

Maritime

Life and Traditions

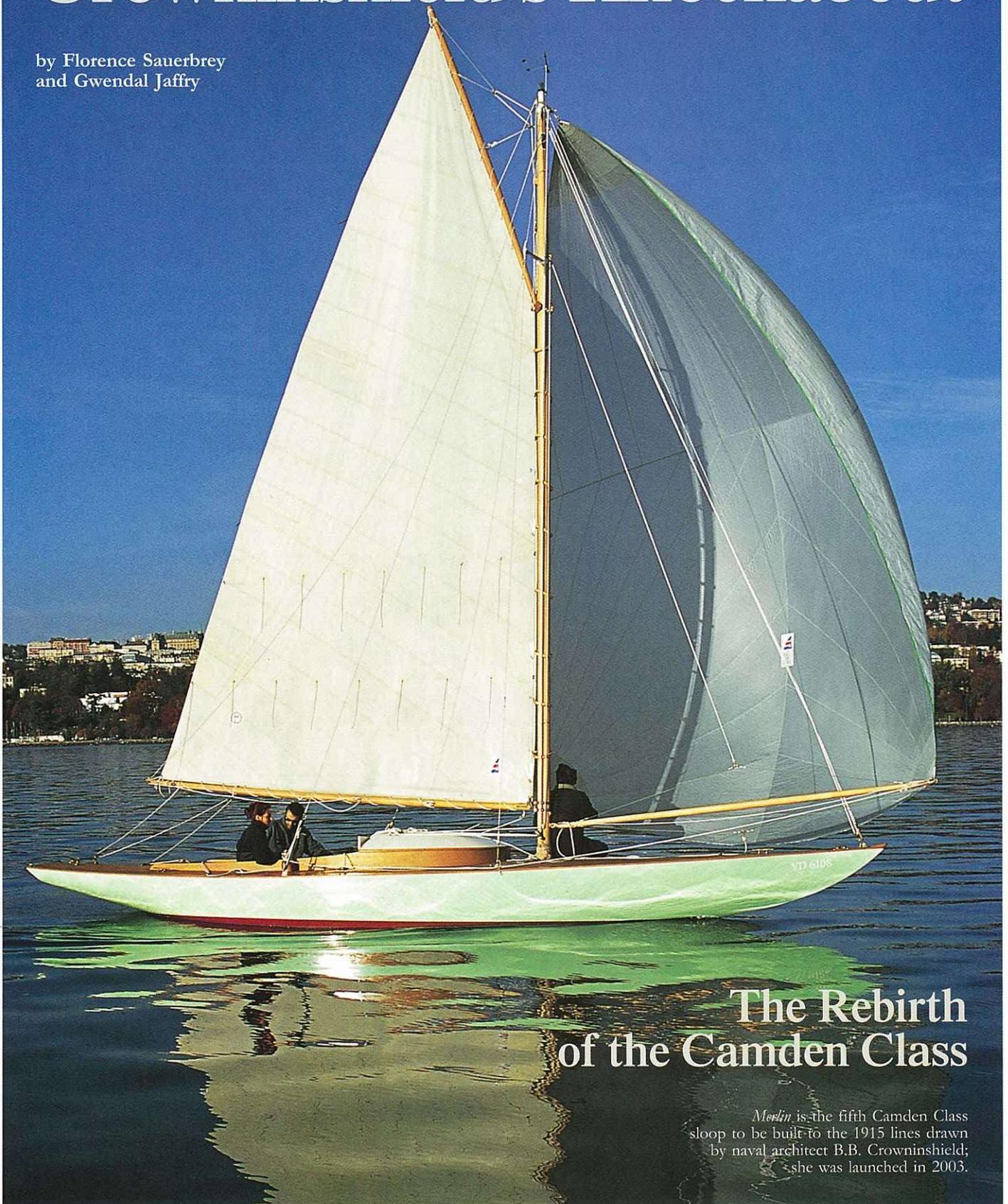
No.24 ● BAMBOO SAILING RAFTS IN VIETNAM ● THE SCORESBYS OF WHITBY



CAMDEN KNOCKABOUT ● SAILING DUYFKEN ● CRAB FISHING IN ALASKA

Crowninshield's Knockabout

by Florence Sauerbrey
and Gwendal Jaffry



The Rebirth of the Camden Class

Merlin is the fifth Camden Class sloop to be built to the 1915 lines drawn by naval architect B.B. Crowninshield; she was launched in 2003.

In the early 1900s yachting took a new turn in America with a sudden proliferation of small one-design boats on the north East Coast. Some have survived in numbers to this day, others have been less fortunate. Of the four Camden Knockabouts built to B.B. Crowninshield's design, only two are known to have survived.

In the late 1890s *The Rudder* magazine was almost overwhelmed by its readers' enthusiasm for one-design racers: 'Like an epidemic, the one-design idea has spread among the yachtsmen of New York, and several clubs have adopted the idea of building a number of boats all off the same moulds.' The writer seemed thrilled with the idea: it denied, he said, the traditions of 'ordinary classes where one man, having outbuilt the fleet by having the longest pocketbook, is always sure to win; here, it is the best man who wins'. Not only was the resultant racing more 'democratic' but the concept itself was revolutionary in many ways. It implied that several members of a club would reach an agreement on a type of boat, its dimensions, rig, profile, designer, price, schedule of delivery, and so forth. It was as if a dozen families in one town came together and decided that they would each get the same car, let's say a customized Model T Ford. But such an idea does have its advantages: the 'bulk order' requires only one designer, and the boatbuilder need loft and set up only a single reusable mould – the result is a considerably lower purchase price than one would expect for a custom craft. It is possible that the business of some contemporary designers suffered from that kind of 'standardization'; but one can also imagine that – other than in the cases of some exceptionally successful creations (Herreshoff's NYC Thirties or Crowninshield's 17^{1/2}s, for instance) – yachtsmen would soon tire of their one-designs and would push to improve and update the club's entire racing fleet every few years.

The knockabout type was born in about 1892 in Massachusetts Bay, and was the result of two prerequisites: affordable construction and getting the whole family out for sailing parties in boats that were safe, seaworthy, easy to handle, and simple to maintain. The concept was for a light, easy boat that, with a moderate sail area (in the case of the 1897 Boston class the maximum was 500sq.ft) and a fair amount of ballast, favoured seaworthiness and safety over speed. However, while their boats may not have been intentionally designed for racing, it was not long before owners gave in to the temptation of competing against one another. By 1894

the Knockabout Association had been created and the type, now treated as a class, was soon spreading along the north Eastern Seaboard.

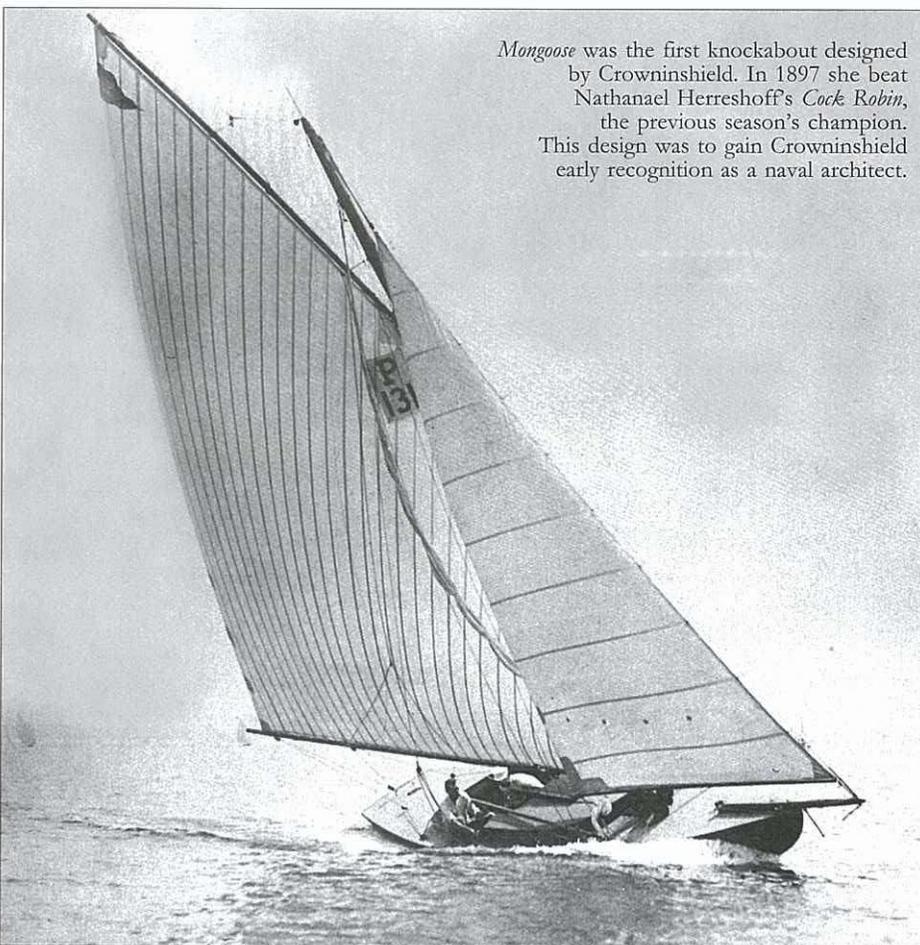
The Seawanhaka Corinthian Yacht Club (SCYC) of Oyster Bay, New York, created by and for amateur yachtsmen, was to become the most supportive club for the knockabout type in the New York and Long Island area. For the 1898 season, Marblehead designer W.B. Stearns came out with a 21'-LWL centreboarder with 500sq.ft of sail and 1,500lb of external lead ballast. The SCYC ordered twenty-six boats, at a cost of \$775 each, and nine more were delivered to the Westchester Country Club; inter-club races were organized for the very first season. By 1900 the term 'raceabout' was in use to differentiate those boats that were purely built for racing from their true 'knockabout' sisters.

The specifications for each type were the same, except that the sail area was increased to 600sq.ft for racing.

Crowninshield's One Designs

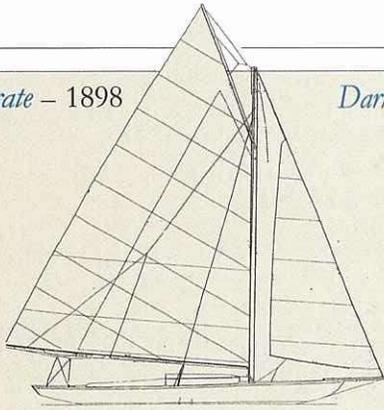
For designer B.B. Crowninshield the knockabouts and raceabouts opened a new door. In 1897 he gained early recognition when his *Mongoose* beat Nathanael Herreshoff's *Cock Robin*, winner of all prizes the previous season. In *The Rudder* an article devoted entirely to *Mongoose* told how her designer had used innovation and risk to stand out from the crowd.

He started on what proved to be a correct idea that a 21-foot boat of at least 7 feet beam, with 3,500 pounds of outside

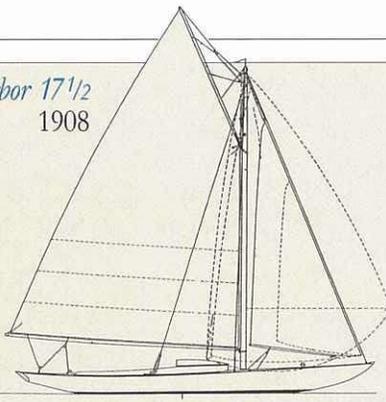


Mongoose was the first knockabout designed by Crowninshield. In 1897 she beat Nathanael Herreshoff's *Cock Robin*, the previous season's champion. This design was to gain Crowninshield early recognition as a naval architect.

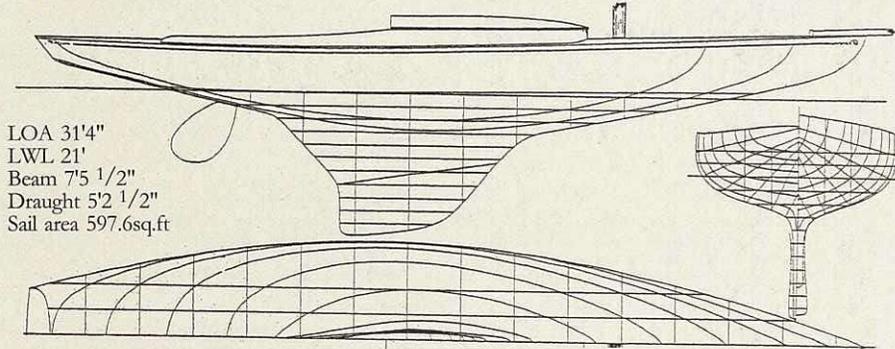
Pirate – 1898



Dark Harbor 17 1/2
1908

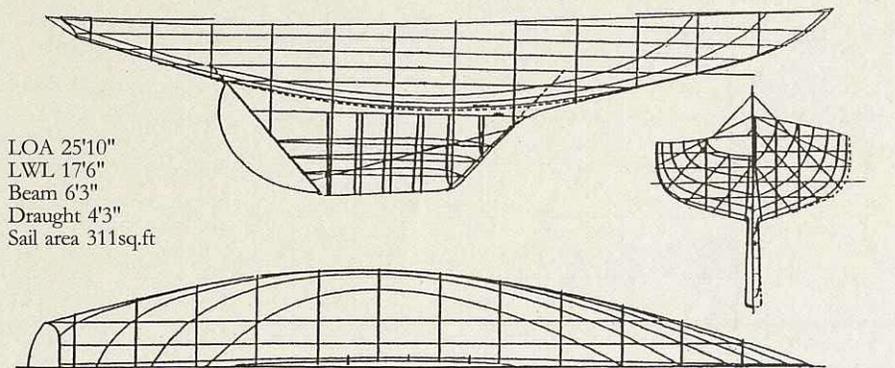


Pirate



LOA 31'4"
LWL 21'
Beam 7'5 1/2"
Draught 5'2 1/2"
Sail area 597.6sq.ft

Dark Harbor 17 1/2



LOA 25'10"
LWL 17'6"
Beam 6'3"
Draught 4'3"
Sail area 311sq.ft

lead, and only 500 square feet of sail, was bound to be decidedly under-canvassed in all except the very strongest breezes. He accordingly cut down her displacement as much as he safely could, also her wetted surface, and gave her only five feet draught or nearly a foot less than any of the other boats which were all within an inch or so of six feet... As for her construction it may perhaps surprise some to know that for two-thirds of her length her frames were spaced 9" apart and only in the very ends 12", which

was the distance between frames of all the other boats for their entire length. She was moreover the only really 'keel' boat in the fleet... a regular out-and-out keel boat with not the slightest approach to the fin keel.

Mongoose was also the only boat not to be double-planked. After a late launching and the replacement of her first set of sails, she raced her way up to the winning position in the class championship. The following year, Crowninshield's career took off with the success of his race-about *Pirate*, described in *The Rudder* as the most accomplished design of the

type. *Pirate* had a slight bulb on her keel, a balanced rudder, and for the 1899 season an excellent crew – designer B.B. Crowninshield and his brother Francis.

Ten years later – after Crowninshield had produced many schooner designs for both commercial and yachting use, an *America's Cup* contender, and the seven-masted schooner *Thomas W. Lawson* (see sidebar p.18) – his knockabouts were still very popular. In 1908 he designed #381, originally for the Manchester, Massachusetts, Yacht Club. She was 25'10" on deck, 17'6" on the waterline, 6'3" in the beam, and 4'3" draught. She had 310sq.ft of sail and a 1,500lb lead ballast keel. In accordance with the knockabout rules, she had a small cuddy cabin with two bunks for foul-weather shelter or for an overnight cruise. The Rice Brothers of East Boothbay, Maine, built an initial batch of twelve boats in 1909, followed by another dozen or so the next year; the fleet continued to grow to more than 100 by the mid 1930s. Such numbers say much for the popularity of the design, which quickly migrated from Massachusetts to Penobscot Bay, Maine, where it was most commonly known as the *Dark Harbor* 17 1/2. Indeed, so popular was the *Dark Harbor* class that in 1915 Crowninshield designed a 12'5"-LWL version, some of which are still sailing, as are the 17 1/2s.

By the 1910s 17 1/2-footers could be found in several Maine coastal waters, but most especially around Isleboro and North Haven in Penobscot Bay, and further east in Bar Harbor and Northeast Harbor on Mount Desert Island.



Bowdoin Bradlee Crowninshield (1867–1948).



Camden, probably in the 1930s. A Haj is leaving the harbour in the foreground.

Camden, Maine, 1915

In the early years of the century, the economy of Camden, Maine, depended principally on the production of lime and shipbuilding. But already tourism was making its mark: the sheltered harbour and the nearby hills – favoured for hiking – made the town a popular summer destination.

The history of the Camden Yacht Club is linked to the life of publishing magnate and philanthropist Cyrus Hermann Kotschmar Curtis. A native of Portland, Maine, he had settled in Philadelphia, but owned a summer home in Rockport, just south of Camden. His steam yacht *Lydonia* was a familiar sight in and around the area, and Negro Island (at the entrance to Camden Harbor) was renamed Curtis Island in his honour after he died in 1933. The yacht club association was founded in 1906 by New Yorker George B. Phelps, and in 1911 Curtis bought property on Bayview Street for the club house – which he had built, and in 1926, donated it to the town. Before 1915 it seems that the club was not very active. A 1914 article in *The Camden Herald* mentions sixteen ‘dories’ racing in the harbour; some races had been organized in the past (the type of boats is not cited) but, as the newspaper puts it ‘other attractions have diverted attention’. Apparently motor-car excursions into the Camden Hills were the most popular distractions.

It was the Curtis family (1) who revitalized Camden’s yachting – in late 1914 they commissioned a knockabout design from B.B. Crowninshield to be delivered in time for the summer of 1915. William J. Curtis, a native of Brunswick, Maine, and an established lawyer in New York City, delegated his son William J. Curtis Jr. to negotiate the deal on behalf of his own family and three others: the Henrys, Hagars, and Jennings. Sydney J. Jennings was a New York City industrialist and father of four; the Henrys of Philadelphia were neighbours and friends of Cyrus Curtis, then Commodore of the Camden Yacht Club (a position he would hold until his death). William J. Curtis ordered a boat for his daughter Elizabeth, an avid sailor. Nothing is now known of the Hagar family.

Young William Curtis (Jack to his family) corresponded freely, to and fro, with the Crowninshield office. It is most likely that the choice of designer was influenced by his father who owned the Crowninshield-designed, 62’ sloop, *Mimosa II*, but it is curious that the Curtis family and, indeed, the Camden Yacht Club, commissioned the new design when they could have settled for another batch of the successful Dark Harbors and saved some money. Presumably they wanted a faster boat that would still qualify for competition with other knockabouts like the 17¹/₂, and the Northeast Harbor As. Whether they actually specified a better-looking boat, or the designer

was particularly inspired by the required measurements wasn’t recorded. However, with a waterline 6” shorter than that of the Dark Harbor, and long, elegant overhangs that bring the deck length to 28’3” – 9” longer – the Camden knockabout was more graceful than her older sisters. Although the draught was exactly the same at 4’3”, her extra deck length, 3” greater beam, and 100-lb heavier ballast all allowed her to carry an additional 40sq.ft of canvas; she had two watertight bulkheads and, like all knockabouts, a small cabin with two bunks.

Construction at the Hodgdon Yard

Before he had even started to draught the lines of the new boat, Crowninshield began looking for a builder. In November 1914 he wrote to the Rice Brothers of East Boothbay, Maine, builders of the Dark Harbors and with whom he had successfully collaborated on numerous other projects. He mentioned that ‘The scantlings will be the same as that of the little one-design boats built by you previously to our designs,’ and requested an estimate for four boats: ‘They have 4 boats settled on and expect several more to sign on before January

(1) The family of William J. Curtis of New York does not seem to be related to Cyrus H.K. Curtis of Philadelphia.



The Hodgdon shipwrights, builders of the four 1915 Camden Class sloops. Charles and William Hodgdon trained at the Herreshoff Manufacturing Company in Bristol, Rhode Island, before returning to Boothbay to run the family yard.

1st.' It was not to be; perhaps Curtis Jr. was too busy with his studies at Princeton to promote the idea to his summertime clique, but ultimately only the initial batch of four boats would be built.(2)

Perhaps made a little too confident by their earlier success with the Dark Harbor 17¹/₂ the Rice Brothers delivered an estimate that Crowninshield considered too high. He looked elsewhere and turned to the Rices' neighbours in East Boothbay: Charles and William Hodgdon. He had worked with the Hodgdon on their first very successful yacht, the 38' sloop *Tyro* for William Joyce of Marblehead, 1906 champion of her class in Massachusetts Bay, and, in 1905, they built the yawl, *Quill II*, to his design – she is still sailing.(3)

George Jr., William, and Charles Hodgdon were the third generation of a business that today is in its fifth and is one of the few American yards still building very large yachts in wood. Alongside their brother Fred, William and Charles had apprenticed at the Herreshoff Manufacturing Company in Bristol, Rhode Island. While Fred stayed with Herreshoffs his brothers came home to run the family boatyard and sawmill. In 1914 they were riding the crest of a small wave, having been selected to plank up George Owen's steel-framed *America's* Cup contender, *Defiance*, and when approached by Crowninshield about the Camden Class they answered with an offer to build each boat, without sails, for \$675. The sails,

the Hodgdon suggested, could be made by Wilson & Silsby of Boothbay and sent to the builder who would then undertake both the rigging and the trials. The sails were estimated at \$65 per suit with spinners an optional extra at \$15. The designer also recommended adding a storm jib for a moderate cost of \$5, a precaution encouraged by Crowninshield: 'I would advise having this sail as some day you might want it badly.' Probably at the customers' request, a balloon jib and its rig were also added at an extra cost of \$15, setting the final price for a Hodgdon-built Camden Class sloop at \$770. In a letter dated 28 January 1915 Crowninshield announced to Curtis that the lines of design #443 were finished. The following month he sent all the specifications to the Hodgdon and awarded them the contract with a \$1,000 deposit.

Crowninshield's construction plan included listed specific woods for certain parts: oak for the backbone, oak or yellow pine for the rudder and keel, oak coamings, white-pine floorboards, mahogany seats. There are no indications for the frames, planking, deck, or deck beams, but small boats of that era and locale would typically have been planked in white cedar on steam-bent oak frames. Bob Vaughan, of Seal Cove Boatyard, who supervised the rebuilding of the Cabot family's Camden Class knockabout a few years ago, believed the sheerplanks were yellow pine. This might have helped to maintain the elegant sheer in the long overhangs for so many years, but it is

doubtful that either the designer or the builder would have considered such longevity a requirement. The deck would have been of white pine, the deckbeams of spruce or oak.

On 5 April Hodgdon wrote that the boats were planked and decked, and the houses were on. By 31 May they were 'ready for delivery at a week's notice' and Crowninshield sent a note by return mail with the names that should be painted on the transoms. The Curtis children's boat was named *Tippity Witches II*; Elizabeth Henry's was *Gone Away*; Sydney J. Jennings's was *Astrea*; the Hagars' was *Aphtram*. A few days later Crowninshield asked how the boats looked in the water and the builder replied that, when launched, they had been slightly down by the head, but that the weight of a helmsman had rectified this and they floated to their lines.

The 1915 season was underway and all was ready – all, that is, except the weather. In July and August there were just twelve days of sun but thirty-four of rain – in one early July storm 6¹/₂" of rain fell in a single twenty-four-hour period – and the average temperature stalled at 64°F, a forty-four-year low for July. Presumably the young owners enjoyed daysailing and picnicking in their new knockabouts, but it seems there was little racing. *The Camden Herald* reported only one regatta for a cup offered by William J. Curtis; it was won by his two children, Mildred and Jack. *Tippity Witches II* won two races out of three, the first one having been cancelled after none of the boats finished within the 2¹/₂-hour limit. According to the *Herald* there was only five minutes between *Tippity Witches* in first place and *Astrea* in last, while *Gone Away* came in second just eleven seconds ahead of *Aphtram*. In the last race the results were more spread out: although the four boats finished in the same positions there were now ten minutes and five seconds between them.

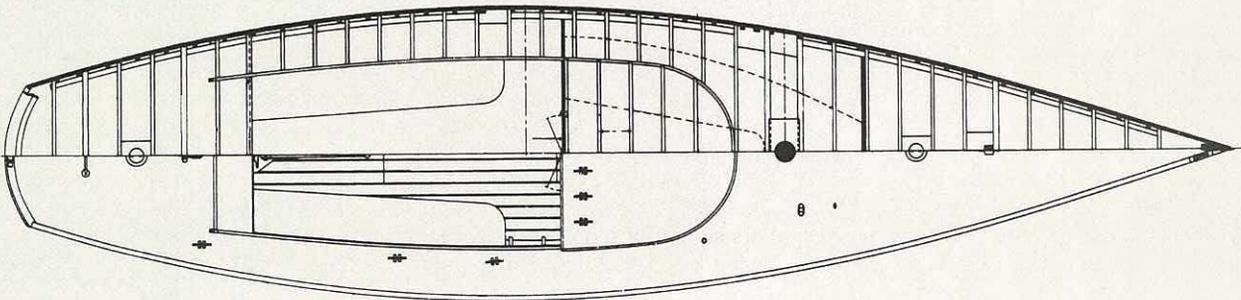
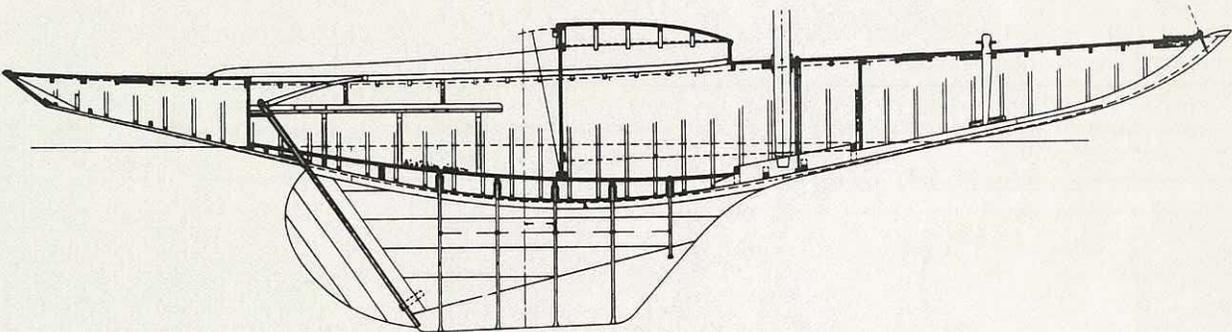
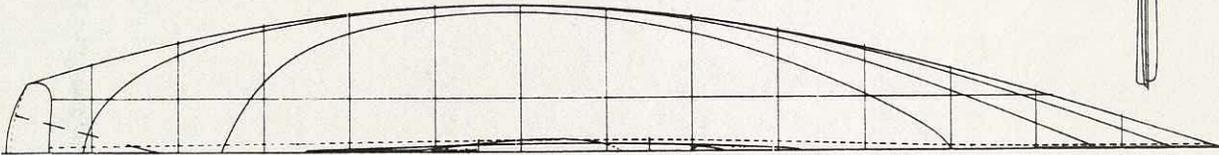
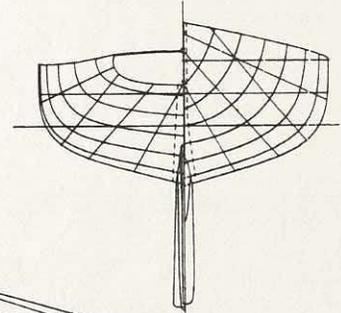
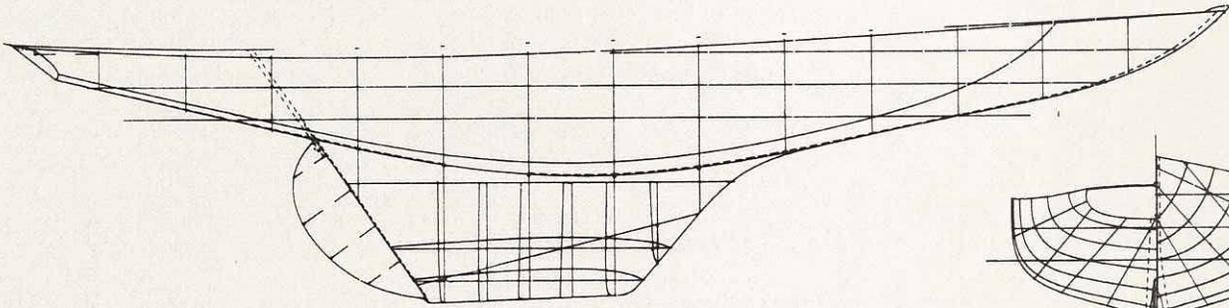
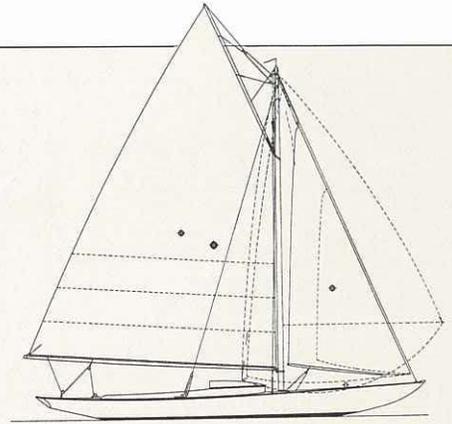
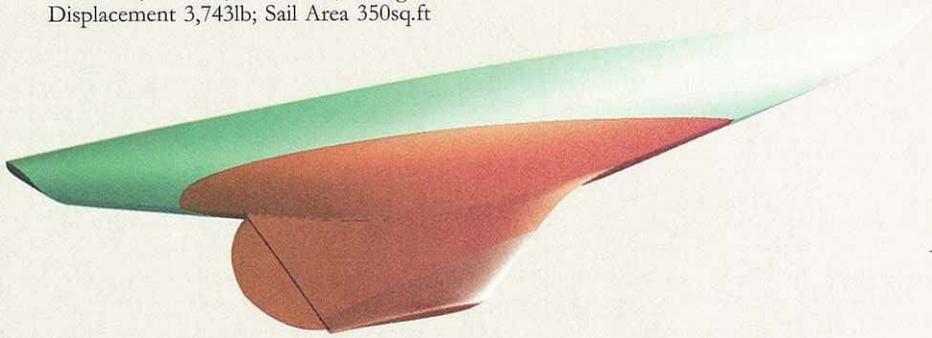
Despite their favourable performance the Camden Class sloops did not really catch the attention of the contemporary yachting press. A short comment published with the sail and construction plans in the 1916 autumn issue of *The Rudder* announced: 'Four of these boats were built by Hodgdon Bros. last spring for use at Camden, Maine, and were very successful.'

(2) If more had been built in the following years or at least before Crowninshield ceased trading, it is likely they would be traceable in his record book.

(3) Barbara Rumsey, p.246.

Camden Class Sloop

Designed by B.B. Crowninshield, 1915
LOA 28'3"; LWL 17'; Beam 6'9"; Draught 4'3";
Displacement 3,743lb; Sail Area 350sq.ft



In 1929 the Camden Yacht Club knockabouts were replaced by fifteen 31'6" Haj (or Shark) -Class sloops developed by then Vice Commodore Thomas J. Watson, who was possibly inspired by articles in *The Rudder* and *Yachting* that featured European one-designs.

So what happened to the old Camden Class sloops? For several reasons it is very challenging to trace their history: the boats were small, only four were built, and ninety years have passed since knockabouts were the rage. Furthermore the Camden class can be easily confused with dozens of other knockabout designs, among them the Dark Harbor 17¹/₂ and the Northeast Harbor A. Nevertheless, with the help of *Maritime Life and Traditions'* Contributing Editor, yachting historian Maynard Bray – himself a native of Maine – we tracked down two of the four original Camdens.

Boatbuilder Bruce Malone of Rockport, Maine, bought his Camden Class sloop for \$250 some twenty years ago. Under what remained of an old coat of white paint, the planking and framing didn't look too miserable for a seventy-year-old boat.(3)

But it was obvious that without appropriate support the knockabout's long overhangs had sagged. The weight of the counter had twisted the aft ends of the planking so that they had almost popped off – probably explaining why the transom was missing. When I saw Bruce's Camden the two bunks had been removed, as had the floorboards, to reveal the single-piece steam-bent frames, running over the top of the keel timber, in typical knockabout construction at the time. There were more floor timbers than are shown on Crowninshield's construction plan, so either the builders thought more were needed and added them or they were put in later to cure a leak.

When I met up with him Bruce had not been able to identify his boat nor had he yet found the time to restore her; in his shop a massive but elegant plank-on-frame lobster boat awaited a buyer, and a Lawley-built Northeast Harbor A-boat was undergoing its annual maintenance. In another shed, the two Haj boats *Fancy* and *Gone Away II* were laid up for the winter. (A few more phone calls to Maine, and as far as British Columbia, led

me to discover that Bruce's Camden was the original *Gone Away!*)

About an hour's ferry ride from Rockport another Camden awaited spring. In spite of her age, she is still well used, having been passed down through five generations of the Cabot family. No one remembers exactly when she came to them, but she was bought by Henry Bromfield Cabot (most probably from one of the four original owners) for his Pulpit Harbor estate on the island of North Haven. *The Knockabout*, which the family never named, is presently owned and sailed by some of Henry Bromfield's fifteen grandchildren, including Anne Wyman. Seventy-four-years old, Anne has not sailed the boat by herself for several years, but still recalls the times when she would take her out in the afternoon 'when everybody was asleep after lunch, when the wind would come up quite strong and you could stay in the harbor. She was so much fun to sail! She turned on a dime, she was very agile.' With her self-tacking jib and backstays within reach when at the helm, *The Knockabout* is the perfect daysailer for singlehanded. Today she has



Bruce Malone's *Gone Away*



The Cabot family's Camden Class sloop, *The Knockabout*, sailing off North Haven Island, Maine. She has been with the Cabots through five generations and yet her early history is not known: no one remembers when she was bought by the family nor what she was originally called.

her original rig, white topsides, and an oiled deck, with varnished hatch, seats, and coamings.

From her mooring in Minister's Creek, *The Knockabout* could be sailed in the shelter of Pulpit Harbor or out in the bay when the wind was light or, as Anne puts it, 'if you were brave'. The Cabots never raced their Camden sloop, not only because they wanted her to last but also because their preference was for the original 'knock about' function of the boat.

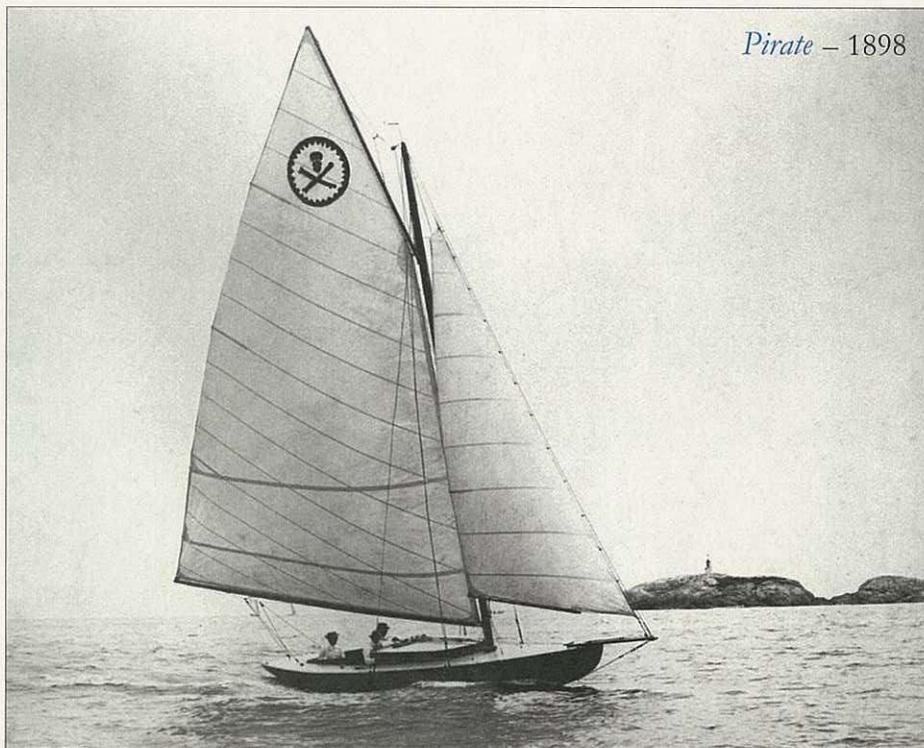
In the spring of 1990 Anne was sailing *The Knockabout* back to Cabot Cove with fourteen-year-old Bear Hopkins, a friend of the family. Although the boat had been taking up for two weeks, she 'was still leaking like mad. Bear had to pump

like crazy, he was saying "Why don't you get rid of this thing and get a decent boat?" But *The Knockabout* holds a place in the affections of every generation of the Cabot family. Powell Cabot, one of Anne's cousins, says that many family members are attached to the wonderful boat and work to keep her alive year after year. She has had several major refits, one by a North Haven boatbuilder in 1990. Anne recalls that the keel had been working loose and that she could feel it through the helm. The boat was also leaking. The first repairs focused on the keel, some on the framing, refastening, and some work on the deck.

A second phase of refit was needed a few years later. This time Seal Cove

Boatyard replaced the deck and the cabin trunk, all the frames and the floor timbers. An apron was added as well as a stronger toe rail to strengthen the sheer, and the transom was reinforced. Thus she was ready for a sixth generation.

In many ways the Cabot boat is something of a miracle. She is the only known sailing survivor of the four Camden knockabouts, a type that was once ubiquitous from New York City to Mount Desert Island, Maine. No doubt she has been cherished down the years because of her sweet lines and her lively performance and because she has lived up to her name providing enjoyable knocking about on the water.



Pirate – 1898

B.B. Crowninshield, Designer 1867–1948

The Crowninshields of Salem, Massachusetts, were well established among the country's pre-eminent families of merchant-ship owners and captains involved in the East India trade. Besides the famous privateer *America* commissioned by George Crowninshield during the war of 1812, two other vessels owned by the family are sometimes mentioned as the first recorded yachts in America. George Crowninshield Jr., great-uncle of the designer, had the 36' sloop *Jefferson* built as a yacht in Salem in 1801, and in 1816 replaced her with the 83' LWL hermaphrodite brig *Cleopatra's Barge*, also built in Salem to his own design. In 1817 Crowninshield cruised *Cleopatra's Barge* to Europe, where her bright stripes and herringbone-pattern paint job must have caused quite a stir. Captain George's brother Benjamin William Crowninshield – the future great-grandfather of renowned sailor Charles Francis Adams – was the first US Secretary of the Navy, 1815–18.

Bowdoin Bradlee Crowninshield was born in 1867 in New York City, the son of Benjamin W. Crowninshield. The family moved to Marblehead on the North Shore of Massachusetts Bay in 1874. 'Bowdie' and his brother Francis ('Frank') grew up sailing small craft – dories and catboats – and were very successful at racing. He studied for a year at MIT before moving on to Harvard from where he graduated in 1890. He established several real-estate businesses in Montana and Massachusetts, an occupation he apparently continued alongside his career as a designer,

builder, broker, insurer, and property manager.

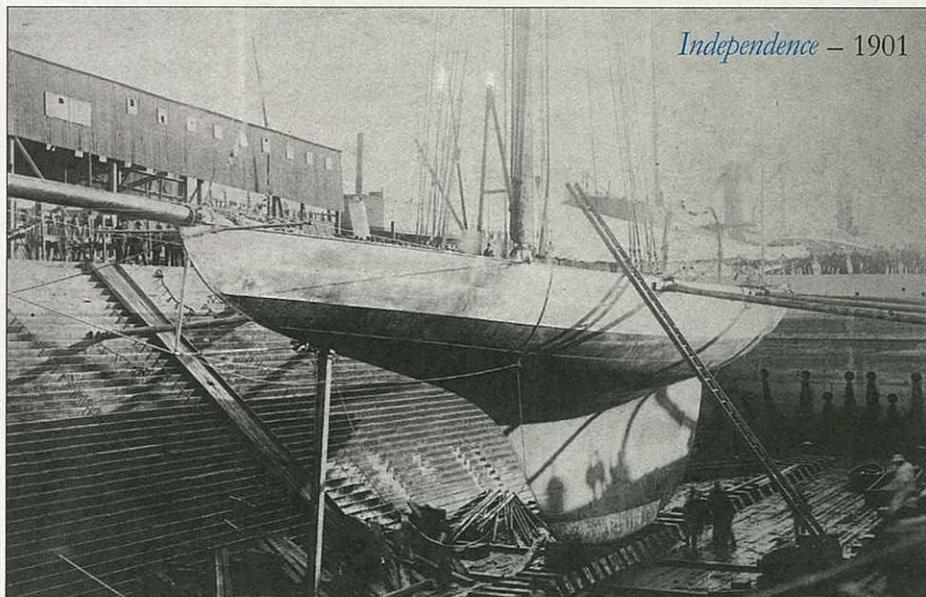
In 1896 Crowninshield went to work for John R. Purdon, a Boston-based yacht designer and builder, as a draughtsman. After just one year he started his own practice as a naval architect and yacht broker with a partner, Frank Tandy, in January 1897. Although it is difficult to keep accurate track of Crowninshield's partnership history, it seems that Ralph N. Burbank was his top draughtsman and his most important partner. Other naval architects including John G. Alden (1902–09) and Edwin

A. Boardman – father of the Northeast Harbor A, a design quite similar to the Camden class sloop – worked in the Crowninshield office before setting up on their own.

Bowdoin Crowninshield was immediately successful with his designs for the knockabout type. In 1898 he designed *Mongoose*, later mentioned in *The Yachting World* as 'the best 21' knockabout of the season'; he raced her himself in every possible club and open race. A young, but shrewd, businessman, Crowninshield knew that the best publicity he could give his work was on the water; he continued to race even after his reputation had been firmly established. In 1899 Bowdie and Frank won the championships of the Massachusetts Yacht Racing Association and the Marblehead Corinthian Yacht Club with a new raceabout, *Pirate*, designed by Crowninshield and built by James E. Graves of Marblehead.⁽¹⁾ *Pirate* was such a success that for a while she became something of a mascot for Crowninshield – her name was used as a telephone code for his design office. In a reciprocal deal, she was also featured in the printed advertisement for Marblehead sail-makers Wilson & Silsby (future suppliers for the Camden Class sloops and many other Crowninshield designs) for more than six issues of *The Rudder* in 1900.

When financier Thomas W. Lawson chose Crowninshield to design the *America's Cup*

(1) Crowninshield's name appears several times as a customer in the book of orders preserved at the Philips Library in Salem, Massachusetts. Amongst other of his personal boats, both *Pirate* and the 36' schooner *Jean* were built by James E. Graves of Marblehead, the latter meeting such requirements as: '1) The biggest boat that I could comfortably handle alone; 2) One that would lie quietly at the mooring with sails up; 3) A strong, tight and comfortable boat in a seaway; 4) She must be inexpensive.'



Independence – 1901

contender, *Independence*, in 1901, the thirty-four-year-old's biggest project to that date had been a 70' cruising schooner. Lawson gave him total freedom to design a yacht capable of beating Nathanael Herreshoff's Cup boats, *Columbia* and *Constitution*. Writing of Crowninshield's *Independence* – the largest fin-keel scow-type yacht ever built: 140'10" LOA, 90' LWL – Howard Chapelle said 'although a brute of a boat she was very fast under certain conditions'. She had numerous innovations but also many faults and experienced a series of setbacks – from a broken topmast to leaking between the hull and fin – and failed to win the coveted role of Cup Defender.

The disappointment of *Independence* did not slow Crowninshield; he continued producing myriad designs for diverse purposes and environments. His scrapbook, preserved at the Phillips Library in Salem, Massachusetts, features, among others, the two knockabouts *Friskey* and *Smart* designed in 1902 for the Saint Petersburg Yacht Club in Florida; the *Martha*, a centreboard schooner built in San Francisco in 1906; (2) and another schooner built in Honolulu for the Hawaii Yacht Club. The schooner *Adventuress* (3) was built in San Francisco in 1913, and another schooner was launched that year in Savannah, Georgia. He also produced many vessels for commercial fishing including a series of schooners for the Gulf of Mexico red snapper fishery. In February 1906 he was aboard the 80' schooner *Tartar* (which he had designed), for a fishing trip to Georges Bank (after a week she returned with 60,000 haddock, just enough to pay for the expenses). According to Chapelle, Crowninshield produced seventeen fishing schooner designs from which at least thirty vessels were built for Boston owners as well as for the Canadian fisheries. His first such design of 1900, the 110' *Rob Roy*, reveals the characteristics that would be honed in his subsequent schooners, including *Tartar*, *Harmony*, and *Fame* (owned by the Eastern Fishing Company controlled by Crowninshield), *Hope* and *Stranger*. Chapelle's description of Crowninshield's working vessels could also pertain to his yachts: 'short, straight keels with marked drag; long, light counters; and long forward overhangs'.(4)

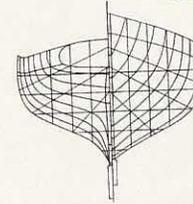
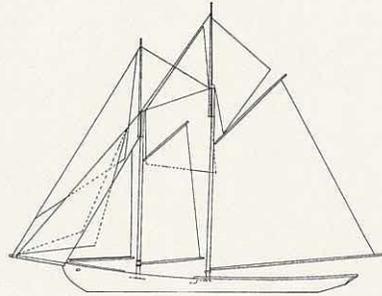
He also designed many coasting schooners and long-distance freighters, some of them highly innovative, like the two steel three-masted schooners *Mexico* and *Laguna* built in 1904 in Frederickstad, Norway, for a Texan owner of Scandinavian origin. Probably built for the oil trade, these 181' (160' LWL) schooners were fitted with centreboards, double bottoms, and had water ballast. The famous 395' *Thomas W. Lawson* – the only seven-masted

(2) The *Martha* is currently available for charter from the West Coast.

(3) *Adventuress* was first commissioned as a yacht for Arctic hunting, but was soon sold to the San Francisco pilots who kept her until 1950. She currently belongs to an educational organization in Port Townsend, WA.

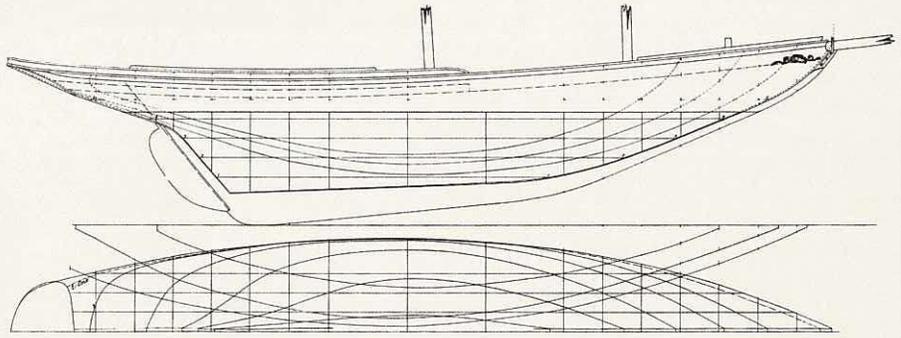
(4) *The American Fishing Schooners*, p.245.

Stranger – 1903



Fishing Schooner
Designed by B.B. Crowninshield, 1903
LOA 73'6"
Beam 19'4"
Draught 8'10"

Emelia Gloria and *Virginia Lyons* were also built to these lines and were launched in the same year. All three were built by the Oxner and Story shipyard in Essex, Massachusetts.



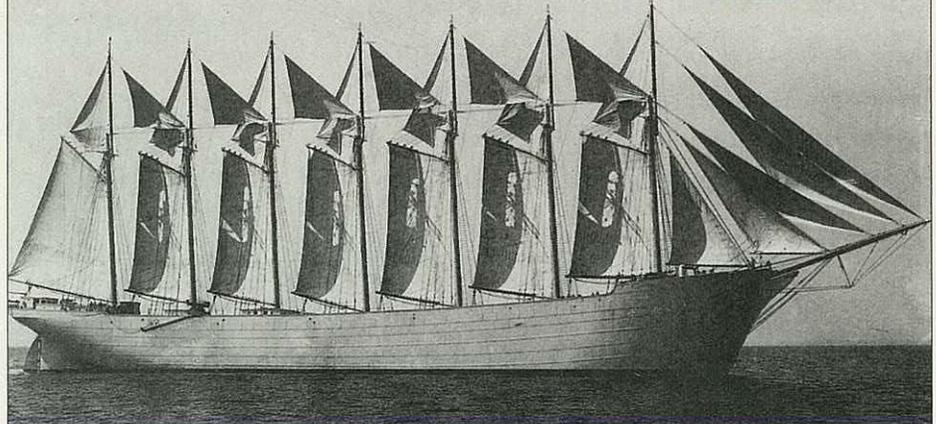
launched *Luther Little II* in 1917; they also began construction of another four-masted coal schooner for Roger & Webb of Boston, the *Hesper*, designed by yard foreman E.J. Blinn.(5) (*Luther Little II* and the *Hesper* were reunited at the end of their careers – on the beach at Wiscasset, Maine, where they became landmarks as they slowly deteriorated before being broken up in the 1990s.)

In January 1926 Crowninshield resumed his design practice, this time in partnership with R.N. Burbank. In 1943 he was appointed Inspector of Hulls Building for the US Navy at Manchester, Ipswich, and Amesbury, Massachusetts. His book *Fore-and-Afters* was published in 1940, comprising

a selection of lines drawings by the author and other architects as well as Crowninshield's technical and historical comments on fore-and-aft rigged boats. In the 1970s Sturgis Haskins wrote that Crowninshield never shied away from experimentation, that he would always question his failures and modify his plans in search of the best results. His record books contain notes written in the margins of most designs, that comment on the boats' performances or problems long after launching. B.B. Crowninshield died in 1948.

(5) According to B.B. Crowninshield himself, in *Fore-and-Afters*.

Thomas W. Lawson – 1902



Camden Class Sloop Rebirth

Based in Lausanne, Switzerland, where he worked as a commercial photographer for thirteen years, Alexandre Genoud came across wooden boats some ten years ago during a trip to Brittany – the western tip of France sometimes referred to as ‘France’s Maine’ in the world of wooden boats. ‘I’ve always sailed and raced modern boats on Lake Geneva, but in Brittany I was somehow smitten by my exposure to traditional wooden boats. I immediately bought Xavier Buhot-Launay’s book *Construire un bateau en bois* (*Build A Wooden Boat*) and took some time out from my photography shop to build the small daysailer that he describes in it.’

Emile, as that little sloop was called, was an epiphany for Alexandre. His humorous tone becomes more serious as he describes the emotions: ‘I experienced something that truly touched me, so much so that I applied to the International Boatbuilding Training School in Lowestoft, England. I realize I was probably at a time in my life when I needed to turn a page. My photography business was successful, but my heart was no longer in it, whereas building *Emile* had gratified both my soul and my hands...’

In 1997, at the age of thirty-five, Alexandre sold his business and moved to England. After a thirty-month training course he returned home to work with Rolle boatbuilder Jean-Philippe Mayerat. Later his new trade called him back to France where he joined the restoration team working on a 6-Metre yacht, *Musette*, at Chantier du Guip in Iles-aux-Moines, south Brittany. But soon he was longing for his own project, something he could work through from start to finish as the only way to learn. ‘Maybe it was because of my age: at twenty it seems natural to



Alexandre Genoud and Anne Renault aboard *Merlin*, the Camden Class sloop built by Alexandre and launched in 2003.

be trained and to learn from others. At forty you want to be in charge!’

Thus he started searching for a design for single-handed or family sailing, a boat that would be lively and fun but not too tricky to handle. ‘I was not looking for an old design just for the sake of it. I wanted a boat whose aesthetics and sailing abilities would touch me,’ he says. He studied a large number of designs during his search. He first explored the closest available options – plans of yachts that had raced on the lake in the late 1880s under the French ‘Godinet’ rating rule adopted by the Yacht Club of Geneva.⁽⁴⁾ The designs of Gustave Caillebotte, a French Impressionist painter and naval architect involved in the Cercle de la Voile de Paris, also caught his eye, as did Uffa Fox’s 22-sq.m *Vigilant*. ‘Then one fine day I came across the Camden Class sloop in one of the books of plans published by WoodenBoat in Maine. I immediately knew she was the boat I was

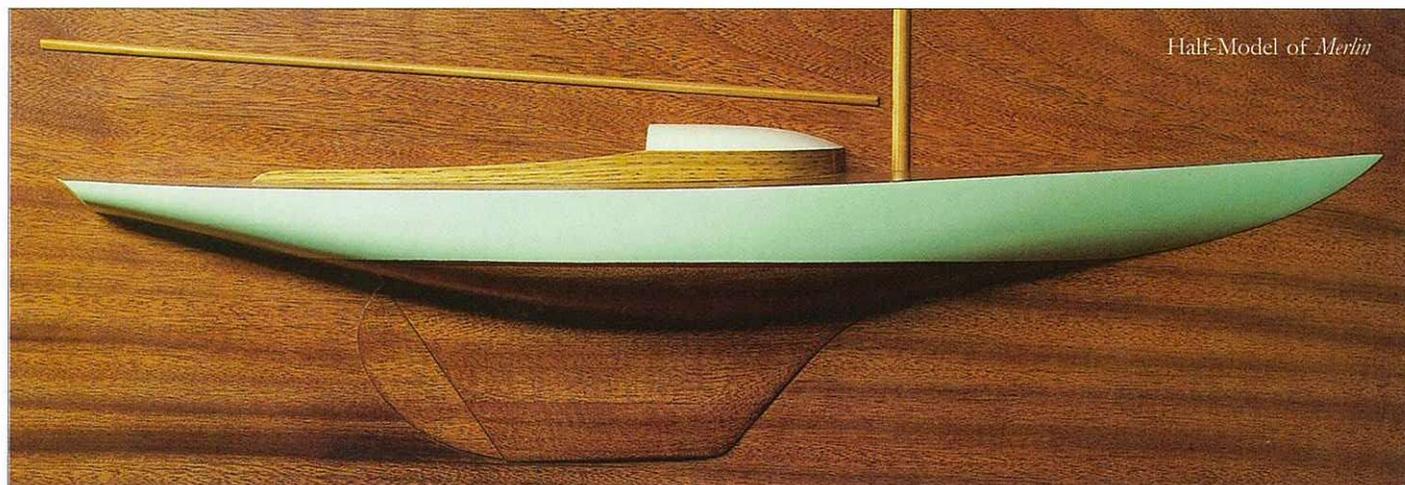
looking for. There was something straightforward about her, but she was also attractive.’ His friend, Hubert Detrey, was also drawn to the Camden and joined the project as co-owner: he would pay for the materials while Alexandre put in the labour and invested in the shop. Without delay they ordered a set of the Camden’s plans (lines, construction plan, sail plan, and table of offsets) from WoodenBoat.

Alexandre began by building a half model in order to visualize the shape, and to explore the challenges he would meet during the full-size construction. He also set up shop in a country barn twenty minutes from Lausanne. ‘I used the money from the sale of my [photographic] business. It took two months to turn that barn into a boatshop, from installing insulation and electricity, to setting up pieces of equipment like a thickness planer and a jointer. In my view, it was an important part of the learning process. Sure, I could have built the boat for less in my backyard, but creating my own shop [established the whole thing as] a real, professional project.’ As for Hubert, he sold his 24’ sailing boat in order to buy the wood.

The Design Consultation

Alexandre contacted naval architects Herskovitz & Thômé before he started the lofting. ‘I needed some technical back-up because we then had very little information on the class. Most of all, I questioned

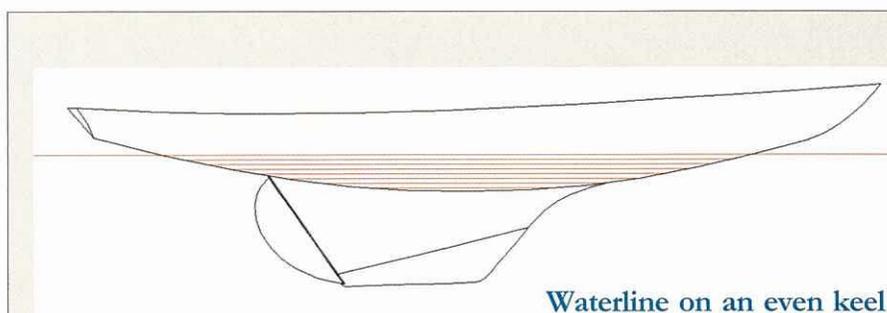
⁽⁴⁾ The International Rule, which produced boats ill-adapted to the sailing conditions of Lake Geneva, was not introduced in Switzerland for several decades, and probably only came in when new materials and design standards gradually spread and allowed the production of lighter boats.



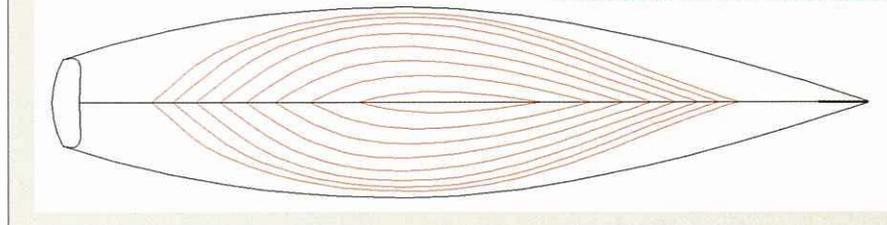
them about some modifications that I wished to introduce to the original specifications. And I wanted them to look into the types of woods that could be used in place of those specified on the construction plan; woods that would not increase the weight too much – I could not afford to risk the possibility of launching a boat that would not float to her lines...’ The construction plan specified white cedar planking, which was common in New England in the 1910s but is almost impossible to find in Europe today. Rather than import cedar at high cost, Alexandre first tried to substitute a local species, but could never find the quality he needed. ‘Eventually, I came across a fine 33’ log of sipo [*Entandrophragma utile* – a West African hardwood similar to mahogany] from which I could cut some full-length planks. I hated supporting the destruction of the rainforests, but I had to go with it... For the steam-bent frames, I chose locust [*Robinia pseudoacacia*], a widespread timber commonly used in Europe for just that purpose, and which bends more easily than oak.’ Herskovitz & Thômé supported both substitutions and suggested that the sipo planking thickness could be 1/2”.

Philippe Thômé also approved the choice of laminated sipo for the keel (Alexandre could not find oak of appropriate dimensions), and backed the idea of rabbeting the keel timber – a feature not shown on the original construction plan. Also, Crowninshield had adopted the widespread knockabout technique of running each frame across the top of the keel timber in one continuous piece from rail to rail. ‘I did not trust this choice from a structural point of view, nor did I want water to be trapped between the frames where it might cause rot. We also agreed on putting five floor timbers, instead of just two, forward of the maststep.’

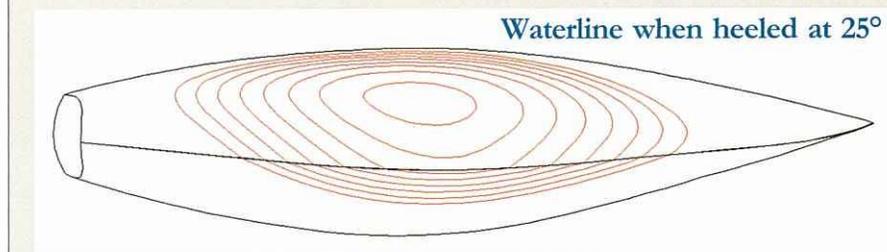
Finally, the architects compared the calculated total weight of Alexandre’s future Camden Class sloop with that of the original. With a displacement of 3,633lb *Merlin* would outweigh her ancestors – but by only 53lb, according to Crowninshield’s calculations. The centre of gravity would shift just 1/8” forward and 1/4” upward, resulting in only 1/2” more freeboard at the transom. Herskovitz & Thômé predicted that these differences would be the equivalent of a 2” shift of the crew in the cockpit and concluded: ‘none of the modifications introduced by Alexandre would negatively affect the structural strength of the boat.’



Waterline on an even keel



Waterline when heeled at 25°



Waterline at speed

The Advantage of Overhangs

Nowadays we are familiar with hulls that have short or no overhangs, but the Camden’s bow and counter are just the opposite: they are extremely long – equal to 39% of her 28’3” overall length. Waterline length is 17’.

Crowninshield would have wanted a minimal wetted surface for light winds, while the long overhangs added to the waterline length when heeled to allow greater speed as the breeze increased. What slows a boat’s hull speed is a combination of frictional resistance (depending on speed and wetted surface among other things) and wave resistance (determined by speed and waterline length). A reduced wetted surface will help the boat go in light airs, and a long waterline will allow greater top speed in most displacement hulls.

When the Camden heels, her wetted surface is even smaller than when she’s upright, but her waterline is longer. At 6 knots, the waterline stretches to 21’6” – a generous increase for a boat this size. In addition, the Camden’s long overhangs and short keel have other advantages: she spins easily and precisely even at low speed; she hardly pitches at all in a sea... and nothing compares to her elegance!

Herskovitz, Thômé and Thobie,
Naval Architects

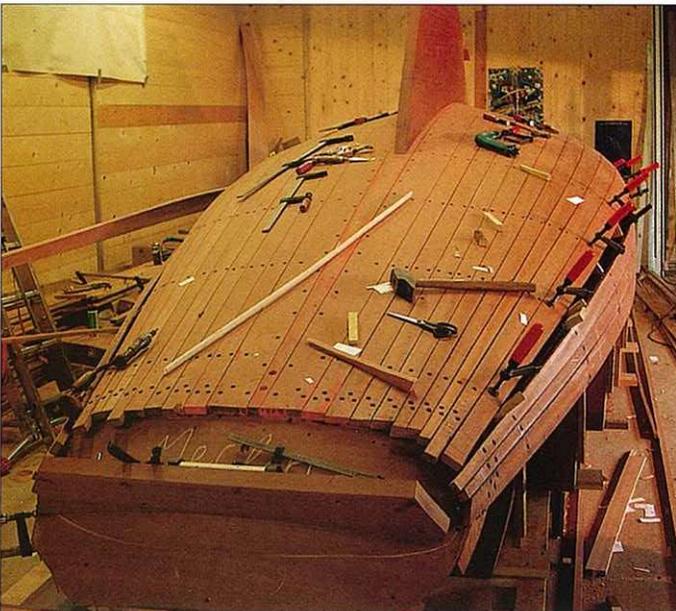


Alexandre chose to build *Merlin* upside down on a jig in Nathanael Herreshoff's preferred method for small-boat construction. Moulds were placed at every third frame; here the keel has been built and the planking is in the early stages.

2,500 Man-Hours

Alexandre finished lofting in February 2002. Although it had been suggested that the original Camdens might have been built right side up, he elected to build his upside down over a jig – much as the Herreshoff Manufacturing Company had built most of its boats. Besides being curious about the method, he believed it would probably make the process of planking up easier for one man working alone and, last but not least, the time invested in building a jig for *Merlin* could save labour in subsequent orders. Unlike Herreshoff, who usually set up a mould for each frame, Alexandre positioned one every three frames – a total of sixteen moulds. The remaining frames were bent and fitted after the hull was planked and turned right side up.

Rather than building a plank-on-frame transom with the hull planking mitred to it, Alexandre chose to construct the transom in three glued-together layers and to fasten the planks to it – a less fancy technique than the original, but less delicate to build and easier to caulk. Another difference was to nib the forward ends of the planking into the stem rabbet. This would leave sufficient wood for the hood-end fastenings, which would otherwise be confined by the feather ends created by the delicate bow. (It is interesting to note that all of Alexandre's construction choices had to do with the longevity he expected for his boat. Back in the 1910s when knockabouts were all the rage, owners were more inclined to change their boat for a newer model and, because performance was an issue, longevity would have taken a back seat.)



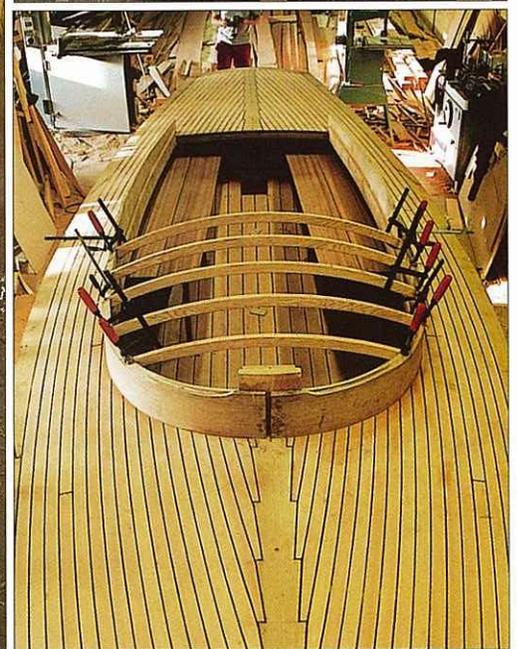
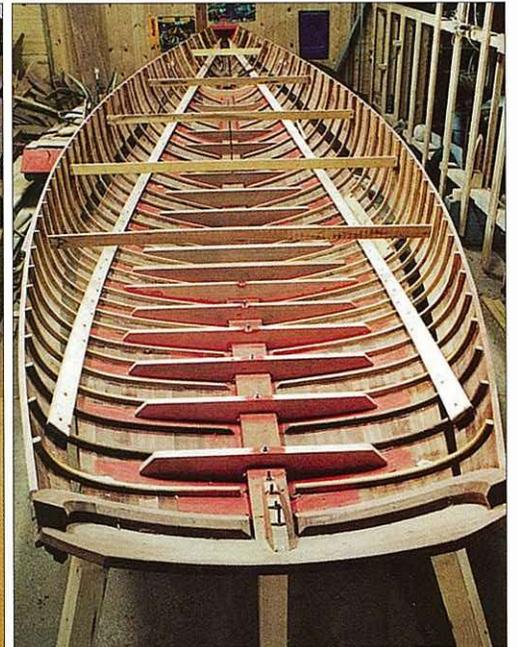
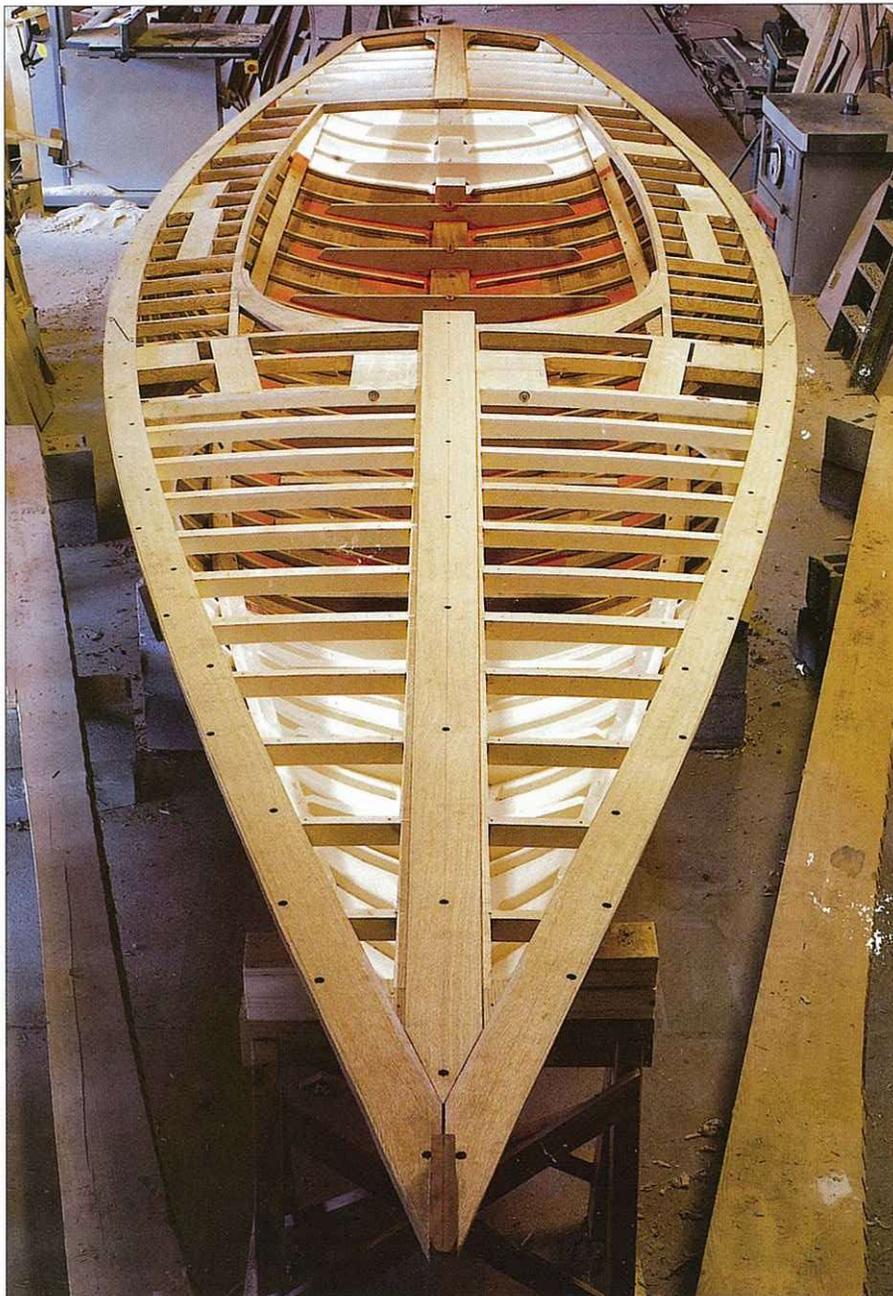
Just before the shutter planks were fitted, the hull was removed from the jig and turned right side up. Then the remaining frames were fitted and the floor timbers – separate from the frames – were bolted to the keel. The last two planks were then through-fastened from beneath. Alexandre riveted the clamp and the bilge stringer to the frames and planking before the deck was laid.

For the deck, he again decided to add strength and stiffness, but this time choosing the correct course was not easy. As he explains, ‘Crownshield’s clamp ran lower than mine did, and the deck

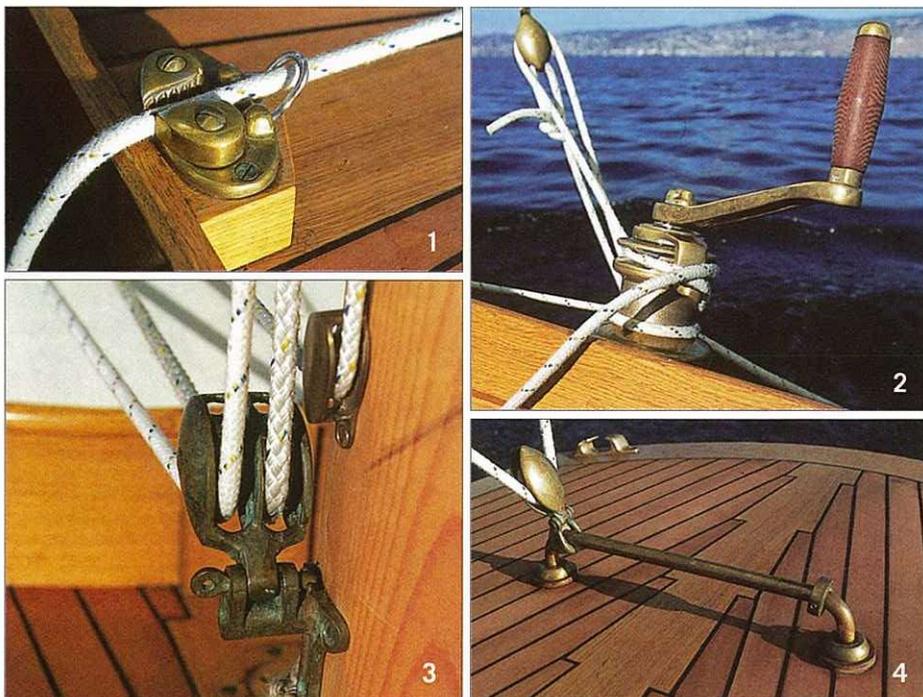
beams were simply fastened over it, with the deck itself stiffening the whole thing. I chose to dovetail the beams to the clamp. Also, the original plan pictured the cockpit coamings being screwed to the deck from below; I added carlins on which the side decks are fastened, and there is a stanchion beneath the coamings’. Except in areas where more strength is needed (ie in way of the mast partner and traveller) where they are of oak, the deckbeams are of Douglas-fir.

Although the Camden originally had a canvassed deck (about which Alexandre was very enthusiastic for many reasons –

including ease of construction), Hubert wanted a laid deck, a choice he now admits was not really appropriate. Once again, Alexandre was reluctant to use teak, but had almost conceded to it when Philippe Thômé suggested Douglas-fir. Fatigued by the uniform choices made in modern classic-yachting circles, where the mainstream swears by varnished mahogany, scrubbed teak, and polished bronze, Alexandre gratefully embraced the advice. ‘The heritage of yachting is so rich with diversity and creativity that it would be a shame to cut it down to a postage stamp. Plus, it’s the lines that give a boat her



The hull was turned right-side up when all but the shutter planks had been fitted. The interior framework is complete and the deck structure is also finished – ready for the deck planks to be laid. The quality of construction is clearly evident from these pictures.



1. The mainsheet leads to a cam cleat mounted on the sterndeck, against the aft side of the cockpit coaming. 2. The self-tailing jib-sheet winches can be operated one-handed by the helmsman who need never release the tiller to trim sail. 3. The halyards lead through bronze blocks at the bottom of the mast and thence to cleats on the coachroof. 4. The bronze mainsheet horse is through-fastened to the keel timber, making it very strong and preventing possible distortion to the long counter.

beauty.’ Thus he also went with oak for the covering boards, kingplank, and coamings. The oiled decks and bright trim enhance the distinctiveness of *Merlin*, as do her unusual, light-green topsides. The colour was chosen long before the keel was laid, back when Alexandre made the half model. The combination of the fresh, sparkling green topsides and the red boot top above the bronze bottom, turns many a head and elicits generous acclaim.

While Alexandre built the sitka-spruce spars, his girlfriend, Anne Renault, worked on the upholstery for the cabin’s two bunks. A traditional sailmaker in France, Anne launched herself into the project at an early stage and added boat carpentry to her already numerous skills. She also helped to finish off the rigging. A local sail loft made the sails to Alexandre’s specifications: half-width synthetic cloth in a soft off-white. ‘I planned to keep the 280sq.ft main and the 97sq.ft jib, but I wanted the latter to be overlapping rather than self-tacking, so it ended up slightly larger than the original. I also ordered a 538sq.ft spinaker to replace the balloon jib.’

The blocks were of bronze, cast to Herreshoff patterns by Jim Reineck of Hull, Massachusetts. Most of the other hardware came from Classic Marine in Woodbridge, England, but some pieces were made by the French ship-chandler

Lignes d’Eau and by the Nivet Foundry also in France – the latter firm making the chainplates and mast partner in cupronickel (a high-strength alloy of copper and bronze).

Merlin was launched and christened in the picturesque harbour of Lutry, Switzerland, in September 2003, with about 100 people cheering her on. Among them was Kurt Kirsch, the retired boat-builder who had assisted Alexandre with generous and helpful advice during the construction.

At project’s end Alexandre enjoyed the luxury of looking back: ‘I learned a lot during the process. First, what you decide to do at any given time will always pay back later... I lost some time trying to perfect parts that did not need it – like precisely lining up the floor timbers, which was unnecessary as they are now hidden beneath the floorboards.’ But, all things considered, there’s nothing I am embarrassed about; which, by the way, does not mean that everything is perfect!’

It was during the building of *Merlin* that Bruce Malone’s Camden was discovered by Roland Fasbender in Maine (see p.16) – Roland had worked with Alexandre for three months at the beginning of *Merlin*’s construction. When he examined *Gone Away* he discovered that Alexandre’s build modifications had been well founded. The old Camden was fastened

with bronze screws rather than rivets, which might confirm that Hodgdon built her upside down – not surprising if one remembers that at least two of the Hodgdon brothers had trained at the Herreshoff yard in Bristol, Rhode Island. Also, *Gone Away* had been given extra floor timbers forward of the mast, and her keel had been rabbeted. But her hood-ends were feathered (not nibbed as were *Merlin*’s) and they had split. Finally, the coamings of both boats were of similar construction. *Gone Away* was discovered just in time to have accurate reproductions of the hardware made.

As she sailed the lake and dealt elegantly with its tricky weather conditions, *Merlin* proved extremely seaworthy. During trials in the autumn of 2003 I experienced first-hand her stiffness, her speed in calm water, and her stability downwind. The cockpit is comfortable and large enough for three or four, but as Anne Wyman (member of the Cabot family, see p.16) recalls, the knock-about is also very easy for one person to handle as everything is within reach of the helm. Wisely, Alexandre did not alter the deck plan, except to add a winch for the genoa sheets.

Shortly after launching, Alexandre Genoud and Anne Renault went for a week-long ‘show-off’ cruise on the lake and *Merlin* drew admirers wherever she went. Later, in the autumn, at the Grand Pavois de La Rochelle in France – a show that attracts many traditional boats – visitors voted *Merlin* ‘Best in Show’. It was a fine accolade for a new boatbuilder and an old designer – the Camden knock-about was, and is, a gem of a boat. ■

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Florence Sauerbrey is a regular contributor to *Le Chasse-Marée* and *Maritime Life and Traditions*. Gwendal Jaffry is a staff-writer with *Maritime*’s French sister magazine, *Le Chasse Marée*.

Alexandre Genoud <agenoud@worldcom.ch>

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