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	Emergency Employment of Army and Other Resources	
	USACE R&D AND OTHER SEPARATE FOA SUPPORT TO PREPAREDNESS, RESPONSE AND RECOVERY FOR EMERGENCIES AND DISASTERS	
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ER 500-1-20

DEPARTMENT OF THE ARMY U. S. Army Corps of Engineers Washington, D. C. 20314

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Regulation No. 500-1-20

15 October 1985

Emergency Employment of Army and Other Resources USACE RESEARCH AND DEVELOPMENT AND OTHER SEPARATE FIELD OPERATING ACTIVITIES SUPPORT TO PREPAREDNESS, RESPONSE AND RECOVERY FOR EMERGENCIES AN DISASTERS

1. <u>Purpose</u>. This regulation provides guidance and procedures for utilization of U.S. Army Corps of Engineers Research and Development (R&D) activities and other separate field activities (FOA), in support of emergency preparedness for and operations due to natural and/or man-made disasters.

2. <u>Applicability</u>. This regulation is applicable to all HQUSACE/OCE elements and all field operating activities who have responsibility for emergency preparedness and response activities and those R∧D and separate FOA with capabilities that can support these efforts.

3. <u>References</u>.

- a. Executive Order 11490, 28 October 1969, as amended
- b. AR 500-60
- c. ER 11-2-320
- d. ER 500-1-1

4. <u>General</u>. This regulation provides the basic guidance for utilization by FOA responsible for preparedness, response and recovery of the capabilities of R&D activities and other separate FOA to support accomplishment of these missions.

5. <u>Responsibilities</u>.

a. U. S. Army Corps of Engineers (USACE).

(1) <u>Natural Disasters</u>. As detailed in ER 500-1-1, USACE has major responsibilities for preparedness for, response to, and recovery from natural disasters under its own authority (Public Law 84-99 and in support of others, particularly the Federal Emergency Management Agency (FEMA).

^{*}This regulation supercedes ER 500-1-20, 31 October 1983.

(2) <u>Man-made Technical Hazards</u>. USACE provides support to the Regional Response Team (RRT) in its role under the National Oil and Hazardous Substances Contingency Plan. USACE also supports the Department of Defense, the Department of Army, and other agencies in their response to diverse emergencies and disasters (e.g., civil disturbances, fires, explosions, and nuclear accidents) which require its technical expertise.

b. <u>Division and Districts</u>. Within their geographical of responsibility, divisions and districts are generally responsible for accomplishing mission assignments. Divisions and districts are responsible for insuring that preparedness, response and recovery activities are timely, reliable and accomplish the mission with the minimum utilization of resources. To meet these goals, all resources, within and outside the division/district, should be considered during preparedness planning and actual response efforts.

c. <u>R&D Activities and Other Separate FOA</u>. These activities are responsible for insuring that divisions/districts are aware of special capabilities or new capabilities that are not noted in Appendix A of this regulation. When requested to provide assistance, R∧D activities and other separate FOA shall identify specific resources available and release those resources. Where appropriate, detailed agreements on transfer of resources to divisions and districts for pre-planned response missions should be prepared.

6. <u>Preparedness</u>, <u>Response</u>, and <u>Recovery</u>.

a. <u>HQUSACE</u>. HQUSACE staff elements shall incorporate the expertise and resources of R∧D activities and other separate FOA in the development of policy, procedures, and plans to support USACE missions and responsibilities for preparedness and response to natural or man-made emergencies and disasters.

b. <u>Division and Districts</u>.

(1) <u>Preparedness</u>. In accomplishing preparedness activities, the capabilities of R∧D activities and separate FOA will be evaluated and, where determined appropriate, incorporated in the response plans. Procedures should be established for reliable communications/contact with these support activities during both duty and non-duty hours to ensure rapid provision of needed assistance.

(2) <u>Response and Recovery</u>. As new conditions occur during response and recovery activities, the expertise and resources of the R∧D activities and other separate FOA shall be reevaluated.

c. <u>R&D Activities and Other Separate FOA</u>.

(1) <u>Preparedness</u>. R&D activities and separate FOA should insure that all USACE elements are aware of their capabilities to support preparedness, response and recovery activities. Where appropriate, R&D activities and separate FOA should develop plans to accomplishe missions assigned to them and to support other elements during response and recovery.

(2) <u>Response and Recovery</u>. If an R&D activity or separate FOA is assigned a specific mission or requested to provide technical assistance and/or resources for a response or recovery action, that activity must insure that adequate resources are available to accomplish the mission in a timely manner. Where an ongoing study or research project has potential applicability to a response or recovery mission, the R&D activity should contact the USACE element responsible for the mission to determine if the services available consist assist in mission accomplishment.

7. <u>Resources and Funding</u>.

a. <u>Preparedness Activities</u>. When an R&D activity or separate FOA is tasked to support a division's/district's preparedness activities, funding will be provided by the tasking element. Preparedness actions undertaken by R&D activities or separate FOA without specific assignment of mission or responsibility will be accomplished with available in-house resources.

b. <u>Response and Recovery</u>. When an R&D activity or separate FOA is tasked to support response and/or recovery activities under USACE authorities, funding will be provided thorough the tasking element from the correct appropriation (e.g., PL 84-99, O&M General, Construction General). If the tasking is in support of another agency's authority (e.g., DOD, FEMA, Department of State), request for reimbursement will be in accordance with ER 11-2-320.

FOR THE COMMANDER:

Trit Striller

ARTHUR E. WILLIAMS Colonel, Corps of Engineers Chief of Staff

1 Appendix App A-R&D Activities and Other Separate FOA Capabilities

APPENDIX A

R&D ACTIVITIES AND OTHER SEPARATE FOA CAPABILITIES

A-1. <u>General</u>. The capabilities listed are the general capabilities of each activity and do not address all the expertise or resources that may exist. Resources noted are those which are readily available for response or can quickly be made ready. During coordination between divisions/districts and the R&D activities or separate FOA, specific mission requirements and specific resources and expertise should be evaluated.

A-2. <u>Waterways Experiment Station (WES)</u>.

a. <u>Technical Expertise</u>.

- (1) Hydraulic/hydrologic engineering.
- (2) Structural engineering.
- (3) Mobility and transportation.
- (4) Sediment transport.
- (5) Geotechnical and geophysical engineering.
- (6) Chemical and biological.
- (7) Environmental.
- (8) Explosives and blast analysis.
- (9) Radiological.
- (10) Computer programming and modeling.
- (11) Coastal engineering.
- b. Equipment and Other Resources.
- (1) Existing physical hydraulic models.
- (2) New model construction.
- (3) Mobile laboratories.
- (4) Portable waste treatment plant.
- (5) Radiology monitoring teams and equipment.

- (6) Field measuring equipment.
- (7) Boring and testing equipment.
- (8) Coastal and marsh traveling equipment.
- (9) Scuba divers.
- (10) Surf zone and beach surveying equipment and teams.
- (11) Coastal/oceanographic/meteorological monitoring equipment.
- (12) Teams for rapid response coastal measurements.
- (13) X-band radar and Codar.

A-3. Cold Regions Research and Engineering Laboratory (CRREL).

- a. <u>Technical Expertise</u>.
- (1) Ice, ice jams, and ice jam flooding.
- (2) Ice blasting.
- (3) Structural engineering.
- (4) Earthquake engineering.
- (5) Impacts of snow; varied.
- (6) Fire impacts (erosion).
- (7) Foundation engineering.
- (8) Remote sensing.
- (9) Arctic/Antarctic operations.
- (10) Environmental.
- (11) Cold regions hydrology.
- b. Equipment and Other Resources.
- (1) Instrumentation and monitoring equipment.
- (2) Special "through-ice" radar.
- (3) Air transportable shelters.

A-4. Construction Engineering Research Laboratory (CERL).

- a. <u>Technical Expertise</u>.
- (1) Corrosion and coatings technology.
- (2) Accoustics.
- (3) Building technology.
- (4) Energy systems.
- (5) Facilities maintenance.
- (6) Civil, mechanical and electrical engineering.
- (7) Environmental/sanitary engineering.
- (8) Expedient construction methods for mobilization.
- b. Equipment and Other Resources.
- (1) Computer-aided management processes.
- (2) Large shake table.
- A-5. Engineer Topographic Laboratories (ETL).
 - a. Mapping and terrain.
 - b. Survey equipment (precise and rapid).
- A-6. Hydrologic Engineering Center (HEC).
 - a. Hydraulic/hydrologic engineering.
 - b. Computer programming expertise.
 - c. Existing computer programs (e.g., hydraulics, hydrology, economics, sediment transport).

- A-7. <u>Water Resources Support Center (WRSC)</u>.
 - a. Management of USACE dredge fleet.
 - b. Status of private industry dredge fleet.
 - c. Port facilities status.
 - d. Remote sensing (LANDSAT).
 - e. Radio frequency management.