

Recent publications from the neutron group of NMIJ/AIST

From 2005 to 2007

1. T. Matsumoto, H. Harano, T. Shimoyama, K. Kudo and A. Uritani : Characterization of keV-monoenergetic neutron fluence standard with the $^{45}\text{Sc}(p,n)^{45}\text{Ti}$ reaction at NMIJ: *Radiat. Prot. Dosim.* (in printing)
2. T. Shimoyama, H. Harano, T. Matsumoto, K. Moriyama, T. Hata, K. Kudo, T. Koyamada and A. Uritani : Development of the fast neutron fluence standard using a $\text{Be}(\alpha,n)$ reaction at the National Metrology Institute of Japan: *Radiat. Prot. Dosim.* (in printing).
3. A. Makinaga, H. Utsunomiya, S. Goko, T. Kaihori, H. Akimune, T. Yamagata, S. Hohara, S. Gorlely, H. Toyokawa, H. Harano, T. Matsumoto, H. Harada, F. Kitatani, K. Y. Hara and Y.-W. Lui: Photodisintegration of ^{80}Se as a probe of neutron capture for ^{79}Se : s-process branching and allowed temperatures: *Proceedings of Nuclei in the Cosmos - IX*(in printing)
4. Y. Sato, A. Yunoki, Y. Hino, T. Kurosawa, M. Kato, H. Harano, T. Matsumoto, T. Shimoyama, K. Kudo, T. Yamada, M. Matsumoto, K. Suzuki, T. hatakeyama, K. Doi, Y. Saito, T. Suzuki, K. Suzuki, T. Fukumura, K. Miyamoto, C. Toramatsu, A. Iwamoto, K. Endo and S. Matsubara: The remote calibration of radioisotope calibrators: *IFMBE proceedings*, p. 1494 (2006)
5. H. Harano, T. Matsumoto, T. Shimoyama, Y. Sato, A. Uritani, Y. Hino, K. Kudo and T. Michikawa: Convenient method of relative calibration of the neutron source emission rate between different source type; *IEEE Trans. Nucl. Sci.* **53**, 1413 (2006)
6. H. Harano, T. Matsumoto, T. Shimoyama, T. Hata, K. Moriyama, K. Kudo, S. Miwa, T. Koyamada and A. Uritani: Characterization of the 3 MeV Neutron Field for Monoenergetic Fast Neutron Fluence Standard at the National Metrology Institute of Japan ; *Proceedings of International Workshop on Fast Neutron Detectors University of Cape Town, South Africa, 2006*, PoS(FNDA2006)017 (2006)
7. H. Harano, T. Matsumoto, Y. Shibata, Y. Ito, A. Uritani and K. Kudo: Improvement of Photon Collection Uniformity from an NE213 Scintillator Using a Light Guide;*IEEE Trans. Nucl. Sci.* **52(6)**, pp.3147-3150 (2005)
8. T. Matsumoto, A. Uritani, H. Harano and K. Kudo: Fast Neutron Spectrometer

Composed of PSPCs and Si(Li)-SSDs with Excellent Energy Resolution and Detection Efficiency; *IEEE Trans. Nucl. Sci.* **52(6)**, pp.2923-2926 (2005)

9. K. Kudo, A. Uritani, H. Harano, T. Matsumoto and Y. Toda: Neutron measurement traceable to international system of units and international key comparisons performed by national metrology laboratories: *Ionizing Radiation*, **31**, 105-110 (2005)(in Japanese)
10. T. Matsuzaki, K. Nagamine, K. Ishida, N. Kawamura, H. Imao, Y. Matsuda, M. Iwasaki, S.N. Nakamura, M. Kato, H. Sugai, M. Tanase, K. Kudo, A. Uritani, H. Harano, G.H. Eaton: Particle correlations in $t+t$ reactions studied by muon catalyzed $t+t$ fusion: *Genshikaku Kenkyu* **49(6)**, 191-196 (2005).