

PMC-EF2a

(2.04.02)

**U.S. DEPARTMENT OF ENERGY
EERE PROJECT MANAGEMENT CENTER
NEPA DETERMINATION**



RECIPIENT: South Carolina Research Foundation

STATE: SC

PROJECT TITLE : University of South Carolina Aiken Biofuels Laboratory in Aiken, SC

Funding Opportunity Announcement Number	Procurement Instrument Number	NEPA Control Number	CID Number
CDP	DE-EE0003152	GFO-10-500	EE3152

Based on my review of the information concerning the proposed action, as NEPA Compliance Officer (authorized under DOE Order 451.1A), I have made the following determination:

CX, EA, EIS APPENDIX AND NUMBER:

Description:

- B3.6** Siting, construction (or modification), operation, and decommissioning of facilities for indoor bench-scale research projects and conventional laboratory operations (for example, preparation of chemical standards and sample analysis); small-scale research and development projects; and small-scale pilot projects (generally less than two years) conducted to verify a concept before demonstration actions. Construction (or modification) will be within or contiguous to an already developed area (where active utilities and currently used roads are readily accessible).
- A9** Information gathering (including, but not limited to, literature surveys, inventories, audits), data analysis (including computer modeling), document preparation (such as conceptual design or feasibility studies, analytical energy supply and demand studies), and dissemination (including, but not limited to, document mailings, publication, and distribution; and classroom training and informational programs), but not including site characterization or environmental monitoring.

Rational for determination:

The South Carolina Research Foundation proposes to use federal funds to establish a biofuels laboratory in the Aiken Center for Hydrogen Research. In this four year project they hope to develop screening techniques of colorimetric and gas chromatograph assays for hydrogen production by bacteria. They also hope to develop bacteria infused latex mats that are incorporated into fuel cells for high hydrogen production.

This project will include obtaining equipment for characterization and preservation of bacterial isolates, develop and assay isolates to visually detect hydrogen production using a colorimetric technique, embed diverse metabolic bacterial strains in latex coating, selection of isolates for industrial conditions, test under industrial conditions, and project management and reporting.

This project will include conventional research within existing facilities. The applicant has submitted an R & D questionnaire which thoroughly addresses safety and chemical handling protocols.

This project comprises of research and development and information gathering of bacteria for hydrogen production; therefore a CX A9 & B3.6 will apply.

NEPA PROVISION

DOE has made a final NEPA determination for this award

Insert the following language in the award:

Note to Specialist :

Eugene Brown 8/5/2010

SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

NEPA Compliance Officer Signature: _____

NEPA Compliance Officer

Date: _____

8/16/2010