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

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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.

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Footnotes

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