H.-7.

per 1,000 for the only 10 per cent. impregnated ova-for surely ova supplied to the New Zealand Government through the Agent-General would not be supplied from inferior establishments—no stronger argument can be furnished for the absolute necessity of sending Home an expert, with his heart in the work, who, by catching the fish himself and seeing the ova impregnated himself, would not have to depend upon the statements of employés, nor would he, or we, be in doubt as to the margin of time left before hatching-out, as is the case when, as the Agent-General points out, "eyed" ova are supplied. In the end, it seems much cheaper to send Home an expert. Mr. Farr's shipment of 120,000 ova at £600 means £5 per 1,000 ova, while £1 per 1,000 for ova only 10 per cent. impregnated raises the price to £10 per 1,000. And again, it would be just as easy, given the facilities on the other side, to catch and spawn and fertilize 1,000,000 ova as 120,000, and at the same expense, or nearly—that is, if arrangements be made, which should be made, that the expert in charge be allowed to catch the fish himself and spawn the ova himself.

The one great fact to which our experience tends is, that not only is skilled care required on both sides, but also during the voyage a sort of wet-nurse between the two maternal hatching

establishments.

With regard to the shipment of Californian salmon arriving in large parcels at a cost of only £37, we may point out that the voyage is a short one, only some seventeen days, and through a tranquil sea. Different must be the cost and chances of success of a shipment of ova coming through the Atlantic, and the stormy and the Southern Seas, and taking some forty-four days.

We would also point out that, although in 1878 there were 18,000 Californian salmon (Salmo quinnat) turned out into the Pomahaka, 13,000 into the Kakanui, besides other quantities into northern streams, yet during the eight years that have elapsed not one authentic specimen has been seen. It is also stated that, in their own country, these fish are peculiarly liable to die of fungus (Saprolignia ferax) after spawning, and do so in large numbers; and also that they do not give the same sport as the Salmo salar. Therefore, on the grounds of the risk of introducing a species of salmon liable to disease, and of the risk of its interbreeding with and degenerating the Salmo salar, we are of opinion that it is inadvisable to introduce the Salmo quinnat to New Zealand. The ova, however, of the Atlantic and Land-locked salmon, together with the ova of the various kinds of American trout, may be introduced with advantage.

From the information supplied by the Agent-General, we think it useless to attempt to intro-

duce lobsters, crabs, or herring at present.

In connection with this subject, we would call your attention to the very inefficient protection afforded to salmon in the existing fishery laws of New Zealand, whereby opportunities are offered for their wholesale destruction by fishermen in tidal waters. At the present time these are not under the immediate control of any one. The fishermen obtain their licenses from the Customs Department. In many cases they have not even licenses, and, under the pretext of netting mullet and flounders, they already destroy large quantities of trout in the tidal and adjacent waters; and, under the terms of their licenses, they claim the privilege of netting three miles east and west of highwater mark. Unless the netting of fish in tidal waters be placed under the control of some local body interested in the preservation of imported fish, it must necessarily follow that all the efforts made to introduce salmon will be thwarted. And, further, under the various Acts for the preservation of trout and salmon, and "The Dynamite Act, 1878," great opportunities are accorded for the destruction of salmon and trout by the use of any net or other poaching device, or even dynamite, for the use of these devices is permitted and sanctioned by the clause in each of these Acts which states that the Act does not apply to waters the property of any private person. In the absence of anything to the contrary, this is held to apply to those rivers and streams which immediately bound or run through the lands of private persons.

In the fishery laws of the American States private waters are accurately defined—e.g., in New York they are called "private ponds," and, as such, are specially dealt with; in Massachusetts there is a clause referring to the proprietors or lessees of any "natural or artificial pond;" in Michigan, "taking fish from any private pond, stream, or spring;" in New Jersey the clause states, "It shall not be lawful to take fish in the Rancocus Creek and extending up the said creek to its beginning, including the coves and branches belonging to it," &c.; in New Hampshire the clause which permitted the owner of the surrounding land to kill and catch fish was repealed in 1868, and the private waters specially named; in Rhode Island private waters are defined as private ponds or streams which are not private ponds or streams stocked at the expense of the State; in Kansas private fish reserves are those owned and used for the propagation of fish; Connecticut-private ponds, streams, or preserves; Vermont—private ponds, streams, or preserves where fish are bred artificially, cultivated, and maintained by owners; Nebraska—any private pond not exceeding ten acres; Pennsylvania—such pond or streams only as shall be used or improved by the owners or lessees for the propagation of fish; Maine-private waters are ponds or streams for the artificial culture of fish.

We therefore suggest that the Fisheries and Dynamite Acts be amended in this direction, and that "waters the property of any private person" be more accurately defined.

HARRY A. DE LAUTOUR, President,

JAS. FIELD CRAWFORD, Honorary Secretary, The Hon. the Commissioner of Trade and Waitaki County Acclimatization Society. Customs, Wellington.

No. 8.

Mr. C. R. Buckland to Mr. Holdsworth.

San Francisco, 12th February, 1886. In accordance with the telegram from Mr. Gray dated the 13th October, 1885, I have to request you to see that the fish ova-a million eggs of whitefish forwarded by the "Alameda" to