

## Editorial

Welcome to the first issue of APMN for 2013. During the past two years, I hope APMN has succeeded to a certain extent in providing a platform for exchange of information among the mathematics community in the Asia Pacific region. This bulletin has not succeeded in attracting more readers to participate actively by sending us their views and opinions about various aspects of mathematics research and education in the region. I appeal to all interested and concerned readers to respond positively to my invitation to contribute their comments, views and knowledge on mathematical matters. We are open to your suggestions on new areas that should be covered by this bulletin.

I would like to welcome Ivan Guo who has replaced Derek Holton as the contributor of the Problem Corner. I would like to express my profound gratitude and appreciation to Derek for his efforts and hard work during the past two years. Readers are reminded to send in the answers as there are some book prizes waiting to be won.

Articles featured in this issue include "Evolution Operators and Algebras of Sex-Linked Inheritance" by Rozikov Utkir who gives a brief review of recent results on discrete-time dynamical systems and evolution algebras of sex-linked inheritance. N. Raja, in his article "Vicious Queues and Vicious Circles" presents some of the fascinating paradoxes that arising in the logic and foundations of mathematics. In "What is Hyperbolic Geometry?" Mahan Mj provides a brief introduction to hyperbolic geometry, including its genesis. Murray Elder introduces a fascinating subject on groups generated by automata in "A Short Introduction to Self-similar Groups".

This issue contains two interviews. In the first interview, Wu Hung-Hsi recounts how from being a reluctant reviewer of school mathematics material and part-time critic of school mathematics teaching in California, he went on to become an active advocate and full-time writer in maintaining the mathematical standards of school teachers. He also gives his views on the influence of modern mathematics on school mathematics education. Nalini Joshi, the first female mathematics professor at the University of Sydney, gives an interesting account of how she defied her father's wish by switching her enrolment to science from medicine, and went on to pursue her dream of becoming a mathematician. Sudhir Ghorpade and students of the late Shreeram S. Abhyankar in "Remembering Shreeram S. Abhyankar" pay tribute to their teacher.

This year, there are two global mathematical theme events, namely Mathematics of Planet Earth (MPE2013) and the International Year of Statistics (Statistics2013). In order

to highlight these two important events I have extracted the following information from the webpage of MPE2013 (<http://mpe2013.org/about-mpe2013/>) and Statistics2013 (<http://www.statistics2013.org/about-us/>).

The most pressing global problems such as climate change, clean water, energy, food and housing, etc. are inherently multidisciplinary and mathematical sciences have an important role to play. A large community of mathematical scientists has stepped forward to embrace this role through participation in the Mathematics of Planet Earth (MPE2013) project. MPE2013 was first conceived as a year-long project slated to begin in January 2013, involving mainly North American institutions. It has since evolved to become a truly worldwide initiative and now includes partners from all continents and endorsements by the International Mathematical Union, International Council of Applied and Industrial Mathematics, International Commission of Mathematical Instruction, and UNESCO, among others. As MPE has gained more and more participants, it is hoped that there is sufficient momentum to propel it beyond 2013. The problems facing our planet will persist, and this proposed project will involve mathematical scientists in laying the groundwork for a long-term effort to surmount them.

Statistics have powerful and far-reaching effects on everyone. Yet most people are unaware of their connection—from the foods they eat to the medicines they take—and how statistics improve their lives. Since our world is becoming more quantitative and data-focused, demand for statisticians and data analysts is expected to increase by 4.4 million jobs worldwide in the years ahead. The founding organizations of Statistics2013 are the American Statistical Association, Institute of Mathematical Statistics, International Biometric Society, International Statistical Institute, Bernoulli Society and Royal Statistical Society. As established by the founding organizations, the campaign's primary objectives are to do the following: increase public awareness of the power and impact of statistics on all aspects of society; nurture statistics as a profession, especially among young people; promote creativity and development in the sciences of probability and statistics. There are now nearly 1,500 organizations from more than 100 countries worldwide participating in Statistics2013. You are invited to visit the website [www.statistics2013.org](http://www.statistics2013.org) for information about all their activities and for the registration of your organization in support of their activities.

Finally, I would like to wish our readers a happy and fruitful 2013.

Swee Cheng Lim  
Editor