

Railway Construction—Contract No. 15.

1st Sept., 1877,  
Judgment  
at  
230 in the  
day as at  
ception.

450. About when were those instructions given to you?—I think I have a letter from Mr. Carre containing those instructions, dated about May or June, 1877.

451. Do I understand that they were the first instructions as to the mode of crossing the water stretches?—Mr. Carre wrote that they were the only instructions that he was aware of at the time.

452. Then they were the first that you had communicated to you?—Yes; the first communicated to us.

453. And that was to make a solid rock basis across water stretches wide enough to support an earth embankment?—Yes.

454. Would the width of it depend upon the height of the probable embankment?—Yes; the higher the embankment the greater the width of the rock basis.

455. Then the probable height of the embankment has been communicated to you by those grade pegs?—Yes.

456. Was there a scale given to you to work by, showing what width would be required for any particular height?—No; but the slopes of the embankment, were fixed and the width of the base depended upon the height of the embankment.

Width of base depended on the height of the embankment.

457. How were the slopes fixed?—The standard slope for earth embankments is one and a half to one.

458. Then you have it fixed by contract?—Fixed by specification.

459. Attached to the contract?—Yes.

460. Were you at that time led to understand that these embankments were to be of solid earth?—We were merely told to make the rock basis sufficiently wide to carry an earth bank. Had the rock basis been intended for trestle work only, it would not have been necessary to make them nearly so wide.

Rock bases much wider than necessary for trestle work only.

461. Then did those instructions in May or June, 1877, appear to indicate that it was a base not for the support of trestle work, but for the support of an earth embankment?—The base was required to be made wide enough to support earth embankments.

462. Were the bases put through the water stretches as solid rock bases?—No.

463. Why not?—It was seen that in order to make those bases, we would have been obliged to use all the rock on the contract at very few points, carrying the rock from cuttings over intermediate dry fills, and placing the material in the water. It was not considered practicable to do that as it would have taken a very long time, and entailed an enormous expense. No contractor could have stood the expense.

Not considered practicable to make bases of rock.

464. You say that this was ascertained; was it ascertained by the contractor and yourself, as an engineer, or by the Government engineer?—We spoke to the Government engineer about it.

The Engineer-in-Charge addressed on this subject in summer of 1877.

465. Do you mean yourself, or you and the contractor?—I mean the contractor and myself.

466. To whom did you speak?—To Mr. Carre.

467. Who was Mr. Carre?—He was the division engineer in charge of the work on the part of the Government.