

Publications in 2009

1 JOURNAL PAPER/PROCEEDINGS

- K. Yukawa, K. Asai, H. Tomita, T. Iguchi, H. Iwai, J. Kawarabayashi, "ESTIMATION OF PRECISION OF FUEL DENSITY RATIO MEASURED BY MULTI-SCATTERING TOF NEUTRON SPECTROMETER", KEK Proceedings, 2008-14, 30-34, (2009)
- H. Tomita, K. Watanabe, Y. Takiguchi, K. Hiromoto, J. Kawarabayashi, C. Ito and T. Iguchi, "Feasibility of Cavity Ring-Down Laser Spectroscopy for Dose Rate Monitoring on Nuclear Reactor", REACTOR DOSIMETRY STATE OF THE ART 2008, 94-99, (2009)
- M. Hayashi, J. Kawarabayashi, H. Tomita, K. Asai, S. Maeda, H. Tsuji and T. Iguchi, "Activation Counter Using Liquid Light-Guide for Dosimetry of Neutron Burst" REACTOR DOSIMETRY STATE OF THE ART 2008, 187-194, (2009)
- S. Raeder, S. Fies, H. Tomita, and K. D. A. Wendt, "Selective Isotope Determination of Uranium using HR-RIMS", AIP Conference Proceedings, 1104, 96-101, (2009)
- K. Watanabe, Y. Higuchi, H. Tomita, J. Kawarabayashi, A. Uritani, and T. Iguchi, "Conceptual Study on New Isotope Analysis Technique with Resonance Ionization Mass Spectrometry Using Inductively Coupled Plasma as an Atomic Source (ICP-RIMS)", AIP Conference Proceedings, 1104, 108-113, (2009)
- K. Hiromoto, H. Tomita, K. Watanabe, J. Kawarabayashi, and T. Iguchi, "Cavity Ring-down Spectroscopy for Carbon Isotope Analysis with 2 μm Diode Laser", AIP Conference Proceedings, 1104, 144-148, (2009)
- T. Sakai, K. Watanabe, A. Uritani, H. Tomita, and T. Iguchi, "Development of Isotope Analysis Based on Laser Induced Fluorescence", AIP Conference Proceedings, 1104, 161-166, (2009)
- S. Sasada, H. Tomita, K. Watanabe, Y. Higuchi, J. Kawarabayashi, and T. Iguchi, "Precision in Strontium Isotope Measurements by Laser Ablation Assisted Resonance Ionization Mass Spectrometry", AIP Conference Proceedings, 1104, 173-178, (2009)
- Y. Higuchi, K. Watanabe, H. Tomita, J. Kawarabayashi, and T. Iguchi, "Study on Mass Discrimination Effect of Resonance Ionization Mass Spectrometry Using an Inductively Coupled Plasma as an Atomic Source (ICP-RIMS)", AIP Conference Proceedings, 1104, 179-184, (2009)
- H. Tomita, Ch. Mattolat, Th. Kessler, T. Muramatsu, K. Wendt, K. Watanabe, and T. Iguchi, "Tunability of Injection Seeded High-Repetition Rate Ti:Sapphire Laser Far Off the Gain Peak", AIP Conference Proceedings, 1104, 195-199, (2009)
- 青山卓史、伊藤主税、岡崎幸基、原野英樹、渡辺賢一、井口哲夫, 7 レーザを用いた高速炉プラントの高感度ナトリウム漏えい検知技術の開発 (Na の原子化及び共鳴イオン化試験と Na 検出システムの設計), 日本機械学会論文集 (B編), 75, 82, (2009)

- H. Iwai, T. Iguchi, H. Tomita, J. Kawarabayashi, M. Isobe, and C. Konno, Development of 2.5MeV Neutron Spectrometer for Helical Deuterium Plasma Experiment, IEEE Nuclear Science Symposium Conference Record 2009, N25-49, (2009)
- Anti-personnel Landmine Detection for Humanitarian Demining- The Current Situation and Future Direction for Japanese Research and Development, K.Furuta and J. Ishikawa eds., 11. Development of Compact Neutron Capture Gamma-ray Imaging System for Anti-personnel Landmine Detection, Tetsuo Iguchi, Jun Kawarabayashi, Ken-ichi Watanabe, Tatsuo Shoji, Tatsuya Osawa, Shinji Mihoya, Tadashi Hasegawa, Masanori Shimazaki and Toshiaki Monaka, 175-192, Springer-Verlag, (2009)
- Takada, E., Inoue, A. ; Imai, H. ; Okada, Hiroyuki ; Naka, S. ; Kawarabayashi, J., "Application of a heterojunction organic photodiode to radiation measurement", IEEE Nuclear Science Symposium Conference Record, 2009, 1295-1299, (2009).

2 THESIS

2008 年度修士論文

- 湯川 恭平 核燃焼プラズマ D/T 比測定のための多重散乱飛行時間中性子スペクトロメータの開発
- 林 光伸 強中性子場のための液体ライトガイドを用いた多重放射化カウンタの開発
- 笹田 星児 レーザーアブレーション支援共鳴イオン化質量分析を用いた骨組織中 Sr 同位体比測定の高精度化に関する研究

2008 年度博士論文

- 伊藤 主税 高速中性子照射環境における長期照射量測定法の開発に関する研究
- 松井 照久 単電子デバイスを用いた高空間分解能放射線画像検出器の開発研究