

ISSN 0126-1568, E-ISSN 2356-5322  
Accreditation No.: 204/E/KPT/2022

# atom indonesia

<https://atomindonesia.brin.go.id/>

**VOL. 51**  
**NO. 1**  
**April 2025**

atom indonesia	Vol. 51	No. 1	Page 1 - 87	Tangerang, April 2025	ISSN 0126 - 1568
----------------	---------	-------	-------------	-----------------------	------------------

# Contents

<b>Editorial</b> .....	i
Thermal Properties of Alpha Decay in Magnetic Field Medium <b>P. O. Nwabuzor, A. T. Ngiangia, F. J. George</b> .....	1
Source Identification Performance of Plastic Scintillator Ranging from 100–1300 keV: Assessment Through Monte Carlo Code and Experimental Validation <b>G. E. Putro, M. R. Omar, K. Kasmudin, H. L. Nuri, M. Pancoko, A. Jamil, H. Subhiyah</b> .....	11
Radiation Dose and Image Quality of Bladder Cancer Patients Analysis on Abdominal CT-Scan Examinations <b>R. Anthon, S. H. Intifadhah, E. R. Putri</b> .....	27
Radial Sensitivity of the Nuclear Shell Structure at N=92 <b>R. R. Swain, A. Anupam, P. Mohanty, K. K. Jena, S. K. Agarwalla, B. B. Sahu</b> .....	35
Brain Tumor Segmentation on MR and CT Images Using Fuzzy C-Means and Active Contour Methods <b>M. Hamid, A. Mu'ti, S. H. Intifadhah, E. R. Putri</b> .....	43
Determination of Typical Values for Pediatric Head CT Scan at Universitas Andalas Hospital <b>R. Fardela, R. Delvihadini, I. B. G.P. Pratama, D. Milvita, A. Oktavia</b> .....	51
Customization of Source Term into JRODOS Compatible XML File Format Using Visual Basic for Nuclear Accident Analysis <b>S. M. T. Hassan, M. A. Khaer, M. A. Hoq, M. T. Chowdhury, M. M. Rahman</b> .....	57
Heavy Metal Waste Using Ch/AgNPs Synthesized by Gamma Radiolysis: Preliminary Study <b>D. Ariyanti, K. T. Basuki, K. Megasari, I Ismail, A. Abimanyu, H. Hamadi, K. Rozana</b> .....	63
Preliminary Neutronic Studies on RSG-GAS Fuel Element with 4.8 grU/cc and Burnable Poison Wire for Reactivity Reduction <b>W. Luthfi, T. Setiadipura, Z. Su'ud</b> .....	71
Selection of Bacteria from Mamuju's NORM as Uranium and Thorium Bioleaching Agents <b>S. Indryati, A. Mujiyanto, K. S. Widana, A. E. Hidayat, F. J. Rahma, C. A. Shabirah,  R. I. Laksmana, A. A. Pratama, K. Trinopiawan, R. Prassanti, T. Purwanti, A. W. Putra,  I G. Sukadana, I. Sugoro.</b> .....	81
Acknowledgment .....	87