

Betsy Ulrick

NOV. 07 1991

License No. SMB-1541

Docket No. 040-08980

MEMORANDUM FOR: Robert L. Fonner, Special Counsel for Fuel Cycle  
and Safeguards Regulation, OGC

John E. Glenn, Chief  
Medical, Academic, and Commercial  
Use Safety Branch  
Division of Industrial and Medical  
Nuclear Safety, NMSS

James Lieberman, Director  
Office of Enforcement

THROUGH: Karla D. Smith, Regional Counsel, RI *K. Smith*

~ Ronald R. Bellamy, Chief  
Nuclear Materials Safety Branch  
Division of Radiation Safety and Safeguards, RI

FROM: John D. Kinneman, Chief  
Research, Development and Decommissioning Section  
Nuclear Materials Safety Branch  
Division of Radiation Safety and Safeguards, RI

SUBJECT: HERITAGE MINERALS, INC.

In a letter dated September 20, 1991 Robert Stern, Chief of the Bureau of Environmental Radiation, Department of Environmental Protection, State of New Jersey requests that the NRC review its decision regarding NRC jurisdiction over various areas at Heritage Minerals, Inc., Lakehurst, New Jersey. In letters dated February 9 and March 20, 1991, Dr. Stern originally requested that we explain our decisions concerning the Heritage license. We answered in a letter dated June 6, 1991. While Stern's September 20 letter is very general concerning the physical areas, the areas in question are known as the "original new feed area", "recycled tailings area", and the "salvage storage area" and have also been referred to as the gray and blue areas, after the colors used to designate them on a map of the site submitted by the licensee. Dr. Stern contends that the operations at Heritage Minerals, Inc. always produced a monazite-rich waste stream which should have been licensed and regulated by the NRC, and, therefore, that the NRC has, and should exert, jurisdiction over all areas at the site contaminated with the monazite waste stream, including the blue and gray areas.

From the memorandum from Fonner to me, dated November 30, 1990 (copy enclosed), we concluded that if a primary activity is not licensable, and source material is contained in a waste stream, but that waste stream is not licensable, the NRC has no regulatory authority over the waste material or areas contaminated by it. Furthermore, that memorandum indicates if the primary activity resulted

in a temporary separation of the source material (considered unwanted waste) from the desired ores, and the source material was recombined with other waste material from the process, then the NRC does not have regulatory authority over the waste material. On that basis we issued License No. SMB-1541 in its current form and formulated our first answer to Dr. Stern.

To prepare our response to the current letter, we reviewed the entire case and all of the associated documents. At the Lakehurst site, mining and processing of sand was performed by ASARCO from 1972 until March 1982, and neither feed stock nor final waste material are believed to have contained enough uranium or thorium to be considered source material. The wet mill tailings and dry mill tailings from this operation were stored in the Original New Feed Area, also known as the gray area. These areas are above background for thorium, but contain less than 0.05 percent by weight. The land was sold to Hovson's Inc. in 1986, which leased the site to Mineral Recovery Inc., later known as Heritage Minerals Inc. Processing from 1986 through 1990, known as Heritage Phase I, did include the separation of a monazite-rich waste stream (greater than 0.05%) but this stream was promptly recombined with other waste streams to produce a waste much less than 0.05%. The final waste material does not contain a sufficiently high concentration of uranium and thorium to be considered source material. This created the Salvage Storage Area and the Recycled Tailings Area, together known as the blue area. There was no NRC license at the site during this time.

As a result of an allegation, an inspection was performed at the Lakehurst site in January 1989. The Inspection Report (enclosed) includes a reference to a Heritage Minerals, Inc. memorandum which documents a meeting in August 1986, between the Plant Manager, a consultant, and a NRC representative in which the NRC representative reportedly told them that a license was not required for the then current process. NRC personnel agree this was the conclusion of the meeting, but do not recall the information supplied by Heritage or the basis for the conclusion. In 1989, following the inspection, a Notice of Violation was issued for the possession of source material in the form of the monazite-rich waste stream even though this waste stream was promptly recombined with other waste streams.

Based on our recent review, and if our understanding of the Fonner memorandum is correct and we rigidly apply the position to all aspects of the case, then it appears the Notice of Violation dated February, 1989 (enclosed) should not have been issued. We did not recognize this possible conclusion during our earlier review, therefore, the June 6, 1991 response to New Jersey is very legalistic. As a result of this Notice of Violation, Heritage Minerals, Inc. submitted an application for a license in March 1989. It was not until April 1990, when Heritage Minerals, Inc. began to reprocess the waste tailings stored in the Blue Area (Heritage Phase II), that the company changed its process so that the monazite-rich waste stream was NOT recombined with the remaining waste from their separation process, resulting in the storage pile of licensable quantities of source material and the production of a very clean (radio-logically) waste stream. This change in operations was made because of the

Notice of Violation and the requirement to have an NRC license. Heritage has been unable to find a buyer for the monazite, and, believing it cannot afford the disposal costs for additional radioactive material, has discontinued operations and begun to decommission the facility.

If the Notice of Violation is correct, then it appears the monazite-rich waste stream and its disposal could be regulated by the NRC, even though it was produced inadvertently as a waste product of the primary activity. Since this monazite-rich waste stream was disposed by recombination with other waste streams, resulting in the blue and gray areas, the NRC could have jurisdiction over these areas. Dr. Stern would very much like NRC to exercise that authority. However, in January 1991, we issued License No. SMB-1541 and specifically excluded the areas in question from regulation.

After careful review of the case and discussion with NMSS, we have concluded that the decisions to license the Heritage site can be best characterized as operational and policy decisions. These decisions have a sound legal foundation, but are not compelled by the legal arguments. There are legal arguments which support alternate courses of action. My letter dated June 6, 1991 was somewhat misleading in that it portrays these decisions as strictly as legal ones. Therefore, we propose the attached answer to Dr. Stern, which indicates that the decisions were more operational in nature and that we do not plan to change our current position.

However, Dr. Stern and the State of New Jersey are strongly motivated to continue to challenge our position. (If NRC regulates the area, the State will not have to make as many difficult decisions concerning the site.) Therefore, we are concerned that a rigorous review of the events and the legal analysis could lead to the conclusion that the NOV was invalid and that Heritage did not require a license or, in the alternative, that the entire site is subject to NRC jurisdiction, positions quite different from our current one. Therefore, we present the arguments in detail and would appreciate NMSS and OGC review of and concurrence with our response.

In addition, we are concerned about our legal liability with regard to Heritage. Heritage has ceased operation and, as a result of the NOV, has expended considerable resources, which would not otherwise have been expended. If this NOV is in error has NRC committed a tort? Is there a significant risk of successful litigation to recover damages? Should we take corrective action?

Your input to me by November 27, 1991, will be appreciated.

John D. Kinneman, Chief  
Research, Development and  
Decommissioning Section  
Division of Radiation Safety  
and Safeguards, RI

Enclosures:

- 1. Letter dated September 20, 1991 from State of New Jersey
- 2. Letter dated February 21, 1989 to Heritage Minerals, Inc. with NOV and Inspection Report No. 99990001/89-001
- 3. Letter dated July 25, 1990 from Heritage Minerals
- 4. Letter dated March 20, 1991 from Stern to Kinneman
- 5. Letter dated June 6, 1991 from Kinneman to Stern
- 6. Memorandum Fonner to Kinneman dated November 30, 1990
- 7. Proposed Response to Dr. Stern

bcc:

Region I Docket Room (w/concurrences)

J. Kinneman, RI

M. Lamastra, NMSS

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10/6/91

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RI:DRSS  
Concurrence  
Smith w/ sending  
to Helge  
for review

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