

# GROVE®

## FULL HYDRAULIC SELF-PROPELLED CRANE

# RT60S 18 TON CAP.

### LIFTING CAPACITIES

ON OUTRIGGERS FULLY EXTENDED — 360°

ON RUBBER

#### 21 ft. - 51 ft. BOOM

Radius in Feet	Boom Length in Feet					
	21	27	33	39	45	51
10	36,000	33,000	32,000	31,000	30,000	
12	32,000	32,000	31,000	30,000	28,000	
15	26,000	26,000	26,000	26,000	25,000	23,000
17	23,000	23,000	23,000	23,000	22,000	21,500
20		20,000	20,000	20,000	20,000	20,000
25			15,000	15,000	15,000	15,000
30				11,600	11,600	11,600
35				9,100	9,100	9,100
40					6,800	6,800
45						5,800
47						5,000

Radius in Feet	Over Front	Over Side
10	30,000	19,500
12	24,600	14,800
15	17,500	10,600
17	16,000	9,000
20	11,800	7,100
25	7,600	5,000
30	5,800	3,100
35	4,400	2,100
40	3,300	1,200
45	2,600	800
47	2,300	

1. Chart based on 16.00 x 24 tires and 80 PSI inflation pressure. Loads must be reduced for lower inflation pressures.

#### 24 ft. - 60 ft. BOOM

Radius in Feet	Boom Length in Feet						
	24	30	36	42	48	54	60
10	36,000	34,500	32,700	30,800			
12	32,000	32,000	31,000	30,000	28,000		
15	26,000	26,000	26,000	26,000	24,000	22,000	20,000
20	20,000	20,000	20,000	20,000	20,000	19,000	17,500
25		15,000	15,000	15,000	15,000	15,000	15,000
30			11,800	11,800	11,800	11,800	11,800
35				9,100	9,100	9,100	9,100
40					7,100	7,100	7,100
45						5,300	5,300
50						4,100	4,100
55							3,650

Radius in Feet	Over Front	Over Side
10	*30,000	19,500
12	24,600	14,800
15	16,500	9,800
20	11,200	6,350
25	7,200	3,860
30	5,250	2,680
35	3,660	1,650
40	2,780	550
45	2,100	
50	1,420	
55	940	

1. Chart based on 16.00 x 24 tires and 80 PSI inflation pressure. Loads must be reduced for lower inflation pressures.

2. \* For 30,000 lb. lifting capacity, maximum boom length is 42 ft.

#### 28 ft. - 70 ft. BOOM

Radius in Feet	Boom Length in Feet							
	28	34	40	46	52	58	64	70
10	36,000	34,000	31,900	29,800				
12	32,000	31,000	30,000	29,800	27,800			
15	27,500	27,500	27,500	27,500	27,000	25,750	23,700	
20	21,250	21,250	21,000	21,000	20,750	20,500	20,400	20,250
25		15,500	15,500	15,500	15,500	15,500	15,000	15,000
30			11,700	11,700	11,700	11,700	11,700	11,700
35				8,650	8,650	8,650	8,650	8,650
40				6,650	6,650	6,650	6,650	6,650
45					5,250	5,250	5,250	5,250
50						4,250	4,250	4,250
55							3,460	3,460
60							2,760	2,760
65								2,180
66.5								1,970

Radius in Feet	Over Front	Over Side
10	*30,000	19,500
12	24,500	14,800
15	16,600	9,800
20	10,300	5,450
25	6,650	3,660
30	4,850	2,300
35	3,380	1,330
40	2,680	470
45	1,525	
50	950	
55	635	

1. Chart based on 16.00 x 24 tires and 80 PSI inflation pressure. Loads must be reduced for lower inflation pressures.

2. \* For 30,000 lb. lifting capacity, maximum boom length is 40 ft.

#### 24 ft. - 78 ft. BOOM

Radius in Feet	Boom Length in Feet							
	24	30	36	42	48	54	60	**78
10	36,000	34,500	32,700	30,800				
12	32,000	32,000	31,000	29,900	28,000			
15	26,000	26,000	26,000	25,500	24,000	22,000	20,000	
20	20,000	20,000	20,000	20,000	20,000	19,000	17,500	
25		13,000	13,000	13,000	13,000	13,000	13,000	13,000
30			10,800	10,800	10,800	10,800	10,800	10,800
35				8,200	8,200	8,200	8,200	8,200
40					6,100	6,100	6,100	6,400
45						4,300	4,300	4,500
50						2,800	2,800	3,200
55							1,600	2,500
60								2,200
65								1,600
70								1,300
74.8								1,175

Radius in Feet	Over Front	Over Side
10	*30,000	18,000
12	24,500	13,500
15	16,500	8,000
20	9,500	4,500
25	6,400	2,900
30	4,250	1,200
35	2,675	600
40	1,500	350
45	950	
50	560	

Use of Manual Fly Section not Recommended on Rubber.

1. Chart based on 16.00 x 24 tires and 80 PSI inflation pressure. Loads must be reduced for lower inflation pressures.

2. \* For 30,000 lb. lifting capacity, maximum boom length is 42 ft.

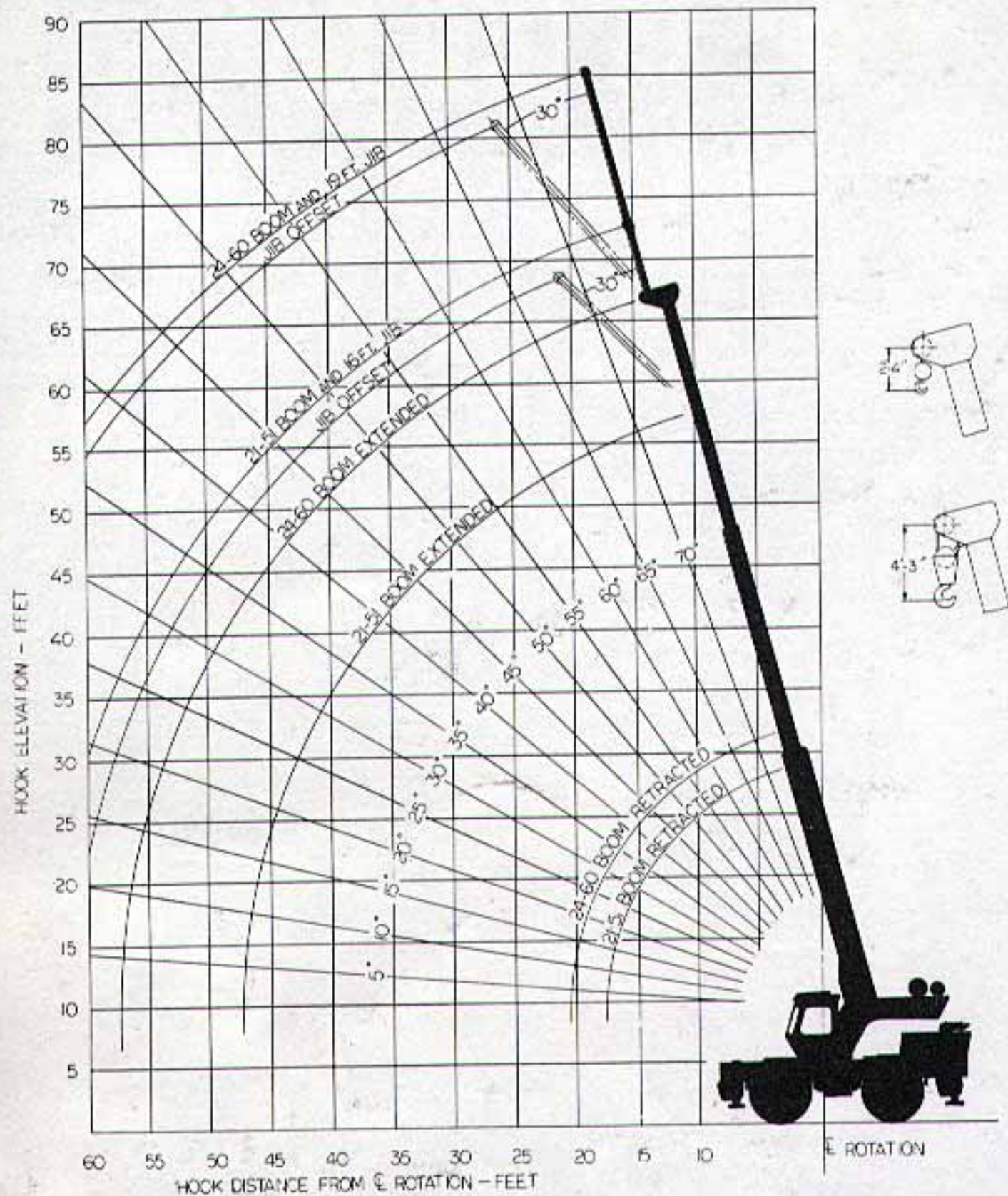
Capacities appearing above bold line are based upon structural strength and machine stability should not be relied upon as the capacity limitation.

\*\* Indicates maximum capacity of Extended Fly Section, regardless of boom length.

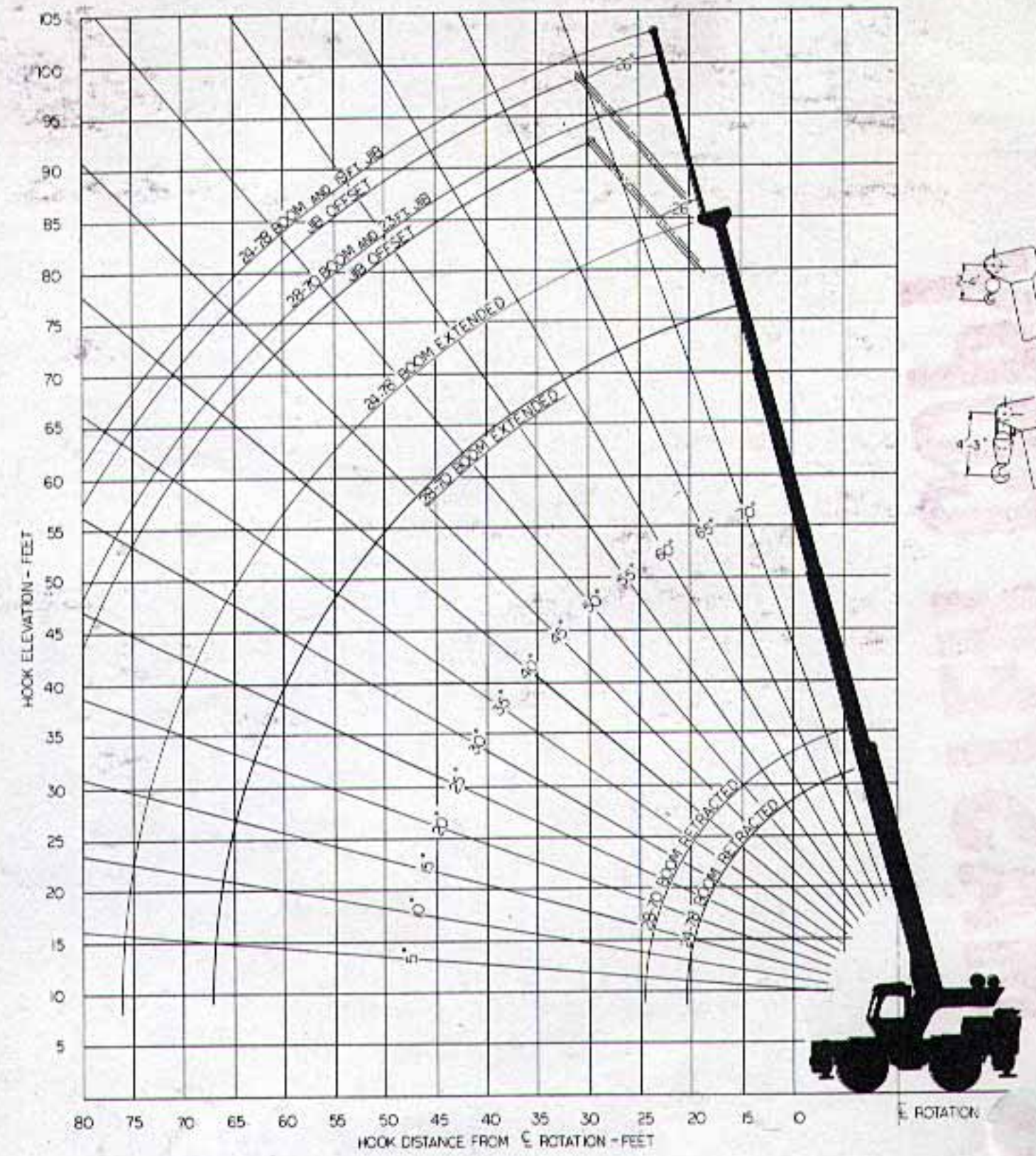
NOTES TO LIFTING CAPACITIES, SEE REVERSE SIDE

MASTER COPY

**RANGE DIAGRAM**  
21 ft. - 51 ft. and 24 ft. - 60 ft. BOOMS



**RANGE DIAGRAM**  
28 ft. - 70 ft. and 24 ft. - 78 ft. BOOMS



## JIB CAPACITIES

16 ft. JIB

MIN. BOOM ANGLE	NO OFFSET	MAX. OFFSET (30°)
75	6200	3600
70	5000	3000
65	4300	2500
60	3700	2100
55	3300	1850
50	2600	1700
45	2400	1575
40	2200	1500
30	1900	

19 ft. JIB

MIN. BOOM ANGLE	NO OFFSET	MAX. OFFSET (30°)
75	6200	2600
70	5000	2400
65	4300	2300
60	3700	2150
55	3300	2100
50	2600	1650
45	2400	1500
40	2200	1460
30	1900	1200

23 ft. JIB

MIN. BOOM ANGLE	NO OFFSET	MAX. OFFSET (26°)
75	6400	3100
70	5150	2850
65	4350	2650
60	3700	2450
55	3300	2275
50	2950	2170
45	2650	2125
40	2550	2085
35	2475	2040
30	2400	2000
26	2300	1950

## NOTES TO LIFTING CAPACITIES

- Rated lifting capacities, with fully extended outriggers, are the maximum loads covered by the manufacturer's warranty with the machine standing on a firm, level and uniform supporting surface. Capacities do not exceed 85% of tipping load. Do not exceed rated lifting capacities.
- For clamshell or concrete bucket operation, weight of bucket and load must not exceed 90% of rated lifting capacities.
- Jibs may be used for single line lifting crane service only. Jib capacities are based on structural strength of jib or main boom. Actual loads lifted must not exceed net lifting capacities for the actual operating radius.
- Long cantilever booms can create a tipping condition when in extended and lowered position.
- Each power-telescoping boom section should be extended equally at all times and boom length should not exceed any length restrictions shown on rated lifting capacity chart.
- The maximum load which may be telescoped is limited by hydraulic pressure, boom angle, boom lubrication, etc. It is safe to attempt to telescope any load within the limits of the rated lifting capacity chart.
- Single Line Capacity 6,790 lbs. (Maximum). For multiple part reeving, use one part of line for each 6,000 lbs. of load to be lifted.



**GROVE MANUFACTURING COMPANY**

A DIVISION OF WALTER KIDDE & COMPANY, INC.

SHADY GROVE • PENNSYLVANIA 17256

MEMBER: POWER CRANE & SHOVEL ASSOCIATION

**Distributed by:**

# RT 60S DIMENSIONAL CHART

DIM	TIRE OPTIONS		BOOM OPTIONS		MAIN WINCH
	1800x2417-50x25	2015x25	21-51	24-60 28-70 24-78	
A	26"	23.6"	26.8"		
B	93.54"	95.45"	106"		
C	76.31"	77.6"	85"		
D		50-72"	59-72"	69-72"	78'-2"
E		8-2 1/2"	11-2 1/2"	15-2 1/2"	11'-9"
F		20-7 1/2"	23-7 1/2"	27-7 1/2"	24'-2"
G					8 3/4"
H					4"
J					12 3/8"
K					11 3/8"
L	10'-11 9/16"	10'-9 3/8"	11'-0 3/8"		

OVERALL WIDTH - OUTSIDE OUTRIGGER PADS IN EXTENDED POSITION - 17'-7 1/2"

