

# HARKEN®

INNOVATIVE SAILING SOLUTIONS

Supplied By:

American Rigging Supply, Inc.

[www.americanriggingsupply.com](http://www.americanriggingsupply.com)

## Battcar Systems

### TAME YOUR MAIN

Handling a big mainsail? Wrestling a flogging main onto the boom? Raising the genoa, but not the main when it's windy? Sailing solo?

Whether reaching, running or beating, a Harken® Battcar system helps raise, douse and reef with ease, and acts as extra crew when sailing shorthanded. Battcar systems outperform in-mast or in-boom furling, cost less, and you don't need to recut your sail.

### CARS AND TRACK BUILT TO LAST

Car bodies are made of one-piece high-grade aluminum. They are strong, lightweight, and will last for years.

Car bodies, bearing races and track are deep-saturation Hardkote-anodized with a black additive to resist the corrosive effects of salt, sun and long-term wear.

Cars are Teflon®-impregnated for a smooth, slippery surface.

### CB CAPTIVE BALL CARS— THE ULTIMATE IN LOW-FRICTION

Stainless steel wire guides keep Torlon® ball bearings captive and circulating smoothly for fast sail hoists, douses and reefs.

Captive bearings allow cars to easily roll off the track for cleaning and maintenance.

Batten toggle assembly moves freely in all directions to prevent the sail from binding when reefing under load.

### SLIDER BATTcars— A COST EFFECTIVE WAY TO TAME YOUR MAIN

Raise and lower sails without battling sticky bolt ropes, slugs and bunched up sailcloth.

### WIDE RANGE OF SIZES

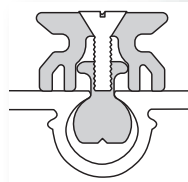
Systems available for boats to 80 ft (24.4 m).

### MIX CB AND SLIDER BATTcars

CB and Slider Battcar systems use the same track, making upgrades to ball bearing cars easy. Mix Slider cars with CB cars to get the perfect system for your boat and budget.

### EASY MAST-UP INSTALLATION

Battcar track is designed to screw directly into slugs that slide into mast groove—no drilling or tapping on most masts.



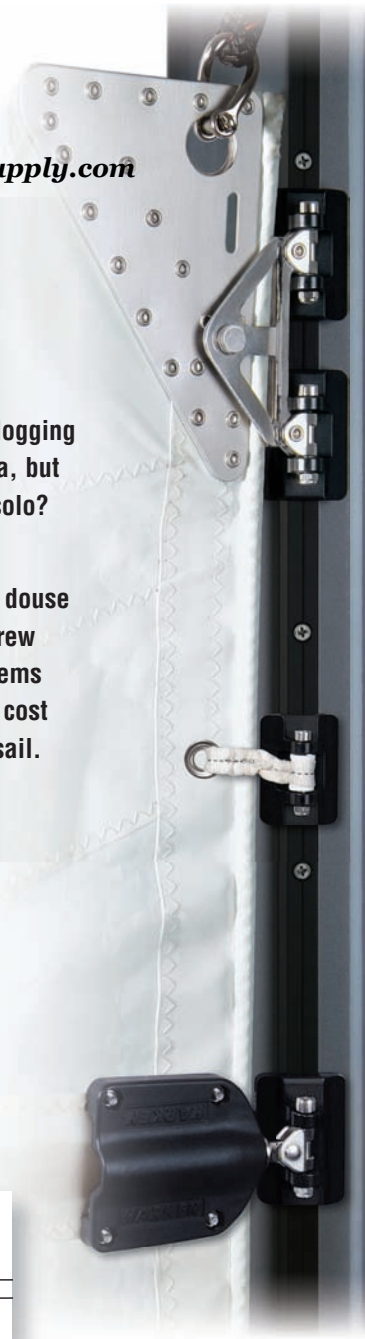
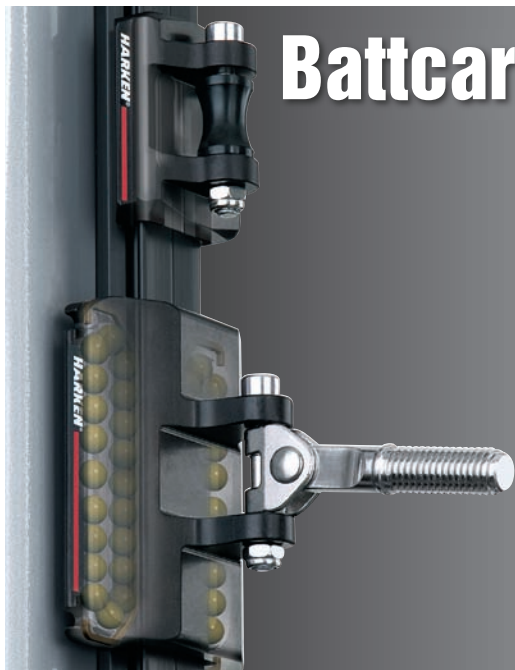
### EASY SAIL STORAGE

Lazy Jacks keep mainsail gathered onto the boom when sail is reefed or dropped. Use independently or with a Battcar system.



**QUICK SAIL REMOVAL**  
Cars and sails slide off the track by removing the screwpin endstop—no tools needed.

MAINSAIL HANDLING

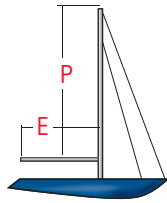


# Ordering Battcars

## Determining System Size

Your boat's length and sail area determine the size of the batten traveler system.

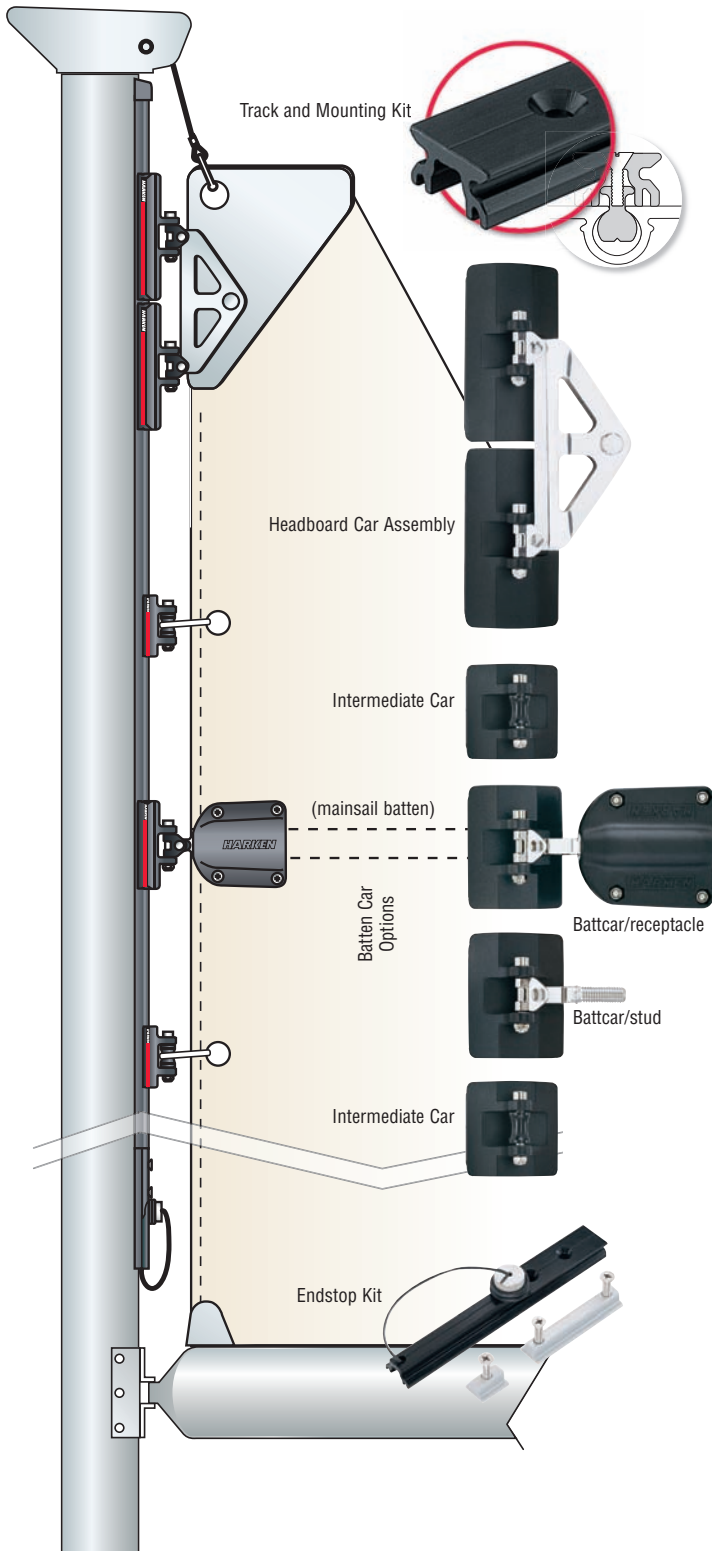
Owners of custom or non standard boats please call your distributor listed in the Harken catalog or on [www.harken.com](http://www.harken.com).



$$\text{Mainsail Area} = P \times E \times .5$$

Typical boat length				Maximum sail area				System size
Monohull		Multihull		Monohull		Multihull		
ft	m	ft	m	ft <sup>2</sup>	m <sup>2</sup>	ft <sup>2</sup>	m <sup>2</sup>	
to 37	to 11.3	to 30	to 9.1	350	32	275	25	AA
37 - 50	11.3 - 15.2	30 - 40	9.1 - 12.2	600	56	500	46	A
50 - 60	15.2 - 18.3	40 - 50	12.2 - 15.2	900	83	700	65	B
60 - 80	18.3 - 24.4	50 - 65	15.2 - 19.8	1500	139	1250	116	C

## Components



## Track

Track and slug system installs on masts with internal slug. Requires no drilling or tapping.

Track lengths average 80.75 in (2.051 m). Order track using mainsail luff length.

## Track Mounting Kits

Each size system offers slugs that fit flat or round mast grooves.

Order one mounting kit for each track section.

## For masts without internal sail track:

Track lengths vary. To order, contact your rigger or Harken® Tech Service.

## Headboard Car Assembly

Two-car design handles high leech loads. Fits most mainsail headboards.

Order one headboard car assembly.

## Batten Cars

Harken® batten cars are available in various configurations for different sail attachments.

**Battcars with Harken receptacle:** require full-length battens.

**Battcars with threaded toggle-stud:** 10, 12, 14 mm stud sizes to fit most batten receptacles.

Order one batten car for each mainsail batten.

## Intermediate Cars

Support luff of sail between batten cars. Their short length reduces stack height. Available in Slider or CB Car configurations.

Order one luff car to allow approximately 4 ft (1.2m) of space between cars. See chart.

Distance between battens		Number of cars
ft	m	
8 or less	2.4 or less	1
9 - 13	2.7 - 4	2
14 - 16	4.3 - 4.9	3

## Endstop Kit

Use on track ends to keep cars on track.

Order one endstop kit. Kit includes two endstops, fasteners, and mounting slugs.

**HARKEN®**