

Monthly Highlights

for

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Thermal-Hydraulic LMFBR and LWR Safety Experiments
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1. Thermal-Hydraulic Reactor Safety Experiments

1.1 Heat Transfer in Core-Concrete Interactions: Liquid-Liquid Heat Transfer
(G. A. Greene)

The single and multi-bubble entrainment experimental apparatus have been completed. Experimental studies will proceed.

1.2 Heat Transfer in Core-Concrete Interactions: Coolant Layer Heat Transfer
(G. A. Greene)

Work has begun in the design and construction of the liquid-liquid film boiling apparatus.

1.3 Core Debris Thermal-Hydraulic Phenomenology-Steam Spike Phenomenology
(T. Ginsberg, N. Tutu)

Analysis of previously acquired particle bed quenching data was carried out in parallel with analytical model development. A model has been developed to characterize the transient heat transfer, and hydrodynamics of particle bed quenching with top flooding. Computer coding of the model is underway.

Modifications to the experimental apparatus are underway to permit use of thermocouples in the test vessel during experiments with one-half inch spherical particles.

1.4 General Programmatic Activities

None to report.

Monthly Distribution List

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