

# Insights from International Students

## Rural Environment Management

## Join us to explore the wonder in science



**G.L.E.P. Perera**  
Sri Lanka

I am a doctoral student who received my master's degree from Okayama University. My existence in this beautiful country gave me many chances of exciting academic and social adventures. Attending this university to achieve my aspirations was the best move I've ever made in my life. My study focuses on sediment management, specifically by using microbial fuel cells to control phosphorus release from sediment in eutrophic lakes while producing bio-electricity. Prediction of greenhouse gas emissions from organic fertilizers in agricultural soil, effects of microplastics in aquatic ecosystems, carbon sequestration, and the role of cleaning crops in soil nutrient management are just examples of fascinating interdisciplinary approaches in our laboratory under Prof. Maeda's guidance. Our laboratory hosts international collaborative research platforms to broaden up the insight of soil management strategies and provides advance technological appliances to be efficient with resources.

I can guarantee you that being a part of our laboratory family, where you can experience a wide range of cultures, faiths, and languages, will motivate you to value diversity and inclusivity throughout your studies. Put on wings to your ambition of becoming a researcher if you are a prospective applicant still considering a well-known university to pursue your further education. We eagerly await your arrival in the land of Sakura.

## Environmental Ecology

## Spend a meaningful research life in Okayama



**RuoYu Liu**  
China

Okayama City is absolutely a nice place for your study life, not only the nice sight, simple folk, but the most importantly, there are only few natural disasters. If you come to Okayama area, whether it is from the quality of education, the strength of teachers, to the college comprehensive strength, I believe that Okayama University is your best choice. I am here to conduct research on high value-added crops in impoverished areas of China. While understanding how local farmers improve their lives through planting and promoting their successful experience. Thanks to excellent professors and perfect research conditions, I can do my investigation without a hitch. In our Resource Management Course, two professors are always there to help and support you. We are looking forward for you to join us.

## Environmental Ecology

## Enjoying Research in Okayama University



**ABI YASI**  
China

My hometown is Inner Mongolia, which is in the northwestern part of China. It has vast grasslands, but also plagued by grassland degradation and desertification. It's been revealed that these problems are mainly caused by overgrazing, climate change etc. Therefore, I chose this course to keep my research on the sustainable development of grassland ecosystem.

In this course, we focus on the reasonable allocation and use of regional resources, to aim to create a sustainable development society. This course objectively explains food, rural and agricultural issues based on various data and discusses the causes of those issues based on economic theory.

During the research in our course, my favorite part is field survey. In this part, while gathering data, I can also get a large amount of knowledge I've never seen or heard from local farmer or herder.

In addition, we have great supervisor here who helps me open up my vision and let me understand the fun of data analysis.

As society develops, it is essential to ensure the sustainable use of resources in the future through appropriate resource management, and the research of sustainable development will play an important role in the future. In my case, keep research on the sustainable development of grassland ecosystem is the best way to contribute to SDGs.

## Human Ecology

## Environmental statistics for better life



**Septian  
Rahardiantoro**  
Indonesia

Hello, my name is Septian Rahardiantoro. I have been a lecturer of the Department of Statistics Bogor Agricultural University, which is currently known as IPB University, Indonesia. Now, I am a sophomore student in the doctoral program at Environmental Science Division, Department of Human Ecology, The Graduate School of Environmental and Life Science, Okayama University Japan. My research area is environmental statistics under the supervision of Prof. SAKAMOTO Wataru. The reason why I chose this program is because I wanted to apply statistical science to the environmental field, which later could be useful for analyzing environmental problems in Indonesia, and amazingly Okayama University offers it. In this program, I was introduced to various issues regarding environmental problems that Japan has experienced along with various solutions. I also gained knowledge on how to develop myself so that I could provide innovations in useful research in the environmental field.

My research topic relates to the development of models that can be applied to environmental data. With excellent discussion and guidance from my supervisor, I believe my research will do well.

## Sustainable Society Studies

## The most liveable city to research and live in Japan



**Dang Chi Anh**  
Vietnam

I am currently studying for a PhD in Urban Transport major at Okayama University. Okayama University is the largest university in the prefecture, the campus is located near the city center. From the dormitory in Tsushima Campus, you can go to the central station, shopping, dining, and entertainment areas by a bicycle in just several minutes. Thanks to the location in the Chugoku region, Okayama Prefecture is a place with a warm climate, little rain and almost no natural disasters. Okayama is well-known for the story of Momotaro and many delicious fruits such as peaches and Muscat grapes. There are more than 30,000 foreigners living in Okayama and the local government attaches great importance to supporting foreigners in their lives. The City Council of Foreigners, which I am one of the members, often makes recommendations to make the city more livable place for foreigners.

Currently, I am researching on Ride Sharing and its impact on urban transport. In the future, Self-driving car and Ride Sharing expected to bring many conveniences to human life and have a great impact on the city's appearance.

## Material and Energy Science

## Aim high with my research life in Okayama



**Huang Haizhi**  
China

I was born in a small city in China. I had a strong interest in science since I was a child. My dream was to be a scientist when I was in middle school. After graduating from university with a bachelor degree, in order to gain a higher quality in research, I thought studying abroad and getting a master's degree was essential. After careful investigation and several communications with professors, I thought Okayama University would be suitable for my research. And after more than two years of studying, I can say that what I got from my learning experience in Okayama University is not just a profession, but also diversification and a higher vision of my life.

My course is mainly about Ceramic Materials and my major research is developing a reliable method to immobilize high-level radioactive waste from nuclear power plants by using glass-based materials. As for why I chose this course, it is because I think this material is a key technology for solving environmental problems and achieving sustainable development for human beings.

Even though I don't know when I can achieve my childhood dream of becoming a scientist, there is no doubt that my dream has taken me one step further because I chose to study at Okayama University.

## Biofunctional Chemistry

## Glycobiology for better future in our life



**Md. Asaduzzaman**  
Bangladesh

Our course "Biofunctional Chemistry" is consists of three major field, such as organic chemistry, biochemistry, and microbiology. I belong to the laboratory of functional glycobiochemistry. In my PhD thesis I have purified peanuts allergen Ara h 1.

I have analyzed the N-terminal amino acid sequences and identified new subunit which is 54 kDa Ara h 1. I have analyzed the structural features of N-glycan linked to Ara h 1. I have also learned molecular biology such as gene cloning for the expression of a gene encoding  $\beta$ -xylosidase. If you join this course, you will get a broad range of knowledge related to agricultural chemistry.

I choose this course because my aim was to study the field of glycobiological science in a well facilitated laboratory. Since joining the research group, I can easily access to new technologies which enable me to achieve my goal. I hope I will get more knowledge about glycobiology by the end of my PhD thesis. In the future when I come back to my country, I want to find a job as a researcher in the field of pharmaceutical company and food production company.

Moreover, it is important for human being the relationship between plants, animal, bacteria, and their environment. The benefit of studying in my course is able to explain the phenomena by the analysis of micromolecules to macromolecules such as carbohydrate, protein, and DNA.

## Plant Stress Science

## Heterosis analysis of barley



**Areej SAKKOUR**  
Syria

I belong to the Genome Diversity group in IPSR. We are interested in evaluating and preserving barley genetic resources and the application of genome diversity. My research aims to uncover the genetic mechanism of heterosis in barley (*Hordeum vulgare* L.) to utilize this advantage to increase biomass production and minimize carbon dioxide in our environment. My work involves phenotypic evaluation, which enabled me to gain experience with the plant in the field. In addition to skills in Molecular Biology, Data Analysis, and Population Genetics, I got due to the support of our laboratory experts. Where I come from, we rely on cereal crops as the primary food resource. All that encouraged me to become a barley breeder. I took a step to accomplish my Ph.D. in IPSR because it has a high reputation as a representative gene bank of the barley secondary diversity center of East-Asia. Also, it contributes to valuable scientific output. Not to mention the privilege of working with well-known scientists guided by Prof. Sato. Over the last decades, meeting the demand of population nutrition necessity has become significantly at risk due to the climate changes threatening the future of food security. Therefore, unlocking plant genetic potentials will benefit our generation and the planet's future. To live in Japan as a MEXT Student benefit my experience in language, culture, and making memories. So far, it has been the highlight of my life.

## Plant Science

## Genetic Diversity in African Melon



**Imoh Odirichi  
Nnennaya**  
Nigeria

I study the genetic variations embedded amongst melon varieties especially from Africa, since it's been revealed that *Cucumis melo* is very much genetically diverse. Africa is said to be one of the centers of origin for *Cucumis melo* species and this has sparked up series of questions that needs to be resolved. Hence the reason this study is necessary to assist in bridging the gap of knowledge about the evolution of melon varieties.

I chose this field of study because I realized there is so much mystery yet to be discovered in plants generally and melon with all its different traits/ characteristics avails me the opportunity to learn and try to discover things for my self.

The use of phylogenetics helps in discovering issues related to the evolutionary history of plants and with this information, scientists make better decision on how best to conduct breeding activities. This is very beneficial to the world at large because when scientists are able to make profitable decisions about plants, the local farmers are able to reproduce these new findings in more convenient ways with better outputs. These benefits also apply with melon varieties and with more research, useful discoveries will be made.

## Animal Science

## Gate to Okayama University



**Le Nu Anh Thu**  
Vietnam

It has been a long and memorable path that led me to this gate. It began from the first time I visited Japan via a short term-exchange program in Kyoto University. I had unforgettable impressions about the Japanese people and culture as well as advanced education in Japan. That was the reason to bring me back to this country to pursue the Master and PhD program.

Indeed, I have accumulated valuable experiences throughout my two years of master studying in Kyoto University. However, I decided to move to Okayama University to pursue the PhD program. I was fortunate that I not only gained the useful expertise and skills in this course, but also had a better opportunity to get to know the great friends. The Animal Genetics Laboratory has a good international flavor with many students from abroad. We had mutual interests in research and of course, the friendship was also enhanced by the many occasions for organizing parties that we were able to join. Moreover, the atmosphere in the land of sunshine made me feel completely comfortable and peaceful. I was fascinated by its natural beauty such as cycling on KIBI road full of fragrant flowers, enjoying the delightful scenery surrounded by rich nature and cute animals, or picking the local specialty fruits with affordable prices. Yes, my stay at Okayama University was a memorable experience for myself and especially for contribution in my future studying and career.

## Number of International Students by Country and Admission Status

| Country/Region | Regular Students    | Research Students | Special Audit Students | Total Number (2016-2020 Fiscal Year) |            |     |
|----------------|---------------------|-------------------|------------------------|--------------------------------------|------------|-----|
|                |                     |                   |                        | Special Research Students            | Total      |     |
| Asia           | Afghanistan         | 11                | 5                      | 0                                    | 0          | 16  |
|                | Bangladesh          | 41                | 1                      | 0                                    | 0          | 42  |
|                | Cambodia            | 5                 | 1                      | 0                                    | 1          | 7   |
|                | China               | 161               | 40                     | 2                                    | 0          | 203 |
|                | India               | 3                 | 1                      | 0                                    | 0          | 4   |
|                | Indonesia           | 53                | 1                      | 0                                    | 1          | 55  |
|                | Iran                | 1                 | 0                      | 0                                    | 0          | 1   |
|                | Iraq                | 2                 | 0                      | 0                                    | 0          | 2   |
|                | Korea               | 3                 | 0                      | 0                                    | 0          | 3   |
|                | Laos                | 3                 | 0                      | 0                                    | 0          | 3   |
|                | Malaysia            | 8                 | 0                      | 0                                    | 0          | 8   |
|                | Myanmar             | 6                 | 1                      | 0                                    | 0          | 7   |
|                | Nepal               | 7                 | 0                      | 0                                    | 0          | 7   |
|                | Pakistan            | 0                 | 1                      | 0                                    | 0          | 1   |
|                | Sri Lanka           | 4                 | 0                      | 0                                    | 0          | 4   |
|                | Syria               | 5                 | 1                      | 0                                    | 0          | 6   |
|                | Taiwan              | 5                 | 1                      | 0                                    | 0          | 6   |
| Thailand       | 6                   | 0                 | 0                      | 1                                    | 7          |     |
| Vietnam        | 191                 | 6                 | 1                      | 1                                    | 199        |     |
| Africa         | Egypt               | 6                 | 0                      | 0                                    | 0          | 6   |
|                | Ethiopia            | 4                 | 0                      | 0                                    | 0          | 4   |
|                | Kenya               | 28                | 1                      | 0                                    | 0          | 29  |
|                | Morocco             | 0                 | 0                      | 0                                    | 2          | 2   |
|                | Nigeria             | 2                 | 1                      | 0                                    | 0          | 3   |
|                | Uganda              | 2                 | 1                      | 0                                    | 0          | 3   |
| Latin America  | Brazil              | 2                 | 0                      | 0                                    | 0          | 2   |
|                | Trinidad and Tobago | 0                 | 1                      | 0                                    | 0          | 1   |
| Europe         | Belgium             | 0                 | 0                      | 0                                    | 1          | 1   |
|                | France              | 0                 | 0                      | 0                                    | 19         | 19  |
|                | Germany             | 0                 | 0                      | 6                                    | 0          | 6   |
|                | Spain               | 1                 | 0                      | 0                                    | 9          | 10  |
| CIS            | Russia              | 1                 | 0                      | 0                                    | 0          | 1   |
| Oceania        | Fiji                | 4                 | 2                      | 0                                    | 0          | 6   |
|                | Papua New Guinea    | 2                 | 0                      | 0                                    | 0          | 2   |
|                | Solomon             | 2                 | 1                      | 0                                    | 0          | 3   |
|                | Tonga               | 2                 | 1                      | 0                                    | 0          | 3   |
|                | Vanuatu             | 2                 | 1                      | 0                                    | 0          | 3   |
| <b>Total</b>   | <b>573</b>          | <b>68</b>         | <b>9</b>               | <b>35</b>                            | <b>685</b> |     |