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Type: Poster Presentation

Efficient Continuous-Wave Normal Conducting Accelerator for Industrial applications.

Wednesday 13 August 2025 16:00 (2 hours)

A normal conducting, high power, high efficiency copper linear accelerator prototype is being developed for industrial applications. The system will be powered by low-cost high-efficiency magnetron RF sources and will use a gridded thermionic cathode electron gun. Leveraging the significant accelerator expertise at JLab and industry partners, these technologies will be combined to deliver high-power (>100 kW) electron beams with energies of 1 MeV or higher that are cost-effective to produce and operate. The design is modular such that energy and power can be increased by adding additional sections as required. The status of the design, prototype fabrication and plans for a beam demonstration at JLab are described.

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Yes

Would you like to submit this poster in student poster session on Sunday (August 10th)

No

Footnotes

Funding Agency

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Yes

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