

Task 7.1 - Strategic Planning

Semi-Annual Report July 1 - December 31, 1996

RECEIVED
AUG 18 1997
OSTI

By
Daniel J. Daly

Work Performed Under Contract No.: DE-FC21-93MC30097

For
U.S. Department of Energy
Office of Fossil Energy
Morgantown Energy Technology Center
P.O. Box 880
Morgantown, West Virginia 26507-0880

By
Energy and Environmental Research Center
University of North Dakota
P. O. Box 9018
Grand Forks, North Dakota 58202-9018

DISTRIBUTION OF THIS DOCUMENT IS UNLIMITED

MASTER

19980313 051

Disclaimer

This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government nor any agency thereof, nor any of their employees, makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.

DISCLAIMER

This report was prepared as an account of work sponsored by an agency of the United States Government. Neither the United States Government, nor any agency thereof, nor any of their employees makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement, recommendation, or favoring by the United States Government or any agency thereof. The views and opinions of authors expressed herein do not necessarily state or reflect those of the United States Government or any agency thereof.

ACKNOWLEDGMENT

This semiannual was prepared with the support of the U.S. Department of Energy (DOE), Federal Energy Technology Center, Cooperative Agreement No. DE-FC21-93MC30097. However, any opinions, findings, conclusions, or recommendations expressed herein are those of the author(s) and do not necessarily reflect the views of the DOE.

EERC DISCLAIMER

LEGAL NOTICE This research report was prepared by the Energy & Environmental Research Center (EERC), an agency of the University of North Dakota, as an account of work sponsored by the U.S. Department of Energy. Because of the research nature of the work performed, neither the EERC nor any of its employees makes any warranty, express or implied, or assumes any legal liability or responsibility for the accuracy, completeness, or usefulness of any information, apparatus, product, or process disclosed, or represents that its use would not infringe privately owned rights. Reference herein to any specific commercial product, process, or service by trade name, trademark, manufacturer, or otherwise does not necessarily constitute or imply its endorsement or recommendation by the EERC.

TABLE OF CONTENTS

1.0	INTRODUCTION	1
2.0	ACCOMPLISHMENTS	1
3.0	FUTURE WORK	2

TASK 7.1 – STRATEGIC PLANNING

1.0 INTRODUCTION

Energy industry decisions on resources, utilization technologies, and environmental control measures are made in reference to changing patterns of fuel cost and availability, emerging technological choices, externality impacts, and governmental policies, statutes, and regulations. Energy and environmental research that makes a difference must be performed with an awareness of the forces that shape these future trends and should anticipate needs in advance to compensate for developmental lead time. Research relevance begins with the appropriate selection of research thrust and topical content and ends with integration, interpretation, and application of results in real-world commercial development. The Energy & Environmental Research Center (EERC) has endeavored to maintain a highly relevant research focus through activities dating back to the benchmark 1980 Low-Rank Coal Study, 1983 defederalization plans, and the 1991 comprehensive white paper on energy policy and technologies. Work was completed in FY94 on an energy and environmental profile for selected East Central European nations.

Task 7.0 continues a limited effort devoted to strategic studies under the base Cooperative Agreement. The objective of this activity is to understand the potentialities, limitations, and status of competing energy technologies in terms of scientific basis, state of development, technical barriers, cost, efficiency, policy treatment, and environmental performance for the purpose of planning and evaluating research activities under the Cooperative Agreement. This work will be performed under the direction of the EERC Director and Associate Directors to provide guidance for planning the broad outline for future research under the Cooperative Agreement in keeping with industry needs and national goals. This is being accomplished through directed studies and technical oversight.

2.0 ACCOMPLISHMENTS

As directed by the EERC senior management, activities during the reporting period have focused on research in support of the development of a series of white papers dealing with the status and future direction of select areas of environmental policy. These areas include 1) brownfields, 2) onshore solid waste management, 3) water-related policy, 4) climate change, 5) nuclear facility cleanup and waste disposition, and 6) air emissions. Each white paper is designed to consist of two parts: 1) a summary of status and future directions and 2) an evaluation of a select group of key issues. The EERC believes that energy and environmental issues are inseparable and the environmental policy evaluations are considered to be a continuation of the activities begun at the EERC in 1989 focused on the assessment of trends and policies affecting energy industries. The conclusions reached are our own, based on a broad list of sources with certain findings attributed by reference.

Accomplishments during the reporting period include the following:

- Preparation of draft white papers
 - Issues concerning the nuclear sector were discussed in the context of 1) commercial nuclear power, 2) the defense sector, 3) waste management, 4) radiation exposure and impacts, and 5) policy directions.
 - Air quality issues were discussed in terms of the Titles of the Clean Air Act.
- Work continued on the white paper concerning water-related issues.

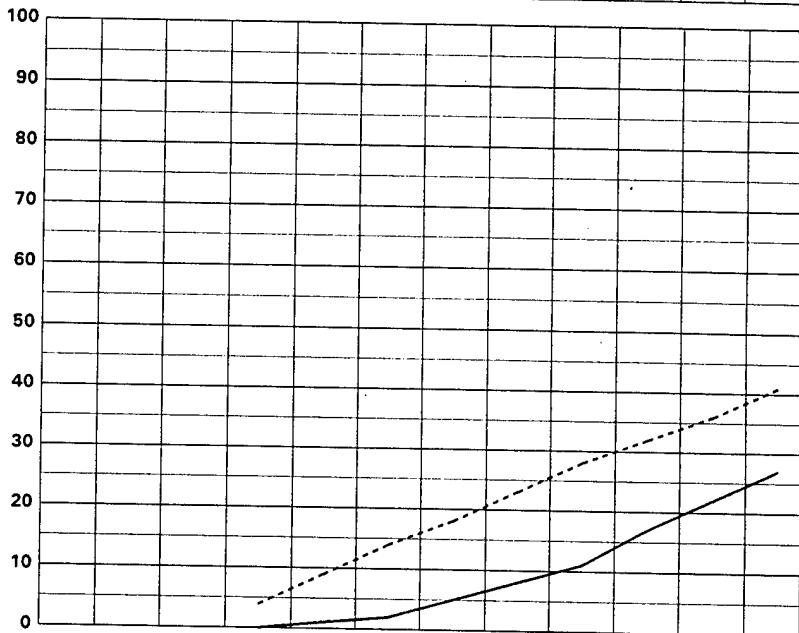
3.0 FUTURE WORK

In the coming reporting period, efforts will focus on continued preparation of white papers on select policy areas and on the assessment of the future direction for the Cooperative Agreement.

U.S. DEPARTMENT OF ENERGY
FEDERAL ASSISTANCE MANAGEMENT SUMMARY REPORTFORM APPROVED
OMB NO. 1900 0127
Page 1 of 2

1. Program/Project Identification No. DE-FC21-93MC30097		2. Program/Project Title TASK 7.0 STRATEGIC STUDIES		3. Reporting Period 10-1-96 through 12-31-96										
4. Name and Address Energy & Environmental Research Center University of North Dakota PO Box 9018, Grand Forks, ND 58202-9018 (701) 777-5000				5. Program Start Date 01-12-93										
				6. Completion Date 12-31-97										
7. FY 96/97	8. Months or Quarters Quarters	b. Dollar Scale	1st JAN	2nd FEB	3rd MAR	4th APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC

9. Cost Status		a. Dollars Expressed In Thousands																	
10. Cost Chart																			
Fund Source	Quarter				Cum. to Date	Tot. Plan													
	1st	2nd	3rd	4th															
DOE	P	0	14	14	13	41													
	A	0	2	9	16	27													
	P																		
	A																		
	P																		
	A																		
Total P		0	14	14	13	41													
Total A		0	2	9	16	27													
Variance		0	12	5		14													
P = Planned A = Actual																			



c. Cumulative Accrued Costs

Total Planned Costs for Program/Project		Planned		0		14		28		41
\$41		Actual		0		2		11		27
		Variance		0		12		17		14

11. Major Milestone Status		Units Planned									
7.1 Strategic Planning/Management		Units Complete									
		P									
		C									
		P									
		C									
		P									
		C									
		P									
		C									
		P									
		C									
		P									
		C									
		P									
		C									

12. Remarks		
13. Signature of Recipient and Date	1-31-97	14. Signature of DOE Reviewing Representative and Date

U.S. DEPARTMENT OF ENERGY
FEDERAL ASSISTANCE MANAGEMENT SUMMARY REPORT

FORM EIA-459E
 (10/80)

FORM APPROVED
 OMB NO. 1900 0127
 Page 2 of 2

1. Program/Project Identification No. DE-FC21-93MC30097	2. Program/Project Title TASK 7.0 STRATEGIC STUDIES	3. Reporting Period 10/1/96 through 12-31-96		
4. Name and Address Energy & Environmental Research Center University of North Dakota PO Box 9018, Grand Forks, ND 58202-9018 (701) 777-5000			5. Program Start Date 01-12-93	
			6. Completion Date 12-31-97	
Milestone ID. No.	Description	Planned Completion Date	Actual Completion Date	Comments
Subtask 7.1	<p>a Provide information and analysis of external issues, technological developments, and EERC program performance</p> <p>b Provide results of analyses</p> <p>c Incorporate analyses into published results</p>	12/96 12/96 12/96		*
* Project extended to 3/97				

M97002240



Report Number (14) DOE/ME/30097--5593

Publ. Date (11) 1990708

Sponsor Code (18) DOE/FG, XF

JC Category (19) UC-101, DOE/ER

DOE