

the Indian Government their large Hydraulic Lift, capable of docking vessels of any size and draft up to 5,000 tons, they desire to call the attention of Shipowners to the great advantage of this additional docking facility in Bombay, where, owing to the dry climate and cheap labour, such work can be better and less expensively performed than at most home ports.—For further particulars apply to PENINSULAR & ORIENTAL STEAM NAVIGATION COMPANY, LONDON OR BOMBAY."—*Advertisement in Liverpool paper.*

"I have but one opinion regarding the question—which is, that ships of the largest class, loaded with full cargoes can be safely lifted, and transported in the manner proposed without subjecting them to any more strain than they would undergo during a sea passage, and in fact much less fatigue than they would encounter during gales of wind such as ships are at times subjected to in all oceans of the world"—A. K. Miller, of A. K. Miller & Co., New Orleans.

"In reply to your questions, I would state that I was manager and Superintendent of the Marine Railway at Nassau, N. P., Bahamas, for ten years, and during that time—as near as I can remember—I hauled out and repaired between 800 and 900 vessels, about one-third of which were steamers, and perhaps one-fifth of them loaded.

"As we charged so much per ton for cargo on board, as far as practicable the vessels were discharged before being taken out.

"My experience was that it was easier and safer to take out a loaded vessel than one in ballast. The railway was about 800 feet long, and similar in all respects to your model, the principle being the same. There was not one dollar's damage done to any vessel in hauling out while I had charge of the railway."—*Epes Sargent.*

"For nearly fifty years, I have been more or less connected in some manner with Ship Railways; and for many years with all classes of docks and ways, for hauling out and repairing ships, and for about thirty-eight years, have owned a Marine Railway, and we have often taken ships out full of cargo and water. From the information which I have derived from you and your plans, I have no doubt but that your enterprise will be a success; and I trust you will soon have the great pleasure of seeing it in full and complete operation."—*D. D. Kelly, East Boston.*

"A Boat Railway has existed in Cornwall since 1826, and is at this moment, I believe, in full employment. The Bude Canal was designed by Mr. Green, and cost Lord Rolle £128,000. It runs between Bude and Launceston, and is twenty miles long. At Hobbacote Down the canal boats ascend the uplands by an inclined plane 900 feet long, provided with two lines of rails terminating at each end in the canal. The boats are provided with small iron wheels to fit the rails, and are raised by an endless chain, moved by two vast tanks, alternately filled with water and descending into wells 220 feet deep. There are seven of these inclined planes. The canal is situated in a remote and unfrequented part of the country, and is so ingenious that I make no excuse for troubling you with this letter."—*Letter of G. Buckston Brown to Pall Mall Gazette.*

EXAMPLE OF A CANAL BOAT RAILWAY IN THE UNITED STATES.

"If further assurance of the ability of ships to safely endure out-of-water handling were required, it might readily be found in the every-day handling of loaded canal boats at portages. In staunchness a sea-going vessel compares with a canal boat about as a well-made beef barrel does with a cracker box; and the capacity of canal boats to endure railway carriage was amply demonstrated forty years ago on the Portage Railroad of the Allegheny Mountains. To connect the canal systems of Eastern and Western Pennsylvania, a system of gravity railways with ten inclined planes was constructed between Hollidaysburg and Johnstown, thirty miles or more apart 'as a bird flies;' and up and down these steep inclines the large boats of the 'Pioneer Packet Line' made regular trips until the Pennsylvania Railroad was built."—*Scientific American.*