



Department of Energy

Washington, DC 20585

DEC 10 2012

MEMORANDUM: MAXCINE MAXTED
SAVANNAH RIVER NATIONAL LABORATORY (SRNL)

SUBJECT: Research and Development on Graphite Destruction for the Pebble Bed Fuel Elements, WFO-13-002, Germany

In accordance with DOE Order 481.1C, this provides the Office of International Cooperative Activities' concurrence in the proposed project between SRNL and Forschungszentrum Julich GmbH.

Julich is currently storing 152 casks of graphite pebble bed fuel from the AVR reactor. They have a need to remove these casks. The Savannah River Site has fuel processing experience and has been asked to assist with the evaluation of a potential disposition of these fuel pebbles. The research will be done in two phases:

- 1) R&D phase using non-irradiated material conducted at the SRNL and;
- 2) R&D phase using irradiated material to be conducted at the Julich facility in Germany with assistance from SRNL.

The objective of this work is to perform exploratory research on chemical systems for dissolving fuel materials that contain a large fraction of graphite and a system studied by SRNL for the dissolution of high-fired plutonium oxide and bearing scraps.

The period of performance is to be completed by December 2013. The estimated cost of the project is \$1,578,916.

The concurrence is based on a determination that the proposed work is consistent with DOE international agreements and foreign policy objectives.

Should you have any questions, please call Keena Hillary, of my office, who may be reached at (202) 586-8156.

Sincerely,

Phyllis Yoshida

Phyllis G. Yoshida
Deputy Assistant Secretary for
Asia, Europe, and the Americas
Office of Policy and International Affairs

