1876. NEW ZEALAND.

SECOND COOK STRAIT CABLE,

(PAPERS RELATING TO A).

Presented to both Houses of the General Assembly by Command of His Excellency.

No. 1.

The Hon. the Colonial Secretary to the Agent-General.

Sir,—
Colonial Secretary's Office, Wellington, 18th December, 1875.

In the last Session of the Assembly, a sum of £10,000 was voted for a second cable across Cook Strait. Herewith you will receive memorandum by the General Manager of New Zealand Telegraphs, giving description of cable required, and suggestions as to supervision and as to mode of shipment and laying, all of which have the approval of the Government. Enclosed are also charts of the soundings in Cook Strait, in the direction in which the cable is proposed to be laid.

I have to request that you will be good enough to put this order in hand as speedily as possible.

I have, &c., DANIEL POLLEN.

The Agent-General for New Zealand, London.

Enclosure in No. 1.

MEMORANDA by the GENERAL MANAGER.

Memorandum for the Hon. the Telegraph Commissioner.

Hon. Commissioner,—
Herewith I beg to lay before you the chart of the soundings of the proposed route for the new Cook Strait cable; also, copy of Captain Johnson's report on the same.

2. The length required will be 50 nautical miles, allowing rather more than 25 per cent. for slack

and spare cable.

3. The cable to consist of one conductor, seven strands copper wire.

4. The description of cable should be left to the discretion of the engineer who will have charge of the supervision during its manufacture.

5. I think it may be of tolerably light construction the greater part of it; but the first ten miles from Lyell's Bay should be somewhat heavier than the remainder, as the tides are more rapid on that side, and the prevailing winds set on that shore.

6. The insulation of the cable should be at least 300 megohms per nautical mile when laid, or 150 megohms when tested at a temperature of 75° Fahrenheit, with a battery of 500 cells, after twentyfour hours' immersion in water, on its completion.

7. If it can possibly be arranged, it would be advisable for the Agent-General to arrange with the proprietors of the New-Zealand-Australian Cable, for the use of their steamship "Edinburgh" to lay the cable, as that vessel will have all the appliances permanently fitted up for paying-out or pickingup, as the case may be.

8. If this can be so arranged, it will only remain to freight the cable out by some sailing vessel, to be delivered at Wellington.

9. The insurance should cover all risks from port to port.

10. If not found too expensive, I think it would be advantageous to have the tank the cable is sent out in made of galvanized iron, as it would be better adapted for fresh-water purposes afterwards, and would in all probability fetch its prime cost, and thus lessen the cost of the cable.

11. I estimate the cost of the cable to be about £10,000, delivered in New Zealand.

12. The above sum was voted by the General Assembly last session.

C. Lemon, General Manager.

New Zealand Telegraphs, Head Office, Wellington, 10th November, 1875.

Memorandum for the Hon. the Telegraph Commissioner.

I should recommend that Mr. Lattimer Clark be intrusted with the designing and supervision of the cable during its manufacture. I believe his firm, Clark and Ford, are engineers for the Australian cable.

18th December, 1875.

C. Lemon, General Manager.

Sub-Enclosure to Enclosure No. 1.

REPORT by Captain Johnson.

Marine Office, 1st November, 1875.

In compliance with the Hon. the Commissioner's instructions, I proceeded in the "Luna," for the purpose of sounding across Cook Strait, from Lyell's Bay to White's Bay, for the new telegraph cable. After two days' work, a route passing south of the supposed position of the old cable was found, with a good average bottom, and one (in the opinion of Dr. Lemon, who was on board) well suited for the cable. The course selected is rather serpentine, and is $38\frac{1}{2}$ miles long, with a bottom for the most part of sand, shell, and gravel. The soundings were taken at an average of a quarter of a mile apart, and the deepest water found was 160 fathoms on the route; while to the southward of the line the bottom was found very uneven, and as much as 414 fathoms (mud) found. Before the cable is laid, it will be necessary to closely traverse about 25 miles of the line, to ascertain the depth and nature of the bottom on either side, as it will be found, from the strong and variable tides, impossible to lay the cable exactly on the line.

The Secretary of Customs, Marine Branch.

I have, &c., R. Johnson.

No. 2.

The Hon. the PREMIER to the AGENT-GENERAL.

(From Wellington, 6th March, 1876.)

Referring to Lemon's memo. re cable: if you think better stipulate for delivery here in sound condition, or for laying, use your own discretion.

Featherston, London.

Vogel.

No. 3.

The AGENT-GENERAL to the Hon. the COLONIAL SECRETARY.

7, Westminster Chambers, Victoria Street, Westminster, S.W., 9th March, 1876.

SIR,—

I have the honor to acknowledge the receipt of your letter No. 198, of the 18th December, 1875, on the subject of the new telegraph cable across Cook Strait. In accordance with the instructions contained therein, I at once placed myself in communication with Mr. Latimer Clark, and I have now to enclose you copies of two letters which he has addressed to me on the subject. After consultation with Dr. Hector, I decided to adopt Mr. Clark's suggestions, and the work will now proceed without

As you will observe, his estimate does not include freight; and the total cost of the cable delivered in Wellington will exceed the amount voted, unless I can send it out by the steamers now building in the Clyde.

I have, &c.,

The Hon. the Colonial Secretary, Wellington.

I. E. FEATHERSTON, Agent-General.

No. 4.

Mr. CLARK to the AGENT-GENERAL for New Zealand.

5, Westminster Chambers, Victoria Street, S.W., 6th March, 1876.

Sir,—

Replying to your favour of the 1st instant, I beg to inform you that I shall be happy to undertake the design and supervision and testing of the cable for Cook Strait, as proposed by your letter.

My charge for this work, including electricians' services, &c., would be 2½ per cent. upon the gross amount of the work or contract.

I have, &c.,

I. E. Featherston, Esq., Agent-General for New Zealand.

LATIMER CLARK.

No. 5.

Mr. CLARK to the AGENT-GENERAL for New Zealand.

5, Westminster Chambers, Victoria Street, S.W., 7th March, 1876.

Sir.—

7th March, 1876.

I beg to report further upon the subject of the new cable across Cook Strait.

I have carefully considered the subject with my partners, and have studied the report of Mr. Johnson, the Marine Surveyor, and the memorandum of Mr. C. Lemon, and also the chart of soundings of the proposed route for the cable.

3 F-8.

As regards the route, I would observe that it is in my opinion most desirable that the new cable should be laid as far north as possible; and if it were possible to the northward of the present cable, rather than to the south.

My reason being, that the long and heavy waves of the Pacific, which first break upon shoal water in about lat. 41° 30", at first cause a very heavy movement at the bottom, but after traversing the shoal water for a short time they break up into shorter and shallower waves, which do not reach the bottom with any great force. The farther northward therefore the cable is laid, the farther would it be away with any great force. The farther northward therefore the cable is laid, the farther would it be away from the influence of the deep-sea waves. If it be impracticable to find a route to the northward of the present cable, I would lay the new cable as near to it as safety would permit. I would also recommend that they should, as far as possible, lay the cable in the deepest water they could find, as the bottom disturbance would there be less than in shallower waters.

It is probable that the best practicable route will be found to be 3 or 4 miles to the southward of

the present cable.

I observe that they have allowed 25 per cent. for slack and spare cable. This is a very excessive amount. If the cable be laid by the "Edinburgh," or any other well-appointed cable vessel, the amount of slack could not exceed from $3\frac{1}{2}$ to 5 per cent., unless an extremely bad course were made.

The present cable was paid out from a sailing ship, and the amount of slack used under those circumstances must not be taken as a criterion of what it would be if the cable were paid-out from a steamer going direct. I consider, therefore, that a shorter length than 50 nautical miles will be sufficient for all purposes, both of slack and spare cable.

The instructions as regards testing and insulation shall be carefully attended to.

I will ascertain and report to you on what terms arrangements could be made for the laying of the cable by the s.s. "Edinburgh," or such other repairing vessel as the Eastern Extension Company may have on that station at the time.

I have calculated the weight and cost of several cables which might suit the proposed route.

If 50 knots of cable be sent out, including 10 knots of heavy cable, the estimated amount of £10,000 would not admit of a heavier cable for the main portion of the route than rather less than 4 tons per knot, and a cable of this weight would, in my opinion, be too light to lay across Cook Strait, having especially in view the great wash which breaks in during storms from the southward, the rapid character of the tide, and the fact that the cable is to receive these strains laterally and not longitudinally. Upon full consideration, therefore, I am of opinion that not more than 45 knots of cable should be sent out; that 5 knots of this should be of a heavy description, weighing 10.4 tons per knot for the two shore ends, and that the remaining 40 knots of main cable should weigh at least 53 tons per knot. It would not, in my opinion, be judicious to lay a lighter cable across Cook Strait.

I have calculated the cost of such a cable, free on board ship in England, together with the cost

of tanks, and I estimate that such a cable would cost £9,500, exclusive of freight.

Before proceeding to give you further details of the proposed cable, I should like to have an interview with you, in order to learn how far you consider such a sum within the limits of your I have, &c.,

I. E. Featherston, Esq., Agent-General for New Zealand.

LATIMER CLARK.

No. 6. MEMORANDUM by Dr. LEMON.

3rd May, 1876.

I NOTICE, in the attached letter of Mr. Latimer Clark's, that he has recommended Dr. Featherston only to have 5 miles of shore end for the new cable, instead of 10 miles of shore end, for the Lyell's Bay end, as advised in my memorandum. The 5 miles of shore end, as per his letter, is to be divided, and $2\frac{1}{2}$ miles placed at each end. I do not object to the $2\frac{1}{2}$ miles for the shore end at White's Bay, but I do object to the allowance of only $2\frac{1}{2}$ miles of shore end from the Lyell's Bay end. In my memorandum to the Commissioner, I clearly pointed out why 10 miles of shore end would be required from the Lyell's Bay end. This recommendation was based on my personal observations during the time of taking soundings, and in my memorandum I gave cogent reasons for my suggestions being adopted. My reasons for giving that opinion have, since the writing of the memorandum, been considerably strengthened from the experience gained in the repairing of the present cable. I consider that 10 miles of shore end at the Lyell's Bay end will be none too much. To have only $2\frac{1}{2}$ miles will just carry the light cable to where the real wear and tear on the cable will commence, and 5 miles of shore end would not place it out of danger from storms and tides, whilst by having 10 miles of heavy shore end, would, as far as human appliances and forethought can be commanded, place the cable in comparative safety. The other parts of Mr. Clark's letter call for no remark. The alternative of laying the cable to the south, suggested by him, has long since been decided on; in fact, the route sounded, of which a sketch was sent home for his information, is in some parts more than 4 miles southward from the route of the present cable, so far as it is possible to judge. I think, if it is not too late, that Dr. Featherston should be requested to stipulate, in the manufacture of the cable, that 10 miles of heavy shore end should be placed on the Lyell's Bay end of the cable, and not $2\frac{1}{2}$ miles as suggested by Mr. Latimer Clark. If only $2\frac{1}{2}$ miles laid from this end, I would not guarantee the life of the cable twelve months, as the deep-sea portion would just commence where the tides set heaviest on to the

shore, and where the water commences to shallow.

It does appear strange to me that Mr. Clark, after reading my memorandum, should only recommend 2½ miles of heavy shore end for a cable to be laid in a place like Cook Strait, when the Australian cable has 5 miles at each end, and from this side (New Zealand) is well at the mouth of the Strait, comparatively free from influence of tides; and beyond anchors, nothing will ever interfere with it, and the chance of that risk is exceedingly remote. I much regret this decision of Mr. Clark's, as I fear the cable, if laid with only $2\frac{1}{3}$ miles of shore end, will give us future trouble. From the way Dr. Featherston writes, he evidently intends to lose no time in carrying out the

It is to be regretted that both cables are interrupted north of Port Darwin at the present juncture, as I fear before any instructions could reach England the work will be completed.

C. LEMON.

The Hon. the Commissioner.

General Manager.

No. 7.

Sir J. VOGEL to the AGENT-GENERAL.

(Telegram.) Wellington, 14th June, 1876. ADD 7½ miles heavy cable, making 10 for Lyell's Bay, as originally ordered. If rest of cable left, send soon as possible after. Take usual precaution for safety during voyage.

Featherston, London.

J. VOGEL.

No. 8.

Extract from a Letter by the AGENT-GENERAL to the Hon. the MINISTER for IMMIGRATION.

7, Westminster Chambers, Victoria Street, Westminster, S.W.,

1st April, 1876. SIR,—

Tenders for the construction and carriage of the Cook Strait telegraph cable were opened on the 29th March, and the tender sent in by the Telegraph Construction and Maintenance Company, offering to construct the cable and deliver it at Wellington, in accordance with Mr. Latimer Clark's I have, &c.,
I. E. FEATHERSTON, specification, was accepted.

The Hon. the Minister for Immigration, Wellington.

Agent-General.

No. 9.

The AGENT-GENERAL to the Hon. the Colonial Secretary, Wellington.

7, Westminster Chambers, Victoria Street, Westminster, S.W.,

SIR.

3rd May, 1876.

In continuation of my letter of the 9th March, No. 189, I have the honor to transmit a copy of the contract* entered into with the Telegraph Construction and Maintenance Company, for the construction and safe delivery of the Cook Strait cable.

I have, &c.,

I. E. FEATHERSTON,

The Hon. the Colonial Secretary, Wellington.

Agent-General.

No. 10.

Mr. WALTER KENNAWAY to the Hon. the COLONIAL SECRETARY, Wellington.

7, Westminster Chambers, Victoria Street, Westminster, S.W.,

SIR,-

8th June, 1876.

Adverting to your letter No. 198, of the 18th December, 1875, I have now the honor to transmit herewith a copy of the contract entered into by me, on behalf of the Government, with the Telegraph Construction and Maintenance Company, for the cable to be laid across Cook Strait.

Mr. Latimer Clark has superintended the construction of the cable, which has been shipped on board the "Zealandia," to sail from this on the 12th instant for Wellington.

It will be observed that the Telegraph Construction Company are to deliver the cable at Welling-

ton in perfect working order, and that the last instalment of the contract price is to be paid by me in London, on their producing a certificate from the Government to that effect.

I may further state that I have intrusted the making of the 5-mile cable, ordered under your letter No. 25, of the 29th February, 1876, to the same Company, who have undertaken to deliver it at Wellington for the sum of £2,600, payable on delivery to me of a certificate that the work has been duly executed to the satisfaction of the officer appointed by the Government.

I enclose herewith a copy of the Company's tender.

An electrician and boiler-maker will accompany the larger cable, and will superintend the landing of both.

I wished to forward both cables in the same ship, but this could not be done owing to the want of space in the "Zealandia." I have, &c.,

WALTER KENNAWAY, (for the Agent-General and in his absence).

The Hon. the Colonial Secretary, Wellington.

No. 11.

Messrs. John Mackrell and Co. to the Agent-General.

Cook Strait Cable.

21, Cannon Street, London, E.C., 31st May, 1876. SIR,-

We beg to report, for the information of your Government, that, after the execution of this contract, questions arose with reference to the demurrage payable upon ships, the Company alleging that they had assented to the amount inserted in clause 9 under a misapprehension of the amount

they would have to pay.

The difficulty has been got over by a substituted arrangement that the Company should undertake to land the cable under the superintendence of their engineer and boiler-maker, who will go out with the cable, the Government repaying the actual cost incurred for wages, &c.; not including, however, the wages of the engineer and boiler-maker, nor such assistance from the crew as may be included in the freight.

To carry out this substituted arrangement, a memorandum has been put upon the contract, of

which we subjoin a copy, and the contract must be read as thus varied.

We have, &c.,

To the Agent-General for New Zealand.

JOHN MACKRELL AND Co.

Enclosure in No. 11.

THESE Articles of Agreement, entered into this 28th day of April, 1876, between His Excellency the Most Honorable George Augustus Constantine, Marquis of Normanby, Earl of Mulgrave, Viscount Normanby, and Baron Mulgrave of Mulgrave, in the County of York, and in the Peerage of the United Kingdom; and Baron Mulgrave of New Ross, in the County of Wexford, in the Peerage of Ireland; a Member of Her Majesty's Most Honorable Privy Council; and Knight Commander of the Most Distinguished Order of Scient Michael and Scient Georges, the Governor and Commander in Chief Most Distinguished Order of Saint Michael and Saint George; the Governor and Commander of the Most Distinguished Order of Saint Michael and Saint George; the Governor and Commander-in-Chief in and over Her Majesty's Colony of New Zealand and its Dependencies, and Vice-Admiral of the same (hereinafter called "the Governor"), of the one part, and the Telegraph Construction and Maintenance Company Limited (hereinafter called "the Company"), of the other part, witness, that for the consideration hereinafter appearing, the Governor for himself, separately, and his successors in office, Governors and Commanders-in-Chief for the time being in and over the said colony (each such successor for the time being, and also the Governor for the time being of the said colony, being hereby declared to be included in the word "Governor" wherever it hereafter occurs, unless such meaning shall be inconsistent with the context) doth hereby for and on hebalf of the said colony, so meaning shall be inconsistent with the context), doth hereby for and on behalf of the said colony, so far as the matters hereinafter contained are to be observed and performed on the part of the Governor of New Zealand, agree with the said Company, their successors and assigns. And the said Company, for themselves, their successors and assigns, do hereby, so far as the matters hereinafter contained are to be observed and performed on their part, agree with the Governor and his successors, for and on behalf of the said colony, in manner following, that is to say,—

1. The Company will manufacture for the Governor a telegraphic cable of the total length of

forty-five knots, of the types and kind, and in the manner following, that is to say,

(A.) The copper conductor to be a strand of seven wires, weighing 107 pounds per nautical mile. The specific conductivity of the copper to be not less than 90 per cent. of that of

pure copper.

(B.) The conductor to be insulated with three coatings of gutta percha of the finest quality, alternating with three coatings of Chatterton's compound, and to weigh 140 pounds per nautical mile, or within 5 per cent. thereof. The resistance of the completed core to be not less than 150 megohms per nautical mile, when tested at a temperature of 75° Fahrenheit after one minute's electrification.

(C.) The core to be kept continually under water until the commencement of the serving

process.

(D.) The core to be served in the usual manner, with a good and sufficient serving of jute yarn, steeped in a solution of cutch or other preservative mixture, and to be applied wet. The hemp to be laid on in two servings, in opposite directions. Great precaution to be

Outer Coverings.

- (E.) The length of cable to be as follows, videlicit: Type A (shore end) ... Type B (main cable) ... 5 knots. 40 Total 45
- (F.) Type A.—The served core to be closed with ten B.B. galvanized iron wires, the diameter of each wire to be No. 0, B.W.G., equal to 340 of an inch, when galvanized, or within $2\frac{1}{3}$

(G.) Type B.—The served core to be closed with ten B.B. galvanized iron wires, the diameter of each wire to be No. 4, B.W.G., equal to 238 of an inch, when galvanized, or within 21

per cent. thereof.

(H.) Each type of cable, when completed, to be served with two coatings of jute yarn, laid on in opposite directions in the usual manner, and three coatings of Clark's compound.

2. The Company will manufacture the cable in a proper manner, and to the entire satisfaction of an engineer (hereinafter called "the Engineer"), appointed by the Agent-General for the New

Zealand Government, and all the materials used shall be the best of their respective kinds, and any materials which the Engineer shall disapprove of shall, if he shall so require, be at once removed from the Company's works.

3. The Company will provide at their cable works a separate and convenient room for testing and suitable batteries, and permit the Engineer to have free access to those works at all times during the manufacture, and to make use of the said batteries, and afford him all facilities for the inspecting, testing, and examining the cable, and all materials used in the manufacture thereof.

4. The Company will coil the cable when completed in a tank under water, and permit the Engineer to make use of the said batteries, and afford him all facilities for then testing the cable for insulation: the standard of insulation for the completed cable being not less than 200 megohms per nautical mile when reduced to a temperature of 75° Fahrenheit after five minutes' electrification; the tests to be taken at the actual natural temperature, and to be reduced by calculation to the standard specified; and the Company undertake that the cable, when completed and tested, shall be up to such

5. The Company will, after the cable has been tested, if it shall be found up to the standard of insulation, ship it within about one calendar month from the date of these presents, in a suitable and thoroughly seaworthy steamer or sailing ship, classed A1 at Lloyds for not less than seven years, to be provided by the Company at their own expense, and will carefully coil it in one or more strong watertight tanks to be provided by the Company at their own expense, giving it during the process of coiling a good coating of chalk and water; but the cable shall not be coiled until the tank or tanks, and the fittings thereof, shall have been approved of by the Engineer.

6. The Company will place the said batteries on board, and permit the Engineer to make use of them, and afford him all facilities for testing the cable for insulation; and if he shall not find it to be up to the standard of insulation hereinbefore mentioned, the Company will forthwith repair any defects, and do all such things as shall be necessary to bring the cable up to such standard; and, after the cable shall have been approved of and passed by the Engineer, will at all times while it shall be on board

keep the cable in the tank or tanks covered with water.

7. The Company will, at their own expense, engage two competent persons to see that the cable in the tank or tanks is covered with water, and to attend to the cable during the voyage, and to superintend the taking of it out of the tank or tanks at Wellington.

8. The Company will use their best endeavours to deliver the said cable at Wellington, in New

Zealand, within about four calendar months from the date of these presents.

9. Three weeks are to be allowed the Governor to take out and remove the cable and the tank or tanks (which shall become the property of the Governor); and as many days as the Governor shall require over and above the said period of three weeks on payment of ten pounds for every day over and above the said period.

10. The Company undertake that the cable when delivered at Wellington shall be in as good electrical condition as it was when it was approved of and passed by the Engineer before the sailing of the steamer or ship, and as soon as the cable shall have been removed from the steamer or ship, it shall be tested by some competent and impartial person appointed by the Governor, in the presence of one

of the persons hereinbefore mentioned.

- 11. The Governor will pay to the Company for the cable and tank or tanks, and for the performance of the matters hereinbefore undertaken by the Company, the sum of nine thousand five hundred and seventy-five pounds, at the times and in the manner following, that is to say, six thousand three hundred and eighty-three pounds six shillings and eightpence, being two-thirds of the said sum, in London, upon production and delivery by the Company to the said Agent-General of a certificate by the Engineer that he has tested the cable on board the ship and has approved of and passed it, and on delivery also of the usual shipping documents; and the Governor will pay the further sum of three thousand one hundred and ninety-one pounds thirteen shillings and four pence, the balance of the said thousand one hundred and ninety-one pounds thirteen shillings and fourpence, the balance of the said sum of nine thousand five hundred and seventy-five pounds, less such deductions, if any, as may be made from such sum of three thousand one hundred and ninety-one pounds thirteen shillings and fourpence as hereinbefore provided, within ten days after the production in London of a certificate in writing of the person so appointed by the Governor as hereinbefore mentioned that the cable has been delivered at Wellington in proper electrical condition, according to the standard hereinbefore mentioned.
- 12. The Governor will, at his own expense, in addition to any insurance he may think fit to effect on his own account, effect an insurance, in some office to be selected by the Agent-General, on the cable and the tank or tanks in the steamer or ship, for the benefit of the Company, in the sum of three thousand one hundred and ninety-one pounds thirteen shillings and fourpence, against fire and sea risks, and hand the policy to the Company

13. The Engineer for the purposes of this agreement shall be Josiah Latimer Clark, Esquire, or him failing, Henry Charles Forde, Esquire; and the Governor agrees that the Engineer and the person to be appointed under clause 10 shall duly give such certificates as hereinbefore mentioned so soon as the conditions upon the performance of which the Company is entitled to the same shall have been

duly fulfilled.

14. Any question or difference between the parties hereto as to the right of the Company to any certificate or certificates under these presents, or as to any other matter or thing arising under or out of this agreement, shall, upon the application of either party, be referred to arbitration in England, pursuant to the provisions of "The Railway Companies Arbitration Act, 1859," and as if the Company were a railway company.

15. No individual responsibility shall be incurred by the Governor, or by Isaac Earl Featherston, the Agent-General for the Government of New Zealand, by whom on behalf of the Governor it is

intended that these presents shall be signed.

In testimony whereof the said Isaac Earl Featherston has signed these presents, in the name and on behalf of the said George Augustus Constantine, Marquis of Normanby, and the Company have I. E. FEATHERSTON. hereunto affixed their common seal.

MEMORANDUM.

It is hereby agreed between the parties to the within-mentioned contract that clause 9 thereof shall be, and it is hereby cancelled, and that in lieu thereof the following shall be substituted and have

effect, that is to say,

The Company shall take out and remove from the ship the cable and the tank or tanks (which shall become the property of the Governor), and land the same at Wellington. And the Governor shall upon request repay the Company the actual cost incurred by them in so doing, but not including any charge for the wages of the persons referred to in clause 7, nor for such assistance of the officers and crew of the ship as shall have been included in the freight paid.

In testimony whereof the above-named Isaac Earl Featherston has signed this memorandum in the name of and on behalf of George Augustus Constantine, Marquis of Normanby, the above-named Governor, and the said Company have hereunto affixed their common seal, this thirty-first day of May,

one thousand eight hundred and seventy-six.

I. E. FEATHERSTON.

No. 12.

Sir W. Power to the Hon. the Colonial Secretary, Wellington.

7, Westminster Chambers, Victoria Street, Westminster, S.W.,

SIR,-

29th June, 1876. Adverting to my letter No. 413, of the 8th June instant, advising the shipment of the 45-mile cable by the "Zealandia," for Wellington, New Zealand, I have now the honor to enclose a bill of lading for the same; also, a copy of the certificate given by Mr. Latimer Clark, the Engineer who superintended the construction of it.

I have, &c., I have, &c., W. TYRONE POWER,

The Hon. the Colonial Secretary, Wellington.

Agent-General.

Enclosure in No. 12.

Mr. CLARK to the TELEGRAPH CONSTRUCTION and MAINTENANCE COMPANY.

5, Westminster Chambers, Victoria Street, S.W., 28th June, 1876.

GENTLEMEN,-

In accordance with the contract of the 28th April, 1876, between yourselves and the New Zealand Government, I beg to certify that I have tested the cable carefully on board ship, and I have, and do approve the same, as having been constructed according to the contract; and I have also examined the tank and fittings, and approved of them; and I beg to state that the whole of the cable has left this country in perfect electrical condition. I have, &c.,

The Telegraph Construction and Maintenance Company.

LATIMER CLARK.

Price 6d.]

By Authority: George Didsbury, Government Printer, Wellington.—1876.