The original documents are located in Box C34, folder "Presidential Handwriting, 2/4/1976" of the Presidential Handwriting File at the Gerald R. Ford Presidential Library.

Copyright Notice

The copyright law of the United States (Title 17, United States Code) governs the making of photocopies or other reproductions of copyrighted material. Gerald Ford donated to the United States of America his copyrights in all of his unpublished writings in National Archives collections. Works prepared by U.S. Government employees as part of their official duties are in the public domain. The copyrights to materials written by other individuals or organizations are presumed to remain with them. If you think any of the information displayed in the PDF is subject to a valid copyright claim, please contact the Gerald R. Ford Presidential Library.

Digitized from Box C34 of The Presidential Handwriting File at the Gerald R. Ford Presidential Library

THE WHITE HOUSE WASHINGTON

February 4, 1976

MEMORANDUM FOR:

JIM LYNN

JIM CONNOR

FROM:

SUBJECT:

Meeting with Senator Mike Mansfield - Feb. 4, 1976

Dick Cheney asked me to forward the attached to 'you. I assume you know what it is about.

Attachment:

Briefing Paper for Meeting with Senator Mike Mansfield and original of Senator Mansfield's letter of 2/3/76 to President.



THE PRESIDENT HAS SEEN

THE WHITE HOUSE

WASHINGTON February 4, 1976

MEETING WITH SENATOR MIKE MANSFIELD

Wednesday, February 4, 1976 11:00 a.m. (20 minutes) The Oval Office

Thru: Max L. Friedersdorf . . From: William T. Kendall

I. PURPOSE

To discuss several projects of interest to the Senator

II. BACKGROUND, PARTICIPANTS & PRESS PLAN

- A. <u>Background</u>: Senator Mansfield called the President to request s short visit to discuss, among other things, an energy project important to his home state. The Senator believes that the budget allocation for MHD (magneto hydro dynamics) research is too low. The figure for fiscal '77 is \$37 million, an increase of \$8 million over the previous year. The Senator had hoped that the figure would be between \$50 and \$100 million.
- B. <u>Participants</u>: The President, Senator Mansfield, and Max L. Friedersdorf
- C. Press Plan: White House photo only

III. TALKING POINTS

- 1. Mike, it's good to see you this morning. You want to talk about an energy research project--magneto hydro dynamics.
- 2. You know that we are funding that project above last year's level at \$37 million. My people tell me that this is as much as the project can use this year. Apparently, you disagree with this figure.
- 3. Why don't you go ahead, Mike



MAGNETOHYDRODYNAMICS - Senator Mansfield

- The Senator has been pushing hard for the construction of an MHD test facility in Montana. He managed to get a provision in a 1973 law(PL 93-404) requiring such a facility.
- ERDA's initial 1977 budget request provided about \$18 million for design work and initial construction-all based on the assumption of a total cost of about \$24 million.
- . The initial ERDA budget request to OMB for the MHD program(\$49 million) would have accommodated the funds needed. This total was cut back by OMB to \$37 million and was not appealed by Dr. Seamans. Dr. Seamans was under the incorrect impression that the \$37 million would take care of Senator Mansfield's project, but now concludes that it will not.
- . Your budget request for ERDA for the MHD program of \$37 million does include about \$5million for design and initial construction of the facility.
- . We understand that the Senator wants the additional \$19million to bring it up to the total cost estimate of \$24 million.
- . The problem is complicated by the fact that ERDA has done a new estimate which is now \$31 Million for the facility -- but the Senator does not know this.
- . Reprogramming does not look feasible, but it will take more time to check this out.



MARE MAREFIELD

•___

United States Senate Office of the Alajority Leader Mashington, N.C. 20510 February 3, 1976

The President The White House Washington, D. C.

Dear Mr. President:

As you know from our previous discussions, I feel very strongly that the magnetohydrodynamics (MHD) research and development program under the auspices of ERDA must move forward in an accelerated way. I have urged the development of this important technology for the generation of electric power because of its substantial increase in efficiency and its environmental benefits.

MHD research and development is mandated by Public Law 93-404, enacted in August, 1974, calling for the operation of a commercial size 500-megawatt NHD demonstration plant by the mid-1980's. As a part of the development process to achieve this objective of Public Law 93-404, last year the Energy Research and Development Administration under its MHD program plan committed itself to the construction and operation of an NHD component development and integration facility (CDIF) in Butte, Montana. ERDA committed to begin the construction of the CDIF in the spring of 1976 and to complete the CDIF installation by the latter part of 1977. This commitment is not being fulfilled. ERDA's program plan and requested budget amount for fiscal year 1977 does not include the construction of this CDIF facility.

In a June 13, 1975, letter to me, Dr. Seamans stated, "The development process for MHD has reached the point where a structured engineering oriented program has to be initiated to replace the more loosely coordinated research activities which have hitherto existed. We must obtain engineering experience to establish if MHD can, indeed, reach its promised efficiency and environmental potentials."

At this time of national energy crisis, the main problem in development of the MHD technology has been Administration budgetary restraints. The original FY 1976 budget request for MHD was only \$13.7 million, a figure tantamount to a cutback from the FY 1975 funding level. You will recall, however, that on June 27, 1975, you called me to indicate that a FY 1976 Supplemental request for MHD would be \$29.3 million. Subsequently, \$37.3 million was appropriated for the national MHD program in FY 1976 plus the transition quarter.



Sec.

On November 11, 1975, Dr. Seamans commented in a letter to me that "essentially, the MHD program is being accelerated and emphasis is being shifted from a research activity which has proved the basic concept of MHD to a structured engineering-oriented program." He further stated in the ERDA MHD Position Memorandum #2 that the total budget request for FY 1976 was considered to be sufficient "to continue and expand the base of the current research and development activities and at the same time to initiate the required engineering effort." In this same Memorandum, Dr. Seamans announced plans to "begin construction of the laboratory support building in the spring of 1976 as a first step and to follow this with the main Component Development and Integration Facility installation on a schedule so that shakedown can start in the latter part of 1977." Dr. Seamans also announced his intention to begin the preliminary design work on the ETF in accordance with Public Law 93-404, saying that "by getting this preliminary work underway in the near future, it will be completed in time to utilize the experience from the CDIF and the EDGF to finalize the ETF design and proceed with its construction."

In view of the above, I spoke with Jim Lynn in OMB on December 12, 1975, to request his support in seeing that the FY 1977 budget figures for MHD corresponded with the accelerated program developed by ERDA. He stated he would call me back but, because of the pressures of work, he was unable to do so. This, I can understand, but I had hoped to talk to him about MHD and the importance of its application to Montana for this fiscal year.

Now that I have studied the FY 1977 budget request for MHD, I am greatly disturbed. In a year when MHD was to receive accelerated attention in an effort to comply with public law, the budget contains a request for only \$37.4 million instead of approximately \$70 million needed for such an effort. This request does not contain funds estimated at \$24 million for construction of the CDIF in Montana. Of the estimated \$10 million needed for preliminary work on the ETF as required by public law, ERDA requested only \$2.6 million and OMB approved nothing.

This matter is of great concern to me. This failure to plan and request funding for the CDIF will result in an unacceptable delay. The purpose of the CDIF as described by ERDA is to test combustors designed specifically for use in MHD generators. In the words of the ERDA plan itself, "the development of a combustor to meet the very stringent requirements of the MHD generator is of prime importance, yet nowhere in the world has a combustor been operated under appropriate MHD power plant conditions and coupled to an MHD generator." The present program has not yet undertaken the coal combustion development work specifically designed to satisfy the unique requirements of an MHD generator. What is required is to proceed with the design and construction of the CDIF building and support equipment while at the same time to conduct MHD coal combustor development work specifically designed to meet the requirements of an MHD generator. By constructing the CDIF facility and conducting



the MHD coal combustion development in parallel, a combustor will be ready for testing when the CDIF is completed. As outlined in the ERDA plan, this MHD coal combustor development research should be done in close proximity to the CDIF in Butte by qualified industrial MHD research and development capabilities which will be established in Butte to support component development and test operations for the CDIF and the following Engineering Test Facility.

The Office of Management and Budget and ERDA should be working together to further the development of the MHD technology. Congress should not permit an agency to ingore public law and the intent of the Congress in the development of this program--as you are well aware in view of your Congressional service.

It appears that I may have been misled by OMB and ERDA. As a result, I ask that you have this program reviewed with particular attention to directing the departments concerned to comply with the provisions of P.L. 93-404. The law clearly requires accelerated construction of an Experimental Test Facility in Montana. This cannot effectively be accomplished without first building the Component Development and Integration Facility beginning this year. I hope that necessary funds will be provided or requested in the immediate future to expedite this important program through construction of the CDIF and design engineering for the ETF. This program is of the highest importance to my state and to me personally. Anything you can do, Mr. President, to be of assistance will be most deeply appreciated.

With best personal wishes, I am ...

Respectfully yours,



hils have

P. S. With your permission, I am sending copies of this letter to Jim Lynn of OMB and Dr. Robert Seamans of ERDA. Regards, MM



...

. .

· . . · · ·