

Your First Step to a Future of Innovation

International Undergraduate Programs
in English

SCHOOL OF ENGINEERING

Applied Chemistry
Civil Engineering
Electrical Engineering and Computer Science
Mechanical and Aerospace Engineering



KYUSHU
UNIVERSITY



Your First Step to a Future of Innovation

It is said that every journey begins with a single step. We invite you to take your first step with the School of Engineering at Kyushu University, utilizing a unique education and research environment to lead your personal journey to become a future innovator.

An aerial photograph of the Kyushu University campus. The foreground features a large, modern, multi-story building complex with a mix of grey and orange-brown facades. The building is surrounded by green lawns and parking areas. In the background, a dense urban area of Fukuoka is visible, extending to the coast and across a bay. The sky is clear and blue.

Kyushu University

Since its establishment in 1911 as the 4th Imperial University, Kyushu University has grown into an international research institution comprised of 12 undergraduate schools, 21 graduate schools, 16 faculties and a university hospital. Under the new slogan “Lead the next 100 years, leap to be in the best 100 world” which was set in 2011, Kyushu University is committed to educational and research advancement over the next century and aims to be ranked within the world’s top 100 in all disciplines. The university’s new flagship “Ito Campus” is the heart of an academic research city built on cooperation with government and industry.



Study at KYUSHU UNIVERSITY

One of the National Seven University Group

Kyushu University is a former imperial university founded by the Empire of Japan before World War II. These universities distinguish themselves as Japan's "Ivy League" and remain the cream of crop in research and prestige.

Japan's 4th oldest engineering school

Since the very beginning, we have taken pride in contributing to the development of Japanese society. The Faculty of Engineering of Kyushu University may trace its history back to 1911 when Kyushu Imperial University was established with the colleges of medicine and engineering.

Developing as Japan's Top Global University

The university is currently working to enhance its international profile under the government's Top Global University project while a number of engineering and technology subjects are already in the top 100 QS world rankings – the top 0.5% among 20,000 universities.

Tapping into world-class research infrastructure

The flagship Ito Campus features state-of-the-art facilities and equipment for research. Undergraduate students may also take advantage of this as they study in their program and conduct graduation research in their final year of study.



A member of Japan's Research University 11

RU 11 is a consortium which was established in 2009 consisting of the top 9 national and 2 private universities in Japan. Its membership shows that Kyushu University is highly active in research in the international academic community.

Very low Student to Faculty ratio of 9:1

Our very low student and faculty ratio promises you an optimal learning environment with a high level of interaction, engagement and academic support. Students main also gain much individual attention from their teachers and their research supervisor.

Strong ties with industry, both local and international

We are active in cooperation with business and industry, with companies maintaining their laboratories on-campus, facilitating a seamless transaction between academic research and commercial development and application.

Inspired by bright minds from across the globe

2,521 international students from 97 countries and regions are studying in Kyushu University.*¹ The number of foreign students is on the rise yearly. The university is among the top five universities in Japan with the highest ratio of international students.

*¹ As of Nov. 1, 2018

World-level Research Institute and Notable Research



International Institute for Carbon-Neutral Energy Research: I²CNER

- Carbon-neutral energy research for the creation of a sustainable and environmentally-friendly society



Next-Generation Fuel Cell Research Center: NEXT-FC

- Next-generation fuel cell research for a low-carbon society and a solution to global warming



Center for Organic Photonics and Electronics Research: OPERA

- Organic materials and devices for creating future electronics



Research Institute of Applied Mechanics: RIAM

- Ultra-efficient, next-generation compact wind lens power systems



Research and Development Center for Taste and Odor Sensing: R&D TAOS

- Taste sensors to detect and identify flavor (a world-first invention)

FUKUOKA

Settling in the city with great potential

In 2017, Fukuoka, home to Kyushu University, was ranked the number one city in Japan for Potential Growth with its tolerance of diversity, spirit to take on new challenges, and promotion of innovation. The city positions itself as Japan's start-up capital and can boast an internationally-recognized high quality of life. Come and explore your potential in this vibrant city!



A great livable city

Fukuoka, which literally means "Happy Hill" is a pleasant and cosmopolitan city; the 5th largest metropolis in Japan. 95% of its population report satisfaction with life and it was ranked as the world's 7th most livable city by Monocle Magazine in 2016. Fukuoka enjoys a growing reputation as a modern, vibrant regional trade and production center, and is brimming with a dynamic and cosmopolitan atmosphere. The new flagship campus of Kyushu University, Ito Campus, is located in the western part of Fukuoka city in the middle of the Itoshima peninsula, an area that is rich in nature and has beautiful oceans nearby. Itoshima is ranked as the most liveable area in Fukuoka prefecture and is one of the top areas for quality of life in the world.



A platform for Japanese green technology

In 2011, Fukuoka prefecture, Fukuoka city and Kitakyushu city were selected as one of seven international strategic zones of Japan, as the platform for developing Japanese green technology for export to the rest of Asia. This initiative aims to bring together industry and technology related to urban environment infrastructures; a field that Japan has promoted, refined and gained experience with in order to tackle global environmental issues. Fukuoka will lead the way in the development of green technology as it grows together with the rest of Asia. Furthermore, many leading companies have been founded in Fukuoka and Kitakyushu cities, including Yaskawa Electric and Toto Ltd. Japanese companies that have become household names throughout the world have a strong presence, including famous automobile companies such as Toyota Motors Kyushu Inc. and Nissan Motors Kyushu Co. Ltd.



Gateway to Asia

Fukuoka is often called the "Gateway to Asia" because there are many flights that connect Fukuoka International Airport to Asia's major cities which include hub airports such as Singapore Changi Airport and Hong Kong International Airport. Fukuoka has also been Japan's culture gateway and contributed to the development of Japan's history and culture since ancient times through active cultural exchanges with Asian countries.



Fukuoka as No. 1 in Japan

City growth potential
(among 100 cities in Japan)

1st

Population increase by number
(among designated cities)

1st

Ratio of young population
(ages 15-19)

1st

Number of international students
(among designated cities)

2nd

Lowest food cost
(among 21 major cities)

1st

INTERNATIONAL UNDER

—Leading to a Bachelor of Engineering—

Because of the wide-ranging influences of engineers on society, engineers not only require special knowledge in their respective fields, but also an understanding of ethics in engineering, a profound awareness of the diversity of humanity, and a broad education about the environment and the role of human beings within it. In keeping with this view of engineering's responsibility to society as a whole, IUPE students take liberal arts subjects and science core classes in KIKAN Education provided in Center Zone for the first year, then proceed to take specialized subjects common to the four programs offered by the School of Engineering located in West Zone, and others that are specific to each program for the remainder of their study.



Liberal Arts:

Japanese Issues, Global Issues, Intercultural Encounters, Interdisciplinary Collaborative Learning of Social Issues, Introduction to Economics, Introduction to Philosophy, Introduction to Law, KIKAN Education Seminar, Language and Communication in Society, etc.

Science Core:

Fundamental Physics, Calculus, Linear Algebra, Basic Chemistry, Fundamental Organic Chemistry, Environmental Geoscience, Introductory Biology, Fundamental Cell Biology, Basic Laboratory Experiments in Natural Sciences, etc.

Common Engineering:

Advanced Engineering, Technical Communication, Engineering Ethics, Japanese Industry, Business, Ordinary Differential Equation, Complex Function, Engineering Mathematics, Introduction to Information Processing, etc.

Japanese Language

From university entrance until graduation, half, IUPE students can learn all-rounded Japanese which are offered at eight levels, ranging from their studies, students can improve their Japanese.

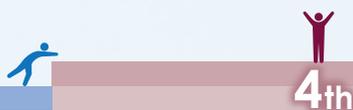


West Zone

GRADUATE PROGRAMS

TOP 5 REASONS TO CHOOSE IUPE

1. Education by top professors, research with leading scientists
2. Study in English, learn Japanese
3. Very small interactive classes of 4-6 people
4. Join the brightest minds from across the globe
5. Generous support available exclusively for our students



& Graduation Research

Education,
Learn Japanese,
Education Theory,
Formation

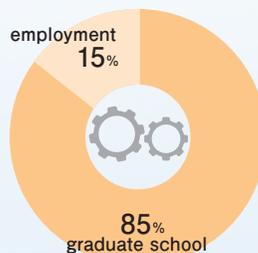


- Applied Chemistry
- Civil Engineering
- Electrical Engineering & Computer Science
- Mechanical & Aerospace Engineering

Students can learn the Japanese language. For the first year and Japanese skills through twice-a-week required Japanese courses beginner to advanced level. In the Specialized Education part of Japanese proficiency through elective Business Japanese courses.

Kyushu University Graduate School of

- ▶ Engineering
- ▶ Information Science and Electrical Engineering
- ▶ Systems Life Sciences
- ▶ Integrated Frontier Sciences



Because Kyushu University is a research-led university, more than 85% of graduates proceed to graduate schools either in Japan or abroad while about 15% of students obtain employment every year; many in Japanese companies.



APPLIED CHEMISTRY

In Applied Chemistry, the creation of materials with structure and functions controlled at atomic and/or molecular levels is studied, with the goal of contributing to the sustainable growth of human society and environmental conservation. In this program, we provide an advanced education in chemistry which can be applied to various fields, and cover a range of materials from organic, inorganic to biomolecules.

Examples of Classes:

- ▶ Organic Chemistry
- ▶ Inorganic Chemistry
- ▶ Analytical Chemistry
- ▶ Biochemistry
- ▶ Physical Chemistry
- ▶ Polymer Chemistry
- ▶ Chemical Reaction Engineering
- ▶ Coordination Chemistry

Message from a **STUDENT**

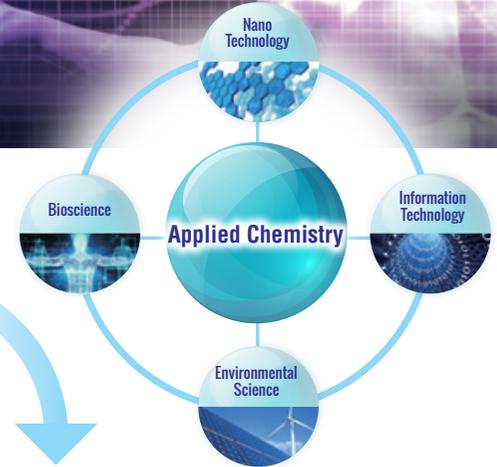


Naura Fakhira

Enrolled in 2016



Having the opportunity to study applied chemistry in the IUPE course has been an absolute privilege. Not only have I had the chance to learn about the theories and basics of chemistry, I also have had the chance to do first-hand experiments and operate instruments for chemical analysis. Moreover, I have had the opportunity of being able to learn from prominent and world-famous professors from whom I was updated on recent and significant developments in the field of applied chemistry. This kind of information and support has been very helpful for me to further pursue my interest in chemistry and develop my future career.



Examples of Laboratories:

- ▶ Molecular Self-Assembly
- ▶ Carbon Nanotube
- ▶ Biomimetic Chemistry
- ▶ Drug Delivery System
- ▶ OLED
- ▶ Li-Battery
- ▶ Fuel Cell
- ▶ Photocatalysts

CIVIL ENGINEERING

In Civil Engineering, the building, maintenance and control of social infrastructure is taught, including studies into restoration of devastated natural environments, all for the purpose of a happier and healthier society. In this program, students learn about the latest technologies, in various fields of building design and construction, urban planning, and soil and water environment preservation.

Examples of Classes:

- ▶ Structural Mechanics
- ▶ Hydraulics
- ▶ Soil Mechanics
- ▶ Transportation Planning
- ▶ Disaster Mitigation System Engineering
- ▶ Environmental System Engineering
- ▶ Mathematics of Planning
- ▶ Construction Materials

Message from a **STUDENT**



Krisadawat Chantat

Enrolled in 2016



My love for civil engineering has its root in my childhood fascination with the design of complex structures such as skyscrapers and bridges. My dream is to become an engineer with expertise in structural design, and it is here in Kyushu University where I can pursue my goal to the fullest. I was taught a diverse set of skills crucial for one to become a civil engineer. Also, my awareness of the challenges in the engineering world has been constantly expanded through exposure from professors in specialized classes. Soon I will have an opportunity to enroll into one of the department laboratories, where I look forward to learning through hand-on experience.

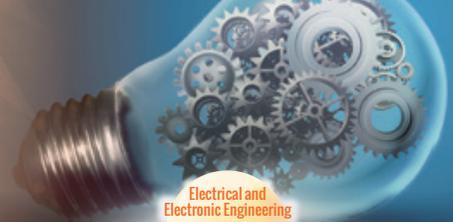


Examples of Laboratories:

- ▶ Earthquake Engineering
- ▶ Concrete Engineering
- ▶ Ecological Engineering
- ▶ Urban System Planning
- ▶ Transportation System
- ▶ Landscape Engineering
- ▶ Structure Analysis
- ▶ Geo-Disaster Prevention

ELECTRICAL ENGINEERING AND COMPUTER SCIENCE

In Electrical Engineering and Computer Science, a systematic program is provided to learn about electricity, electrical energy, electronics, communication, data science and computers. The program will guide you to be a highly skilled engineer or researcher to create new products and new services in wide industrial fields ranging from social infrastructure to cutting edge application of information.



Examples of Classes:

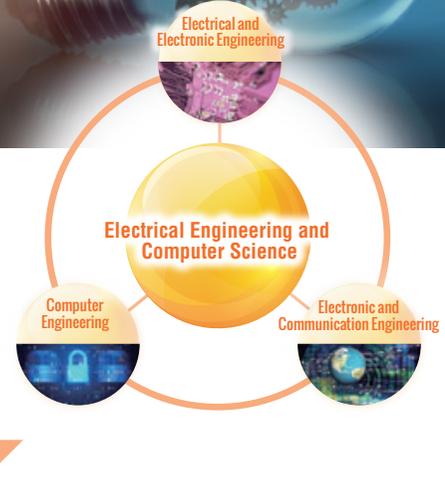
- ▶ Linear Circuits
- ▶ Logic Circuits
- ▶ Programming Methodology
- ▶ Programming Practice
- ▶ Computer Architecture
- ▶ Fundamentals of Integrated Circuits
- ▶ Electric Energy
- ▶ Practice in Logic Design

Message from a **STUDENT**

 **Aneek Nag**
India Enrolled in 2017



Studying at Kyushu university has been a very gratifying experience so far and I am looking forward to my later years. This department has three main sub departments, electrical power engineering, communication systems and information/computer engineering, and you get a look into each one from the very first semester. This gives you the chance to explore and find out what you are interested in. I like this program because you get the opportunity to interact with highly respected professors in your field and work on the latest technologies in our century. This direct exposure to real life applications will surely help me achieve my future goals.



Examples of Laboratories:

- ▶ Automatic Control
- ▶ Sensing Technologies
- ▶ Superconductivity
- ▶ Satellite Communication
- ▶ Artificial Intelligence
- ▶ Communication Network
- ▶ Data Science
- ▶ Cognitive Science

MECHANICAL AND AEROSPACE ENGINEERING

In Mechanical and Aerospace Engineering, future generations of technicians and researchers are nurtured in the culture of "monozukuri", or innovation and manufacturing. Students gain a diverse knowledge of mechanical and aerospace engineering, essential for development of cutting-edge technology such as automobiles, hydrogen energy, robots with AI, aircrafts and rockets, etc.



Examples of Classes:

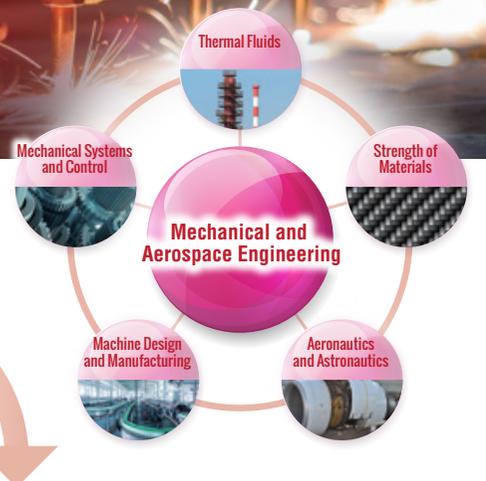
- ▶ Strength of Materials
- ▶ Dynamics of Machinery
- ▶ Internal Combustion Engines
- ▶ Manufacturing Processes
- ▶ Computational Methods
- ▶ Machine Design
- ▶ Systems Control
- ▶ Aerospace Engineering

Message from a **STUDENT**

 **Raad Asif**
Bangladesh Enrolled in 2017



When searching for universities, I was very much attracted to Kyushu University because I knew Japan was significantly advanced in the fields of mechanical engineering. Kyushu University was the global leader in hydrogen energy research, and I was very passionate about working with renewable energy. I knew it would be a priceless experience to attend here for my undergraduate degree as I would be exposed to the frontier of research. My experience as a Kyushu university student has been truly wonderful. I am able to benefit from being taught by very accomplished professors in various fields.



Examples of Laboratories:

- ▶ Hydrogen Utilization
- ▶ Manufacturing Process
- ▶ Machine Design
- ▶ Systems Control
- ▶ Thermal Engineering
- ▶ Aerospace Structure
- ▶ Space System Engineering
- ▶ Strength of Materials

Life Beyond the Class

There's more to a great higher education experience than lectures and experiments. Participating in various extracurricular activities leads to increased productivity in your studies and a better quality of life while living in Japan. We encourage our students to explore their interests and expand their knowledge as they join these extra-curricular activities.

Club Activities

Currently Kyushu University has well-over 170 clubs and societies allowing you to connect your passions with your campus experience. Joining a club on campus is a great way to meet new friends, develop new skills and broaden your horizon! They cover a variety of fields. Some of these clubs have come to be known outside Japan through their participation in international competitions.

Aikido, Kendo, Swimming, Soccer, Ice Hockey, Yacht, Horseback riding, Baseball, Debating, Photography, Hang-glider, Philharmonic Orchestra, Brass Band, Choir, and many more.



Workshop "Sozo Kobo"

The "Sozo Kobo" workshop is a facility that provides you with the freedom and opportunity to exercise your ingenuity and express yourself, developing and manufacturing your own original ideas. This unique workshop environment not present at other universities is supported and managed by the school of Engineering and department of Mechanical Engineering. Currently the following 5 projects are under-way:

- ▶ Robocon Team
- ▶ Kyushu Humanoid Project
- ▶ Wind Tunnel and Turbine Frontier
- ▶ Formula Project
- ▶ Planet-Q



Student Voice



Simi Asher

(Enrolled in 2016, Mechanical Engineering, Former President of ISU)



India

ISU stands for IUPE Student Union and we try to organize events in order to support IUPE students academically and socially. By organizing parties, trips, tutoring sessions and seminars, we create regular opportunities for students to interact with their seniors and form a tight-knit community at Kyushu University. At Kyushu University, students have the opportunity to be a part of many clubs and 'circles', ranging from sports to engineering. I've been a part of 2 engineering circles before and it helped me improve my Japanese skills. But I joined ISU because I get creative freedom to develop projects with my friends. I have learnt a lot about leadership and project management skills as a part of ISU and moreover, it's been a lot of fun!



room

Leadership and Volunteer

Kyushu University provides you with plenty of leadership and community engagement opportunities. Many IUPE students work in the student association on and off campus and develop leadership and communication skills. Whether it is teaching about cultural diversity to elementary school students, cleaning up the environment or promoting tourism, they take part in various volunteer projects for the community.

- ▶ IUPE Students Union
- ▶ IUPE Student Press Assistant
- ▶ Kyushu University Foreign Students Association
- ▶ Kyushu University International Friendship Association
- ▶ Student Committee for Internationalization of Kyushu University
- ▶ Fukuoka Overseas Students Association

Science and Technology Library

Located in the West Zone, this library offers materials relating to mathematics, natural sciences, engineering, information science, and agriculture. It is equipped with an automated storage and retrieval system, which is able to house 800,000 materials maximum.

About
1,200,000
Holdings of books

1,042
Seats

60
Computers

Student Support System

We have a comprehensive supports system for international students on and off campus available from the moment they arrive in Fukuoka. For example, a team of students who are assigned to each new students will support them in adjusting to life in Japan. English-speaking staff at student office always stand by to help you with necessary documents and procedures. A specially-assigned coordinator and a class advisor will help you with any aspect of your campus life.

- ▶ International Student Supporter Team
- ▶ Coordinator & English-Speaking Staff
- ▶ Class Advisor and Research Supervisor
- ▶ Student Academic Support Services
- ▶ Counseling and Free Medical Consultation

Housing

All of three dormitories on campus and one in the neighborhood are international dormitories where international students and Japanese students live together. Each room is fully-furnished with facilities to make your campus life safe and comfortable. IUPE students are guaranteed a room for their first year. Even after that, students can receive assistance from the university in finding accommodation near the campus.

- ▶ On-campus dormitories:
 - Dormitory 1 (single rooms), Dormitory 2 (single rooms, couple rooms)
 - Dormitory 3 (shared rooms of four students: 2 Japanese students and 2 international students)
- ▶ Ito Harmony House:
 - 15 minute-walk, biggest dorm for 581 students featuring the largest amount of living spaces

Location

J A P A N

Tokyo

Fukuoka

Websites

Admission <http://www.kyushu-u.ac.jp/en/admission>
For the details of application and scholarship

International Undergraduate Programs <http://www.eng.kyushu-u.ac.jp>
For further information about our educational program

QUBES-Student Website <http://qubes.kyushu-u.ac.jp>
For the updated information of our students' campus life

QR code:



Admission



International Undergraduate Programs



QUBES-Student Website



Contact Kyushu University School of Engineering
Address: 744 Motoooka, Nishi-ku, Fukuoka 819-0395, Japan
Email: kotiupe@jimukyushu-u.ac.jp