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ELM pacing with 3D fields in boronization operational phase for main ion control

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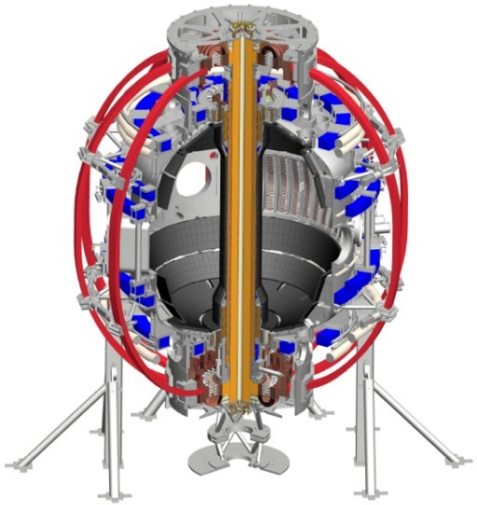

Background and experimental plan

- ELM pacing via 3D field application has been used to control impurity accumulation in discharges with lithium wall conditioning
- With boronized walls main ion accumulation limits discharge length, 3D field ELM pacing has not been attempted
- Rough shot plan
  - Apply n=3 pulse trains at various frequencies
  - Monitor main ion and impurity diagnostics to assess effect on particle control
  - Vary amplitude to find an operating point above triggering threshold, but below level at which ELMs expel large fraction of stored energy
  - Adjust 3D field waveform and plasma shape (e.g., elongation) to produce a discharge with reliable triggering and stationary conditions.