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ENGINEERING AND RESEARCH DEPARTMENT

NOV 25 1980

Mr. C. Anderson
U. S. Nuclear Regulatory Commission
Division of Safety Technology
Generic Issues Branch
Washington, D.C. 20555

Subject: Limerick Generating Station - In-Plant Test

Dear Mr. Anderson:

In order to quantify assumptions related to the determination of loads on adjacent structures due to hydrodynamic loads in the Limerick containment, we intend to perform tests on December 13 and 14, 1980.

The Limerick Generating Station In-Plant Test will consist of a series of tests in which the suppression pool will be excited and the responses of the containment and adjacent structures (reactor building and control room) will be measured.

The excitation energy will be caused by the simultaneous rupture of nitrogen filled bubble sources symmetrically located and submerged in the suppression pool. Two sets of four and eight bubble tests are planned. The bubble sources were developed by SRI International. These sources simulate a phenomena similar to the air clearing of an SRV discharge, although we do not plan to use this simulation directly.

It is our intention to measure suppression pool loads, and determine the effects on adjacent structures. Accelerometers located at corresponding computer model node points will measure input accelerations transmitted from the containment, down through the rock, up into the reactor building/control structure. From the data gathered and its subsequent reduction, actual parameters related to soil/structure interaction, building response and damping will be determined.

As previously mentioned, the test is scheduled for the weekend of December 13 and 14, 1980, and you or your representative would be welcome to observe the performance of this test. Please advise me by December 8, 1980, if you plan to attend. In addition, please provide a telephone number at which you or your representative could be reached should there be a change in schedule.

Very truly yours,

H. W. Vollmer

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H. W. Vollmer
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