

Stochastic Cooling Enhanced Steady-State Microbunching

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In this paper, we propose to combine two promising research topics in accelerator physics, i.e., optical stochastic cooling (OSC) and steady-state microbunching (SSMB). Basically we want to apply OSC in an SSMB storage ring to speed up the damping to enable or boost the formation of microbunching, for high-power short-wavelength coherent radiation generation. The presented work is expected to be useful for both OSC and SSMB.

Footnotes

Funding Agency

I have read and accept the Privacy Policy Statement

Yes

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