



Contribution ID: 1725 Contribution code: MOPL116

Type: **Poster Presentation**

A Booster Replacement Linac for the Future of High Energy Physics at Fermilab

Monday, 8 May 2023 16:30 (2 hours)

After the PIP-II linac is commissioned as a new start of the Fermilab Accelerator Complex, the Booster will become a bottleneck for future high intensity particle physics research at Fermilab. An SRF linac is proposed as a replacement for the booster to enable future higher power proton beams in the Fermilab complex - this would include neutrino-based and muon-based studies, dark matter searches, and a platform for R&D for a muon collider. In this contribution, we overview the early conceptual accelerator design under development and discuss potential configuration options.

Funding Agency

Footnotes

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Session Classification: Monday Poster Session

Track Classification: MC1: Colliders and other Particle Physics Accelerators: MC1.A08: Linear Accelerators