

# Small cruising cat on a big ocean

Voyagers Carllie and  
Garett Hennigan and their  
experience of deploying a  
sea anchor in the Pacific  
between Mexico and Hawaii

Story and photos by Carllie and Garett Hennigan

Before they experienced gale conditions, the Hennigans began their passage from Mexico to Hawaii in benign conditions.

Tethered on our parachute anchor to a heaving sea midway between Mexico and Hawaii, we were losing heart. We were not stuck in a storm system that would pass in 12 to 24 hours; this was a stationary weather system of intensified trade winds that would not shift for days, possibly weeks. As huge waves rolled under our small voyaging catamaran, *Light Wave*, our spirits flagged. We were losing confidence in ourselves and in the forward momentum of our crossing. We had expected our first ocean crossing to be pretty easy, having set out during the prescribed time when, as one friend put it, this passage is supposed to be

one of the most benign in the world. It wasn't. In the end we did safely complete the 2,700-mile passage to Hawaii. And in doing so, we answered some questions for ourselves about sailing offshore in a catamaran.

As voyagers discover the joys of sailing and cruising on catamarans, many are venturing offshore. Despite the fact that the ancient Polynesians sailed the uncharted Pacific in their double-hulled sailing canoes for thousands of years, the myth lingers that catamarans are somehow unsafe. Perhaps this stems from people seeing lightweight beach cats flip or pictures of capsized racing multihulls. These high-performance boats are very

different from the modern cruising catamaran.

How did we prepare ourselves and our boat for the crossing? There is a growing base of knowledge on the special considerations in sailing offshore in a catamaran, and here we cover some of those points and share the knowledge we gained in sailing our 32-foot cat on our first offshore passage.

## The vessel

We built our Richard Woods-designed Gypsy catamaran and launched her in 1999. She is of modern design and construction, the hulls being constructed of cored foam fiberglass, and the cockpit and bridgedeck cabin of wood,

glass and epoxy composite. During the next seven years, sailing in our home waters of British Columbia, we tweaked *Light Wave*, adding an arch and hardtop, a catwalk and a bowsprit with a free-flying screecher, and reinforcing and

While a keel boat can absorb an extra 1,000 pounds above designed weight and not feel that different, a catamaran's performance suffers, especially a smaller one like ours: it sails slower, there is more hobby-horsing, and because

it sits lower in the water, there is more slamming to the bridgedeck in big following cross seas.

We addressed these limitations during our trip, thanks to the simplicity of the Woods design. In one week on the water at a San Francisco marina, we cut out the bridgedeck nacelle floor and raised it

5 inches. And during seven weeks on the hard in Guaymas in the Sea of Cortez from mid-April to mid-June 2007, we extended the aft hulls 4 feet and raised the whole cockpit and central cabin sections another 6 inches.

We started psyching ourselves up for our maiden ocean crossing when we returned to the Sea of Cortez in September 2007 after having spent the hot Mexican summer months at home in British Columbia. Although we had made many two or three-day passages and done

lots of night sailing over the years, the thought of sailing out into the big blue sea with untold fathoms of water under our hulls and no land for more than 1,000 miles was still daunting.

## Heavy weather toolbox

The most important point of seamanship in considering heavy weather is to avoid it by sailing passages only in the recommended times (Jimmy Cornell's *World Cruising Routes* is the definitive guide); and, equally important, to move out of areas during their hurricane, typhoon or cyclone seasons. Even with careful planning, bad weather can still catch up with anyone. Successfully handling it in a catamaran requires special consideration. Though techniques such as heaving to and lying ahull can be used in a catamaran, its relatively lighter weight causes it to not only surf in smaller waves, swells and wind, but also to surf faster. This requires early use of a speed-limiting drogue off the stern in moderate conditions and a parachute anchor deployed off the bow in a full-blown storm to stop the boat and keep the bows into the breaking waves.

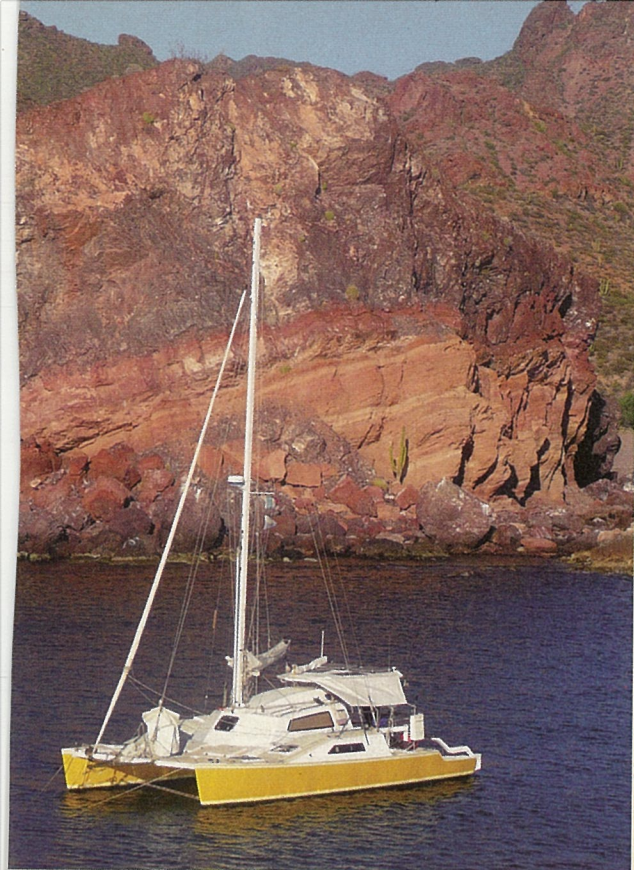
The following describes our experience with the cruising catamaran's heavy weather tools — a drogue and parachute anchor — when we



**Gale conditions due to La Niña reinforced trade winds forced the Hennigans to use heavy weather tactics.**

upgrading her in many other ways to prepare her for off-shore sailing. In July 2006 we literally cut the tie to land and set out on a two-year adventure to Mexico, Hawaii and back to Vancouver.

Sailing down the rough and windy northwest coast of America, we identified a few further areas that needed upgrading. Even with our best intentions to cruise light (we hadn't gotten to the stage of cutting our tooth brushes in half to reduce weight) our cat was still heavily loaded for long-term voyaging.



the bridgedeck by 6-inch walkways, which means you can walk forward very safely to the bow in heavy seas with four feet of hull deck between you and the water, the trade-off being that you have to go outside to get from

sailed from Mexico to Hawaii in March 2008. Before leaving the Sea of Cortez, we extensively practiced deploying our 48-inch Para-Tech Delta on 150-foot, non-stretch, 3/8-inch polyester line and our 12-foot Para-Tech Sea Anchor with 350 feet of super-stretchy nylon rode, a retrieval float and a 400-foot, 1/4-inch polyester non-floating trip line.

Our catamaran was ready: all equipment had been checked and double-checked and spares purchased. We left the city March 2, 2008, and, after two overnight stops heading around the tip of the Baja Peninsula, on March 4th bade gentle Mexico “*Adios y gracias para todo!*” as we sailed past Cabo San Lucas.

The Woods-designed Gypsy is designed for safety: the hulls are separated from

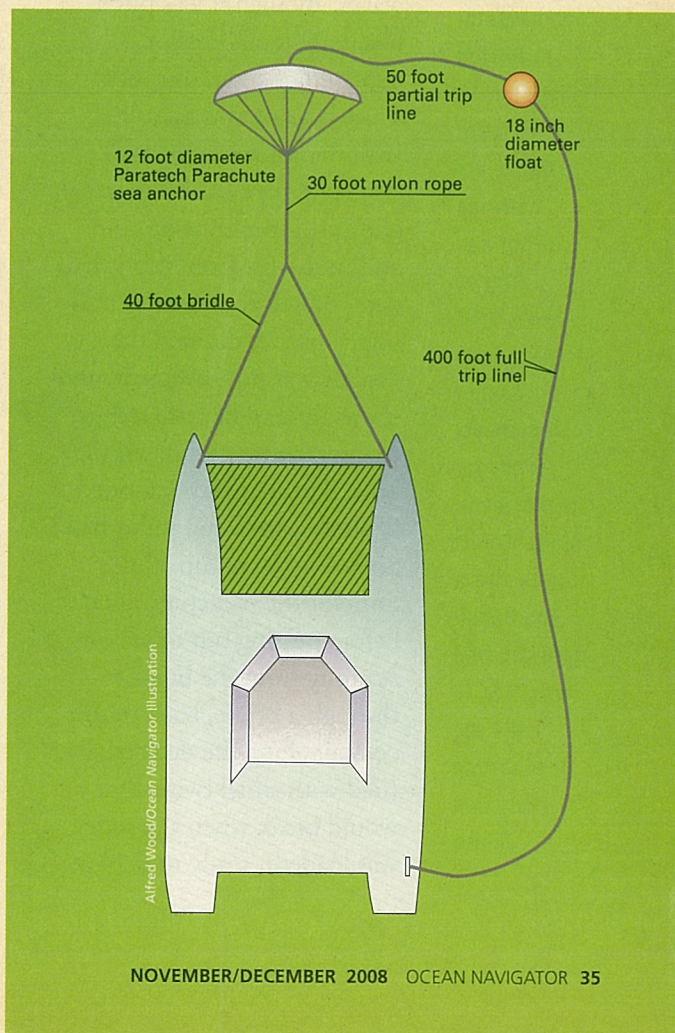
one living area to the other. We actually like this arrangement as it gives us more privacy in each living area, and one of us can be actively living life, so to speak, in one area while the other is resting in another. We had beefed up *Light Wave* by completely surrounding the cockpit with hefty 42-inch-high railings made with 1 1/4-inch stainless tubing. For our crossing we also tied several sets of ropes at shoulder height to provide additional safety in the more extreme movement in big seas; and we had a firm rule that we never ventured forward out of this cage of railings and lines without attaching our inflatable life vests onto the our jacklines running to the bows.

For the first 10 days of our westward passage, we

coped with this year’s *La Niña* reinforced trade winds of 20 - 25 knots. Sailing in these east-northeast winds and waves would have been fine, but we were constantly jarred by cross swells generated by the last of the winter storms far away in the North Pacific. It was like tubing behind a water-ski boat, going around and around in circles as the waves get all mixed up, only in this case the combined waves were 10 - 12 feet high. As the sun set on the 11th day, the winds cranked up to 30 - 35 knots and the gale developed. Exactly as practiced, we deployed our

Left, the Hennigan’s 32-foot Woods-designed Gypsy cat *Light Wave* at rest in the Sea of Cortez before they departed for Hawaii.

Below, to deal with the large waves during their voyage, the Hennigans deployed a sea anchor.



Alfred Woods/Ocean Navigator illustration



The Hennigans were well prepared for heavy weather, having taken time to practice deploying both sea anchor and drogue. Above, their parachute sea anchor components ready for deployment. Right, Garrett on the bow. The Hennigans checked for chafe on the sea anchor rode every two hours.

drogue off our starboard aft quarter to slow us down to 5 knots and prevent surfing down the ever-steepening waves. By then it was pitch black night, and being deprived of sight, our more acute hearing was assaulted with the sound of the water and wave tops crashing, gurgling and rumbling around and under us. Conditions had deteriorated so much by midnight that we decided the drogue was not sufficient, and it was time to lie tethered to our parachute anchor off the bow. Fortunately, a seasoned offshore catamaran sailor had advised us to set up all the lines for the parachute anchor before putting out to sea — running from the bows, through a bridle, back to the cockpit along the deck edge (tied with small twine that would break when the rode was loaded), ready to deploy

from the cockpit while running downwind. This way we could avoid going out onto the bows in the teeth of a storm. Now, we share this vital piece of advice with every catamaran sailor we meet.

Before we could deploy the parachute, we had one small problem: we had to retrieve the drogue first as we did

not want to risk it tangling with the parachute. However, because we did not want to go sideways to the seas to slow the boat down, we were unable to pull the drogue in against the force being generated by our 6 knots of boat speed. And so we waited.

By 0400, with winds of 35-plus knots and the seas building, we decided to risk putting out the parachute with the drogue still trailing behind us. We easily deployed the parachute anchor system from the aft deck, again exactly as practiced, and *Light Wave* slowly turned her bows into the

wind and virtually came to a stop. We were now, in effect, anchored to the surface of the water. Fortunately, the parachute rode did not foul with the drogue line, and we were able to retrieve the drogue without difficulty when our speed dropped to near zero. Now we were safe. It was a relief just to relax and rest until dawn as *Light Wave* rose and fell on each huge wave. We quickly established a routine of crawling forward every two hours to check the heavy rubber chafe guards that protected the bridle lines.



We endured 28 hours on our parachute anchor mid-ocean, pinned to the sea like bugs to a corkboard as *Light Wave* was relentlessly buffeted by the huge waves roaring under and around her. Through monitoring weather channels and the ham nets of

other voyagers and by downloading weather faxes, we determined that this was not a low-pressure system, front or hurricane that would blow through in 12 to 24 hours, but a huge unmoving area — 1,000 by 1,500 miles — of very reinforced *La Niña* trade winds that may not move for a week or even a month. Declaring our first and only axiom of the trip, “There is no point in being safe in the middle of the ocean if you can never leave,” we decided that in spite of our qualms it was time to go. Fortunately, we had used a full trip line from the parachute back to the boat, so it was relatively easy to retrieve all the components of our parachute anchor and set sail into the sunshine. Boy, did it feel good to be finally under way again!

As night approached, the winds and waves were still up, so we re-deployed our drogue off the stern, only this time with a bridle run through two snatch blocks. What a difference! Our speed was not only controlled to a smooth 5 - 6 knots, but all the side-to-side sloshing motion stopped.

### Lessons learned

Although we still faced 1,350 miles, once we cleared this area the seas gradually moderated and the rest of our crossing became a continuous routine. We sailed faster during

the day and usually shortened our sails for the night watches. As we progressed toward our idyllic tropical destination, we mulled over our handling of the unexpectedly big winds and seas we had encountered and concluded that we would have been far better off in these conditions to use our drogue properly deployed on a bridle, rather than our parachute anchor. In our fright at our first encounter with big wind and waves mid-ocean, we could hardly wait to get that parachute anchor out so we would be safe on the sea, just like other catamaran sailors whose experiences we had read about in the *Drag Device Data Base*. Now that we are more seasoned blue water sailors, we know better.

A parachute anchor is still the ultimate survival tool for a catamaran in anything more than 45 - 50 knots, but in 30 - 45 knots a drogue deployed with a bridle off the stern controls your speed and direction while allowing you to continue sailing at 5 - 7 knots (depending on the size of the cat), which is exactly what you want. It is essential to carry a drogue and parachute anchor of sufficient size and with enough rode to do the job (the manufacturers will tell you exactly what you need for your catamaran); to practice

deploying this equipment in non-threatening conditions; and to set it up ready to deploy from the cockpit before you go to sea.

Our reward for the long days and nights and countless lonely hours on watch crossing the Pacific Ocean has been spending three months exploring the Hawaiian Islands as only voyagers can.

Very soon after our arrival we felt the tension of the long days at sea ease out of our bodies and minds, to be replaced with the calmness generated in these tropical islands, where ancient wisdom has molded a people whose heritage is music, generosity and gentleness.

The lessons we learned on our maiden crossing have seasoned us, and now we look forward to our next crossing of the Pacific to head home. ■

*Check out Carllie and Garrett's adventures at [www.lightwave99.com](http://www.lightwave99.com).*

**Carllie, equipped with foul weather and safety gear, prepares to go on deck.**



## NETWORKING

Side-by-side networked displays allow for more options in viewing data from electronic charts, radar, performance data, etc.



# Battle of the networks

STORY AND PHOTOS BY  
RALPH NARANJO

Voyagers  
have  
rallied to  
the plug  
and play  
revolution

The three big players in electronic networking are Furuno, Garmin and Raymarine. Each have expanded from making high quality stand-alone electronic navigation equipment to focus on system integration. These players, along with Simrad, Lowrance, Northstar and a couple of others are doing more than setting shoreside technology afloat. Their hardware may differ a bit in electronic architecture, but all base their systems on multifunction displays and

high data rate cable links that can access information from sensors that include radar, GPS receiver, depth sounders and more. Any of the networked hardware output can be accessed on a multifunction display, either individually or simultaneously — giving users fingertip control of more information than ever before.

As with all good things, there are a couple of downsides to networked electronics that go beyond the substantial price tag attached to the components. One of

the biggest issues is human sensory overload, by no means an electronic flaw. It is linked to the avalanche of data that all of these systems offer, and it can cause a user to navigationally lose the forest for the trees. The cure lies in understanding how to manage the information, prioritizing what's the most important input(s) at any given time, and learning how to sideline the rest. For example, in overcast conditions the radar operator wants detailed accuracy, and the sensitivity