SRINIVASA RAMANUJAN

Srinivasa Ramanujan was born in 1887 in Erode, Tamil Nadu, India. He grew up in poverty and hardship. Ramanujan was unable to pass his school examinations, and could only obtain a clerk's position in the city of Madras. However, he was a genius in pure mathematics and essentially self-taught from a single text book that was available to him. He continued to pursue his own mathematics, and sent letters to three mathematicians in England, containing some of his results. While two of the three returned the letters unopened, G.H. Hardy recognized Ramanujan's intrinsic mathematical ability and arranged for him to go to Cambridge. Hardy was thus responsible for making Ramanujan's work known to the world during the latter's own lifetime. Ramanujan made spectacular contributions to elliptic functions, continued fractions, infinite series, and analytical theory of numbers. His health deteriorated rapidly while in England. He was sent home to recuperate in 1919, but died the next year at the age of 32.

RAMANUJAN PRIZE

In 2005 the Abdus Salam International Centre for Theoretical Physics (ICTP) established the Srinivasa Ramanujan Prize for Young Mathematicians from Developing Countries, named after the mathematics genius from India. This Prize is awarded annually to a mathematician under 45. Since the mandate of ICTP is to strengthen science in developing countries, the Ramanujan Prize has been created for mathematicians from developing countries. Since Ramanujan is the quintessential symbol of the best in mathematics from the developing world, naming the Prize after him seemed entirely appropriate.

The Prize is funded by the Department of Science and Technology (DST) of the Government of India and administred jointly by ICTP, DST and the International Mathematical Union. The Prize carries a $15,000 cash award. The Prize is given with the provision that the prize money be used to support the research of the recipient. The selection committee is formed by members of all three institutions.

RAMANUJAN PRIZE SCULPTURE

The Ramanujan Prize sculpture is an exact miniature replica of the statue of Srinivasa Ramanujan that is kept in the ICTP Marie Curie Library. The bronze bust of Ramanujan was donated to ICTP by the SASTRA University in India, where the original bust is kept.

A CELEBRATION OF MATHEMATICS

DST - ICTP - IMU 2021
RAMANUJAN PRIZE CEREMONY
AND
RAMANUJAN INTERNATIONAL CHAIR LECTURE

ICTP
21 February 2022

The Abdus Salam International Centre for Theoretical Physics

Department of Science and Technology of the Government of India

International Mathematical Union (IMU)

2021 RAMANUJAN PRIZE CEREMONY

Monday, 21 February, 2022
Venue: Budinich Lecture Hall and online
14:30 - 17:00 CET

Programme

14:30	Welcome address by ICTP Director **Atish Dabholkar** Introduction of the Ramanujan Prize and Ramanujan International Chair
14:40	**H.E. Neena Malhotra**, Ambassador of India to Rome
14:45	**Prof. Srivari Chandrasekhar**, Secretary, Department of Science and Technology, India
14:50	**Prof. Helge Holden**, Secretary General of the International Mathematical Union
15:00	**Prof. Ngô Bảo Châu**, Fields Medalist and ICTP Scientific Council - Presentation of the 2021 Ramanujan Prize winner, Prof. Neena Gupta
15:10	Prof. Neena Gupta, Indian Statistical Institute, Kolkata Ramanujan Prize Lecture: G_a-Actions and their Applications
15:40	COFFEE BREAK
16:00	Introduction of Prof. Don Zagier by Prof. Atish Dabholkar
16:10	Special Lecture: Ramanujan and the Partition Function by **Prof. Don Zagier**
17:00	Closing remarks by **Prof. Claudio Arezzo**, Head, ICTP Mathematics section

RAMANUJAN INTERNATIONAL CHAIR

It is the excellence of ICTP's faculty that ensures the breadth, depth and power of our mission.

The Ramanujan International Chair, which is bestowed upon prominent mathematicians, is an investment in the excellence of our faculty. By providing opportunities for exceptional scholars to spend periods from few weeks up to one year with us, ICTP is pursuing new research directions and expanding its collaborations to have a greater global impact.

That impact means wider access to leading scientists and mathematicians for researchers from disadvantaged countries, especially younger generations who do not have the opportunity and the means to go to international conferences to exchange views.

ICTP is pleased to announce that Don Zagier has been named as the first holder of its Ramanujan International Chair

Don Zagier is a mathematician, Emeritus Scientific Member and Director at the Max Planck Institute for Mathematics in Bonn and the first holder of ICTP's newly-estabilished Ramanujan International Chair.

Zagier, who first visited ICTP more than 10 years ago, has been part of the Centre since 2014 as a Distinguished Staff Associate, and collaborated on numerous research papers with ICTP scientists, both within and outside the Mathematics section. In addition to his ICTP affiliation, Zagier is a distinguished affiliated member of the Trieste-based Institute for Geometry and Physics, run jointly by ICTP and SISSA.

A number theorist who has also done work in topology, algebraic geometry, and mathematical physics, Zagier shared his time for many years between Germany and a professorship in another country: first at the University of Maryland, then at the University of Utrecht, and then at the College de France. Zagier won many prizes, including the Carus Medal, the Cole Prize in Number Theory, the Prix Elie Cartan, the Chauvenet Prize, and the von Staudt Prize.
He became a foreign member of the Royal Netherlands Academy of Arts and Sciences in 1997, a member of the National Academy of Sciences (NAS) in 2017, and an honorary member of the London Mathematical Society in 2019.

In 2021 he has been awarded the Fudan-Zhongzhi Science Award. He shares the prize with Benedict Gross, Emeritus Professor of Mathematics at Harvard University and the University
of California, San Diego, for their formulation and proof of the Gross-Zagier formula.

2021 RAMANUJAN PRIZE CITATION

This year's Ramanujan Prize is awarded to Prof. Neena Gupta, the Indian Statistical Institute in Kolkata, India.

Professor Neena Gupta, a mathematician at the Indian Statistical Institute in Kolkata, was awarded the 2021 DST-ICTP-IMU Ramanujan Prize for Young Mathematicians from Developing Countries.

Professor Gupta received the Prize for her outstanding work in affine algebraic geometry and commutative algebra, in particular for her solution of the Zariski cancellation problem for affine spaces. The DST-ICTP-IMU Ramanujan Prize committee, composed of eminent mathematicians from around the world, commented that Gupta's work "shows impressive algebraic skill and inventiveness".

The 2021 Ramanujan Prize
Selection Committee consisted of:

Prof. T. Toro
Prof. G. Rangarajan
Prof. P. Nang
Prof. A. Wade
Prof. L. Gottsche (Chairman)