PMC-EF2a
(2.06.02)

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

RECIPIENT: RTI International

STATE: NC

PROJECT TITLE : Catalytic Upgrading of Thermochemical Intermediates to Hydrocarbons

Funding Opportunity Announcement Number	Procurement Instrument Number	NEPA Control Number	CID Number
DE-FOA-0000467	DE-EE0005358	GFO-0005358-001	GO5358

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:

A9 Information gathering, analysis, and dissemination	Information gathering (including, but not limited to, literature surveys, inventories, site visits, and audits), data analysis (including, but not limited to, computer modeling), document preparation (including, but not limited to, conceptual design, feasibility studies, and analytical energy supply and demand studies), and information dissemination (including, but not limited to, document publication and distribution, and classroom training and informational programs), but not including site characterization or environmental monitoring. (See also B3.1 of appendix B to this subpart.)
B3.6 Small-scale research and development, laboratory operations, and pilot projects	Siting, construction, modification, operation, and decommissioning of facilities for smallscale research and development projects; conventional laboratory operations (such as preparation of chemical standards and sample analysis); and small-scale pilot projects (generally less than 2 years) frequently conducted to verify a concept before demonstration actions, provided that construction or modification would be within or contiguous to a previously disturbed or developed area (where active utilities and currently used roads are readily accessible). Not included in this category are demonstration actions, meaning actions that are undertaken at a scale to show whether a technology would be viable on a larger scale and suitable for commercial deployment.

Rational for determination:

DOE is proposing to provide federal funding to RTI International to conduct laboratory research and development activities to improve a catalytic biomass pyrolysis process that produces gasoline and diesel hydrocarbon fuels.

The proposed project would include laboratory scale catalysis synthesis of bio-crude intermediate produced from forest residues, switchgrass and corn stover. Laboratory work would be conducted at RTI's research and development facility (3040 E Cornwallis Rd, Durham, North Carolina 27709) with some additional work conducted at Haldor Topsøe research facilities in Copenhagen, Denmark. An R&D questionnaire addressing the protocols in place for laboratory safety, risk management, chemical handling and waste disposal has been completed for each facility where work would be conducted.

Both facilities have safety protocols adhering to standard laboratory safety procedures including safety equipment and personal protective equipment. RTI uses Occupational Health and Environment (OHE) Management System procedures to insure compliance with external regulations and policies. RTI also has external auditors conducting inspections to insure safety including the State of North Carolina, Durham County Fire Marshals, RTI's insurance provider, and the Federal Aviation Administration. Haldor Topsøe uses a management system to insure compliance with regulatory requirements as mandated by the Danish Working Environment Authority. An internal Health, Safety, & Environmental department is responsible for insuring compliance through initial training and seminars throughout the year on MSDS, handling carcinogens and hazardous waste, personal protective equipment and emergency plans.

Both facilities have all applicable permits in place to conduct research. Nonhazardous liquids, such as process cooling water effluent, are discharged to the municipal water system. Hazardous liquid effluents consisting of solvents, acids, bases, chemical reagents and other liquid wastes will be disposed of by licensed contractors.

Based on this information, DOE has determined the work outlined is consistent with activities identified in categorical exclusion A9 (information gathering, analysis and dissemination) and B3.6 (small-scale research and development, laboratory operations and pilot projects).

NEPA PROVISION

DOE has made a final NEPA determination for this award

Insert the following language in the award:

Note to Specialist :

Cristina Tyler 4.5.2012

DOE Funding: $4,000,000
Cost Share: $1,000,000
Total Project Cost: $5,000,000

SIGNATURE OF THIS MEMORANDUM CONSTITUTES A RECORD OF THIS DECISION.

NEPA Compliance Officer Signature: _____ Date: 4/11/2012
NEPA Compliance Officer

FIELD OFFICE MANAGER DETERMINATION

☐ Field Office Manager review required

NCO REQUESTS THE FIELD OFFICE MANAGER REVIEW FOR THE FOLLOWING REASON:

☐ Proposed action fits within a categorical exclusion but involves a high profile or controversial issue that warrants Field Office Manager's attention.

☐ Proposed action falls within an EA or EIS category and therefore requires Field Office Manager's review and determination.

BASED ON MY REVIEW I CONCUR WITH THE DETERMINATION OF THE NCO :

Field Office Manager's Signature: _____ Date: _____
Field Office Manager