

**BEFORE THE UNITED STATES HOUSE OF REPRESENTATIVES
COMMITTEE ON NATURAL RESOURCES
SUBCOMMITTEE ON OVERSIGHT AND INVESTIGATIONS**

**STATEMENT OF BILL GRAHAM, PUBLIC ADVOCATE
MARSHALL ISLANDS NUCLEAR CLAIMS TRIBUNAL
FEBRUARY 24, 1994**

Mr. Chairman and distinguished members of the Subcommittee,

The Agreement for the Implementation of Section 177 of the Compact of Free Association, signed by Marshall Islands President Amata Kabua and United States Ambassador Fred Zeder in Majuro in June 1983, formally recognized as yet unspecified "contributions and sacrifices made by the people of the Marshall Islands in regard to the Nuclear Testing Program."

In Article VIII of that Agreement, the Government of the United States concluded that the Northern Marshall Islands Radiological Survey and related environmental studies conducted by it represented "the best effort ... to evaluate and describe radiological conditions in the Marshall Islands" and that those studies "can be used for the evaluation of the food chain and environment and estimating radiation-related health consequences of residing in the Northern Marshall Islands."

The state of the art scientific reference available at the time for estimating such radiation-related health consequences was the report "The Effects on Populations of Exposure to Low Levels of Ionizing Radiation" issued in July 1980 by the National Academy of Sciences/National Research Council's Committee on the Biological Effects of Ionizing Radiation.

That report, commonly known as BEIR III, acknowledged that there were unresolvable differences among committee members concerning the methods of extrapolating to the most probable effects of low doses of radiation. Because of those differences, the somatic effects section of the initial final draft report that had been approved by the Academy in 1979 was modified by a subgroup of the committee, resulting in the writing of a strong dissenting statement to the report by Dr. Edward P. Radford, Chairman of the overall BEIR III Committee and of the Subcommittee on Somatic Effects.

Dr. Radford stated his support for the linear no-threshold model originally adopted by the subcommittee for estimating cancer induction by radiation, as opposed to the linear-quadratic model frequently employed in the final version of the report. He observed that the approach used "has the effect of reducing the cancer risk estimates ..." and that this conclusion "ignores the considerable body of supportive data ... which indicate that as the follow-up of human study populations has been extended, evidence of cancer risk is increasing, the doses at which effects have been observed have progressively decreased, and the number of different human cancers in which radiation exposure has shown an effect has been extended." [BEIR III, page 250]

In 1990, the National Research Council and National Academy of Sciences issued a new report entitled "Health Effects of Exposure to Low Levels of Ionizing Radiation—BEIR V." Citing "significant developments in our knowledge" and "new data on the late health effects of radiation in humans," the Executive Summary section of the BEIR V report states (at page 6): "The cancer risk estimates derived with the preferred models used in this report are about 3 times larger for solid cancers (relative risk projection) and about 4 times larger for leukemia than the risk estimates presented in the BEIR III report."

Clearly, circumstances had changed with regard to accepted medical and scientific knowledge about the effects on humans of exposure to radiation since the 1983 consummation of the Section 177 Agreement.

In the meantime, in accordance with Article IV of the Agreement, the Government of the Republic of the Marshall Islands had established the Nuclear Claims Tribunal in mid-1988, giving it statutory jurisdiction "to render final determination upon all claims past, present and future of the Government, the citizens and nationals of the Marshall Islands which are based on, arise out of, or are in any way related to the Nuclear Testing Program."

During the first year of its existence, the Tribunal received thousands of claims for an extensive variety of personal injuries, land damage and loss of personal property from and on behalf of individuals from every atoll in the Marshall Islands. In addition, the Tribunal had:

Reviewed the reported results of the 1978 Northern Marshall Islands Radiological Survey, noting that the survey had been conducted strictly on an aerial basis and that Kwajalein and all atolls to the south had been excluded from the survey;

Analyzed both the BEIR III report and the history of medical findings of Brookhaven National Laboratory visits to the Marshall Islands, and observed that the focus of the latter's examinations had been limited largely to the people of Rongelap and Utirik;

Apprised itself of the programs established by Congress for the benefit of those people of the Marshall Islands deemed to have been affected by the testing program¹ and ascertained what had been done to provide compensation and medical care and treatment;

Sought information on the monitoring for illnesses, the comprehensive periodic survey and analysis of radiological status, and the development of updated radiation dose assessments and risk estimates mandated by Congress in 1980², and found no evidence of any such efforts beyond Bikini, Enewetak, Rongelap and Utirik; and

¹ For example: U.S. Public Laws 88-485 (1964) and 95-134 (1977), which provided compensation to the peoples of Bikini, Enewetak, Rongelap and Utirik "in full settlement and discharge of all claims against the United States arising out of the thermonuclear detonation on March 1, 1954" and P.L. 96-205 (1980), which was intended to "provide for the people of the atolls of Bikini, Enewetak, Rongelap, and Utirik and for the people of such other atolls as may be found to be or to have been exposed to radiation from the nuclear weapons testing program, a program of medical care and treatment..." (italics added)

² Also provided for under U.S. Public Law 96-205.

Taken notice of U. S. Public Law 100-321 (the Radiation-Exposed Veterans Compensation Act of 1988), which provided a "presumption of service connection" to veterans who participated in the testing program for 13 specified medical conditions.

By mid-1989, the Tribunal had realized that it could not effectively carry out its mandate based on the limited information available to it. Most of the personal injury claims before it were not supported by a documented medical diagnoses and so could not be adjudicated in a fair manner. And without radiological survey results for half of the nation's atolls and islands, many of the land claims could never be heard. Accordingly, the Tribunal requested the Government of the Republic to utilize the \$3 million available to it under Article II, Section 1(e) of the Section 177 Agreement to conduct medical surveillance and radiological monitoring activities on a nationwide basis.

A medical diagnostics program, directed by expatriate M.D.s, was established by the Republic in early 1990 and was continued by the Tribunal, at its own expense, for an additional six months when the allocated 177 funds had been exhausted in late 1992. During the three years of its existence, the program's doctors examined and/or reviewed medical records of nearly 3,500 personal injury claimants and filed with the Tribunal individual diagnostic reports on each.

In addition, in late 1989, a nationwide radiological study was initiated by the Republic under the direction of a resident scientist working with an international scientific advisory panel. The activities of that study continue and will be reported on today by Dr. Steven Simon.

With documented medical diagnoses of personal injury claimants beginning to come before the Tribunal and the release of the BEIR V report, the Tribunal was finally able to begin, in early 1991, the actual process of establishing a compensation program for personal injury. In carrying out this task, an important guideline was provided by the United States Radiation Exposure Compensation Act of 1990 (P.L. 100-406). Under that law, Congress found that "fallout emitted during the Government's atmospheric nuclear tests exposed individuals to radiation that is *presumed* to have generated an excess of cancers among these individuals." (italics added) The law provides for "partial restitution" in the form of payments of \$50,000 for any of 13 specified diseases suffered by people meeting certain physical presence requirements.

Before, during, and after the testing program, the U.S. had failed to compile exposure data on the people of the Marshall Islands, had failed to investigate thoroughly the existing health and non-radiation risk factors of the population, and had largely provided medical diagnostic services only to the people of Rongelap and Utirik, whose radiation exposure levels it could only estimate.

In light of the presumptions of service connection and causation extended by the United States to its own citizens, the Tribunal determined that it could do no less than provide for similar presumptions on behalf of the people of the Marshall Islands. Therefore, after much deliberation and review, the Tribunal adopted regulations in August 1991 identifying 25 medical conditions which it would administratively presume were caused by exposure to radiation created by the testing for those who were physically present in the Marshalls Islands during the period of testing. In late 1993, the Tribunal amended its regulations to include two additional conditions on the presumed list, bringing the current total to 27 (see Attachment 1).

The first 13 of the Tribunal's presumed conditions are the same as in the Radiation-Exposed Veterans Compensation Act and the Radiation Exposure Compensation Act. The additional 14 were adopted based on research finding of the Radiation Effects Research Foundation in Japan and its Life Span Study of atomic bomb survivors, the conclusions contained in BEIR V, and on consultation with and recommendations of Dr. Robert Miller, a recognized expert in the area of radiation health effects who is the Chief of Clinical Epidemiology at the National Cancer Institute.

Once the original list of 25 presumed conditions had been finalized, the Tribunal's attention was directed to setting amounts of compensation for each condition. With substantial input from a variety of medical professionals, a rating system was developed taking into account three distinct matrices: typical prognosis, general amount of pain and suffering, and level of treatment usually involved for each condition. This led to an overall ranking of the original 25 conditions with a wide range of impact between the top and bottom.

The Tribunal then re-examined the provisions of the U.S. Radiation Exposure Compensation Act. Of the 13 conditions compensated equally at \$50,000 under that law, it was clear that thyroid cancer ranked well below the other 12 on the Tribunal's ranking of overall impact. Based on this, the Tribunal determined that the \$50,000 RECA payment for thyroid cancer should be viewed as a benchmark and that compensation levels for the other 24 conditions should be established based on their relative impact and severity (again, see Attachment 1).

To date, the only compensation awards made by the Tribunal have been for those 27 presumed medical conditions, as suffered by individuals who were physically present in the Marshall Islands during the testing program.

Only a few awards have been made for presumed medical conditions suffered by deceased individuals for whom the only documented diagnosis is that contained on a certificate of death.³

No awards have been made for any personal injuries suffered by individuals who had not been born (or were not *in utero*) by the conclusion of the testing program.

No awards have been made for other accepted radiogenic conditions such as lung cancer which may be proven by an individual to have resulted from the testing program but which are not on the presumed list because of other risk factors.⁴

³ A decision issued by the Tribunal in June 1993 provided that, with certain restrictions, "any certificate admitted for the purpose of showing that a decedent suffered from a compensable condition should constitute prima facie evidence of that issue." That decision limited the acceptable period between time of death and signing of the certificate by the physician to five days. In January 1994, based on briefs filed before it, the Tribunal issued a decision stating that it "will admit death certificates which are signed up to one year after death as prima facie evidence of the existence or non-existence of a medical condition." Resolution of over 20 such claims is pending.

⁴ It is expected that resolution of claims for such "non-presumed personal injuries" will begin during this year through formal individual and/or group hearings conducted by the Tribunal. Before those hearings can be scheduled, however, radiation exposure dose estimates must be prepared on an individual basis for each claimant who suffered from a non-presumed medical condition that could have resulted from radiation. The need for these dose estimates has been communicated to the nationwide radiological study but it is uncertain when or if the study will be able to provide the requested information.