One is the navigation of the mouth to Shreveport, thence via 12-Mile and Cypress Bayous to Daingerfield, Tex.; channel stabilization works from Shreveport upstream to the Red River to Index, Ark.;

then stabilization on the banks from Index on up to Denison.

Each segment of the project has a favorable B-C ratio. The total estimated cost of the project is \$522,910,000, of which \$471,223,000 is Federal and \$51,687,000 is non-Federal. The benefit-cost ratio for the bank stabilization features is 1.2. The benefit-cost ratio for the navigation features is 1.3.

Mr. Cramer. Could I ask a question, Mr. Chairman?

Mr. Blatnik. Let me check first: I am not clear on your benefits, Colonel. Bank stabilization, you have got them divided there. Are bank stabilization aspects, is it the overall comprehensive proposal, are they

separate and unrelated?

Colonel Hall. The bank stabilization features were treated separately to determine if those works were economically justified by themselves. Each of the three reaches has a favorable B–C ratio as a separate unit. However, in the lower reach where a navigable waterway is recommended, the bank stabilization works are necessary to preserve channel alinement.

Mr. Blatnik. I am not clear on the benefits. Approximately a half a billion dollars will be allocated for bank stabilization, not precisely total project cost is \$500 million. How much of that goes for bank

stabilization? I would like to have separate tabulations.

Colonel Hall. It is \$193 million. Mr. Blatnik. You have got a cost-benefit ratio and you must have the cost.

Colonel Hall. Yes, sir—\$193 million.

Mr. Blatnik. About \$200 million, about two-fifths, about 40 percent of the project will be for bank stabilization. Your problem is particularly extreme upstream, is it not, on the upper reaches of the Red

Colonel Hall. The Red River itself is a meandering river through-

out its length, sir.

Mr. Blatnik. The Red River is characterized by wide fluctuations in stage as well as by caving banks and unpredictable shoaling conditions adverse to the interests of navigation. Many acres of productive land are lost to the river each year due to caving banks, and improvements must be either relocated or abandoned.

The benefit-cost ratio on that is 1.2.

Navigation is of primary concern in the lower reaches of Red River, and your benefit-cost ratio is 1.3. And I estimate that about 60 percent

of its cost would be for navigation.

On the comments of the Bureau of the Budget, I am not clear on just what they are driving at. It says, and I do not understand this, the Bureau of the Budget notes that the recommended waterway segment between Shreveport, La., and Daingerfield, Tex., is economically justified by only a narrow margin. We are concerned about the cost ratio of the entire stretch, are we not? It is nothing unusual. That is what we do all the time, with all these sections, is it not? In some sections the benefit-cost ratio would be less than other sections. You take the average, overall B-C ratio?