

Abstract Submitted
for the DNP07 Meeting of
The American Physical Society

HIE-ISOLDE R. KRUECKEN, TU Muenchen, Germany, P. BUTLER, University of Liverpool, UK, M. HUYSE, K.U. Leuven, Belgium, D. JENKINS, University of York, M. LINDROOS, K. RIISAGER, CERN, Switzerland, W.B. WALTERS, University of Maryland, USA, HIE-ISOLDE COLLABORATION — The HIE-ISOLDE project proposal is a major staged upgrade to the existing REX accelerator facility at ISOLDE with the objective to provide radioactive beams up to 5.5 MeV/u with a future option of going to 10 MeV/u. The ambition is to make all isotopes produced at ISOLDE (>800) available as post accelerated beams. The beam quality will be much improved for ISOLDE users with the installation of a RFQ cooler, a new improved resonant laser ionization system and a renovated high resolution mass separator. New isotopes will be made available through target and ion source development. The driver intensity will be increased (5x), with a first increase coming from a faster cycling of the PS Booster and a later increase coming from the new Linac-4. The project is designed as a participative project with many sub-tasks in which ISOLDE users are invited to participate. So far, the development and construction of an improved resonant laser ionization system, the construction of an RFQ cooler, and the prototyping of the SC linac are well advanced. We will in this contribution review the project and report on the present status of the staged proposal.

Reiner Kruecken
TU Muenchen

Date submitted: 02 Jul 2007

Electronic form version 1.4