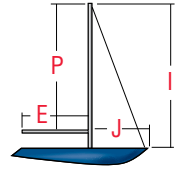


Ordering Big Boat Blocks



1. Determine block size and type

The tables below are a guideline for typical applications. Additional rigging tips are available at <http://www.harken.com>.

2. Contact

If you have any questions, please contact your dealer or Harken Technical Service.

Note: These hardware specifications assume a boat of moderate displacement sailing in normal conditions. Ultra Light Displacement Boats may use smaller hardware. Heavy displacement boats and multihulls often require stronger hardware.

Mainsheet

Mainsheets are usually attached near the end or the middle of the boom, depending on accessibility and whether the boat is used for racing or cruising. The farther forward a mainsheet system is on the boom, the higher the loads it sees. Systems with multiple attachment points spread the load over the boom. Use the table to choose the appropriate Black Magic®, ESP, or stainless steel blocks for your mainsail area. See pages 18-19 for common configurations.

	Maximum mainsail area (P x E x .5 x 1.1*)													
	57 mm Low-load Black Magic®		57 mm High-load Black Magic®		75 mm Low-load Black Magic®/ 75 mm ESP		75 mm High-load Black Magic®/ 75 mm Stainless		100 mm Black Magic® 100 mm Stainless		125 mm Black Magic®		150 mm Black Magic®/ 150 mm Stainless	
	ft²	m²	ft²	m²	ft²	m²	ft²	m²	ft²	m²	ft²	m²	ft²	m²
End-boom														
Single Attachment	450	41	550	51	600	56	750	70	900	84	1250	116	1550	144
Multiple Attachment* †	500	46	675	63	720	67	900	84	1100	102	1500	139	1750	163
Mid-boom														
Single Attachment	400	37	400	37	450	42	550	51	700	65	1000	93	1375	128
Multiple Attachment*	450	41	575	53	600	56	700	65	950	88	1300	121	1525	142

*Assumes 10% roach †Assumes two or more shackles share load on both boom and deck

Running Backstays

Crews use running backstays to adjust mast bend for different wind conditions. This controls headsail sag as well as the camber (depth) of the mainsail. Use Black Magic® or stainless runner blocks with higher breaking strengths than your runner wire.

	Maximum breaking load of runner wire													
	57 mm Black Magic® Air Runner®		75 mm Black Magic® Air Runner®/ 3" Stainless steel runner		4" Stainless steel runner		100 mm Black Magic® Air Runner		5" Stainless steel runner		125 mm Black Magic® Air Runner		150 mm Black Magic® Air Runner	
	lb	kg	lb	kg	lb	kg	lb	kg	lb	kg	lb	kg	lb	kg
Flying Blocks	2500	1134	10000	4535	12500	5670	15000	6800	19000	8618	22000	10000	30000	13605
2:1 Separate Deck Blocks	3025	1372	12100	5490	15250	6920	17550	7960	23150	10500	26500	12020	36136	16388
2:1 Becket Deck Blocks	1875	850	7500	3400	9470	4295	10900	4945	16500	7485	16500	7485	22500	10204
3:1 Deck Blocks (Block #1)	3713	1684	14850	6735	18750	8505	21600	9800	28500	12928	32700	14835	44550	20203
3:1 Deck Blocks (Block #2)	4525	2052	18100	8210	22875	10375	26300	11930	34750	15760	39850	18075	54300	24625

Mastbase Lead Blocks

Leading halyards and control lines aft allows crews to raise and lower sails or make tuning adjustments from the cockpit. Attach blocks to the mastcollar post or padeyes, or mount mastbase halyard leads to the deck. The table below sizes Black Magic®, stainless steel, ESP, and mastbase blocks for different foretriangle heights and luff lengths. See page 21 for common configurations.

	57 mm Low-load Black Magic®/ESP		57 mm High-load Black Magic®/fixed MBL* blocks		75 mm Low-load Black Magic®/ Mastcollar post block/ 75 mm ESP		75 mm High-load Black Magic®/fixed MBL* blocks/ 75 mm Stainless		100 mm Black Magic®/ 100 mm Stainless		125 mm Black Magic®	
	ft	m	ft	m	ft	m	ft	m	ft	m	ft	m
	Maximum "P" Dimension											
Main Halyard	47	14.3	52	15.8	60	18.3	74	22.6	80	25	90	27.5
	Maximum "I" Dimension											
Genoa Halyard	45	13.7	50	15.2	58	17.7	72	21.9	76	23.2	87	26.5
Spinnaker Halyard	47	14.3	53	16.1	60	18.3	74	22.6	82	25	93	28.4

*MBL = Mastbase Lead blocks