

"FOUNDATIONAL QUESTIONS IN PHYSICS: PERSPECTIVES FROM SCIENCE AND SPIRITUALITY "

Varun Agarwal

*Director, Bhaktivedanta Institute, Kolkata;
Alumnus, IIT Kanpur, India*

From the days of Galileo and Newton to today's quantum technologies, physics has made tremendous progress in last few centuries. We have come long way from Newton's pulleys and steam engines to modern precision clocks and quantum based appliances. We have explored various phenomenon in nature and have got answers to many questions. It is a great triumph for humanity – the research, the hard work, and the achievements we have made. However, there are various foundational questions in physics, which have been puzzling physicists since the beginning of physics till today. These questions, starting from the origin and nature of 'force', the meaning of 'wavefunction' to the very nature of quantum information, touch the very boundaries of physics, and pushes us towards philosophy, psychology and spirituality. Astonishingly, many founders of physics were inspired towards ancient spiritual wisdom while deeply contemplating on these foundational questions. The present lecture will explore some of these foundational questions in physics in the light of scientific and spiritual perspectives. The lecture will draw insights from the works and thoughts of founding fathers of physics, such as Louis de broglie, Werner Heisenberg, Erwin Schrodinger, Wolfgang Pauli, Max Planck, Niels Bohr, among others. The author proposes the need for an interdisciplinary platform by bringing together physics, philosophy, psychology and Vedanta in search for answers to these fundamental questions.