

Presentations at Conferences:

1. *Kaonic atoms and Nuclei*,
S.Z. Kalantari, Annual Nuclear Physics Conference of Iran (ANP), Nuclear Physics Society of Iran, Mashhad, Iran, Ferdowsi University, February (2021).
2. *Investigation of the beam loading effects in a pillbox cavity*,
R. Kavusi, S.Z. Kalantari, S. Sanayehajarii and F. Ghasemi, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan, Isfahan University of Technology (2021).
3. *Determining the radius-mass range of a rotating neutron star using the universal relation of Keplerian frequency*,
R. Riahi and S. Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan, Isfahan University of Technology (2021).
4. *Investigation of the $\pi\Sigma$ mass spectra in the $\gamma+p \rightarrow K^+ + (\pi\Sigma)^0$ reaction by AGS Faddeev method*, S. Marri , M. N. Nasrabadi and S.Z. Kalantari, Nuclear Structure and Reactions conference, University of Golestan, Iran (2021).
5. *Calculation of the optimum energy and therapeutic gain in proton therapy of brain tumor using Snyder phantom in MCNP code*,
S. Rezaei and S.Z. Kalantari, Annual Nuclear Physics Conference of Iran (ANP), Nuclear Physics Society of Iran, Bushehr, Iran, February (2019) 1.
6. *The stability of rotating neutron stars*,
R. Riahi and S. Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), International University Imam Khomeini, Ghazvin, Iran, (2018).
7. *Investigation of kaon-deuteron interaction at $p_{lab}^{\bar{K}} = 1\text{GeV}/c$ by Faddeev method*,
S. Marri, S. Z. Kalantari and J. Esmaili, Annual Nuclear Physics Conference of Iran (ANP), Nuclear Physics Society of Iran, Tehran, Iran, February (2017) 866.
8. *Investigation of $\bar{K}\bar{K}NN$ four-body using Faddeev AGS method*,
S. Marri, S. Z. Kalantari and J. Esmaili, Annual Nuclear Physics Conference of Iran (ANP), Nuclear Physics Society of Iran, Tehran, Iran, February (2017) 870.
9. *Designing Of Electromagnet For a Small Cyclotron Accelerator*,
M. Tavakoli and S.Z. Kalantari, Third Iranian Particle Accelerator Conference, Isfahan University of Technology, Isfahan, Iran. Dec. (2017) 158.

10. *Investigation Of The Optimume Conditions For PIG Ion Source*,
M. Tavakoli and S.Z. Kalantari, Third Iranian Particle Accelerator Conference,
Isfahan University of Technology, Isfahan, Iran. Dec. (2017) 154.
11. *Effect of the different equations of state on maximum mass of rotating neutron stars*,
R. Riahi, S. Z. Kalantari, J. A. Rueda and R. Ruffini, Annual Physics
Conference of Iran, Physics Society of Iran(PSI), Yazd University, Yazd, Iran
(2017).
12. *Exploring the nonlinear QED effects with a probe laser beam*,
S. Shakeri, S.Z. Kalantari, and She-Sheng Xue, 7th Conference of Particle
Physic and Fields, Damghan University, Iran (2017) 58.
13. *Investigation of $\bar{K}\bar{K}NN$ four-body using Faddeev AGS method*,
S. Marri, S. Z. Kalantari and J. Esmaili, Annual Nuclear Physics Conference of
Iran, Nuclear Physics Society of Iran, Tehran, Iran, February (2017) 870.
14. *Investigation of the ground states of $\bar{K}NN$ and $\bar{K}NNN$ systems by the Faddeev
method*,
S. Marri, S. Z. Kalantari and J. Esmaili, Annual Physics Conference of Iran,
Physics Society of Iran(PSI), Ferdowsi University, Mashhad, Iran, August
(2015) 359.
15. *Investigation of the atomic and nuclear states of $K^- ^{118}Sn$* ,
M. Jafari Shahivand and S.Z. Kalantari, Annual Physics Conference of Iran,
Physics Society of Iran(PSI), Ferdowsi University, Mashhad, Iran, August
(2015) 2278.
16. *Neutron beam design based on ^{252}Cf neutron source for BNCT*,
Z. Salehi, S.Z. Kalantari and Y Kasesaz, Annual Physics Conference of Iran,
Physics Society of Iran(PSI), Sistan & Balochestan University, Iran, September
(2014) 1691.
17. *Calculation of the deeply bound nuclear states of $K^- ^{12}C$ and $K^- ^3He$* ,
M. Jafari Shahivand and S.Z. Kalantari, Annual Physics Conference of Iran,
Physics Society of Iran(PSI), Sistan & Balochestan University, Iran, September
(2014) 1555.
18. *The rule of $\Lambda(1405)$ resonance in determination of $K^- pp$ energy*,

- S. Marri, S. Z. Kalantari and J. Esmaili, 21st IPM Physics Spring Conference, IPM, Tehran, Iran, May (2013).
19. *Stability of Particle Motion in the IUT's 7 inches Cyclotron*,
A. Arefian, S.Z. Kalantari, and S. Mahmoudpour Ghamsar, 1th Iranian Particle Accelerator Conference, Amirkabir University of Technology, Tehran, Iran. Nov. (2012).
 20. *Calculation of the cross section of $\Lambda(1405)$ formation in pp collision and its decay rate to $\Sigma\pi$ channel and fitting to HADES data*,
M. Hassanvand, S.Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Yasd University ,Yazd, Iran, September (2012)355.
 21. *Calculation of Cascade Processes rates and Simulation of the Transitions in Kaonic $4He$ atom*,
S.Z. Kalantari, Sh. Sanaye and M Dayyani, International Conference on Exotic Atoms and Related Topics - EXA2011, Vienna, September(2011).
 22. *Study of the formation possibility of a deeply-bound $K-K-pp$ state in the $pp \rightarrow K+K+\Lambda$ reaction*,
M. Hassanvand, Y. Akaishi, T. Yamazaki and S.Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Urmia University ,Urmia, Iran, 5-8 September (2011).
 23. *Investigation of the resonant formation of $\Lambda(1405)$ by stopped- K^- absorption in d* ,
J. Esmaili, S.Z. Kalantari, Y. Akaishi and T. Yamazaki, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Urmia University ,Urmia, Iran, September (2011).
 24. *Neutron Flux Simulation of The Intense Neutron Generator (CF-INS)*,
M. Chashti, S.Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Urmia University ,Urmia, Iran, 5-8 September (2011) 1075.
 25. *Design a beam shaping assembly (BSA) for Isfahan MNSR reactor for using in BNCT*,
H. Tavakoli, S.Z. Kalantari, Annual Physics Conference of Iran, Physics Society of Iran(PSI), Urmia University ,Urmia, Iran, 5-8 September (2011) 1051.
 26. *Determination of mass and width of $\Lambda(1405)$ by $\Sigma\pi$ invariant-mass spectra from K^- absorption ...*,
J. Esmaili, S.Z. Kalantari, Y. Akaishi and T. Yamazaki,, Proceeding of the ANP Conference of Iran, Isfahan, Iran, 23-24 February(2011) 464.

27. *Few body calculations of deeply bound states of Kaonic Nuclei by Faddeev method*, J. Esmaili,
S.Z. Kalantari, Y. Akaishi and T. Yamazaki,, Proceeding of the ANP Conference of Iran, Isfahan, Iran, 23-24 February(2011) 1260.
28. *Simulation of Cascade Transitions and Calculation of X-ray Yields of Kaonic Helium Atoms*,
S.Z. Kalantari, Sh. SanayeM and Dayyani, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Boalisina University ,Hamedan, Iran, 12-14 September (2010).
29. *Quantum Mechanical Calculation of Cascade Transition Rates of $K^4\text{He}$ Atoms*,
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M Dayyani and Sh. Sanaye, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Boalisina University ,Hamedan, Iran, 12-14 September (2010).
30. *Analysis of cascade dynamics and x-ray yields for $K-p$ and $K-d$ atoms by Monte-Carlo method*,
S.Z. Kalantari, International Workshop on Hadronic Atoms an Kaonic Nuclei solved puzzles, open problems and future challenges in theory and experiment, ECT_, Trento, Italy, October 12-16 (2009).
31. *Nuclear Absorption and Stark mixing effects on the X-ray Yields of Kaonic Hydrogen and Deuterium Atoms*,
M. Raeisi G. and S.Z. Kalantari, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan University of Technology,Isfahan, Iran, 15-18 August (2009)649.
32. *Calculation of Collisional Processes Cross Sections of Kaonic Hydrogen Atom with Hydrogen atom and molecule by CTMC Model*,
M. Raeisi G. and S.Z. Kalantari, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan University of Technology,Isfahan, Iran, 15-18 August (2009)86.
33. *Simulation of Sonoluminescence by Water Hammer in Low Frequencies*,
S. Mahmoodpour and S.Z. Kalantari, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan University of Technology,Isfahan, Iran, 15-18 August (2009)548.
34. *Sonoluminescence Experiment in Low Frequencies by water Hammer*,

- S. Mahmoodpour and S.Z. Kalantari, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Isfahan University of Technology, Isfahan, Iran, 15-18 August (2009)560.
35. *Study of the Motion and the Temperature of Bubble in Moving Single Bubble Sonoluminescence*,
S.Z. Kalantari and M Aliasgarian, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Kashan University, Kashan, Iran, 25-29 August (2008)45.
36. *Calculation of Muonic atom cascade dynamics in D-T Mixtures*,
S.Z. Kalantari and M. Raeisi, International Conference on μ CF and Related Topics (MCF-07), JINR, Dubna, Russia, June 18-21 (2007).
37. *Study of the strong interaction by calculation of the K series yields in cascade processes of kaonic hydrogen atoms*,
S.Z. Kalantari and M. Raeisi, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Yasuj University, Yasuj, Iran, 27-30 August (2007)103.
38. Study of the liquid temperature effects on single bubble sonoluminescence by a hydrochemical model,
S.Z. Kalantari, M. Hasanvand, A. Moshaii, and R. Rezaei, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Yasuj University, Yasuj, Iran, 27-30 August (2007)751.
39. *Calculation of relative x-ray yields in cascade processes of muonic deuterium atoms by Monte-Carlo method*,
S.Z. Kalantari and M. Raeisi, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Shahrood University, Shahrood, Iran, 28-31 August (2006)242.
40. *Dynamics of cascade processes of muonic atoms*,
S.Z. Kalantari and H. Pirahmadian, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Shahrood University, Shahrood, Iran, 28-31 August (2006)238.
41. *Hydrochemical simulation of sonoluminescence from Noble gas bubbles*,
R. Rezaei-Nasirabad, M. Silatani, K. Imani, A. Moshaii, S.Z. Kalantari, R. Sadighi-Bonabi, Proceeding of the Annual Physics Conference of Iran, Physics Society of Iran(PSI), Shahrood University, Shahrood, Iran, 28-31 August (2006)465.

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45. *Monte-Carlo simulation of the μCF ,*
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47. *Spin polarization effects on kinetics of μCF ,*
S.Z. Kalantari, Proceeding of the ANP Conference of Iran, Shahreza, Iran (2002)108.
48. *Thermalization of Muonic Atoms and Calculation of $_Parameter$ in μCF ,*
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49. *Epithermal effects and hyperfine interactions in H/D/T μCF ,*
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52. *Nuclear Fusion*, S.Z. Kalantari, 7^{th} Phys. Teach. Conf. of Iran, Center of Teach. Training of Yazd (1999).
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55. *Neutron production and breeding of ^{239}Pu and ^3T in D-T and D- ^3He ICF*, S.Z. Kalantari, Gathering of Phys. Stu., Ferdowsi Univ. of Mashhad, Iran (1995)4.
56. *Gain calculation for the D-T in SCAT and CAT modes with Bremsstrahlung loss and Reheat branches*, M.R. Eskandari and S.Z. Kalantari, Abs. of Seventh Inter. Conf. on Emerging Nuclear Energy Systems, Makuhari, Chiba, Japan, (1993)123.
57. *Kinetics of D-T fusion by ICF in SCAT and CAT modes*, M.R. Eskandari and S.Z. Kalantari, Abs. of the Iranian Annual Phys. Conf., Physics Society of Iran(PSI), Razi Univ., Kermanshah, Iran (1993)85.
58. *Safety studies on Pool-Type research reactors*, M.R. Eskandari, A. Ghasemi and S.Z. Kalantari, Proc. of 3^{th} Int. Conf. on Nuclear Power Plants Safety ..., Obninsk, Russia (1993)131.
59. *Evaluation of depletion function of any index of $k \geq 3$ for isotope transmutation*, M.R. Eskandari and S.Z. Kalantari, Proc. of Inter. Congress on Computational Method in Engineering, Vol.1, Shiraz Univ., Iran (1993)177.
60. *Generalized Hertz Potentials*, M.M. Golshan and S.Z. Kalantari, Abs. of the Iranian Annual Phys. Conf., Physics Society of Iran(PSI), Alzahra Univ., Tehran, Iran (1992)12.
61. *Derivation of the Maxwell equations in the presence of magnetic Monopoles by spatial relativity*,

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