

## Съдържание

<b>PREFACE</b> .....	v
<b>LIST OF PARTICIPANTS</b> .....	xi
<b>POETRY</b> .....	xv
<i>Damian Damyarov: At the Bottom</i> .....	xv
<i>José de Espronceda: Canción of the Pirate</i> .....	xvi
<b>CONTRIBUTED PAPERS</b> .....	1
<i>D. Bonatsos, K.E. Karakatsanis, A. Martinou, T.J. Mertzimekis, N. Minkov:</i> Islands of Shape Coexistence in Proxy-SU(3) Symmetry and in Covariant Density Functional Theory .....	3
<i>P.E. Georgoudis:</i> Conformal Symmetry, Unitary Limit and Collective Nuclear States ....	15
<i>M.K. Gaidarov, E. Moya de Guerra, A.N. Antonov, I.C. Danchev, P. Sarriguren, D.N. Kadrev:</i> An Alternative Approach within the CDFM for Studies of Nuclear Symmetry Energy Components and their Ratio .....	26
<i>P. Papakonstantinou:</i> Nuclear Symmetry Energy and the PREX-CREX Neutron Skin Puzzle within the KIDS Framework .....	36
<i>L. Tsaloukidis, P.S. Koliogiannis, A. Kanakis-Pegios, Ch.C. Moustakidis:</i> The Third Family of Compact Objects as a Tool to Constrain the Nuclear Equation of State .....	46
<i>A. Rahmatinejad, T. Shneidman:</i> Multi-Step Neutron Emission Probabilities in Heaviest Nuclei .....	57
<i>M. El Adri, M. Oulne:</i> Study of Structural and Decay Properties of Even-Even Pb Isotopes within CDF Theory .....	65
<i>J. Gonzalez-Rosa, G.D. Megias, J.A. Caballero, M.B. Barbaro:</i> The SuSAv2 Model for Inelastic Neutrino-Nucleus Scattering .....	74
	vii

## СЪДЪРЖАНИЕ

<i>M.V. Ivanov, A.N. Antonov, M.B. Barbaro, C. Giusti, A. Meucci, J.A. Caballero, R. González-Jiménez, E. Moya de Guerra, J.M. Udías:</i> Neutral Current Quasielastic (Anti)Neutrino Scattering beyond the Fermi Gas Model at MiniBooNE and BNL Kinematics . . . . .	84
<i>N. Firdous, M.M. Junaid:</i> Prediction of Monte Carlo Event Generator to Probe the Shower Implementation . . . . .	95
<i>N. Firdous, M.M. Junaid:</i> Phenomenological Study of Impact Parameter Dependence in PYTHIA 8 . . . . .	105
<i>V.A. Karmanov:</i> Systems Dominated by Exchange Particles . . . . .	111
<i>D. Petrellis, P. Bydžovský, A. Cieplý, D. Skoupil, N. Zachariou:</i> Combining LASSO Regularization with Information Criteria: a Study of the $K^+\Sigma^-$ Photo-production with an Isobar Model . . . . .	121
<i>S. Akkoyun, M.K. Bahar:</i> Plasma Shielding Effects On Nuclear Spectra: $^{18}\text{Ne}$ Application . . . . .	127
<i>N.K. Dhillon, S. Gautam, R.K. Puri:</i> Influence of Momentum Dependent Interactions on the Energy of Onset of Vaporization . . . . .	134
<i>N. Buyukcizmeci, A.S. Botvina, M. Bleicher:</i> Disintegration of Nuclei in High Energy Reactions . . . . .	142
<i>F. Sammarruca:</i> The Equation of State of Neutron-Rich Matter at Fourth Order of Chiral Effective Field Theory and the Radius of a Medium-Mass Neutron Star . . . . .	147
<i>R. Machleidt:</i> Alternative Facts in Microscopic Nuclear Structure . . . . .	156
<i>P.V. Kostyukov, A. Dobrowolski:</i> Study of Low-Energy Fission Actinide-Nuclei with Fourier Shape Parametrization . . . . .	164
<i>A. Kanakis-Pegios, P.S. Koliogiannis, Ch.C. Moustakidis:</i> The Effect of Temperature on the Tidal Deformability of Neutron Stars .	175
<i>F. Lassiaille:</i> Relativity in Motion: Short Version . . . . .	185
<i>D. Arora, P. Sugathan:</i> Study of Fission Dynamics in $^{213,215,217}\text{Fr}$ Formed in Heavy-Ion Induced Reaction . . . . .	195

*СЪДЪРЖАНИЕ*

*Y. El Bassem, M. Oulne:*  
Shape Evolution in Pt Isotopes within the Covariant Density  
Functional Theory ..... 200

*R. Rana, S. Gautam, R.K. Puri:*  
A Systematic Study of Nuclear Stopping and Various Observables  
that Reflects the Degree of Thermalization ..... 209

*S. Gautam, N.K. Dhillon, R. Rana:*  
Neutron Proton Asymmetry Effects in Far Fermi Energy Region ..... 219

**AUTHOR INDEX** ..... 227