



TO MAGNIFICO RETTORE OF UNIVERSITA' DEGLI STUDI DI MILANO
CODE _____ PNRR - Prof. Genoni- ID: 6322

ID

I the undersigned asks to participate in the public selection, for qualifications and examinations,
for the awarding of a type B fellowship at **Dipartimento di**

Scientist- in - charge: _____ **Prof. Marco Genoni** _____

[Name and surname]

CURRICULUM VITAE

PERSONAL INFORMATION

Surname	MAITY
Name	ARGHYA

PRESENT OCCUPATION

Appointment	Structure
Postdoc	

EDUCATION AND TRAINING

Degree	Course of studies	University	year of achievement of the degree
Degree	M.Sc	Sambalpur University	2013
Specialization			
PhD	Condensed Matter	BITS-Pilani, Rajasthan, INDIA	2020
Master			
Degree of medical specialization			
Degree of European specialization			
Other	(1)Postdoc Researcher (2)Postdoc Researcher	(1) IIT-Bombay, Mumbai, INDIA (2) HRI, Prayagraj, INDIA	(1) 7th May,2021 (2) Continue



REGISTRATION IN PROFESSIONAL ASSOCIATIONS

Date of registration	Association	City

FOREIGN LANGUAGES

Languages	level of knowledge
English	Good

AWARDS, ACKNOWLEDGEMENTS, SCHOLARSHIPS

Year	Description of award
2018	Sandwich Research Scholarship: Freie Universitat Berlin, Germany
2025	Mexican Council of Science (CONACyT) PhD Scholarship,(2015) (Full time Ph.D. Scholarship)

TRAINING OR RESEARCH ACTIVITY

description of activity : Theoretical Physics

PROJECT ACTIVITY

Year	Project
8th May, 2021 to 4th Oct, 2023	"QuEST" - Quantum-Enabled Science & Technology, project,

PATENTS

Patent

CONGRESSES AND SEMINARS

Date	Title	Place
------	-------	-------



15-18 Feb, 2023	Presented a talk on "Resource Theory of Non-absolute Separability" (in person)	Young Quantum - 2023 (YouQu-2023), organized by the Quantum Information and Computation group(QIP) of Harish-Chandra Research Institute (HRI), Prayagraj (Allahabad), INDIA
12-14 Dec, 2018	Presented a talk on "Stability of DNA within the matrix of different geometric confinement" (in person)	Puri Polymer Conference 2018, organized by the Institute of Physics, Bhubaneswar, INDIA
October 2015	Presented a poster on "DNA Denaturation in Ionic Solution" (in person)	American Institute of Physics (AIP) Conference Proceedings, International Conference on Condensed Matter & Applied Physics (ICC), Bikaner, INDIA

PUBLICATIONS

Books
[title, place, publishing house, year ...] N. Mathur, Arghya Maity, N. Singh, Booktitle : "Advances in Computational Modeling and Simulation", Publisher : "Springer Nature Singapore", Chapter Title : "DNA Molecule Confined in a Cylindrical Shell: Effect of Partial Confinement", isbn="978-981-16-7857-8" (2022),
[title, place, publishing house, year ...]
[title, place, publishing house, year ...]

Articles in reviews
[title of the article, review, place, publishing house, year ...] A. Singh, Arghya Maity, N. Singh ; "Review: Structure and dynamics of dsDNA in cell mimicking environments", Entropy, 24(11),1587 (2022)
[title of the article, review, place, publishing house, year ...]
[title of the article, review, place, publishing house, year ...]

Congress proceedings
[title, structure, place, year] Arghya Maity, A Singh, Navin Singh, "DNA denaturation in ionic solution", American Institute of Physics (AIP) Conference Proceedings; 1728, 020415 (2016)
[title, structure, place, year]
[title, structure, place, year]

OTHER INFORMATION

(1) Arghya Maity, Ahana Ghoshal; "Using non-Markovian dynamics in effective negative temperature based transient quantum Otto engines", Physical Review A 109, 022207 (2024), (★ Editors' Suggestion)
(2) Arghya Maity, Aditi Sen De; "Enhanced efficiency in quantum Otto engine via additional magnetic field and effective negative temperature", arXiv:2304.10420 (2023)
(3) T. K. Konar, Arghya Maity, Aditi Sen De; "Classical correlations for Generic States are Fragile under Decoherence", arXiv:2209.03334 (2022)



(4) A. Patra, Arghya Maity, Aditi Sen De;"Resource Theory of Non-absolute Separability", Physical Review A 108, 042402 (2023)
(5) R. Gupta, Arghya Maity, S. Mal, Aditi Sen De ;"Statistics of Entanglement Transformation with Hierarchies among Catalysts", Physical Review A 106, 052402 (2022)
(6) Arghya Maity, N. Mathur, Petra Imhof, Navin Singh ; "Structural Analysis of DNA molecule in a confined shell", Physica A: Statistical Mechanics and its Applications 609(128382), 0378-4371 (2023)
(7) Arghya Maity, Navin Singh, "Melting of DNA in confined geometries", European Bio- physics Journal, 49 (7) 561-569 (2020)
(8) Arghya Maity, A. Singh, Navin Singh, "Stability of DNA passing through different geometrical pores", EPL(Europhysics Letters), 127 (2) 28001 (2019)
(9) Arghya Maity, A Singh, Navin Singh, "Differential stability of DNA based on salt concentration", European Biophysics Journal; 46 (1) 33-40 (2017)

Declarations given in the present curriculum must be considered released according to art. 46 and 47 of DPR n. 445/2000.

The present curriculum does not contain confidential and legal information according to art. 4, paragraph 1, points d) and e) of D.Lgs. 30.06.2003 n. 196.

Please note that CV WILL BE PUBLISHED on the University website and It is recommended that personal and sensitive data should not be included. This template is realized to satisfy the need of publication without personal and sensitive data.

Please DO NOT SIGN this form.

Place and date: 9th Feb,2024 _____, Prayagraj, INDIA _____