Overview of Fukushima Daiichi Events – Technology, Chronology, Damage, Current Conditions, and Lessons Learned

Abstract: On March 11, 2011 one of the largest earthquakes in recorded history occurred off the northeast coast of Japan. The earthquake severely jolted Japan including the six nuclear power plants at the TEPCO Fukushima Daiichi power station. The earthquake also created a tsunami; the effective water rise was about five stories when it arrived at Fukushima Daiichi; the tsunami was apparently the root cause of most of the subsequent events. Using pictures and drawings, this lecture will: fill in some of the details, e.g., plant location and configuration, the reactors on the site, a high level chronology of events, the source and extent of damage; make a brief comparison to TMI-2 and Chernobyl; describe the current conditions on the site; and provide examples of lessons learned.