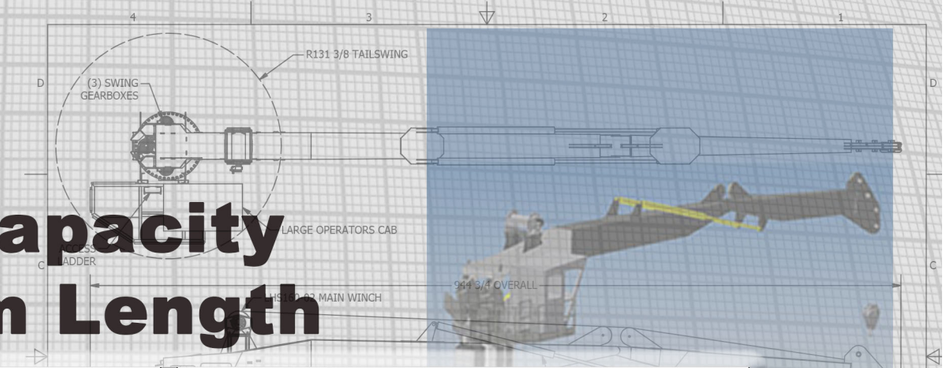
K80

Load Capacity By Boom Length



MODEL K80-45-60

US UNITS:KNUCKLE DOWN 45 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
6	82.4	110,000	73,150
10	77.2	98,468	65,481
15	70.6	78,497	52,201
20	63.6	66,399	44,155
25	56.3	58,231	38,724
30	48.2	52,283	34,768
35	39.0	47,652	31,689
40	27.3	43,678	29,046
45	0.0	37,013	24,614

US UNITS: EXTENDED BOOM LENGTH: 60 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
7	83.3	110,000	73,150
10	80.4	110,000	73,150
15	75.6	95,380	63,428
20	70.6	73,686	49,001
25	65.4	61,606	40,968
30	60.0	53,489	35,570
35	54.3	47,624	31,670
40	48.2	43,163	28,703
45	41.4	39,609	26,340
50	33.6	36,609	24,345
55	23.6	33,885	22,534
60	0.0	28,853	19,187

MODEL K80-65-80

US UNITS:KNUCKLE DOWN 65 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
8	83.0	110,000	73,150
10	81.2	99,890	66,427
15	76.7	88,580	58,906
20	72.1	72,520	48,226
25	67.4	69,100	45,952
30	62.5	58,880	39,155
35	57.5	55,160	36,681
40	52.0	48,770	32,432
45	46.2	42,420	28,209
50	39.7	39,670	26,381
55	32.2	36,920	24,552
60	22.6	31,220	20,761
65	0.0	27,600	18,354

US UNITS: EXTENDED BOOM LENGTH: 80 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
9.1	83.5	110,000	73,150
10	82.9	110,000	73,150
15	79.2	95,120	63,255
20	75.6	83,050	55,228
25	71.8	68,250	45,386
30	68.0	58,100	38,637
35	64.1	50,825	33,799
40	60.0	45,325	30,141
45	55.8	41,025	27,282
50	51.3	36,150	24,040
55	46.6	31,575	20,997
60	41.4	27,775	18,470
65	35.7	24,550	16,326
70	29.0	21,800	14,497
75	20.4	19,400	12,901
80	0.0	17,325	11,521

MODEL K80-85-100

US UNITS:KNUCKLE DOWN 85 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
10	83.3	101,430	67,451
15	79.9	86,148	57,288
20	76.4	72,988	48,537
25	72.9	60,513	40,241
30	69.4	51,813	34,455
35	65.7	45,438	30,216
40	62.0	40,550	26,966
45	58.1	36,675	24,389
50	54.0	32,825	21,829
55	49.7	29,350	19,518
60	45.1	26,163	17,398
65	40.1	23,125	15,378
70	34.6	20,513	13,641
75	28.1	18,225	12,120
80	19.8	16,238	10,798
85	0.0	14,220	9,456

US UNITS: EXTENDED BOOM LENGTH: 100 (ft)

REACH (ft)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) lbs	OFFBOARD LOAD (*DYNAMIC*) lbs
11.3	83.6	110,000	73,150
15	81.4	93,818	62,389
20	78.5	77,175	51,321
25	75.6	62,925	41,845
30	72.6	52,775	35,095
35	69.5	45,525	30,274
40	66.5	40,050	26,633
45	63.3	35,775	23,790
50	60.0	32,325	21,496
55	56.7	29,500	19,618
60	53.2	27,125	18,038
65	49.5	24,550	16,326
70	45.6	21,700	14,431
75	41.4	19,225	12,785
80	36.9	17,050	11,338
85	31.8	15,150	10,075
90	25.9	13,450	8,944
95	18.2	11,925	7,930
100	0.0	10,575	7,032

SI UNITS:KNUCKLE DOWN 13 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
1.8	82.4	50,000	33,250
3.0	77.2	44,758	29,764
4.6	70.6	35,680	23,728
6.1	63.6	30,181	20,071
7.6	56.3	26,469	17,602
9.1	48.2	23,765	15,804
10.7	39.0	21,660	14,404
12.2	27.3	19,854	13,203
13.7	0.0	16,824	11,188

SI UNITS EXTENDED BOOM LENGTH = 18 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
2.1	83.3	50,000	33,250
3.0	80.4	50,000	33,250
4.6	75.6	43,355	28,831
6.1	70.6	33,494	22,273
7.6	65.4	28,003	18,622
9.1	60.0	24,313	16,168
10.7	54.3	21,647	14,395
12.2	48.2	19,620	13,047
13.7	41.4	18,004	11,973
15.2	33.6	16,640	11,066
16.8	23.6	15,402	10,243
18.3	0.0	13,115	8,721

SI UNITS:KNUCKLE DOWN 19 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
2.4	83.0	50,000	33,250
3.0	81.2	45,405	30,194
4.6	76.7	40,264	26,775
6.1	72.1	32,964	21,921
7.6	67.4	31,409	20,887
9.1	62.5	26,764	17,798
10.7	57.5	25,073	16,673
12.2	52.0	22,168	14,742
13.7	46.2	19,282	12,822
15.2	39.7	18,032	11,991
16.8	32.2	16,782	11,160
18.3	22.6	14,191	9,437
19.8	0.0	12,545	8,343

SI UNITS EXTENDED BOOM LENGTH = 24 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
2.8	83.5	50,000	33,250
3.0	82.9	50,000	33,250
4.6	79.2	43,236	28,752
6.1	75.6	37,750	25,104
7.6	71.8	31,023	20,630
9.1	68.0	26,409	17,562
10.7	64.1	23,102	15,363
12.2	60.0	20,602	13,701
13.7	55.8	18,648	12,401
15.2	51.3	16,432	10,927
16.8	46.6	14,352	9,544
18.3	41.4	12,625	8,396
19.8	35.7	11,159	7,421
21.3	29.0	9,909	6,590
22.9	20.4	8,818	5,864
24.4	0.0	7,875	5,237

SI UNITS:KNUCKLE DOWN 25 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
3.0	83.3	46,105	30,660
4.6	79.9	39,158	26,040
6.1	76.4	33,176	22,062
7.6	72.9	27,506	18,291
9.1	69.4	23,551	15,662
10.7	65.7	20,653	13,735
12.2	62.0	18,432	12,257
13.7	58.1	16,670	11,086
15.2	54.0	14,920	9,922
16.8	49.7	13,341	8,872
18.3	45.1	11,892	7,908
19.8	40.1	10,511	6,990
21.3	34.6	9,324	6,200
22.9	28.1	8,284	5,509
24.4	19.8	7,381	4,908
25.9	0.0	6,464	4,298

SI UNITS EXTENDED BOOM LENGTH = 30 Meters

REACH (m)	ANGLE (deg)	ONBOARD LOAD (*STATIC*) Kg	OFFBOARD LOAD (*DYNAMIC*) Kg
3.4	83.6	50,000	33,250
4.6	81.4	42,645	28,359
6.1	78.5	35,080	23,328
7.6	75.6	28,602	19,021
9.1	72.6	23,989	15,952
10.7	69.5	20,693	13,761
12.2	66.5	18,205	12,106
13.7	63.3	16,261	10,814
15.2	60.0	14,693	9,771
16.8	56.7	13,409	8,917
18.3	53.2	12,330	8,199
19.8	49.5	11,159	7,421
21.3	45.6	9,864	6,559
22.9	41.4	8,739	5,811
24.4	36.9	7,750	5,154
25.9	31.8	6,886	4,579
27.4	25.9	6,114	4,066
29.0	18.2	5,420	3,605
30.5	0.0	4,807	3,197

LOAD CHART CREATOR: DSHAD 12/2018 rev1.0 - Values listed subject to change without notice. - Values reflect structural capacities and may vary with configuration via client specification. Offboard denotes a default CV=2. Sea State Load Charts are available by request and in conjunction with client supplied vessel data.

Designed and Manufactured under the controls set forth by

API Q 2C-0067

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