

7. What is their gross tonnage?—They are 2,000-ton boats, and they carry cargo as well as passengers.

8. What would be your view of the tonnage of vessels required to carry on such a service between Wellington and Lyttelton?—If they were carrying 400 or 500 tons of cargo, and passengers and mails as well, boats of 2,000 or 2,500 tons would be quite enough.

9. To stand driving in such weather as you sometimes meet on the trip between here and Lyttelton would you recommend a boat below 2,000 tons?—It is difficult to speak with regard to tonnage, because it is so easy to put on measurement in the way of deck-houses and that sort of thing. Perhaps it would be better to give the length of the steamer that would be required. I should think 300 ft. would be quite short enough to get the speed you want out of her.

10. What would be the tonnage of an ordinary steamer of that length leaving out of consideration deck-houses and extras?—I should say about 1,800 or 2,000 tons.

11. From your knowledge of the prevalent weather between these two ports, do you think that an eighteen-knot boat, builder's guarantee, could be depended on to run sixteen knots in anything except very bad weather?—Oh, yes; I think an eighteen-knot boat, builder's guarantee, would do sixteen knots, unless the weather was too bad to drive her at all.

12. Could you give us your idea of what a boat of that class would cost, say to carry 250 passengers?—Of course, my knowledge is not very great in that matter. It would be very much better got from a London broker. It depends upon the style of the engines, the power required, the finish of the boat, and in a great measure on the state of the labour-market. To build a ship now would cost from 15 to 20 per cent. more than it would have cost twelve months ago. The boat employed in the service you describe would have to be a specially built boat, and you could hardly form an opinion of the cost of such a boat without going into details: the strength of boat you required, and so on. There is nothing varies more in price than ship-building. You could get an old tank-steamer for from £6 to £8 a ton, and you could go as high as £20 or £30 or more for a well-appointed passenger-steamer.

13. Would it surprise you to hear that the Committee have been given evidence that a first-class steamer to run the speed which is in contemplation would cost from £50 to £60 a ton?—Of course, if you are going to be extravagant, and to fit up everything with silver and gold, you can put on what money you like for it; but I should think you could get a good average passenger-steamer for about £30 a ton.

14. Do you know the "Mararoa"?—Yes.

15. Say a steamer with her class of fittings, what would her cost be per ton?—I could scarcely say. She has a single screw.

16. Well, with twin-screws?—That would add about 25 per cent. to the cost of the engines. You would not get the same power out of twin-screws for the same money as from a single screw.

17. Do you know anything of the Channel steamers connecting with the Continent on the one hand and with Ireland on the other?—I do not know the present boats. I used to know the old paddle-steamers, but they have renewed their fleet within the last year. All that I have seen since then have twin screws.

18. You see no difficulty in eighteen-knot builder's speed boats running between Wellington and Lyttelton at sixteen knots?—Oh, no; not a bit.

19. Without any interruption except in extraordinary weather?—Yes. Of course, I presume that the extra two knots would be required at times to make up the sixteen knots, and outside that the weather must be exceptionally rough to prevent it. I should think that two knots reserve would be sufficient.

20. *Mr. Joyce.*] You say you have been running here for twenty-eight years?—Yes.

21. Have you been running in steam for twenty years of that time?—About fifteen or sixteen years.

22. And during those sixteen years, how many times each year have you crossed the Straits between here and Lyttelton?—About six or ten times perhaps. We sometimes run two or three times between those ports on the one voyage.

23. The distance is about 176 miles?—Yes.

24. What has been your experience as to weather in making the passage? Have you found it as severe as on the English coast?—Oh, no; I should say it is very much finer on the New Zealand coast than it is on the English coast.

25. I am speaking of Cook Strait?—Yes; even taking Cook Strait.

26. Then, do you think a sixteen- or eighteen-knot boat would be able to do the passage at any time in the weather that you have experienced during the last sixteen years?—I would not say exactly at any time, because I have experienced very bad weather here, and even, if you had a twenty-four-knot boat, it would not be wise to drive her against such weather. If you were to force her you would be very likely to smash everything and destroy the boat.

27. In such a gale as you have in your mind, what time would such a boat as you have described take to make the passage?—She would very likely have to be brought down to nine or ten knots. Of course, it would be a very exceptional case.

28. The gale of which you speak was a very exceptional one?—Yes.

29. You have not experienced anything like it before?—That was one of the worst I have experienced. Of course, I have met with very bad weather at other times.

30. In weather not so bad but the boat could make her twelve knots?—With a good eighteen-knot boat it would be very bad weather indeed when she could not make her fourteen knots.

31. What is the length of the passage which the special steamers which the P. and O. Company have built to run between Brindisi and Port Said have to make?—I could not tell you from memory. It is two or three days—two days I think, but I would not be certain.

32. Would you recommend twin screws?—Oh, decidedly.