

## President's Address for Entrance Ceremony

It is my great pleasure to welcome two new students to the Master's Program of the Graduate School of Human and Social Sciences, nine students to the Master's Program, and three students to the Doctoral Program of the Graduate School of Natural Science and Technology, Shimane University. Congratulations to all those who have enrolled and everyone involved. On behalf of all Shimane University professors and staff as well as the current students, I would like to extend my sincere congratulations to you.

Among fourteen new students, one is Japanese and thirteen are international students. I am glad that you, international students, selected Japan and Shimane University as the place of study out of a large number of universities. We are ready to support all the students so that you can pursue the learning and research that will lead to your dreaming future.

Shimane University is a national comprehensive university with a well-balanced arrangement of seven faculties and four graduate schools in the natural sciences, including medicine, and humanities and social sciences on the Matsue and Izumo campuses. World-leading research activities that take advantage of the unique strengths of the region and detailed individualized education are being carried out in Shimane University, including the graduate school and laboratory to which you belong. Since you have enrolled in graduate school, I hope that, based on the knowledge you acquired in your Bachelor's program, you will acquire even more advanced specialized knowledge and abilities. I further hope that you will value the questions that interested each of you, deepen your research through the guidance of your supervising professors and active discussions with everyone in the laboratory, overcome difficulties, and create a master's or doctoral thesis as an achievement that leads to your ultimate goal.

On the other hand, I strongly recommend you to take advantage of the strengths as a comprehensive university which I mentioned earlier and strive to gain a broader perspective during your studies, going beyond your specialized field and even beyond the boundaries between the natural sciences and humanities and social sciences. Why would I encourage you to make such a seemingly extra effort?

First, new developments, value, and innovation are created by linking the highly specialized knowledge and skills acquired through one's own intellectual curiosity and spirit of inquiry with the knowledge and skills of other specialized fields. In addition, the encounters and interactions with various people that occur during this process have a great impact not only on research but also on the development of life. While there are many examples of this, including my own experience, I would like to give you an example from a book by Prof. Tsutomu Miyasaka that I recently read. He has led the development of perovskite solar cells, which are expected to be revolutionary next generation of solar cells invented in Japan, and he has been nominated for the Nobel Prize.

First, in the book, he explained that the unexpected invention of perovskite solar cells was born from the interactions that occur naturally through human contact, which he calls “self-organization”. Furthermore, he described that after the invention, as a result of research exchanges that transcended the fields of chemistry and physics, the completely unexpected excellent performance of perovskite materials was discovered. He also mentioned that cross-disciplinary exchanges that go beyond one's interests and fields will lead to new discoveries and guidelines for new ways of life.

In another sense, highly specialized human resources need to have a bird's-eye view. The current era is called the VUCA era. VUCA is an acronym coined from the initials of four words: Volatility, Uncertainty, Complexity, and Ambiguity, and represents the current and future situation of the world, which is difficult to predict, such as the spread of the new coronavirus, an increase in natural disasters, the rapid development of technologies such as AI (artificial intelligence), and changes in the world situation due to Russia's invasion of Ukraine. From a geological perspective, the modern era is also sometimes referred to as the Anthropocene. This is a word which expresses that human economic activities and nuclear tests have imprinted profound changes on the earth, comparable to asteroid collisions in the history of the earth. Attempts to solve these global issues through cooperation around the world include initiatives such as SDGs, Sustainable Development Goals, by 2030 and carbon neutrality after that. Shimane University has also adopted the SDGs Action Guidelines and is promoting many initiatives in areas such as education, research, and community contribution, which are introduced on the university's website.

SDGs include 17 goals. There are many cases where activities aimed at one goal actually work in the opposite direction of hindering the achievement of other goals. An example of this is the environmental destruction caused by renewable energy development, such as deforestation caused by the construction of mega solar panels. Therefore, initiatives that value overall balance in addressing many local and global issues are necessary to achieve well-being in a sustainable society and the global environment, with no one left behind. In order to lead such a future, you need to position the advanced specialized knowledge you acquire from a panoramic perspective that transcends disciplines, and to develop it in relation with the real world.

In this area, Japanese traditions such as ancient Izumo, Matsue Castle, tea ceremony, and Japanese sweets are still alive. This area is also blessed with abundant nature, including Lake Shinji, which has one of the 100 best sunsets in Japan, and fresh, delicious food. One of the great benefits of studying at Shimane University among others in Japan is that you can learn richly from a bird's-eye view of cutting-edge science in such a culturally and healthy environment. While taking full advantage of these benefits, I hope you will study steadily with an eye to the future and a wide range of perspectives encompassing local to global views. I also hope all of you will spend a fulfilling student life at the Shimane University while interacting with friends, faculty, and staff members.

My best wishes for your success!

October 8, 2024  
OTANI Hiroki  
President of Shimane University