## CHAPTER XI

The islanders at Juan Fernandez entertained with Yankee doughnuts--The beauties of Robinson Crusoe's realm--The mountain monument to Alexander Selkirk--Robinson Crusoe's cave--A stroll with the children of the island--Westward ho! with a friendly gale--A month's free sailing with the Southern Cross and the sun for guides--Sighting the Marquesas--Experience in reckoning.

The Spray being secured, the islanders returned to the coffee and doughnuts, and I was more than flattered when they did not slight my buns, as the professor had done in the Strait of Magellan. Between buns and doughnuts there was little difference except in name. Both had been fried in tallow, which was the strong point in both, for there was nothing on the island fatter than a goat, and a goat is but a lean beast, to make the best of it. So with a view to business I hooked my steelyards to the boom at once, ready to weigh out tallow, there being no customs officer to say, "Why do you do so?" and before the sun went down the islanders had learned the art of making buns and doughnuts. I did not charge a high price for what I sold, but the ancient and curious coins I got in payment, some of them from the wreck of a galleon sunk in the bay no one knows when, I sold afterward to antiquarians for more than face-value. In this way I made a reasonable profit. I brought away money of all denominations from the island, and nearly all there was, so far as I could find out.

Juan Fernandez, as a place of call, is a lovely spot. The hills are well wooded, the valleys fertile, and pouring down through many ravines are streams of pure water. There are no serpents on the island, and no wild beasts other than pigs and goats, of which I saw a number, with possibly a dog or two. The people lived without the use of rum or beer of any sort. There was not a police officer or a lawyer among them. The domestic economy of the island was simplicity itself. The fashions of Paris did not affect the inhabitants; each dressed according to his own taste. Although there was no doctor, the people were all healthy, and the children were all beautiful. There were about forty-five souls on the island all told. The adults were mostly from the mainland of South America. One lady there, from Chile, who made a flying-jib for the Spray , taking her pay in tallow, would be called a belle at Newport. Blessed island of Juan Fernandez! Why Alexander Selkirk ever left you was more than I could make out.

A large ship which had arrived some time before, on fire, had been stranded at the head of the bay, and as the sea smashed her to pieces on the rocks, after the fire was drowned, the islanders picked up the timbers and utilized them in the construction of houses, which naturally presented a ship-like appearance. The house of the king of Juan Fernandez, Manuel Carroza by name, besides resembling the ark, wore a polished brass knocker on its only door, which was painted green. In front of this gorgeous entrance was a flag-mast all ataunto, and near it a smart whale-boat painted red and blue, the delight of the king's old age.

I of course made a pilgrimage to the old lookout place at the top of the mountain, where Selkirk spent many days peering into the distance for the ship which came at last. From a tablet fixed into the face of the rock I copied these words, inscribed in Arabic capitals:

## IN MEMORY OF ALEXANDER SELKIRK, MARINER,

A native of Largo, in the county of Fife, Scotland, who lived on this island in complete solitude for four years and four months. He was landed from the Cinque Ports galley, 96 tons, 18 guns, A. D. 1704, and was taken off in the Duke , privateer, 12th February, 1709. He died Lieutenant of H. M. S. Weymouth , A. D. 1723, [FOOTNOTE: Mr. J. Cuthbert Hadden, in the "Century Magazine" for July, 1899, shows that the tablet is in error as to Selkirk's death. It should be 1721] aged 47. This tablet is erected near Selkirk's lookout, by Commodore Powell and the officers of H. M. S. Topaze , A. D. 1868.

The cave in which Selkirk dwelt while on the island is at the head of the bay now called Robinson Crusoe Bay. It is around a bold headland west of the present anchorage and landing. Ships have anchored there, but it affords a very indifferent berth. Both of these anchorages are exposed to north winds, which, however, do not reach home with much violence. The holding-ground being good in the first-named bay to the eastward, the anchorage there may be considered safe, although the undertow at times makes it wild riding.

I visited Robinson Crusoe Bay in a boat, and with some difficulty landed through the surf near the cave, which I entered. I found it dry and inhabitable. It is located in a beautiful nook sheltered by high mountains from all the severe storms that sweep over the island, which are not many; for it lies near the limits of the trade-wind regions, being in latitude 35 1/2 degrees. The island is about fourteen miles in length, east and west, and eight miles in width; its height is over three thousand feet. Its distance from Chile, to which country it belongs, is about three hundred and forty miles.

Juan Fernandez was once a convict station. A number of caves in which the prisoners were kept, damp, unwholesome dens, are no longer in use, and no more prisoners are sent to the island.

The pleasantest day I spent on the island, if not the pleasantest on my whole voyage, was my last day on shore,--but by no means because it was the last,--when the children of the little community, one and all, went out with me to gather wild fruits for the voyage. We found quinces, peaches, and figs, and the children gathered a basket of each. It takes very little to please children, and these little ones, never hearing a word in their lives except Spanish, made the hills ring with mirth at the sound of words in English. They asked me the names of all manner of things on the island. We came to a wild fig-tree loaded with fruit, of which I gave them the English name. "Figgies, figgies!" they cried, while they picked till their baskets were full. But when I told them that the cabra they pointed out was only a goat, they screamed with laughter, and rolled on the grass in wild delight to think that a man had come to their island who would call a cabra a goat.

The first child born on Juan Fernandez, I was told, had become a beautiful woman and was now a mother. Manuel Carroza and the good soul who followed him here from Brazil had laid away their only child, a girl, at the age of seven, in the little churchyard on the point. In the same half-acre were other mounds among the rough lava rocks, some marking the burial-place of native-born children, some the resting-places of seamen from passing ships, landed here to end days of sickness and get into a sailors' heaven.

The greatest drawback I saw in the island was the want of a school. A class there would necessarily be small, but to some kind soul who loved teaching and quietude life on Juan Fernandez would, for a limited time, be one of delight.

On the morning of May 5, 1896, I sailed from Juan Fernandez, having feasted on many things, but on nothing sweeter than the adventure itself of a visit to the home and to the very cave of Robinson Crusoe. From the island the Spray bore away to the north, passing the island of St. Felix before she gained the trade-winds, which seemed slow in reaching their limits.

If the trades were tardy, however, when they did come they came with a bang, and made up for lost time; and the Spray, under reefs, sometimes one, sometimes two, flew before a gale for a great many days, with a bone in her mouth, toward the Marquesas, in the west, which, she made on the forty-third day out, and still kept on sailing. My time was all taken up those days--not by standing at the helm; no man, I think, could stand or sit and steer a vessel round the world: I did better than that; for I sat and read my books, mended my clothes, or cooked my meals and ate them in peace. I had already found that it was not good to be alone, and so I made companionship with what there was around me, sometimes with the universe and sometimes with my own insignificant self; but my books were always my friends, let fail all else. Nothing could be easier or more restful than my voyage in the trade-winds.

I sailed with a free wind day after day, marking the position of my ship on the chart with considerable precision; but this was done by intuition, I think, more than by slavish calculations. For one whole month my vessel held her course true; I had not, the while, so much as a light in the binnacle. The Southern Cross I saw every night abeam. The sun every morning came up astern; every evening it went down ahead. I wished for no other compass to guide me, for these were true. If I doubted my reckoning after a long time at sea I verified it by reading the clock aloft made by the Great Architect, and it was right. There was no denying that the comical side of the strange life appeared. I awoke, sometimes, to find the sun already shining into my cabin. I heard water rushing by, with only a thin plank between me and the depths, and I said, "How is this?" But it was all right; it was my ship on her course, sailing as no other ship had ever sailed before in the world. The rushing water along her side told me that she was sailing at full speed. I knew that no human hand was at the helm; I knew that all was well with "the hands" forward, and that there was no mutiny on board.

The phenomena of ocean meteorology were interesting studies even here in the trade-winds. I observed that about every seven days the wind freshened and drew several points farther than usual from the direction of the pole; that is, it went round from east-southeast to south-southeast, while at the same time a heavy swell rolled up from the southwest. All this indicated that gales were going on in the anti-trades. The wind then hauled day after day as it moderated, till it stood again at the normal point, east-southeast. This is more or less the constant state of the winter trades in latitude 12 degrees S., where I "ran down the longitude" for weeks. The sun, we all know, is the creator of the trade-winds and of the wind system over all the earth. But ocean meteorology is, I think, the most fascinating of all. From Juan Fernandez to the Marguesas I experienced six changes of these great palpitations of sea-winds and of the sea itself, the effect of far-off gales. To know the laws that govern the winds, and to know that you know them, will give you an easy mind on your voyage round the world; otherwise you may tremble at the appearance of every cloud. What is true of this in the trade-winds is much more so in the variables, where changes run more to extremes.

To cross the Pacific Ocean, even under the most favorable circumstances, brings you for many days close to nature, and you realize the vastness of the sea. Slowly but surely the mark of my little ship's course on the track-chart reached out on the ocean and across it, while at her utmost speed she marked with her keel still slowly the sea that carried her. On the forty-third day from land,--a long time to be at sea alone,--the sky being beautifully clear and the moon being "in distance" with the sun, I threw up my sextant for sights. I found from the result of three observations, after long wrestling with lunar tables, that her longitude by observation agreed within five miles of that by dead-reckoning.

This was wonderful; both, however, might be in error, but somehow I felt confident that both were nearly true, and that in a few hours more I should see land; and so it happened, for then I made the island of Nukahiva, the southernmost of the Marquesas group, clear-cut and lofty. The verified longitude when abreast was somewhere between the two reckonings; this was extraordinary. All navigators will tell you that from one day to another a ship may lose or gain more than five miles in her sailing-account, and again, in the matter of lunars, even expert lunarians are considered as doing clever work when they average within eight miles of the truth.

I hope I am making it clear that I do not lay claim to cleverness or to slavish calculations in my reckonings. I think I have already stated that I kept my longitude, at least, mostly by intuition. A rotator log always towed astern, but so much has to be allowed for currents and for drift, which the log never shows, that it is only an approximation, after all, to be corrected by one's own judgment from data of a thousand voyages; and even then the master of the ship, if he be wise, cries out for the lead and the lookout.

Unique was my experience in nautical astronomy from the deck of the Spray -- so much so that I feel justified in briefly telling it here. The first set of sights, just spoken of, put her many hundred miles west of my reckoning by account. I knew that this could not be correct. In about an hour's time I took another set of observations with the utmost care; the mean result of these was about the same as that of the first set. I asked myself why, with my boasted self-dependence, I had not done at least better than this. Then I went in search of a discrepancy in the tables, and I found it. In the tables I found that the column of figures from which I had got an important logarithm was in error. It was a matter I could prove beyond a doubt, and it made the difference as already stated. The tables being corrected, I sailed on with self-reliance unshaken, and with my tin clock fast asleep. The result of these observations naturally tickled my vanity, for I knew that it was something to stand on a great ship's deck and with two assistants take lunar observations approximately near the truth. As one of the poorest of American sailors, I was proud of the little achievement alone on the sloop, even by chance though it may have been.

I was en rapport now with my surroundings, and was carried on a vast stream where I felt the buoyancy of His hand who made all the worlds. I realized the mathematical truth of their motions, so well known that astronomers compile tables of their positions through the years and the days, and the minutes of a day, with such precision that one coming along over the sea even five years later may, by their aid, find the standard time of any given meridian on the earth.

To find local time is a simpler matter. The difference between local and standard time is longitude expressed in time--four minutes, we all know, representing one degree. This, briefly, is the principle on which longitude is found independent of chronometers. The work of the lunarian, though seldom practised in these days of chronometers, is beautifully edifying, and there is nothing in the realm of navigation that lifts one's heart up more in adoration.