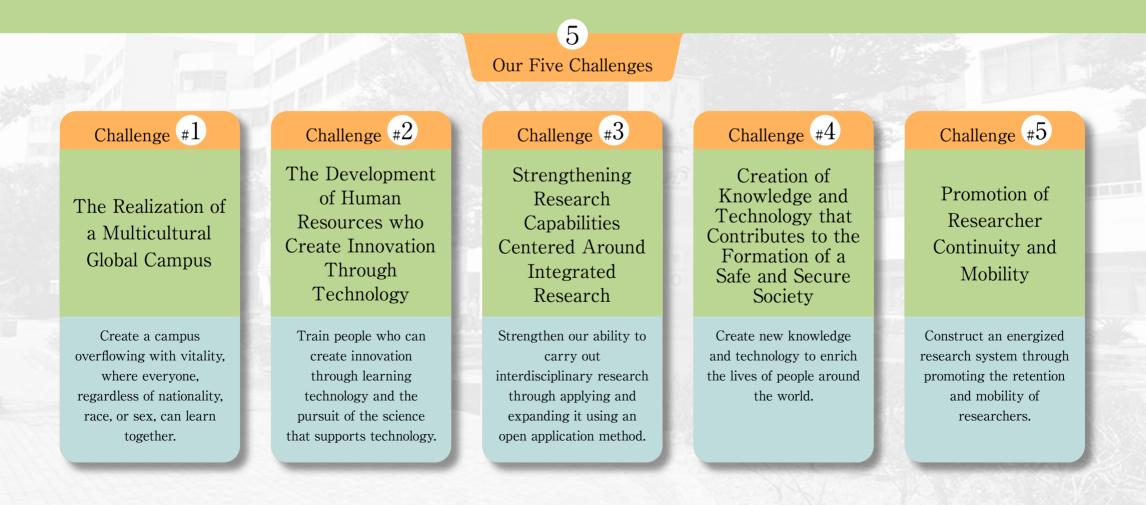# The Onishi Plan 2019

Aiming for Science and Technology that Leads the World:Toyohashi University of Technology's Challenges

Toyohashi University of Technology welcomes technical college and high school graduates. Our mission is to carry out education and research in science and technology, and academic inquiry that develops new technologies through the pursuit of the science that supports technology.

Our mission is why we emphasize graduate school education, fostering practical, creative, and leading engineers and researchers. We aim to become a top-class engineering university open to the world, one that carries out the research for the science and technology that paves the way to the next generation.

5 Our Five Challenges

Challenge #1

The Realization of a Multicultural Global Campus

Create a campus overflowing with vitality, where everyone, regardless of nationality, race, or sex, can learn together.

Challenge #2

The Development of Human Resources who Create Innovation Through Technology

Train people who can create innovation through learning technology and the pursuit of the science that supports technology.

Challenge #3

Strengthening Research Capabilities Centered Around Integrated Research

Strengthen our ability to carry out interdisciplinary research through applying and expanding it using an open application method.

Challenge #4

Creation of Knowledge and Technology that Contributes to the Formation of a Safe and Secure Society

Create new knowledge and technology to enrich the lives of people around the world.

Challenge #5

Promotion of Researcher Continuity and Mobility

Construct an energized research system through promoting the retention and mobility of researchers.

Focus Areas for the 2019 Academic Year

As a member of United Nations Academic Impact, we tackle the Sustainable Development Goals (SDGs) through dealing with common issues faced by people around the world, such as global poverty, lack of food or water, urban problems, worsening environments, and global warming.

[Collaboration / Education with Kosen Colleges]

By promoting the construction of a Collaborative Education Program that links Kosen (National Institute of Technology colleges) courses and our curriculum, and joint research with Kosen and companies around the country, we will further strengthen our links with Kosen.

[Research]

We are working to promote joint research with companies , strengthen the Electronics-Inspired Interdisciplinary Research Institute (EIIRIS), and expand our Research Administration Center (RAC).

[Internationalization / Education]

We aim to further expand our internationalization through bilingual lectures, overseas training, links with overseas universities, hiring people with experience in research or work overseas, and by utilizing our Penang Campus.

[University Management]

Along with further encouraging the hiring of women, we will increase awareness about all forms of harassment and discrimination.

[Student Support]

We will provide additional support for extracurricular activities, such as the Archery Club, the Baseball Club, the Robocon Club, and the Brass Band, encouraging students to take an active part in these.

[University Management / Research / Education]

We will tackle the challenges presented by the central government in its National University Management Reform Project, Project to Foster World-Class Doctoral Students, and Project to Create Genuine Industry-Academia Partnerships at the Organizational Level.

Toyohashi University of Technology is a member of United Nations Academic Impact.

UNITED NATIONS
academic
impact

Sharing
a Culture
of Intellectual
Social
Responsibility

SUSTAINABLE
DEVELOPMENT
GOALS

Activities We Promote

Expansion of Education

● We work closely with education at Kosen, with long-term internships as a feature, to strengthen our abilities in science and technology through enhancing our "spiral-up curriculum" which builds on basic and specialized instruction.
● Introduce tailor-made curriculums throughout the university and train students who will take on the challenges of inter-disciplinary issues.
● Develop "Global Technology Architects" through MEXT's Top Global University Project.
● Promote globalized education through bilingual lectures, overseas training, and so on.
● Implement leading teaching programs in doctoral courses through industry-academia-government participation and construct a support system that takes into account the end of the project period.
● Tackle the challenge of a program to train doctoral students at a global level.
● Strengthen the ability of our people to perform on a global level through Global Liberal Arts education, and strengthen our Entrepreneurship education to foster people with the mindset of job entrepreneurs.
● Develop a curriculum that ensure smooth connections between the curriculums of TUT and Kosen.

Expansion of Research

● Promote research in practical technology fields and advanced interdisciplinary research and creation fields in our Research Institute for Technological Science and Innovation.
● Promote world-leading research through advanced joint research laboratories.
● Promote research that fuses disparate fields through strengthening our Electronics-Inspired Interdisciplinary Research Institute (EIIRIS).
● Promote research that leads to implementation within society or proposals for society through our Cooperative Projects for Innovative Research, which all university members can apply for.
● Strengthen research capacity through enhancing our Research Administration Center (RAC).
● Raise the overall level of research skills of all faculty through enhancing research skills.

Links with Kosen

● Further strengthen our links with Kosen colleges through the construction of a linked education program, promoting joint research with Kosen collegesthem and companies around the country, and so on.
● Further strengthen our diverse range of exchanges, links, and collaborative programs with Kosen colleges in our Kosen Liaison Center.
● Organic links such as training faculty, improving curriculums, and ongoing education for Kosen graduates.
● Continue partnerships constructed in our Tri-Institutional Collaboration Program, continue to be active globally, and expand our initiatives to provide practical engineer training that will bring about innovation.

Industry-academia Partnerships

● Promote "Institution-Linked Joint Research" focusing on organization-level partnerships with companies and so on through our Research Administration Center (RAC).
● Tackle the challenge of genuine industry-academia partnerships at the organizational level.
● Promote innovative interdisciplinary research.
● Promote applied research that contributes to strengthening industrial competitiveness, etc.
● Strengthen our risk management system to develop an environment where it is easy to accelerate our industry-academia partnerships.

Global Expansion and Partnerships

● Promote and strengthen TUT's internationalization in our Institute for Global Network Innovation in Technology Education (IGNITE).
● Promote active exchange with partner universities/institutes.
● Promote student exchange, international joint research, and multi-layered global human resources movement.
● Strengthen networks such as with our overseas alumni and by following up with international graduates from TUT.
● Actively accept international students through double degrees or joint degrees, and promote sending Japanese students overseas.

Partnerships with the Community

● Tackle the challenges of projects that aim to reform national university management in collaboration with the manufacturing industry, Kosen, and Nagaoka University of Technology.
● Further promote regional creation and social contribution at our University-Community Partnership Promotion Center.
● Promote recurrent education through enhancing our adult practical learning program, and contribute to the creation of an enriched, sustainable "future for the local community."

Support Environment

Organization Management

- Ensure time for education and research through rationalizing the management system.
- Change the name of a course/major in light of the social importance of chemistry and biotechnology (Environmental and Life Sciences → Applied Chemistry and Life Science)
- Ongoing revision of education and research institutions based on analysis and verification, reform into outreach-style university management.
- Enhance salary and reward system to increase faculty members' passion for teaching and research.
- Strengthen our funding acceptance and management system to increase donation income.
- Put a gender equality action plan into action by, for example, hiring more female faculty members.
- Hire foreign faculty members or people who have research or work experience overseas.
- Construct a human resources system and develop an environment whereby young faculty members with superior research skills can use their abilities to the maximum.
- Carry out strategic university management utilizing IR data and implement a new faculty member evaluation system.
- Strengthen our financial foundation through external funding and self-income acquisition projects.
- Enhance an environment and support system that allows people to engage fully regardless of sex or disability.

Creating a Better Environment for Education, Research and Student Support

- Improve campus internationalization, renovate the student dorms and the International House.
- Promote a planned development of the environment based on the Facility & Campus Master Plan.
- Developing a better educational environment and welfare environment that actively incorporates student and employee desires.
- Promote a system that encourages active participation by students in extracurricular activities, such as improving the archery field and buying new manufacturing equipment for the Robocon Club.
- Support initiatives such as extracurricular activities that encourage physical and mental health, and bring about a bright, lively campus.
- Promote initiatives towards achieving a campus free of any kind of discrimination or harassment.
- Utilize the University Library and the Penang Campus to create a multi-cultural, global campus within TUT.
- Enhance financial support to allow us to provide educational opportunities to students without them worrying about their family's finances.

Dealing with Fraudulent Research and Misappropriation of Research Funds

- Responses based on the guidelines for research activities, the use of research funds, and so on.
- Implement and enhance education in research ethics for faculty and students.

Liaising with Parents/Guardians and Alumni

- Construct a system for mutual support among graduates by liaising with the alumni association in the Alumni Liaison Office.
- Bring about a campus that parents/guardians and alumni can freely visit, and which provides a forum for active exchange.