airfoils and there is a question, a rather grave question at the moment,

as to whether or not this could be done economically.

But above and beyond that, it is my understanding that we are not far enough along in this program to say that this is the answer or an answer.

Mr. Kuykendall. Mr. Secretary, are we correct at least theoretically in our assumptions here that the long low approach is a heavy power-on approach? You have a lot of power on the longer your approach?

Secretary Boyd. There is no question about that.

Mr. Kuykendall. All right. And that the presence of power in a jet airplane is a safety factor; is this correct?

Secretary Boyd. Yes, sir. Without that it is through flying.

Mr. Kuykendall. More so than in an old type propeller aircraft? Secretary Boyd. Yes. I think that is true. You have a higher wing loading for one thing.

Mr. Kuykendall. And also you have a greater lag in recovery of

power, is that correct?

Secretary Boyd. That is correct. The jet engine is less responsive. Mr. Kuykendall. Let me get into another question here. Are you studying the probability in new construction, and I know we have the problem of the airports that already exist, but in the new construction building these airports quite a considerable distance out and using some form of vertical aircraft in coming into the congested area. Is there some danger here in this effort?

Secretary Boyn. No; there isn't. As a matter of fact, a vertical lift device would enable us to get far greater utilization out of the existing space because it could operate in a completely different traffic pattern without conflict with fixed-wing aircraft. Here, however, with the vertical lift we have two major difficulties. One is economics. There is nothing in production today that can operate anywhere near economically, based on any representative assessment of charges. The other is that the existing vertical lift devices are just as noisy as all get out.

Mr. KUYKENDALL. I am certainly aware of this.

Thank you, Mr. Chairman.

Mr. Friedel. Congressman Pickle.

Mr. Pickle. Thank you, Mr. Chairman.

Mr. Secretary, I am glad to see you and I liked your statement and

am always glad to have you before this committee.

I would like to first of all make one observation. I certainly agree that we have to start as soon as possible to try to find a reasonable solution on the noise abatement problem. I think, though, that it is highly important that we keep in mind equally as a part of it the fact that in future construction we have to think in terms of the airports, major air centers being further out from the city.

This involves a lot of complications for us, but perhaps it would be a central or a series of central downtown collection stations going out to these airports. We don't have the problem, for instance, in Dulles and I think that is a compliment to the planners who helped provide for the

creation of Dulles where it is.

Surely we must tie this in with better helicopters, VTOL, better roads, high-speed trains, and so forth. I do have one or two questions about this bill as presented to us. One, it seems to me that we are going