

## Scholar Award Recipients Named by International Plant Nutrition Institute

The first group of winners of the Scholar Awards sponsored by IPNI has been announced. The awards of US\$2500 (twenty-five hundred dollars) each are conferred to deserving graduate students in sciences relevant to plant nutrition and management of crop nutrients.

The five recipients for 2007 and their universities are:

- **Miss Zhu Hongxia**, Southwest University, Chongqing, China
- **Mr. Fernando Ramos Gourcy**, Almería University, Spain
- **Mrs. Nunuk Suprihati**, Bogor Agricultural University, Indonesia
- **Mr. Christopher Boomsma**, Purdue University, West Lafayette, Indiana, U.S.A.
- **Miss K. Vanitha**, Tamil Nadu Agricultural University, Coimbatore, India

“We had a significant number of applications for these new awards in 2007 and were impressed with the quality and credentials of the graduate students,” said Dr. Terry L. Roberts, IPNI President. “This speaks well of the academic institutions where these students are pursuing advanced degrees, and it is also a credit to their major professors and advisers.”

Funding for the Scholar Awards is provided through support of member companies of IPNI, primarily producers of nitrogen, phosphate, potash, and other fertilizers. Graduate students attending a degree-granting institution located in any country with an IPNI program region are eligible. Students in the disciplines of soil and plant sciences including agronomy, horticulture, ecology, soil fertility, soil chemistry, crop physiology, and other areas related to plant nutrition are encouraged to apply. Following is a brief summary of information for each of the 2007 winners.

**Miss Zhu Hongxia** is completing her Masters of Science degree in the Department of Resources and Environment of Southwest University in Chongqing, China. Her thesis title is “Effect of Slow/Controlled Release Compound Fertilizer (SRCF) on Soil Nitrogen and Enzyme Activity”, which focuses on characteristics of nutrient release of SRCF and effect on plant growth. The objective of this research is to evaluate the effect of SRCF on soil fertility and nutrient supply to plants. Several advantages have been identified related to SRCF use in crops. Miss Zhu has written two scientific papers as first author and is third author on another. For the future, she hopes to work as a teacher or researcher, with a longer-term goal of studying for a Ph.D.

**Mr. Fernando Ramos Gourcy** is pursuing studies for a Ph.D. at the University of Almería in Spain, with a thesis title of “Programation of Organic Fertilization with Mulching and Drip Irrigation Techniques.” He is originally from Mexico and is currently an instructor at Universidad Autónoma de Aguascalientes (UAA) in Mexico. Mr. Ramos Gourcy received his B.S. degree in 1987 at UAA and earned his M.Sc. in 1993 at Instituto Agronómico Med. de Zaragoza in Spain. He has been very active in arranging and managing exchange programs among institutions in various countries for professors and students, while also encouraging cooperative research projects. Mr. Ramos Gourcy has visited more than 20 countries in Europe, the Middle East, Africa, and the Americas. He is familiar with the difficulties in agricultural production in less developed countries and seeks to adapt intensive and efficient production methods from more advanced areas. Mr. Ramos Gourcy has worked extensively in rural community development in Mexico and has served as a consultant to the Inter-American Development Bank.

**Mrs. Nunuk Suprihati** is completing her Ph.D. in Soil Science and Land Resources at Bogor Agricultural University (IBP) in Bogor, Indonesia. Her thesis title is “Microbe Population, Methane and Nitrous Oxide in a Rice Field: Effect of Water Management, Organic Matter and N Fertilizer.” The main goal addresses how to decrease methane and nitrous oxide fluxes from rice fields without reducing rice yield by the management of water, organic matter, and N fertilizer. Rice straw incorporation is an important means of maintaining tropical soil productivity. The project seeks to determine how straw management will impact on greenhouse gas emissions, when fertilizer N and irrigation are manipulated. Mrs. Suprihati is a native of Karanganyar in Central Java, and completed her B.S. and M.Sc. degrees at IBP. Her career goals include teaching and research work on soil management and soil fertility. She has special interest in how agricultural practices impact the environment, and how effects can be minimized.



Zhu Hongxia



Fernando Ramos Gourcy



Nunuk Suprihati

**Mr. Christopher Boomsma** is completing his Ph.D. in Crop Physiology and Cropping Systems at Purdue University. His thesis title is “Intraspecific Competition and Plant-to-Plant Variability in Maize: Nitrogen Rate and Plant Density Effects.” Research for the dissertation seeks to elucidate the physiological mechanisms in maize (corn) associated with intraspecific competition and plant-to-plant variability, and how these mechanisms are affected by varying N availability at multiple plant populations. Mr. Boomsma is a native of Illinois and completed his B.S. degree in 2003 at Dordt College in Sioux Center, Iowa. His career goals include work in either an academic or industrial setting as a research scientist in crop improvement at the interface of crop physiology and soil fertility. He is particularly interested in future research on the effects of limited versus optimum N availability on crop physiology under water-limiting conditions.



Christopher Boomsma

**Miss K. Vanitha** is a M.Sc. student in Crop Physiology at Tamil Nadu Agricultural University in India. Her thesis title is “Drip Fertigation and its Nutrio-Physiological Impact in Aerobic Rice (*Oryza sativa* L.)” Rice production and water conservation are two major factors impacting food production in India. Aerobic rice is a new concept to further decrease the water requirements in rice production, which will have major consequences for both soil and plant nutrient dynamics. The objectives of this thesis project are to: 1) evaluate the compatibility of drip-fertigation for aerobic rice culture under limited water availability, 2) to work out the production function of water and fertilizer for aerobic rice culture, 3) to standardize crop management options for enhancing aerobic rice productivity under drip-fertigation technology, and 4) to evaluate the physiological and chemical bases of performance of aerobic rice in the drip-fertigation micro-irrigation system. Miss Vanitha is a native of Bommidi in Tamil Nadu and completed her B.Sc. degree in 2006. Her career goals are to pursue a Ph.D. in abiotic stress management of crops, in particular drought tolerance.



K. Vanitha

The IPNI Scholar Award recipients are selected by a committee of scientific staff of the organization. The awards are made directly to the students and no specific duties are required of them. More information is available from IPNI staff, from individual universities, or from the IPNI website: >[www.ipni.net/awards](http://www.ipni.net/awards)<. [BC](#)

## **Rice: A Practical Guide to Nutrient Management** **Revised Edition Available for Sale and Download**

In the last 5 years, site-specific nutrient management (SSNM) for rice has become an integral part of initiatives on improving nutrient management in many Asian countries. Nutrient recommendations were tailored to location-specific needs, evaluated together with rice farmers, and widely promoted through public and private partnerships. The first edition of *Rice: A Practical Guide to Nutrient Management*, published in 2002, quickly became the standard reference for printed materials on SSNM. The guide was in high demand with 2,000 copies distributed and sold to date.

Over the years, SSNM has been continually refined through research and evaluation as part of the Irrigated Rice Research Consortium. Conceptual improvements and simplifications were made particularly in N management. A standardized 4-panel leaf color chart (LCC) was produced and the promotion of the new LCC continues, with more than 250,000 units distributed to date. A new SSNM website was developed ([www.irri.org/irrc/ssnm](http://www.irri.org/irrc/ssnm)) to provide up-to-date information and local recommendations for major rice-growing areas in Asia. The revised edition of the practical guide thus became necessary to be consistent with newer information provided at the SSNM website and local training materials. This 2007 edition will be translated into a number of languages, including Bangla,

Chinese, Hindi, Indonesian, and Vietnamese. The pocket-sized guide introduces the concept of yield gaps and the underlying constraints. The functions of each nutrient are explained, with a description of the deficiency symptoms and recommended strategies for improved nutrient management. The 47-page color annex provides a pictorial guide to identification of nutrient deficiencies in rice.

To make the 2nd edition of the guide as widely accessible as possible, the publishers decided not only to sell the guide through their websites and bookstores, but also to make the guide available in electronic format (pdf) at the websites of IRRI ([www.irri.org](http://www.irri.org)) and the Southeast Asia Program of IPNI and IPI ([www.ipni.net/seasia](http://www.ipni.net/seasia)). This arrangement uses a Creative Commons “attribution-noncommercial-share alike” license: <http://creativecommons.org/licenses/by-nc-sa/3.0>. [BC](#)

