

# Feature Book

Take some inspiration from amazing women featured  
in our Qiskit India Week of Quantum Feature Book



# Aditi Sen De



*Professor, Dean of Student  
Affairs, Harish-Chandra  
Research Institute*

## **About**

Aditi Sen De is a professor in quantum information and computation group at the Harish-Chandra Research Institute, Allahabad. She is known for her research on quantum information and computation, quantum communication including quantum cryptography, quantum optics and many-body physics. The Council of Scientific and Industrial Research India awarded her the Shanti Swarup Bhatnagar Prize for Science and Technology for her contributions to physical sciences in 2018. She is the first female physicist to be given this honour.

## **Hobbies**

Listening to music, watching movies, reading story books

## **Message**

Work hard with sincerity, and honesty.

---

# Babita Jajodia



*Assistant Professor, Indian  
Institute of Information  
Technology Guwahati*

## **About**

Dr. Babita Jajodia, is an Assistant Professor in the Department of Electronics and Communications Engineering (ECE) at IIIT Guwahati. Her research interests are on VLSI Design and Quantum Computing. She is also supporting a quantum computing start-up Artificial Brain LLC that is focused on developing quantumcat: a platform-agnostic, open-source, high-level quantum computing library.

## **Hobbies**

Listening to music

## **Message**

Take tiny steps each day and do whatever interests you the most and makes you feel happy. It is okay if you have not made up your mind or have a fixed plan yet for your future.

# Kasturi Saha



*Associate Professor , Indian  
Institute of Technology,  
Bombay*

## About

Kasturi Saha is an Associate professor in IIT Bombay in the Electrical Engineering Department. She was a postdoctoral fellow at Research Laboratory of Electronics at the Massachusetts Institute of Technology. She obtained her PhD from School of Applied and Engineering Physics at Cornell University. Her research interests include quantum sensing, precision metrology, and quantum computation with solid-state colour defects. She is a recipient of the DST-INSPIRE faculty fellowship.

## Hobbies

Painting, playing badminton and tennis, gardening

## Message

There will always be people who think that you are not fit for the job, but it is your grit and your inner strength that you have to rely on to move forward. Therefore, pay attention to strengthening the core and not the perturbations of the external world. Focus on honing your capabilities and you will shine no matter what.

---

# Kavita Dorai



*Professor, Indian Institute of  
Science Education and  
Research Mohali*

## About

Her current research interests include: NMR quantum computing, multiparty entanglement characterization, decoherence suppression protocols, NMR-based metabolomics to study metabolism and circadian rhythms and evolutionary questions of aging and immunity, NMR methodology development, and Pulsed field gradient NMR studies of nanoparticles and biomolecules in biological networks.

## Hobbies

Travelling, reading, writing fiction. Few of her short stories have been published in literary magazines like Eclectica and Blackbird.

## Message

Follow your own heart and don't listen to the advice of others (I realize this statement is self-contradictory!)



# Manjula Gandhi



*Professor, Coimbatore  
Institute of Technology  
Qiskit Advocate*

## **About**

Manjula Gandhi is a quantum computing educator who aims to make it accessible to students. She is teaching Quantum Computing for a class of 60 postgraduate students, using Qiskit for her lab and demo sessions. She is playing the role of Translation Lead for converting Qiskit textbook to Tamil Language. For last two years, she has been invited as a Resource Person for handling sessions on Quantum Computing in various Faculty Development Programs.

## **Hobbies**

Gardening, listening to music while cooking

## **Message**

Balance all your roles which you play daily equally, we need not plan for 1 year / 5 year plan, but plan daily and complete your day's task to reach your goal. Nothing is impossible, our dreams will come true if we work hard with dedication and enjoyment.

---

# Nithyasri Srivathsan



*CEO & Founder, SheQuantum*

## **About**

Nithyasri is an unconventional quantum technologist with deep passion for conducting fundamental interdisciplinary research in physics and algorithms as a computer scientist through quantum computing. She is also the Author of a bestseller, "Quantum Computing An [Unconventional Beginners'] Book". As the CEO & Founder of SheQuantum - the world's first Quantum EdTech, she is pioneering simplified quantum computing education for the global masses.

## **Hobbies**

Cooking, poetry, coffee connoisseuring

## **Message**

My dear fellow women, the quantum industry and academia needs you. There's no better time than now to start a career in the field of Quantum Computing. Start an online course, reach out to like-minded people, and be ready to take up challenges!

# Padmabati Mondal



*Assistant Professor, Indian  
Institute of Science Education  
and Research Tirupati*

## About

She is working in the area of excited state quantum chemistry involving photochemistry and spectroscopy of transition metal complexes and biologically relevant organic chromophore and multiscale simulation. Her interests include applying quantum mechanics for light-induced chemical and biological processes including subtle phenomena like non-adiabatic coupling, spin-orbit coupling, spin-crossover etc.

## Hobbies

Music, painting (Gond art), social work, travelling

## Message

The word 'quantum' is still frightening for the students which keeps them from exploring its real essence. I feel that once one explores the quantum world with real interest, one will be surprised to find its amazing beauty and enormous capability. Of course, there are challenges but it is a enjoyable journey to overcome the challenges.

---

# Sonali Mohapatra



*Space Applications Lead,  
Craft Prospect Ltd Visiting  
Researcher, Quantum  
Technologies for Space,  
University of Strathclyde*

## About

At Craft Prospect Ltd Sonali looks broadly across integration of Artificial Intelligence and Quantum Technologies on Small Satellites for a smarter and secure space future. She is a part of the technical team of the upcoming ROKS mission, where she leads modelling and simulation of quantum key distribution for space. She is also a visiting researcher at the University of Strathclyde where she researches the translation of early stage quantum tech to space. She has more than seven years of experience consulting for international organisations in the field of Equality, Diversity and Inclusion.

## Hobbies

Singing, painting, making my own decor, poetry, kick boxing, writing.

## Message

I can tell from my personal experience that many times, doubts or obstacles young women face in their careers or your personal journeys, are a product of the structural issues in society rather than a reflection of themselves. Find role models around you who can help you find a way through and never give up! The world is your oyster.

# Supurna Sinha



*Professor ,Raman Research  
Institute*

## **About**

Supurna Sinha received her PhD. in non-equilibrium statistical mechanics from Syracuse University. Subsequently she did postdoctoral work at the IISc, Bangalore and the Raman Research Institute, Bangalore. At RRI, she works in the fields of equilibrium and non-equilibrium statistical mechanics and Quantum Information. Apart from writing technical papers, she enjoys communicating science to a popular audience and has written articles in science education journals such as Resonance and Jantar Mantar.

## **Hobbies**

Painting, making paper art, singing, listening to music- especially western classical

## **Message**

I would encourage the next generation of Women in Quantum to immerse themselves in pursuing their questions fearlessly and passionately. That is sure to lead to good work.

---

# Tanvi Gujarati



*Quantum Computing  
Applications Researcher, IBM  
Quantum*

## **About**

As a quantum computing applications researcher, Tanvi focuses on potential near term and long term applications of quantum algorithms in the fields of chemistry and machine learning. During her PhD she was working on modelling interactions between light and ensemble of neutral atoms. Apart from quantum computing and quantum algorithms, she also interested in ecology and has gained gain some experience in the field ecology techniques in the lush forests of Kerala, India.

## **Hobbies**

Painting, gardening, cooking

## **Message**

Every question deserves to be asked, please don't be shy to ask. There are so many of them waiting to be asked, especially in Quantum. I hope you are the one who asks them and helps find the answers as well! Stay curious!



# Tina Anne Sebastian



*Co-founder , Quacoona*

## **About**

With a computer engineering degree from CUSAT in 2005 and an MBA from the University of Massachusetts, Amherst in 2010, Tina has 12 years of software engineering experience, consulting at companies including Verizon, Whirlpool and Proctor & Gamble. She is currently the technical co-founder of Quacoona, a platform that combines quantum computing, AI, blockchain and crypto to solve global supply chain issues. She was named to the 10 most inspiring women leaders of 2021 by IndustryEra, as well as named to the top 100 Tech Innovators and Influencers by InterCon in 2021.

## **Hobbies**

Writing fiction and poetry. Her work was selected to be published in the publication 'Prelude' in 2021.

## **Message**

Challenges are simply opportunities in disguise, and as long as you refuse to stop believing in yourself, there is nothing too complex, quantum or otherwise, for you to understand or impossible for you to achieve. Always strive to keep moving forward, in life and in work, one step at a time, and let confidence and humility be your key tools on your journey.

---