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Expertise

Nuclear Physics

experimental nuclear physics, Nuclear Physics, Detectors Gamma-Rays Heavy ion Physics, Radiation Detection system, Experimental nuclear Physics, Radioactivity, Gamma Spectroscopy, Ionizing Radiation detector, Nuclear Structure, Spectrometers, Liquid-scintillation Counting system, Computer aided data Analysis, Theoretical Nuclear Physics, Nuclear Instrumentation Nuclear Electronics Data Acquisition, and Computing.

Work experience

1. Visva-Bharati University 2017 — Present

Associate Professor
Birbhum

Education

1. PostDoc - 2005

KVI, Groningen, The Netherlands

2. PostDoc - 2002

Institute of Kern and Hadronen Physics, Rosendorf, Dresden, Germany

3. Ph.D - 2001

Jawaharlal Nehru University (JNU), Inter-University Accelerator Centre, New Delhi

4. M.Sc. - 1996

University of Burdwan

5. B.Sc. - 1993

Abhedanandya Mahavidyalaya, Sainthia, West Bengal

6. Higher Secondary - 1990

Birbhum Zilla School, West Bengal

Publication

1. Measurement of relative isotopic yield distribution of even-even fission fragments from U 235 (nth,f) following γ -ray spectroscopy

Dey A.;Biswas D.C.;Chakraborty A.;Mukhopadhyay S.;Mondal A.K.;Danu L.S.;Mukherjee B.;Garg S.;Maheshwari B.;Jain A.K.;Blanc A.;De France G.;Jentschel M.;Köster U.;Leoni S.;Mutti P.;Simpson G.;Soldner T.;Ur C.A.;Urban W.

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2. Evolution of collectivity and shape transition in Zn66

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3. Spectroscopic investigation of complex nuclear excitations in Ga66

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4. Investigation of different possible excitation modes in neutron-rich As78

Mondal A.K.;Chakraborty A.;Mandal K.;Ghosh U.S.;Dey A.;Biswas S.;Mukherjee B.;Rai S.;Krishichayan ;Chatterjee S.;Das S.K.;Samanta S.;Raut R.;Ghugre S.S.;Rajbanshi S.;Banik R.;Bhattacharyya S.;Nandi S.;Bhattacharya S.;Mukherjee G.;Ali S.;Goswami A.;Chakrabarti R.;Mukhopadhyay S.;Sinha A.K.;Kumar V.;Kumar A.

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5. Spectroscopic investigation of complex nuclear excitations in Ga 66

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6. Quasielastic scattering measurements in the Si 28 + Nd 142,150 systems

Biswas S.;Chakraborty A.;Jhingan A.;Arora D.;Behera B.R.;Biswas R.;Deb N.K.;Ghugre S.S.;Giri P.K.;Golda K.S.;Kaur G.;Kumar A.;Kumar M.;Mukherjee B.;Nayak B.K.;Parihari A.;Rai N.K.;Rai S.;Raut R.;Sahoo R.N.;Sinha A.K.
Physical Review C, Volume 102, Year 2020

7. Shell model study of nuclear structure in ^{63}Ga

Ghosh U.S.;Mukherjee B.;Rai S.
International Journal of Modern Physics E, Volume 29, Year 2020

8. Evolution of collectivity and shape transition in Zn 66

Rai S.;Ghosh U.S.;Mukherjee B.;Biswas A.;Mondal A.K.;Mandal K.;Chakraborty A.;Chakraborty S.;Mukherjee G.;Sharma A.;Bala I.;Muralithar S.;Singh R.P.
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9. In-beam spectroscopic study of Zn 63

Ghosh U.S.;Rai S.;Mukherjee B.;Biswas A.;Mondal A.K.;Mandal K.;Chakraborty A.;Chakraborty S.;Mukherjee G.;Sharma A.;Bala I.;Muralithar S.;Singh R.P.
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10. In-beam spectroscopic study of Zn63

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11. Cluster structure near beta-stability and far from stability

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AIP Conference Proceedings, Volume 2038, Year 2018

12. Nuclear structure of low-lying states in $^{60,62,64,66}\text{Zn}$ - A shell model description

Rai S.;Biswas A.;Mukherjee B.
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13. Exotic decay of hot rotating nuclei near proton drip line

Ray J.;Datta Pramanik U.;Bhowmik R.K.;Ray I.;Rahaman A.;Chakraborty A.;Chakraborty S.;Garg R.;Goyal S.;Ganguly S.;Kumar S.;Mandal S.;Mukherjee B.;Mukherjee P.;Muralithar S.;Negi D.;Saxena M.;Selvakumar K.;Singh P.;Singh A.K.;Singh R.P.
EPJ Web of Conferences, Volume 66, Year 2014

14. A charged particle detector array for detection of light charged particles from nuclear reactions

Muralithar S.;Mukherjee B.;Singh R.P.;Mukherjee G.;Joshi P.;Punithan A.;Sahu B.K.;Gupta A.;Ahuja R.;Ram R.;Rao S.;Saini S.K.;Zacharis J.;Bhowmik R.K.
Nuclear Instruments and Methods in Physics Research, Section A: Accelerators, Spectrometers, Detectors and Associated Equipment, Volume 729, Year 2013, Pages 849-855

15. **First observation of high spin states and isomeric decay in ^{210}Fr**
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16. **High spin states and isomeric decays in doubly-odd ^{208}Fr**
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Nuclear Physics A, Volume 842, Year 2010, Pages 1-14
17. **High spin spectroscopy of ^{137}La**
Chanda S.;Bhattacharjee T.;Bhattacharyya S.;Basu S.K.;Bhowmik R.K.;Muralithar S.;Singh R.P.;Mukherjee B.;Pattabiraman N.S.;Ghugre S.S.;Chatterjee M.B.
Nuclear Physics A, Volume 775, Year 2006, Pages 153-174
18. **High spin spectroscopy of ^{139}Pr**
Chanda S.;Bhattacharyya S.;Bhattacharjee T.;Ghugre S.S.;Basu S.K.;Muralithar S.;Singh R.P.;Mukherjee B.;Bhowmik R.K.;Ray S.N.
Pramana - Journal of Physics, Volume 57, Year 2001, Pages 175-179
19. **High spin rotational bands in ^{65}Zn**
Mukherjee B.;Muralithar S.;Singh R.P.;Kumar R.;Rani K.;Bhowmik R.K.
Pramana - Journal of Physics, Volume 57, Year 2001, Pages 181-184
20. **Two-proton alignment and shape changes in ^{65}Zn**
Mukherjee B.;Muralithar S.;Singh R.P.;Kumar R.;Rani K.;Bhowmik R.K.;Pancholi S.C.
Physical Review C - Nuclear Physics, Volume 64, Year 2001, Pages 243041-243048
21. **γ -ray spectroscopy of odd-odd ^{62}Cu**
Mukherjee B.;Muralithar S.;Singh R.P.;Kumar R.;Rani K.;Bhowmik R.K.
Physical Review C - Nuclear Physics, Volume 63, Year 2001, Pages 573021-573024
22. **High spin states in ^{70}Ge**
Mukherjee B.;Muralithar S.;Mukherjee G.;Singh R.P.;Kumar R.;Das J.J.;Sugathan P.;Madhavan N.;Madhusudanan Rao P.V.;Sinha A.K.;Pande A.K.;Chaturvedi L.;Pancholi S.C.;Bhowmik R.K.
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23. **High spin rotational bands in ^{70}As nucleus**
Mukherjee B.;Mukherjee G.;Joshi P.;Singh R.P.;Muralithar S.;Pande A.K.;Chaturvedi L.;Pancholi S.C.;Bhowmik R.K.
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24. **High spin states in ^{63}Cu**
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I.;Muralithar S.;Singh R.P.
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25. Eigenvalues of the $\mu x^2 + \lambda x^{2^m}$ interaction

Chaudhuri R.;Mukherjee B.
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26. On the $\mu x^2 + \lambda x^4 + \eta x^6$ interaction

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27. On the $\mu x^2 + \lambda x^4$ interaction

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28. On the schrodinger equation for the interaction $x^2 + \lambda x^2/(1+gx^2)$

Chaudhuri R.;Mukherjee B.
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