

CONTACT INFORMATION	610-F Science and Research 1 Houston, TX, USA - 77204 Mob: +1-3465451497, +91-9871756332,	Website: bhavaytyagi.com Linkedin: www.linkedin.com/bhavaytyagi ✉ E-mail: bhavaysaarangtyagi@gmail.com , btyagi@uh.edu
EDUCATION	<p>University of Houston, College of Natural Sciences and Mathematics Aug 2022–Present</p> <ul style="list-style-type: none"> PhD Candidate Advisor: Prof. Eric R. Bittner <p>Durham University, Ustinov College, Durham, UK Oct 2018– Sept 2019</p> <ul style="list-style-type: none"> M.Sc. in Particles, Strings and Cosmology, Result: Merit – 180 credits. Thesis: An Introduction to AdS/CFT and the Holographic Entanglement Entropy. <i>Durham University, UK</i> Supervisor: Prof. Simon F. Ross, Reader: Prof. Nabil Iqbal <p>Amity University Noida, India. Aug 2015–May 2018</p> <ul style="list-style-type: none"> B.Sc. (Honours) Physics, CGPA: 8.05/10 (First Division) – 176 credits. 	
RECENT PUBLICATIONS	<ol style="list-style-type: none"> E. R. Bittner and B. Tyagi. “Statistical Control of Relaxation and Synchronization in Open Anyonic Systems” arXiv 2025 E. R. Bittner and B. Tyagi. “Noise induced synchronisation in coupled quantum oscillators.” The Journal of Chemical Physics 2025 B. Tyagi, F. Suzuki, V. A. Chernyak, and N. A. Sinitsyn. “Asymmetry Amplification by a Nonadiabatic Passage through a Critical Point.” Physical Review A 2025 B. Tyagi, H. Li, E. R. Bittner, A. Piryatinski, and C. Silva-Acuna. “Noise-Induced Quantum Synchronization and Entanglement in a Quantum Analogue of Huygens’ Clock” The Journal of Physical Chemistry Letters 2024 <p>The full list can be found on my Google Scholar or arXiv.</p>	
CURRENT RESEARCH	<ul style="list-style-type: none"> Dynamics of Phase Transitions and Integrability in Quantum Systems June 2024–Present <i>Los Alamos National Lab, New Mexico, USA</i> Mentor: Dr. Nikolai A. Sinitsyn Dynamics of Open Quantum Systems January 2024–Present <i>University of Houston, Texas, USA</i> PhD Advisor: Prof. Eric R. Bittner 	
ACHIEVEMENTS	<ul style="list-style-type: none"> Cullen Fellowship, University of Houston 2025 Best Talk, Physics Research Day 2025, University of Houston 2025 Graduate Research Fellow at <i>Los Alamos National Lab</i> 2024 Awarded Distinction for Masters Thesis 2020 Undergraduate Research Fellow <i>Harish Chandra Research Institute</i> 2017 	
LEADERSHIP/ TEACHING EXPERIENCE	<ul style="list-style-type: none"> Chair American Physical Society (APS) Chapter at University of Houston 2024-2025 Physics 2125 (University Level Classical Mechanics) 2023–2024 Physics 1101 (College Level Classical Mechanics) 2022–2023 Physics 2126 (Topics in Modern Physics: Wave Optics, Quantum Mechanics, Nuclear Physics) Summer 2023 	

TALKS
EXTRA-
CURRICULAR
ACTIVITIES

- [The Knowmads Podcast](#)
- [Music Channel](#)
- Co-founder of '*Beyond Portals*'. An Organization to Promote, Popularize and Support research in fundamental sciences.
- Advocacy and Science Policy

HUMAN
VALUES AND
COMMUNITY
SERVICE

- Volunteer: COVID-19 Pandemic (during the nationwide lockdown) and helped in distribution of food supplies, PPE kits and other necessary goods to migrant laborers and the underprivileged.
- Volunteer: Sanjay Gandhi Animal Health Care Center
- Volunteer and Educator: Slums of New Delhi, India, to help the underprivileged lead a better life.