

DRAFT Additional Question (29164) for Inclusion with RAI 8504

This was discussed with KHNP during a public meeting teleconference on March 3, 2016.

The CE-ABB SBLOCA methodology being used by KHNP was approved for power ratings up to 3800 MWt, per the letter from Parr (NRC) to Stern (CE), dated June 13, 1975. The APR1400 SBLOCA calculations for the APR1400 design are conducted at a power level of 4062.7 MWt (102% of 3983 MWt), which is significantly higher than the 3800 MWt restriction on the CE-ABB SBLOCA methodology. Document the revision of the SBLOCA methodology being used and provide the justification for using the methodology and the computer codes at this higher power level. The justification should include references to other instances where the CE-ABB SBLOCA methodology has been approved by the NRC for higher power levels. The applicant needs to demonstrate the conservatism of the methodology at the APR1400 power level, and establish that there are no phenomenological departures due to APR1400 power level or design differences that would invalidate the use of the SBLOCA methodology or the computer codes approved up to 3800 MWt applications.