

AUSHANG

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Unser Zeichen:

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Einladung zum IKET-Kolloquium

Zeit: Dienstag, 20. Januar 2015, 15.00 Uhr

Ort: Kolloquiumsraum des IKET, Campus Nord, Bau 419, Raum 104

Referent: Dr. Martin Sonnenkalb, Gesellschaft für Anlagen- und Reaktorsicherheit (GRS) mbH, Köln

Titel: Insights gained from analyses (ATHLET-CD/COCOSYS) of the Fukushima severe accidents (units 2 and 3) – GRS contribution to the OECD/NEA BSAF project

Zusammenfassung:

The GRS participated on behalf of the German ministry BMWi in the OECD/NEA BSAF project, phase I, which was recently completed. Coupled ATHLET-CD/COCOSYS analyses for the SA progression during the first days for the similar Units 2 and 3 of Fukushima Daiichi have been provided. ATHLET-CD is a detailed SA code based on the thermal hydraulic code ATHLET of GRS to simulate the processes in the reactor circuit before and during core degradation. COCOSYS, developed as well at GRS is focused on the simulation accident and SA progression in the Containment and the surrounding buildings of NPP.

The objective of the presentation is to chair experience gained from code application to the SA scenarios in the BWRs at Fukushima Daiichi site. The GRS results obtained in this OECD/NEA BSAF project, phase I, are encouraging in terms of capturing essential severe accident signatures. The calculated accident progression of the “best estimate” analyses follows the accident time-line quite closely, what is a prerequisite for reasonable core degradation calculations, as the time window available for such is small. The analyses are useful to identify areas which require future attention in the decommissioning process of the plants, to define information needs to be gained from the decommissioning, and to define further research needs for experiments and code model improvement. The objectives of the GRS analyses as part of the BSAF project, phase II, which recently started, will be summarized as an outlook at the end.

Vortrag in Deutsch/Lecture in German

gez. T. Schulenberg

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