

price for earthwork (37 cents), and make no charge for extra haul for any that may have to be brought from long distances.

The District Engineer reports, this date, that the contract cost of trestle-work, which would be dispensed with by the course proposed, would be about \$390,000; that an additional present expenditure of \$260,000 on earthwork under Mr. Whitehead's offer, including masonry culverts, would make all the embankments permanently solid.

As trestle-work is always more or less dangerous, especially liable to be consumed by fire during the dry season, in a country such as the one the line goes through, and would have to be constantly renewed, until ultimately filled in solid. I am of opinion that it would be sound economy to accept Mr. Whitehead's offer, and therefore recommend it.

I am, Sir,

Your obedient servant,

(Signed)

SANDFORD FLEMING,

Engineer-in-Chief.

F. BRAUN, Esq., Secretary,
Department Public Works.

OTTAWA, 22nd May, 1878.

DEAR SIR,—Having received from the Division Engineer of Contract 15, the estimate referred to in my letter of the 5th of March last, reporting on the subject of Mr. Whitehead's proposal "To make the embankments on Contract 15 with earth instead of trestlework," contained in his letter of the 5th November, 1877, which was enclosed in the above named letter of mine, I now submit further information on the subject, as follows :

The cost of completing the banks with earth instead of trestlework will be.	\$550,500 00
Deduct trestlework done away with in consequence.....	362,000 00
	<hr/>
Balance.....	\$188,500 00
Add for masonry and permanent structures, say.....	70,000 00
	<hr/>
	\$258,500 00
	<hr/> <hr/>
If trestlework of the value given above (\$362,000.00) is put in now, its cost, at 5 per cent. per annum compound interest, at the end of 6 years, say....	\$485,000 00
By which time it would have to be either partially or wholly renewed or replaced by earth-filling. If the latter, and if this could then be put in at 28 cents per cubic yard, instead of at the present contract rate of 37 cents per cubic yard, there must then be a further expenditure of.....	401,500 00
To which must be added as above, masonry and permanent structures.....	70,000 00
	<hr/>
Cost at end of 6 years.....	\$956,500 00
The immediate increased cost of change (\$620,344.00) would, if treated in the same manner, amount to the sum of.....	831,318 00
	<hr/>
Leaving a balance in favor of the proposed change...	\$125,182 00
	<hr/> <hr/>