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Type: **Invited Oral Presentation**

Accelerating Discoveries in Particle Physics

Friday 15 August 2025 11:30 (30 minutes)

Particle accelerators have played a critical role in high-energy physics for many decades. They have facilitated the discovery of elementary particles at the smallest scales and the study of fundamental interactions at the highest energies. The increasing size and cost of these facilities have turned them into truly international projects. Next-generation accelerators will advance the frontiers of accelerator science through extensive R&D, develop new technical applications, and offer opportunities to discover new physics.

In this talk, I will describe the global process and planning efforts for the next large accelerators, with a particular focus on the recent Particle Physics Project Prioritization Process (P5) in the US and the European Strategy for Particle Physics Update. I will summarize the scientific opportunities and technical challenges, and outline the political and sociological difficulties associated with realizing such projects. I will conclude with a vision for the role of accelerators in the future of high-energy physics and beyond.

Please consider my poster for contributed oral presentation

Yes

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

No

Footnotes

Funding Agency

I have read and accept the Privacy Policy Statement

Yes

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