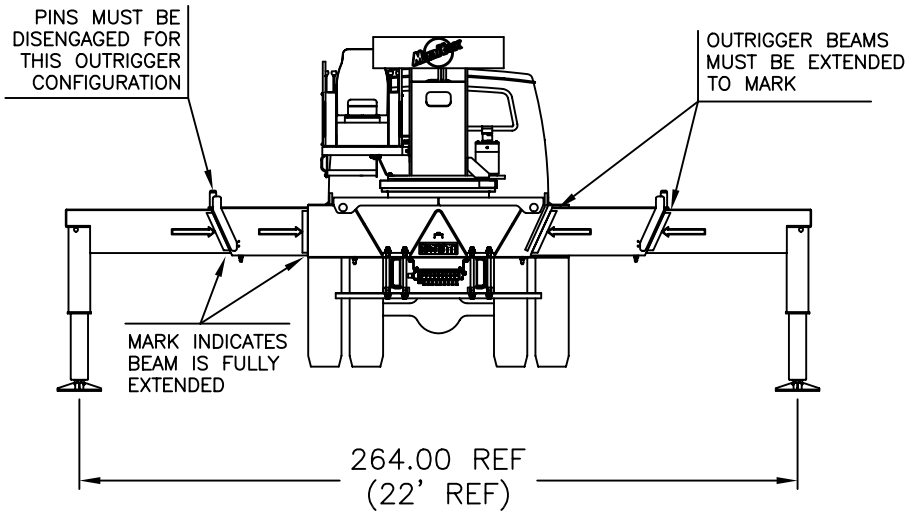
LOAD RATINGS IN LBS WITH ALL OUTRIGGERS IN THE INTERMEDIATE POSITION										JIB LOAD RATINGS IN LBS WITH ALL OUTRIGGERS IN THE INTERMEDIATE POSITION					
LMI CODE #9										LMI CODE #10					
OPERATING RADIUS FT	LOADED BOOM ANGLE		BOOM LENGTH AND MARKER							OPERATING RADIUS FT	LOADED BOOM ANGLE	31 FT JIB FOR ALL BOOM LENGTHS SEE WARNING NOTE 4			
	°	30.8 FT	°	58 FT	°	80 FT	°	102 FT	°				123.5 FT	RATED LOAD IN POUNDS	
5	75	76000													
8	69	60500													
10	64	52550													
12	60	46340	75	25000											
15	53	27730	73	25000	79	21500									
20	40	15230	67	16300	75	16590	80	14500							
25	22	9460	62	10520	71	10780	77	10920	80	8450					
30			56	7210	67	7450	74	7580	78	7650	30	80		4000	
35			49	5050	63	5300	71	5420	75	5480	35	78		3850	
40			42	3540	59	3780	68	3900	72	3960	40	76		3700	
45			34	2410	54	2660	65	2780	70	2840	45	74		3250	
50			23	1530	50	1800	61	1910	67	1980	50	72		2370	
55					44	1110	58	1230	65	1290	55	70		1680	
60									62	730	60	68		1110	
65											65	66		640	
		450 LBS	240 LBS		180 LBS		140 LBS		120 LBS		DEDUCTIONS FOR STOWED JIB				

RANGE DIAGRAM - INTERMEDIATE OUTRIGGER CONFIGURATION -



NOTE : LIFTING PERSONNEL WITH CRANE IN THIS OUTRIGGER CONFIGURATION IS STRICTLY PROHIBITED. USE ONLY FULLY EXTENDED OUTRIGGER CONFIGURATION WHEN LIFTING PERSONNEL.

**USE THIS CHART ONLY
WHEN ALL OUTRIGGERS
ARE FULLY EXTENDED**



- FULLY EXTENDED OUTRIGGER CONFIGURATION -

LOAD RATINGS IN LBS WITH ALL OUTRIGGERS FULLY EXTENDED										JIB LOAD RATINGS IN LBS WITH ALL OUTRIGGERS FULLY EXTENDED			
LMI CODE #1										LMI CODE #2			
OPERATING RADIUS FT	LOADED BOOM ANGLE		BOOM LENGTH AND MARKER							OPERATING RADIUS FT	BOOM ANGLE	31 FT JIB FOR ALL BOOM LENGTHS SEE WARNING NOTE 4	
	30.8 FT	58 FT	80 FT	102 FT	123.5 FT	A	B	C	D				RATED LOAD IN POUNDS
5	75	76000											
8	69	60500											
10	64	52550									10		
12	60	46600	75	25000							12		
15	53	39600	73	25000	79	21500					15		
20	40	30300	67	25000	75	19700	80	14500			20		
25	22	23070	62	22840	71	18200	77	13500	80	8450	25		
30			56	18670	67	16250	74	12820	78	8150	30	80	4000
35			49	14450	63	14540	71	11380	75	7800	35	78	3850
40			42	11190	59	11490	68	10160	72	7280	40	76	3700
45			34	8820	54	9110	65	9250	70	6780	45	74	3550
50			23	7030	50	7340	61	7480	67	6160	50	72	3400
55					44	5970	58	6110	65	5540	55	70	3250
60					39	4880	54	5020	62	5000	60	68	3080
65					32	3980	50	4130	59	4200	65	66	2910
70					24	3230	46	3390	56	3460	70	64	2750
75					12	2580	42	2760	53	2830	75	62	2600
80							37	2220	50	2300	80	60	2460
85							32	1750	47	1840	85	58	2260
90							25	1340	43	1430	90	55	1850
95							17	970	40	1070	95	53	1490
100									35	750	100	51	1170
105											105	48	880
110											110	45	620
		450 LBS	240 LBS		180 LBS		140 LBS		120 LBS		DEDUCTIONS FOR STOWED JIB		

LMI OPERATING CODES

SETTING	CRANE CONFIGURATION	OUTRIGGER CONFIGURATION
#1	— MAIN BOOM	FULLY EXTENDED
#2	— FIXED JIB	FULLY EXTENDED
#5	— PERSONNEL LIFTING PLATFORM ON MAIN BOOM	FULLY EXTENDED
#6	— PERSONNEL LIFTING PLATFORM ON FIXED JIB	FULLY EXTENDED
#9	— MAIN BOOM	INTERMEDIATE
#10	— FIXED JIB	INTERMEDIATE
#13	— MAIN BOOM	FULLY RETRACTED

WARNING

1. THE OPERATOR MUST READ AND UNDERSTAND THE OWNER'S MANUAL BEFORE OPERATING THIS CRANE.
2. POSITIONING OR OPERATION OF CRANE BEYOND AREAS SHOWN ON THIS CHART IS NOT INTENDED OR APPROVED EXCEPT WHERE SPECIFIED IN OWNER'S MANUAL.
3. LOADED BOOM ANGLES AT SPECIFIED BOOM LENGTHS GIVE ONLY AN APPROXIMATION OF THE OPERATING RADIUS. THE BOOM ANGLE BEFORE LOADING SHOULD BE GREATER TO ACCOUNT FOR DEFLECTIONS. DO NOT EXCEED THE OPERATING RADIUS FOR RATED LOADS.
4. THE OPERATING RADIUS SHOWN IN THE JIB RATING CHART IS FOR FULLY EXTENDED BOOM ONLY. WHEN BOOM IS NOT FULLY EXTENDED, USE ONLY LOADED BOOM ANGLE TO DETERMINE LOAD RATING OF JIB.
5. FOR BOOM ANGLES NOT SHOWN ON JIB LOAD RATING CHART, USE RATING OF NEXT LOWER BOOM ANGLE.
6. FOR BOOM LENGTHS NOT SHOWN, USE RATING OF NEXT SHORTER OR LONGER BOOM LENGTH, WHICHEVER IS LESS. FOR RADII NOT SHOWN, USE RATING OF NEXT LONGER RADIUS.
7. CRANE LOAD RATINGS ON OUTRIGGERS ARE BASED ON FREELY SUSPENDED LOADS WITH THE MACHINE LEVELED AND STANDING ON A FIRM UNIFORM SUPPORTING SURFACE. NO ATTEMPT SHALL BE MADE TO MOVE A LOAD HORIZONTALLY ON THE GROUND IN ANY DIRECTION.

WARNING (CONTINUED)

8. PRACTICAL WORKING LOADS DEPEND ON SUPPORTING SURFACE, WIND, AND OTHER FACTORS AFFECTING STABILITY SUCH AS HAZARDOUS SURROUNDINGS, EXPERIENCE OF PERSONNEL, AND PROPER HANDLING, ALL OF WHICH MUST BE TAKEN INTO ACCOUNT BY THE OPERATOR.
9. THE MAXIMUM LOAD WHICH MAY BE TELESCOPED IS LIMITED BY HYDRAULIC PRESSURE, BOOM ANGLE, AND BOOM LUBRICATION. IT IS SAFE TO ATTEMPT TO TELESCOPE ANY LOAD WITHIN THE LIMITS OF THE LOAD RATING CHART.
10. LIFTING OFF THE MAIN BOOM POINT WHILE THE SWING AROUND JIB IS ERECTED IS NOT INTENDED OR APPROVED.

INFORMATION

1. DEDUCTIONS MUST BE MADE FROM RATED LOADS FOR STOWED JIB, OPTIONAL ATTACHMENTS, HOOKS, AND LOADBLOCKS (SEE DEDUCTION CHART). WEIGHTS OF SLINGS AND ALL OTHER LOAD HANDLING DEVICES SHALL BE CONSIDERED A PART OF THE LOAD.
2. LOAD RATINGS ABOVE THE HEAVY LINE ARE STRUCTURALLY LIMITED CAPACITIES. LOAD RATINGS BELOW THE HEAVY LINE ARE STABILITY LIMITED CAPACITIES AND DO NOT EXCEED 85% OF TIPPING.

DEFINITIONS

1. OPERATING RADIUS IS THE HORIZONTAL DISTANCE FROM THE AXIS OF ROTATION TO THE CENTER OF THE VERTICAL HOIST LINE OR TACKLE WITH LOAD APPLIED.
2. LOADED BOOM ANGLE AS SHOWN IN THE COLUMN HEADED BY \angle , IS THE INCLUDED ANGLE BETWEEN THE HORIZONTAL AND LONGITUDINAL AXES OF THE BOOM BASE AFTER LIFTING RATED LOAD AT RATED RADIUS.