DATE: November 9, 2000

MEMORANDUM FOR Distribution

FROM: Merrill Heit, DOE SERDP Technical Coordinator

SUBJECT: Strategic Environmental Research and Development

Program (SERDP) FY 2002 Program Release: Solicitation Call For New Starts and SERDP Exploratory Development (SEED) Solicitation: Instructions for Submission by DOE Organizations

• THE FY'02 SERDP PROGRAM SOLICITATION

I - Background Information: The FY'02 SERDP Program Solicitation and Call for Proposals to both federal and nonfederal organizations was issued today. The solicitation is comprised of seventeen (17) focused Statements Of Need (SON) in the areas of Cleanup (2) including Unexploded Ordnance (UXO) (2), Compliance (3), Conservation (4) and Pollution Prevention (6). An additional call for proposals for seven (7) SEED SONs, is being issued concurrently (See SEED Solicitation below).

II - Instructions for DOE Laboratories and Facilities: Information, including the SONs, and general SERDP full proposal preparation procedures, definitions, and evaluation criteria are available through the SERDP homepage on the worldwide web at: http://www.serdp.org/ewg-federal. (Do not use the instructions for the Broad Area Announcement – BAA).

Important - DOE will again be requesting pre-proposals/white papers PRIOR to requesting full proposals. Note: Requirements for DOE pre-proposals are somewhat different than those required by SERDP HQ.

Mechanism for Submission of Pre-proposals/White Papers Through DOE: Before preparing a pre-proposal/white paper, all DOE potential proposers should carefully read ALL of the requirements and background information shown for the federal solicitation at http://www.serdp.org/ewg-federal for details regarding the individual Statements of Need (SON) as well as evaluation of proposals. This information may provide insight into the rigorous requirements for research funding through SERDP.

To be eligible for consideration, the pre-proposal package should consist of a one signed original hard copy, four additional hard copies and an electronic file (via E-mail - "Microsoft Word" or "WordPerfect 6.1"). Pre-proposals/white papers sent via fax will be rejected.

The original and four copies of the pre-proposals/white papers should be sent to:

Dr. Merrill Heit c/o Ms. Judy Nusbaum Office of Biological and Environmental Research (OBER), SC-70 Office of Science U.S. Department of Energy 19901 Germantown Road Germantown, MD 20874-1290

The electronic copy should be sent to: merrill.heit@science.doe.gov

Please DO NOT send any pre-proposals or requests for information to the three DOE Executive Working Group (EWG) members (Aristides Patrinos, Gerald Boyd or Paul Krumpe) listed on the SERDP Homepage.

DOE researchers wishing to respond to this announcement must submit a preproposal/white paper directly to the Department of Energy (not SERDP HQ) by COB, **Tuesday, January 9, 2001**. Notification of successful pre-proposal/white paper submissions will occur through E-mail on or about Wednesday, January 24, 2001, stating that submission of a full proposal is encouraged. All encouraged full proposals will be due to the DOE by COB Tuesday, March 6, 2001. The DOE will submit all approved full proposals to SERDP HQ by COB March 8, 2001, for scientific peer review and additional evaluation.

Note - Any white paper submitted shall be in response to only one of the seventeen (17) SERDP Statements of Need (SON) listed below: You may, however, prepare additional white papers for additional SONs.

FY'02 SERDP SONS

CLEANUP: (2 SONS)

CUSON-02-03 "Improved Understanding of In-Situ Oxidation"

CUSON-02-04 "Impacts of Source Zone treatment"

CLEANUP – UXO: (2 SONS)

CUSON-02-01 "UXO Site Characterization and Remediation Alternatives for Highly Contaminated Sites"

CUSON-02-04 "UXO Site Characterization for Large Areas of Rough or Vegetated Terrain"

COMPLIANCE: (3 SONS)

CPSON-02-01 "Source and Ambient Air Toxic Monitoring for DoD Operations" CPSON-02-02 "Characterization of Aquatic Non-Indigenous Species for DoD Vessels." CPSON-02-03 "Observing and Predicting the Emissions Rates, Transport,

Transformation, and Fate of Air Pollutants Associated with DoD Activities Worldwide"

CONSERVATION: (4 SONS)

CSSON-02-01 "Cultural Resources Management Detection and Evaluation Technologies"

CSSON-02-02 "Impact of Fog Oil Smoke or Insect Populations Which May Be the Food Source for Threatened and Endangered Species"

CSSON-02-03 "Identifying, Characterizing, and Predicting Impacts of Regional Landuse Changes on the Sustainability of Military Installations"

CSSON-02-04 "Low Frequency Audiogram Technologies for Predicting the Impact of Military Noise on Threatened and Endangered Species"

POLLUTION PREVENTION: (6 SONS)

PPSON-02-01 "Environmental Fate and Transport of a New Energetic Material, CL-20"

PPSON-02-02 "Environmentally Innovative Technologies for Polymer Matrix

Composites Reformulation Fabrication and Associated Repair Processes"

PPSON-02-03 "Remote Location and Identification of Expended Munitions"

PPSON-02-04 "Low Temperature Powder Coatings"

PPSON-02-05 "Solid Waste Reduction Associated With Military Rations and Packaging"

PPSON-02-06 "Environmentally Acceptable Pyrotechnic Formulations"

DOE pre-proposal documents must be in abstract form describing the merits and objectives of the proposer's project. The abstract should concisely describe what the proposer has to offer the SERDP Program with sections discussing (a) the proposed objectives and approach with a CLEAR IDENTIFICATION OF THE OVERALL INNOVATION AND SCIENTIFIC/TECHNICAL MERITS; (b) the proposer's capabilities and related experience, or unique combination of these, which are integral factors in achieving a proposed objective; (c) the qualifications and experience of the principal investigator, team leader, or key personnel who are critical in achieving the objectives of the proposal; (d) the duration of the project along with a milestone chart with significant events; and (e) the estimated labor cost, materials cost, burdens, and profit (if any) by year; (f) other organizations that are likely to participate/partner in the project; (Note: DOE proposers are HIGHLY ENCOURAGED to "partner" with one or more, federal - DoD, EPA, other DOE Labs, etc., and/or academic, and/or private-sector organizations. Steps should be taken as early as possible to obtain suitable partners).

DOE pre-proposal/white papers should be unbound and no longer than five pages (not including Cover Page or the one page curriculum vitae (CV) of the principal investigator), single-sided, and 11 point type. One attachment of up to three single-sided pages of test data may also be submitted. The name and address of the DOE National Laboratory or facility submitting the pre-proposal and the name and phone number of the principal investigator or senior researcher who would be in charge of the project should appear on the cover page.

DOE pre-proposals/white papers will be evaluated against the following factors, listed in descending order of importance: (1) SERDP relevance (PASS/FAIL) - potential relevance to SERDP environmental requirements, both DOE and Department of Defense (DoD); (2) overall scientific, technical and socioeconomic merits of the proposal; (3) the

qualifications, capabilities, and experience of the proposed Principal Investigator, team leader, or key personnel who are critical in achieving the proposed objectives; (4) potential to execute the proposed work, and (5) realism of the proposed cost and availability of funds.

All questions pertaining to this solicitation involving DOE labs or facilities should be addressed to Dr. Merrill Heit via e-mail at: merrill.heit@science.doe.gov. Please enclose your phone number in the event that I cannot easily answer your question(s) by return E-mail.

• THE FY02 SERDP EXPLORATORY DEVELOPMENT PROGRAM (SEED)

I - Background Information: The FY'02 SERDP SEED Program Solicitation to both federal and nonfederal organizations was also issued today. Unlike the above Call for New Starts, the SEED Program requires Full Proposals (no pre-proposals). The SEED program is designed to provide initial funding for high-risk, high payoff projects. Funding is limited to a maximum of \$100,000 for one year. Projects, which are successful in this first year, will have the opportunity to compete for additional funds.

The SEED solicitation is comprised of seven (7) focused SONs in the areas of Cleanup (2) including Unexploded Ordnance (UXO) (1), Conservation (1) and Pollution Prevention (3) listed below:

FY'02 SERDP SEED SONS

CLEANUP: (2 SONS)

SEEDSON-02-02 "Alternatives to Microbial Microcosm Studies"

SEEDSON-02-03 "Alternatives Technologies for Long-Term Monitoring"

CLEANUP – UXO: (1 SON)

SEEDSON-02-04 "Innovative Approaches to Unexploded Ordnance (UXO) Cleanup "

CONSERVATION: (1 SON)

SEEDSON-02-01 "Development of Miniaturized Sensors to Monitor or Determine Ecosystem Parameters"

POLLUTION PREVENTION: (3 SONS)

SEEDSON-02-05 "Environmentally Benign Antifouling Approaches for DoD Vessels" SEEDSON-02-06 "Environmentally Benign Biological Fouling Control in Heat Transfer Equipment"

SEEDSON-02-07 "Environmentally Acceptable Alternatives for Non Destructive Inspection with Fluorescent Penetrant Dyes"

Please note that this year an electronic submission of the cover page will be required (http://www.serdp.org/proposal cover/) for all proposals including SEED. Upon completing the pertinent information through the web site, the Principal Investigator will print the cover page, which will have a SERDP Number assigned and that will become the first page for each proposal submitted.

Complete information, including the SEED SONs and proposal preparation procedures (length, style, format, cover Page - [format to be downloaded], technical section, cost estimate, appendixes, etc.), definitions, and evaluation criteria is available through the SERDP homepage on the worldwide web at: http://www.serdp.org/funding/funding.html for the FY 2002 SEED Federal Call for Proposals (Do not follow the instructions for the FY 2002 SEED Broad Agency Announcement) with the following exceptions:

- 1 To be eligible for consideration through the Department of Energy (DOE), proposers wishing to respond to this announcement must submit a proposal, including a signed original copy, plus nine (not five) additional copies, referencing this Call for Proposals and an electronic copy of the full SEED proposal (via E-mail "Microsoft Word" or "WordPerfect 6.1" file).
- 2 All DOE sponsored SEED proposals are due on **February 6, 2001** (not February 8, 2001) to:

Dr. Merrill Heit c/o Ms. Judy Nusbaum Office of Biological and Environmental Research (OBER), SC-70 Office of Science U.S. Department of Energy 19901 Germantown Road Germantown, MD 20874-1290

The DOE will submit all approved SEED full proposals to SERDP HQ by COB February 8, 2001, for scientific peer review and additional evaluation.

Please DO NOT send any SEED proposals or requests for information to the three DOE Executive Working Group (EWG) members (Aristides Patrinos, Gerald Boyd or Paul Krumpe) listed on the SERDP Homepage.

All questions pertaining to this solicitation involving DOE labs or facilities should be addressed to Dr. Merrill Heit via e-mail at: merrill.heit@science.doe.gov. Please enclose your phone number in the event that I cannot easily answer your question(s) by return E-mail.