

Boshkayev Kuantay



Position: Research associate

Period covered: 1 July-27 August 2015

I Scientific Work

- Rotating white dwarfs and neutron stars in general relativity
- Geodesics in the field of rotating and deformed objects
- Quasi-periodic oscillations from X-ray sources
- White dwarf model of magnetars
- Approximate and exact solutions of Einstein equations.

II Conferences and educational activities

II a Conferences and Other External Scientific Work

1. 9th Alexander Friedmann International Seminar on Gravitation and Cosmology and 3rd Satellite Symposium on the Casimir Effect. St. Petersburg, Russia, June 21 – 27, 2015
2. 9th APCTP-BLTP JINR Joint Workshop on Modern Problems of Nuclear and Elementary Particle Physics, Almaty, Kazakhstan, June 27-July 4, 2015.
3. 14th Marcel Grossmann Meeting on Recent Developments in Theoretical and Experimental General Relativity, Gravitation, and Relativistic Field Theory, University of Rome Sapienza July 12 - 18, 2015, Rome, Italy.
4. 14th Italian-Korean Symposium on Relativistic Astrophysics July 20-24, 2015 ICRANet, Pescara, Italy.

II b Work With Students

Collaboration with Yerlan Aimuratov

II e. Work With Postdocs

Collaboration with Marco Muccino, Camargo Rodrigues de Lima Rafael, Ivan Siutsou and Riccardo Belvedere

III. Service activities [*activities carried out in collaboration with ICRANet (e.g. teaching activities, conferences etc...) and outside ICRANet (teaching activities in your university etc...)*]

III a. Within ICRANet

Scientific collaboration with prof. Remo Ruffini and Dr. Jorge Rueda

III b. Outside ICRANet

Teaching activity at the faculty of physics and technology of al-Farabi Kazakh National University (KazNU), Almaty, Kazakhstan.

2015 List of Publication

1. Boshkayev K., Rueda J., Muccino M. Extracting Multipole Moments of Neutron Stars from Quasi-Periodic Oscillations in Low Mass X-Ray Binaries // Astronomy Reports. – 2015. – Vol. 59. – No. 6. – P. 441–446.

2. Abishev M. E., Boshkayev K. A., Dzhunushaliev V. D., Ivashchuk V. D. Dilatonic dyon black hole solutions // *Classical and Quantum Gravity*, Volume 32, Issue 16, article id. 165010 (2015).
3. Boshkayev K., Rueda J., Ruffini R., Siutsou I. General Relativistic and Newtonian White Dwarfs // *Proceedings of the MG13 Meeting on General Relativity*. Edited by Rosquist K. et al. Published by World Scientific Publishing Co. Pte. Ltd., 2015. ISBN 9789814623995, pp. 2468-2474.
4. Boshkayev K., Rueda J., Ruffini R. SGRs and AXPs as Massive Fast Rotating Highly Magnetized White Dwarfs: the Case of SGR 0418+5729 // *Proceedings of the MG13 Meeting on General Relativity*. Edited by Rosquist Kjell et al. Published by World Scientific Publishing Co. Pte. Ltd. – 2015. – ISBN 9789814623995 – P. 2295-2300.