

LLRF Parameters Tuning for the 972 MHz System at the J-PARC Linac

In the present J-PARC Linac, the negative hydrogen is accelerated by 181 MeV using the RFQ, DTLs, and SDTLs which have the resonance frequency of 324 MHz. In this summer the injection energy to RCS will be upgraded to 400 MeV by the installation of 25 ACS cavities with the resonance frequency of 972 MHz. The 972-MHz LLRF systems and klystrons have been installed for the RF sources and will be operated. Then we have to optimize each LLRF parameter of the 972-MHz LLRF system. We performed the high power test of a ACS cavity throughout the months of May and June 2013. Then we carried out the tuning test for the LLRF parameters. I would like to contribute the results of the 972-MHz LLRF parameters tuning in this conference.

Primary author: Mr FUTATSUKAWA, Kenta (High Energy Accelerator Research Organization (KEK))

Presenter: Mr FUTATSUKAWA, Kenta (High Energy Accelerator Research Organization (KEK))