PRESIDENT'S FILE 10632

Saint Paul, Minnesota
August 9, 1966

79-76

Mr. J. M. Budd:

On September 14, 1965, we gave you a further report on the Corps of Engineers' activities in connection with Skagit River flood control and construction of the so-called "Avon By-pass", which would affect our lines in the vicinity of Burlington, Wash.

For your further information, we are attaching a copy of Mr. Reichert's report of July 13 and the prints to which he refers. The Army Engineers' proposals now boil down to so-called Alternate 1-A and Alternate 1-C, as shown on the attached prints. Alternate 1-A would require a substantial grade raise on the main line just south of Burlington yard, as well as a substantial raise on the Anacortes Line in the vicinity of Avon.

We have considered these alternate proposals and from an operating standpoint, Alternate 1-C is the least objectionable.

J. L. Robson

cc: Mr. Anthony Kane
Mr. M. M. Scanlan

Seattle, July 13, 1966

File: 8741-3-31

Mr. G.V.Guerin - St. Paul
Mr. C.M.Rasmussen- Seattle

Please refer to your files pertaining to the construction of the Avon Bypass in the vicinity of Burlington, Washington.

Last April the Army Engineers requested that we meet with them to discuss in a preliminary way the status of the Avon Bypass and in particular the type of bridges that would be required to carry our lines over the Bypass if it should be built.

The Army Engineers in reviewing the history of the proposed project stated that it was reactivated in 1962, and that it will come before the voters of Skagit County at an election on November 8th of this year. If approved, it would appear that construction would start in 1970 or 1971 and be completed about 1973.

The Bypass as now proposed by the Army Engineers would have a channel width of about 360 ft. at its base with side slopes of 2:1 or 3:1. It is planned to provide 3 ft. of freeboard on levies. The bypass would be used when the flow of the Skagit River exceeds 120,000 cu. ft. per second and it is expected that this would occur about once in 17 years. It is also expected that the bypass would flow to capacity at a frequency of about once in 30 years.

The Engineers left with us plans showing several alternate routes and after a review of these plans by Mr. Shober and this office we told the Army Engineers that none of the proposals were acceptable to us because they required excessive raises in our lines.

The Army Engineers have resubmitted plans with the locations of the bypass and grade raises somewhat more acceptable than their earlier proposals. Under separate cover we are sending to Mr.Guerin two sets and to Mr. Rasmussen one set of Army Engineers Plans E-6-6-268, Sh. 1 to 7 showing in a preliminary way two proposed locations of the bypass. These proposals are designated Alternate 1-A and Alternate 1-C.

Alternate 1-A crosses the Coast Line and siding near M.P. 71 at about Sta. 3997+20, this location is about 2000 ft. south of the yard at Burlington. It is proposed that our subgrade profile be adjusted as shown on the attached print entitled "Alternate 1-A, Coast Line". You will note that we propose a level grade over the bypass and then descend on a 0.6% grade to the yard at Burlington.

Alternate 1-A crosses the Anacortes Branch about 4237 feet east of the Public Crossing at Avon. This would be at about Sta. 964+00 and a grade raise of 18 ft. is required here. Our proposed revision of the subgrade profile is shown on the attached print entitled "Alternate 1-A, Anacortes, Wash." We have shown level grade at Elev. 135.0, for a distance of 800 ft. each way from Sta. 964+00. We would then have a 1.0% grade descending westward toward Avon and about a 0.3% grade descending eastward to meet the existing grade at Sta. 1001+00.

Alternate 1-C does not require a change in the grade line of our Coast Line but requires a widening of the river channel under the girder spans in the north approach to Bridge No. 36 over the Skagit River. This would require underpinning the piers supporting the girder spans.

The bypass under Alternate 1-C would cross our Anacortes Branch at the site of Bridge No. 20, which is about Sta. 852+00, and is 6963 ft. west of the public crossing at Avon. The attached print entitled "Alternate 1-C, Anacortes Branch" shows the proposed revision to the subgrade which is raised 22 ft. above existing grade and would have approach grades of 0.3% descending to the west and 0.48% descending to the east.

The Army Engineers have in mind spans of 28 to 40 feet to carry our tracks over the bypass channels. We have not yet discussed the methods of construction but it is apparent that we would have to construct shoeflys for the bridges.

We believe that each of the above alternatives would be tolerable but we would prefer Alternate 1-C because it causes less disruption of our Coast Line. We believe that if either of these alternates is constructed, we could fill Bridges No. 38 and 38-A and handle the drainage with a culvert. If a bypass should not be constructed we plan to fill all but 6 or 7 spans at the north end of the bridges.

The Army Engineers wish to know if we are agreeable to either or both of the Alternates noted above. Will you please advise what reply we should make?

L. G. Luchini
Assistant Chief Engineer

cfi:ds
enc.

cc: Mr.R. H.Shober (1 set attached)