

Can nuclear physics solve the "missing gold problem" in the evolution of Galaxy?

Tuesday, 30 July 2024 10:00 (30 minutes)

Understanding neutron-rich unstable nuclei is crucial for investigating the r-process nucleosynthesis. In particular, the β decay of the $N = 126$ isotones is decisive for the production of the third peak, including gold and platinum. In this talk, based on nucleosynthesis uncertainty calculations, I will discuss the possibility of addressing the "missing gold problem" in the galactic chemical evolution study by improving the β -decay half-life of $N = 126$ nuclei.

Primary author: Dr NISHIMURA, Nobuya (RIKEN)

Presenter: Dr NISHIMURA, Nobuya (RIKEN)

Session Classification: Session 3