

## **Committees on Biological Effects of Atomic Radiation, 1954-1964**

The mission of the Committees on The Biological Effects of Atomic Radiation (BEAR) was to provide a thorough review of all that was known at the time about the effects of atomic radiation on living organisms. The Committees on BEAR had been put together in 1955 by then-NAS president Detlev Bronk in response to the increasing but uncoordinated accumulation of data on the effects of atomic radiation.

Six committees were formed to investigate various problems arising from the release or presence of radiation in the environment. These committees were: Pathologic Effects of Atomic Radiation (with various subcommittees); Meteorological Aspects of the Effects of Atomic Radiation; Effects of Atomic Radiation on Agriculture and Food Supplies; Disposal and Dispersal of Radioactive Wastes; and Oceanography and Fisheries. Several reports, including two summary reports, the first released in 1956 and second released in 1960, were published by the various BEAR committees and subcommittees before the study was terminated in 1964.

The studies conducted by the Committees on BEAR did not overlap with the studies conducted by the Atomic Bomb Casualty Commission. The collection contains correspondence, reports, and meeting minutes, and cover the years 1954-1964 for a span of 6 linear feet. The collection is divided into two groups, one containing activity records, and the second containing reports.

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- Present Status of Dispersal & Disposal of Radioactive Wastes: 1956
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- Proposals of Panel on Genetics on Limitations of Radiation Exposure: 1956
- Relation of Nature & Magnitude of Wastes to Fuel Processing & Types of Reactors: 1956
- Technological & Administrative Problems in Transport Use & Disposal of Radioisotopes: 1956
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## PUBLICATIONS

- Pediatrics: Supplement on Radiation Hazards: 1957
- General: 1955-1962

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## ADMINISTRATION

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- Committees on Biological Effects of Atomic Radiation
  - Agriculture & Food Supplies: Behavior of Radioactive Fallout in Soils & Plants: 1963
  - Continuation of Program: 1962
  - Pathologic: Subcommittee on Hematology Summary Report: 1963
  - Pathological Effects of Thyroid Irradiation: Report to Federal Radiation Council: 1962

### INSTITUTIONS – ASSOCIATIONS & INDIVIDUALS

- American College of Radiology: Practical Manual on Medical & Dental Use of X-Rays with Control of Radiation Hazards: 1958

## INTERNATIONAL RELATIONS

- Academies & Councils Abroad: Medical Research Council of Great Britain Statement on Report of UN Scientific Committee on Effects of Atomic Radiation: 1958
- Institutions Associations Individuals Abroad
  - International Commission on Radiological Protection Report: 1960
  - International Commission on Radiological Units & Measurement: Report: 1960

### ORGANIZATION: NAS: COMMITTEES ON BIOLOGICAL EFFECTS ON ATOMIC RADIATION

- Disposal & Dispersal of Radioactive Wastes: Disposal of Radioactive Wastes: Status Report: 1958
- Genetic Effects
  - Physical Properties of Ionizing Radiation: 1956
  - Section II: Gonadal Dose Received from Natural Background Radiation: 1957
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- Oceanography & Fisheries
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  - Radioactive Waste Disposal from Nuclear-Powered Ships: 1959
- Pathologic Effects
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    - Ionizing Radiation from External Sources Report: 1961
  - Summary Report: Pathological Effects of Atomic Radiation: 1956

- Summary Reports: Biological Effects of Atomic Radiation
  - Report to Public: 1956; 1960
  - Summary Report: 1956; 1960

## GOVERNMENT

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- Agriculture: Defense Against Fallout on Farm: 1956
- Atomic Energy Commission
  - Analysis of Stratospheric Strontium-90 Measurements: 1959
  - Annotated Bibliography on Transport & Disposition of Atomic Debris: 1956
  - AEC Atmospheric Radioactivity Studies: 1959
  - Effects of Nuclear Weapons Testing: 1955
  - Evaluation of Ground-Level Sampling Program: 1958
  - Latest Stratospheric Fallout Results Particularly on Russian October Series: 1959
  - Naturally Occurring Radioactive Substances & Radiation Doses: 1954
  - Radioactive Contamination of Certain Areas in Pacific Ocean from Nuclear Testing: 1957
  - Relationship between Geologic Environment & Mortality from Congenital Malformation: 1959
  - Statements: 1955-1959
  - Stratospheric Radioactivity Measurements: 1959
  - US Sea Disposal Operations: 1957
- Commerce: Radioactive Waste Disposal in Ocean: 1954

### EXECUTIVE

- Federal Radiation Council
  - Background Material for Development of Radiation Protection Standards: 1960-1961
  - Estimates & Evaluation of Fallout in US from Nuclear Weapons Testing Conducted through 1962-1963
  - Health Implications of Fallout from Nuclear Weapons Testing through 1961-1962

### FOREIGN GOVERNMENTS

- Great Britain: Atomic Energy Research Establishment: Radiological Dose to Persons in UK Due to Debris from Nuclear Test Explosions Prior to Jan 1958; 1956

### INTERNATIONAL RELATIONS

- UN Scientific Committee on Effects of Atomic Radiation
  - Effects of Atomic Radiation: 1958
  - Report of US Delegation: 1957
- UN World Health Organization: Effects of Radiation on Human Heredity: 1957