

Clamshell/Grapple Capacities

777 SERIES 1

Boom No. 78
30 840 kg Counterweight
Crawler Machine on a Barge
0 Degree thru 1 Degree and
1 Degree thru 3 Degree Machine List
360 Degree Rating

LIFTING CAPACITIES: Capacities are for a crawler machine when operating on a barge. Machine shall be positively secured to prevent shifting. Capacities for various boom lengths and operating radii are for freely suspended loads and do not exceed 67.5% of a static tipping load. Capacities are based on tipping, structural competence (*), operating speeds and other factors.

Weight of bucket is considered part of load. Where no capacity is shown, operation is not intended or approved.

OPERATING CONDITIONS: Machine to operate on a firm uniformly supporting surface and machine list not to exceed degrees noted. Refer to boom rigging **No. 178288** and Wire Rope Specification chart **No. 8156-A**. Crane operator

judgment must be used to allow for adverse operating conditions and physical machine depreciation. Refer to operators manual for operating guidelines.

OPERATING RADIUS: Operating radius is horizontal distance from axis of rotation at barge deck to center of gravity of the freely suspended load. Boom angle is angle between horizontal and centerline of boom butt and inserts, and is an indication of operating radius.

MACHINE EQUIPMENT: Machine equipped with 7 544 mm crawlers, 965 mm or 1 219 mm treads, two 305 mm boom hoist cylinders, 7 925 mm mast, four 32 mm boom pendants and 30 840 kg counterweight.

Upper Boom Point Deduct

Deduct 450 kg from boom capacities when upper boom point is attached.

Multi-Part Rope Guard Deduct

Deduct 230 kg from boom capacities when lower boom point is equipped with multi-part rope guard (No. A02744).

Wire Rope Guide Deduct (For Third Line)

Deduct 230 kg from boom capacities when boom top wire rope guide (No. 192312) for third line is attached.

Auxiliary Drum Deduct

Deduct 770 kg from boom capacities when boom butt is equipped with auxiliary drum.

Oper. Radius Meters	Boom Angle Deg.	0 Degree Thru 1 Degree Machine List Boom Capacity Kilograms	1 Degree Thru 3 Degree Machine List Boom Capacity Kilograms
18.3m (60 Ft.) BOOM			
9.1	66.5	13 300 *	13 300 *
10.0	63.6	13 300 *	13 300 *
12.0	56.2	13 300 *	13 300 *
14.0	48.1	13 300 *	13 100 *
16.0	38.7	13 000 *	11 600 *
18.0	26.5	11 900 *	10 000 *
21.3m (70 Ft.) BOOM			
10.7	65.6	13 300 *	13 300 *
12.0	61.6	13 300 *	13 300 *
14.0	55.2	13 300 *	13 100 *
16.0	48.2	13 100 *	11 700 *
18.0	40.3	11 900 *	10 100 *
20.0	30.8	10 500 *	8 800 *

Oper. Radius Meters	Boom Angle Deg.	0 Degree Thru 1 Degree Machine List Boom Capacity Kilograms	1 Degree Thru 3 Degree Machine List Boom Capacity Kilograms
24.4m (80 Ft.) BOOM			
10.7	68.9	13 300 *	13 300 *
12.0	65.4	13 300 *	13 300 *
14.0	60.1	13 300 *	13 100 *
16.0	54.4	13 100 *	11 600 *
18.0	48.3	11 900 *	10 000 *
20.0	41.5	10 500 *	8 800 *
22.0	33.6	9 400	7 800 *

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27.4m (90 Ft.) BOOM			
12.2	67.9	13 300 *	13 300 *
14.0	63.7	13 300 *	13 100 *
16.0	58.9	13 100 *	11 600 *
18.0	53.8	11 900 *	10 000 *
20.0	48.4	10 500 *	8 800 *
22.0	42.4	9 400	7 900 *
24.0	35.6	8 200	7 000 *
26.0	27.4	7 100	6 300 *
30.5m (100 Ft.) BOOM			
13.7	67.1	13 300 *	13 300 *
14.0	66.5	13 300 *	13 100 *
16.0	62.3	13 000 *	11 600 *
18.0	58.0	11 900 *	10 000 *
20.0	53.4	10 500 *	8 800 *
22.0	48.5	9 400	7 800 *
24.0	43.1	8 100	7 000 *
26.0	37.2	7 000	6 300 *
28.0	30.2	6 100	5 600
30.0	21.3	5 300	5 000
33.5m (110 Ft.) BOOM			
15.2	66.5	13 300 *	12 200 *
16.0	65.1	13 000 *	11 500 *
18.0	61.2	11 900 *	10 000 *
20.0	57.2	10 500	8 800 *
22.0	53.0	9 400	7 800 *
24.0	48.5	8 000	6 900 *
26.0	43.7	7 000	6 200 *
28.0	38.4	6 100	5 600
30.0	32.4	5 300	4 900
32.0	25.1	4 600	4 300
36.6m (120 Ft.) BOOM			
16.8	66.0	12 700 *	10 800 *
18.0	63.8	11 800 *	10 000 *
20.0	60.2	10 500	8 700 *
22.0	56.5	9 300	7 800 *
24.0	52.6	8 000	6 900 *
26.0	48.5	6 900	6 200
28.0	44.2	6 000	5 500
30.0	39.4	5 300	4 800
32.0	34.0	4 600	4 200
34.0	27.8	4 000	3 700