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# HKUST Professor Honored with State Natural Science Award

Prof Jing-Song Huang, Professor of Mathematics at the Hong Kong University of Science and Technology (HKUST), was conferred the 2002 State Natural Science Award (SNSA), second class, for his fundamental contributions to research on group representation theory and harmonic analysis.

Prof Huang's award is part of the 2002 State Science and Technology Awards. He was presented the award certificate by Premier Zhu Rongji at a ceremony held in Beijing on 28 February 2003.

The SNSA is the most prestigious award in the field of natural sciences in China. The highly competitive selection exercise involves a three-stage review by panels of experts and the award committee. Only one first-class SNSA (unclaimed for the previous four years) award and 23 second-class awards were presented in 2002.

"The award is more a recognition of the achievements of HKUST than my personal honor," says the 40-year-old Huang, one of the youngest recipients of SNSA in 2002. "I joined HKUST in 1993, two years after it was founded, and witnessed the rapid growth of the University and the establishment of its international reputation. HKUST aspires to be a leading research university, and has succeeded in creating an environment conducive to research. Here we all strive hard to achieve excellence in research."

Hi-res image Premier Zhu Rongji (first row, four from left) and President Jiang Zemin (first row, six from left) with SSTAs awardees, including Prof Jing-Song Huang (second row, middle)

Prof Huang's project on "Noncommutative Harmonic Analysis on Semisimple Lie Groups" has opened up new horizons for research into representation theory. In 1978, the renowned Japanese mathematician Kashiwara et al resolved Helgason's conjecture about eigenspace representations on Riemannian symmetric space, laying the foundation for further developments in group representation theory. Prof Huang proved that Helgason's conjecture for Riemannian symmetric spaces can also be applied in the more general affine symmetric spaces. His findings were published in the prestigious academic journal, *Annals of Mathematics* , Vol 154, 2001.

Prof Huang's research areas are representation theory, Lie theory and harmonic analysis. He has published approximately 20 academic papers in prestigious journals such as the *Annals of Mathematics and Journal of the American Mathematical Society* . He received a BSc in mathematics from Peking University, and a PhD in mathematics from MIT, US in 1989, where he studied under Prof D Vogan, the master of Lie group and representation theory. Prior to joining HKUST, Prof Huang worked at the Institute for Advanced Study in Princeton and the University of Utah in Salt Lake City. His research has been supported by the Research Grants Council of Hong Kong and the National Science Foundation, US. Recently he was awarded 400,000 yuan by the prestigious National Natural Science Foundation of China.