

Establishment of MPI-Korea Confirmed

Expansion to MPI-Korea in 2015 after building two research centers

It has been confirmed that the Max-Planck Institute (MPI) in Germany, the eminent research institute in the field of fundamental science, will be set up at POSTECH.

The university, North Gyeongsang Province, and Pohang City will jointly establish the Korean branch of the Institute, or MPI-Korea, with Max-Planck Gesellschaft. After establishing two research centers for attosecond spectroscopy and complex phase materials, these centers are planned to expand by 2015 to develop into a member institute of MPI.

The establishment details were delineated for 21 months since the formation of the committee for organizing MPI-Korea in July 2008. The initial plan is to run two research centers for attosecond spectroscopy and complex phase materials for five years



▲ MPI-Korea Organization Committee briefing held at POSTECH in Mar. 10

and to construct a high-tech beam line and attosecond spectroscopy in the Pohang Accelerator Laboratory in collaboration with the German Institute.

Within the next month, the basic

agreement will be signed for the establishment. After final adjustments between the Max-Planck Gessellschaft and the Korean government, two independent research centers will be

incorporated and promote talented young scientists from in and out of Korea for research by the end of the first half of the year.

The foundation of MPI acknowledges the potential of building a successful science industry complex in Pohang, where POSTECH and its accelerator are situated, which is similar to Dresden in Germany, where economic growth was stimulated through the formation of a science complex centered around MPI and the university.

President Baik projected, "This news will greatly benefit the university's plan of globalisation. Creating a global science complex with the MPI and coordinating with the industry complex around POSCO will also foster the nation's development."

Reporter Kim Eun-ji

Learning Table Manners

For applicants among freshmen living in Resident College, an opportunity to learn table manners was offered on Mar. 19 in the grand ballroom of the POSCO International Center. A group adding up to 100 students applied to build up their table etiquette especially when eating Western-style meals. Students were given basic lectures about reservations, rules of conduct and sophisticated ways of eating a course meal starting from an aperitif and soup to dessert.

After the lecture, their meals were served and they enjoyed the time of dining while exercising what they had learnt during the lecture. A student who participated commented, "What I have learned today will come handy in the future when having a formal dinner with professors or seniors. I enjoyed the meal very much."

The mangager of banquets and Western dishes in the International Center who took charge of the sessions said, "This kind of event is special and



▲ Students practising decanting wine with the help of an instructor

rarely seen in other universities. We hope students relieve stress and have a relaxing campus life eating delicious food."

This annual event for the newcomers started three years ago and it is still popular. This year, sessions are planned to be done three times—the first one on Mar.19, followed by ones in Mar. 24 and Mar. 29.

Reporter Kim Eun-ji

Are You Curious About the Brain?

Welcoming World Brain Awareness Week, POSTECH's Brain Research Center, chaired by Prof. Kim Dai-jin of the Department of Computer Science and Engineering, held an open lecture titled 'The Brain, Humans, and Computers' on Mar. 19.

For the general public a lecture titled 'The Brain and Consciousness: Why man?' by Prof. Seunghwan Kim of the Department of Physics and one named 'Brain-Computer Interface' by Prof. Kim Dai-jin were delivered, and a laboratory tour was held.

The brain, different from other organs, is still an unexplored field so it is regarded as the last project of the 21st century in the world of science, as it is the passage between the body and the mind as well as the organ which performs highly developed thinking and perception more than just for the management for survival and health.

World Brain Awareness Week, first started in the U.S in 1992 and now held



in 57 countries worldwide in the third week of March annually, has advertised to the general public the importance of brain research. In Korea, the event was held in 10 cities and is in its ninth year.

Prof. Kim Dai-jin, the chairman of Brain Research Center clarified the purpose: "Through the event, brain researchers and common people can recognize the brain and its importance, and I hope youths will be motivated for the dream of becoming brain researchers."

Reporter Lee Sang-min

MIT-POSTECH Research Team Develops Portable Desalination Device

A joint research team of Korea and the United States of America has drawn attention by developing a portable desalination device.

The technology that goes in to the device was developed by Professor Jongyoon Han and Professor Sung Jae Kim of the Massachusetts Institute of Technology (MIT) and Professor Kang Kwan Hyoung and PhD student Sung Hee Ko of POSTECH. The technology uses ion concentration polarization that is used in the production of salt and caustic soda to eliminate salt and harmful substances.

The technology that the research team has developed is somewhat different from current existing technology. It uses the force of ion-exchange layer to shove out any matter that has a charge and gets rid of salt and other substances to get fresh water. With this technology the energy efficiency rises and enables the device to use less electricity than a radio to get a liter of water and can be powered by a solar thermal battery that is currently being developed.

The size of the unit device is 4mm×

5mm and the whole device is expected to be only the size of a desktop computer, different from current desalination technology that requires factory size devices and construction infrastructure.

The device produces drinkable water with pH 7.0~7.5 and a salt concentration of 3mM that fits the drinking water quality regulation of WHO and even annihilates bacteria and minute particles.

"This device produces less water than the present device but it uses less electricity and most importantly is portable so it is fit to be made into a portable desalination device for disaster areas and for military purposes," explained professor Kang Kwan Hyoung.

The research progress was announced on March 21 in the online version of Nature Nanotechnology which covers all areas of nanoscience and nanotechnology and their application.

Reporter Shin Jae-Kwang

New Bioadhesive Developed

From mussel adhesive proteins, patent obtained

Using mussel adhesive proteins, a natural resource, a more advanced bioadhesive has been developed. Professor Cha Hyung Joon of the Department of Chemical Engineering reported the achievement in Biomaterials. The article will be published in Volume 31, Issue 13, May 2010 under the title 'The adhesive properties of coacervated recombinant hybrid mussel adhesive proteins.' Researchers already patented the bioadhesive domestically, and are preparing to apply for an international patent.

Mussels, which maintain their position on boulders, secrete adhesive proteins, but no one could reveal how the mechanism worked. However, Prof. Cha showed mussels secrete adhesive proteins in the form of threads, whose edges are a water-proofing plaque. It had been pointed out that mussel adhesive proteins were too expensive and difficult to gain. His lab solved the problem by a synthesizing fusion with Arginine-glycine-aspartic acid in 2007. Ultimately, researchers developed an advanced version of hybrid proteins which works through tiny vessels and



▲ Threads and adhesive proteins of mussels.

surpasses previous versions in adhesive property.

Coacervated proteins, an advanced version of hybridization, are composed of recombinant mussel adhesive proteins and hyaluronic acid. They hardly mix with water, and have little surface tension and so are more useful. Also, their suitability as bioadhesives is good and can even be used in the human body. Prof. Cha accordingly said, "Current research suggested the secretion mechanism of mussel adhesive proteins and the development of colloidal bioadhesives as their application. It suggests the possibility of developing various bioadhesive materials."

Reporter Lee Sang-min

Discovery of New Electrohydrodynamic Flow Potentially applied to microfluidic devices

A research team at POSTECH discovered a novel type of electrohydrodynamic (EHD) flow which can be used in micropumps to transfer dielectric liquid under electric fields. This was reported in the issue of Mar. 10 on *Physical Review Letters*, an internationally recognized journal in the field of physics.

Jae Chun Ryu (Ph.D), Kwan Hyoung Kang (assistant professor) and his research team at the Department of Mechanical Engineering found a new EHD flow which occurs near the objects immersed in dielectric liquids containing polar additives when applied with strong electric field. After their discovery they investigated into the cause of EHD flow by solving an analytical solution and

comparing it with experimental results.

They suggested that the flow's generation is associated with the nonuniform-field EHD (NUF EHD) flow. The research results are expected to be applied extensively in electromotive pumps and micromixers in microfluidic devices, for example. Beside its technological value, it is noted to be valuable academically because it can lead to an understanding and control of the dynamics of colloidal particles in dielectric liquids.

Professor Kang said, "One of the problems of decrease in e-paper response time is the instability of electric ink particles under electric field. The cause can be found through the EHD flow."

Reporter Kim Eun-ji

Scholastic Agreement Signed Between APCTP and Turkey's ITAP

The Asia Pacific Center for Theoretical Physics (APCTP) signed an agreement with the Institute of Theoretical and Applied Physics (ITAP) on scholastic exchange this March 8.

Executive Director of APCTP Professor Seunghwan Kim from the Department of Physics and Tugrul Hakioglu the ITAP agreed to exchange scientists of each facility, hold joint workshops and conduct international joint research.

ITAP is located in Turkey on the coast

of the Mediterranean and was founded in 2006. Its investment in educating young minds is one of the outstanding facts about ITAP. "This would be a great opportunity for young scientists to exchange knowledge and bond Europe and Asia together," said Peter Fulde of the APCTP.

APCTP is an international research institute for theoretical physics founded in 1996 and is now currently located at POSTECH.

Reporter Shin Jae-kwang

Puzzle A to Z

A	F	E	Z	H	Y	T	I	W	Q
S	R	R	X	B	E	R	E	J	A
B	R	E	A	D	C	R	H	U	M
N	B	V	V	H	K	G	M	N	D
M	U	C	D	J	G	B	A	E	Y
Y	P	L	A	Y	O	F	R	G	S
T	R	O	W	I	T	H	I	D	Y
E	E	A	L	Q	M	E	N	F	T
E	F	F	S	O	W	E	E	D	F
O	M	E	C	H	A	N	I	C	A

◇ Name :

◇ Dept :

Find your own words! Vertically, horizontally, diagonally. **They must go from left to right.** Whatever they are, it will be okay if they are in the dictionary! Submit your answer sheet into the mail box in front of *The Postech Times* office in the Student Union Building 3rd floor by **April 7**. Three winners will be selected by the number of words and will receive a Happy Money Gift Certificate (10,000 KRW).

[Winners]

- Jaehyun Kim (PHYS) : 45 words
- Junyeon Heo (IME) : 38 words
- Kim Youngkwon (ME) : 35 words

✉ Pick up your certificates at *The Postech Times* office during office hours (9am~6pm) on weekdays.

Column

Value in Difference: A Global Approach

Agnostic, anarchist, liberal, and foreigner: of all the labels I could embrace, one that I wear proudly is that of “feminist.” I am, more specifically, an American feminist, possibly with an axe to grind in my home country, but that is neither here nor there. What does being a feminist mean? To me, it means I believe males and females should be treated with equal respect in the workplace and in society: nothing more or less. In fact, feminists don’t even have to be women. Many straight American men are also feminists.

However, in Korea, I am not a feminist. I don’t want to change the social structure here or lead any sort of change. I believe that Koreans are the only people to make that decision. I am not here to serve as any sort of “example” or “role model.” Basically, I’m not here to interfere; I’m here to teach English. I find Korean women to be very powerful in their own way, and they wield that power in a method befitting their culture. I am absolutely sure that, if they desired it, Korean women could run this country in a New York minute—as is reflected by the increasing number of females in government positions.

When teaching English, however, you inevitably end up teaching about your own culture. This

means that, inside the classroom, I must be myself. I don’t need or want Koreans to agree with my perspectives, but will give them the opportunity to hear and understand my viewpoint. Why? Because good foreign language education allows you to mentally prepare yourself for difference, thereby lessening the jarring effects of culture shock. Teaching only grammatical structures and listening skills will not sufficiently prepare you for what you will experience should you choose to take advantage of the study abroad opportunities here at POSTECH. Sure, you can pass a test, but what about mental preparation? The more you allow yourself to encounter and seek to understand difference, the better prepared you will be to thrive and do well in both business and study overseas.

In fact, how many foreign friends do you have here at POSTECH? Chances are you will have the same number of foreign friends when you travel abroad. If you aren’t prepared to encounter difference, you must prepare to encounter loneliness.

Old habits die hard, so I wish I had had more time and opportunities to had learned about Korean culture before I came to this country. Occasionally, Korean culture still throws me off.

Sometimes I smile when, in retrospect, I should have bowed. I have to consciously focus on which hand to pour what liquid with. I, too, am guilty of having fallen into culture difference traps. Fortunately Koreans are generally forgiving and patient about this, but I still hate to do the wrong thing. At times, I envy what Postechians have in the way of preparation for the foreign culture they will encounter.

I think it speaks volumes about the authenticity of the Humanities and Social Sciences program that they have brought an unmarried, 30+ feminist woman here to teach. Clearly this campus wants Postechians to be prepared for the notoriously liberal halls of U.C. Berkeley! With this in mind, I appreciate thus far the open mindedness I have seen here in upper-level classes at POSTECH, and wish Postechian exchange students the best of luck.

Misty Carmichael
Lecturer of HSS



Pareto, Long Tail, and 1,000 True Fans

The Italian economist Vilfredo Pareto observed in 1906 that 80% of the land in Italy was owned by 20% of the population. According to Pareto’s observation, business management thinker Joseph M. Juran suggested what he called the Pareto Principle. The principle states that, for many events, roughly 80% of the effects come from 20% of the causes. We are still living with the Pareto Principle, and this phenomenon is going to become more polarized combined with technology and economic development. For instance, based on the World Bank’s statistics of 2008 gross domestic products (GDP), the summation of the top-twenty countries’ GDP, \$43.45 trillion, is over 8 % of the total world GDP.

As a smaller percentage of organizations causes more, a much larger percentage of organizations come into existence. Chris Anderson, the editor of Wired Magazine, has studied polarization, and finally in 2006 published the book, “The Long Tail: Why the Future of Business is Selling Less of More”. According to Wikipedia, “The long tail is a retailing concept describing the niche strategy of selling a large number of

unique items in relatively small quantities. When the costs of inventory storage and distribution fall, a wide range of products becomes available as well as the most popular products. For example, people generally would like to tour the world’s foremost places like Paris, Roma, and New York for holidays. However, the hidden places keep being discovered and well known as the brand-new visited spots as more the cost get cheap and more the tourists become sophisticated.

“On the strength of the rapid rate, the openness, and the wireless of the internet, the long tail shows marked progress especially in the World Wide Web. In other words, some of the most successful internet businesses include eBay, Amazon, and iTunes Store have leveraged the long tail as part of their business. Those successful internet businesses design in common the place based on web as a platform for whipping of the long tail.”

From now on, it’s possible that a single person can afford to unleash his or her own idea whenever and wherever. Also if the idea is remarkable, people are willing to sneeze it out for free.

Furthermore, social network services like Facebook and Twitter help the idea to spread out easily and make a buzz. Therefore, even though the number of 1% was a tiny quantity in the past, today’s 1% is able to grow up as much as possible. Kevin Kelly, the founding executive editor of Wired Magazine, said there is a break—even point for a lot of creators, such as individual artists, producers, and inventors, standing on one spot of the long tail. The break—even point is to find 1,000 True Fans. A true fan is defined as someone who will purchase anything and everything you produce. For instance, they will drive 200 miles to join openings. They bookmark the eBay page where an out-of-print edition shows up. They can’t wait till the next work. They are true fans.

According to Seth Godin, the author of ten books including “Purple Cow”, 1000 true fans is enough to change the world. For example, 1000 true fans each spending \$1,000 on a special interest cruise equals a million dollars. And 1000 true fans willing to spend \$250 to attend a day-long seminar gives the leverage to invite just about anyone you can

imagine to fly in and speak. Also, 1000 true fans voting as a bloc can change local politics forever. As Seth Godin mentions, organizing 1000 true fans is more profitable than yelling at random strangers all day.

It has been more than 10 years since management consultant Tom Peters first issued the book “The Brand You 50”. Now we are living under the best of conditions for working with our own brands. One thousand is a feasible number. You could count to 1,000. If you added one fan a day, it would take only three years. And therefore if you have a stunning idea or project, feel free to release it and try to organize your 1,000 followers with useful networking tools. Finally, you will have the power to contribute effectively to the world.

Roh Jihoon
IME 05



 Insight into What Foreigners Eat in POSTECH

Food for Thought

Like Mark Twain, an American novelist in the 19th century, said, "Part of the secret of success in life is to eat what you like and let the food fight it out inside." Cooking or eating a mouth-watering meal is the one of the biggest joys in life that applies to perhaps every human being regardless of one's nationality. Sharing delicious food bonds people together to become friends and dining at a fancy restaurant channels the way for social networking.

As crucial as food is as a primal necessity of life, a stay in a foreign land can turn out to be quite miserable if the food does not suit the traveler. How is the food in the POSTECH campus, a reclusive area of Pohang where students mainly take care of their meals inside the school, especially from the eyes of international students?

The Postech Times dined with Indian and Pakistani students, whose populations take up the largest part of the POSTECH international community.

The largest religion in India is Hinduism (80%), followed by Islam (15%) which is the major religion in Pakistan (96%). Their cooking in the DICE dormitory rather than finishing their meals elsewhere is not because of maladjustment to the unique taste of Korean food. The problems lie fundamentally with their religions.

Most Hindus are vegetarians and all Muslims eat halal food. Halal food is that which is appropriately prepared or slaughtered according to Islamic law. Halal food is



▲ A group of Indians and Pakistani dining in the DICE kitchen. (Bottom left) Cooking curry with japati.

rare outside Islamic countries, as in South Korea, which restrains the Muslims residing in such places to eat almost like vegetarians.

"Strictly speaking, there is no food for vegetarians in POSTECH. There are some vegetable and fish dishes to eat in the cafeteria but they either are always the same or not available at all. We have no choice but to cook for ourselves," explained Nisar Ahmed, a Ph.D student in the Department of Chemistry.

There are currently four options for dining in this school. The main ones that Korean students use are the Freedom Cafeteria (with A, B and C corners) and the Snack Bar. The others are the Wisdom Cafeteria and Burger King. One of the reasons for the creation of the C corner of the Freedom Cafeteria was to meet Westerners' daily requirements, but even this does not

help the non-meat-lovers among international students.

Kumar Prashant of the Department of Mathematics questioned, "Some dishes are named 'vegetarian fried rice,' for instance, but along with the vegetable there is always some ham inside it. How can you call that vegetarian?"

In the kitchen of the DICE dormitory, the cupboards are all marked with names of various countries. Students keep their special spices or ingredients inside. "We get our food from a vendor who comes from Busan every last Sunday of the month. There we meet many Indian and Pakistani people and we buy halal food. Others buy it through the Internet from Seoul," said Ahmed who claimed to have started cooking since his coming to POSTECH.

Prashant commented, "Cooking is enjoyable. Friends meet in the kitchen and we can eat together. But there are times when you want to eat something else; however there are not many foreign restaurants in Pohang. It will be very nice if there is something for the vegetarians on the campus."

POSTECH recently took the first step towards quenching the language difficulties of foreigners through the declaration of the Bilingual Campus. However, the university should make detailed efforts, in areas rudimentary as accommodating the needs of student's meals, to become a truly globalised campus.

Reporter Kim Eun-ji

» INTERVIEW

Is the POSTECH Food Catching Up with Globalization?

POSTECH is eager for globalization and has declared itself a bilingual campus, which is now in its first year. However, to succeed in the globalization of POSTECH, it is important to attract foreign students to POSTECH but also to provide them with comfortable services during their stay in POSTECH. Yet, there have been several cries of complaint concerning the food from international students. *The Postech Times* had an interview with the Director of the Welfare Division and the nutritionist in charge of the student restaurant concerning food problems that foreign students have during their stay in POSTECH.

Until now, foreign students have been taking only passive measures on the matter and so has the welfare division. Currently there are over 200 foreign students currently staying in POSTECH. Chinese and Indians, who form the majority of these students, tend to make their own food instead of going to student restaurant or the cafeteria. The



▲ Nutritionist Her Iel Sim (left) and Lee Jae Chel the Head of Welfare division (right)

westerners who eat bread as their staple food were unable to obtain regular bread in the school, the Crown Bakery's bread being only suitable as snacks since it is too sweet. Also since most of the foreign students are graduate students belonging to laboratories, some of them have to go along with what the professor and their fellow Korean students eat.

The POSTECH welfare division admits that there are some inconveniences concerning food and is open to the advice and complaints that foreign students may have. "POSTECH

is currently in the steps of globalization and as time passes there will be more foreigners coming to POSTECH and it would be our duty to make sure that they can have three suitable meals every day," explains Lee Jae Chel, the Director of the Welfare Division at POSTECH.

Mr. Lee and nutritionist Her Iel Sim proposed several solutions the problem. "The Wisdom Cafeteria which can serve a variety of dishes can be modified so that it can serve food that would meet foreigners' tastes. It would be possible for us to develop certain menus that would fit the foreigners' tastes."

There were also some problems concerning convenience in using the Snack Bar. Some of the menus had unclear English names that made it hard for foreigners to understand what the food was really like, which resulted in the low rate of usage.

"We understand that it is difficult for them to order something without knowing what it is," explains Ms. Her. "Since the menus of the Snack Bar does not change, it would be possible to add a photograph or a plastic sample of each food which would give the foreigners some idea on what the food would be like."

Asked what foreign students should expect from their part, Mr. Lee made a request for some help. "Foreign students are also members of POSTECH and therefore have the right to make their voices be heard. We are doing what we can to take control of the situation. We are willing to make whatever changes to their menus to fit the foreign students' taste. We hope that the foreigners would come forth actively so that it would be possible for us to make changes that would serve the foreign students' needs instead of passively regarding the food situation and criticizing the school's food."

Reporter Shin Jae-kwang

BEEN THERE DONE THAT - Dokdo

For Protection of Sovereignty

Exploration Training of the Dokdo Academy Attendees

A dark and cold midnight of Feb. 28, it was in downtown Seoul where the Dokdo Academy expedition met. The 117 students who applied to be Dokdo Academy attendees were preparing itinerary for visiting Dokdo. Riding on our buses, we headed toward the East Sea. There is no nonstop ship to Dokdo, so we first approached Ulleungdo. At 3:30 pm, 15 hours having passed from the beginning, there appeared two tiny islets.

Dokdo, the easternmost islet of Korea, has been a part of Korean territory from more than 1000 years ago. It had several ancient names like Usando and Songdo. Researchers predict that an amount of methane hydrate, expected to be a future energy resource is buried around Dokdo. In addition, by occupying Dokdo, a border line of the sea can be expanded for hundreds of nautical miles. Furthermore, the basic surroundings of Dokdo are excellent fisheries. Conflicts between South Korea and Japan over the sovereignty of Dokdo have risen for these reasons. (See below for more information about the dispute.)

To deal with this, the Dokdo Academy was founded in 2007 to educate university students to be logically armed for the dispute and to learn the right facts about our meaningful territory. The president of the academy, Prof. Koh Chang Keun of Kyung Hee University said, "A nationwide education of what Dokdo is and why Dokdo is ours is important as well as foreign maneuvers along the dispute."

Prof. Koh continued, "Japan has taught its students



▲ (Left) Dokdo Academy attendees, and (Right) Korean B-boying performance in Dokdo.

incorrect sovereignty and reasons for that. Japanese students will oppose against us when they become adults. We need to execute measures; academy attendees with certificates can be available to teach young students about Dokdo. There are sufficient scholars in the academy."

He concluded, "Attendees will become the spearheads of theoretical education about Dokdo sovereignty." Dokdo Academy has produced 11 classes, and more than a thousand alumni.

The Dokdo Academy attendees had their matriculation ceremony on Nov. 14, 2009 and started to take lectures and plan activities in 20 groups composed of nearly 10 each. Each group conducted different activities, such as a guerilla campaign at libraries, distribution of pamphlets in English, and declaration of statements in front of the Japanese embassy. Before they headed for Dokdo for the last exploration, a performance was prepared which will be

conducted in Dokdo that symbolizes our sovereignty.

It was a cold day; the temperature fell below the freezing point even if it was nearly March. Tiny islet Dokdo was in the middle of the East Sea; a strong wind prevented us to move freely. Because a round-trip ship stopped at Dokdo only for a moment, photographing, the declaration and performance were quickly finished. Violent weather bothered us all day. After all this, returning ship from Ulleungdo to land could not leave port; we spent one day more.

At night, in lodges, a small party was held with one of the groups. They were all university students, but the personal atmosphere was quite different. Being from many kinds of origins and majors, individual characteristics were remarkable. Now they will spread into all directions of society and pass on what they saw, and what they learned. The future of the sovereignty of Dokdo is bright.

Reporter Lee Sang-min

History of Dokdo

Ongoing Dispute for Hundreds of Years

On Mar.1 an advertisement concerning Dokdo was hung in Times Square in New York. The reason for such attraction-seeking publicity lies in the dispute over the ownership of the Island. The following article will explain the background of the dispute.

The overview of dispute

The main position of each side is following; the sovereignty of Dokdo (called 'Takeshima' in Japan) is claimed by both South Korea and Japan. Dokdo has been physically dominated by South Korea after the foundation of the Republic of Korea. The Japanese Empire occupied Dokdo before that, and Japan insists on submission of the dispute to the International Court of Justice. South Korea is pursuing enforcement of practical occupation with little noise in diplomacy.

Incorporation of Dokdo by Japan in

1905

Before 1905, Dokdo was included in the Chosun Dynasty and Dae-han Empire, which ruled the Korean peninsula. Many historical evidences from Korea, Japan, and western countries support Korea's claim. In 1905, the Japanese Empire decided to incorporate Dokdo for these reasons: precaution for conflicts against the Russian Empire, procurement of fishery rights, and groundwork to colonize Korea. On Feb. 22, 1905 Shimane Prefectural Notice No. 40, announced in a local newspaper, incorporated the islets as part of Shimane Prefecture by regarding Dokdo as a terra nullius under international law. Five years after that, the Dae-han Empire was annexed by Japan.

After the liberation of Korea in 1945

Along with the defeat of the Japanese Empire and retrocession of territories to

former colonies, many documents, treaties, and instructions were established. However, conflicts and uncertainties have risen on interpretations of Japan's renunciation of sovereignty over Dokdo. Supreme Commander of the Allied Powers Instruction #677 of 1946 referred administration of Dokdo by Japan as part of territories which should have been suspended from Japan. On the other hand, the Rusk Documents, sent to South Korea in 1951, presented the belief of the U.S of Japanese sovereignty over Dokdo. Moreover, the final version of the Treaty of San Francisco signed in 1951 regulated the sovereignty of Dokdo as undefined.

Recent conflicts

In the 21st Century, conflicts around Dokdo have risen once more. It has become a common issue in society. In 2005, the Shimane Prefectural Council established a 'Takeshima Day' and officially claimed sovereignty over Dokdo. To counter this, former president Roh Moo-hyun announced a special statement affirming Korean sovereignty over Dokdo. In addition, the Japanese

Ministry of Foreign Affairs distributed a pamphlet claiming sovereignty over Dokdo, and the Japanese government decided to mention the dispute in common curriculum guidelines for social-study classes in junior high schools. For this decision, the Korean government temporarily recalled its ambassador to Japan.

How to Reach Dokdo

Take a ferry to Ulleungdo from Pohang, and transfer to another one there.

From where? Pohang Port Passenger Terminal.

How to go? Take Bus 105 at the East Gate, and get off at the Pohang Customs (or Northern Beach). Walk five minutes.

When does it depart? Once a day at 9:30 AM; it takes 3 hours. The returning ship departs at 14:30, and the round-trip ship to Dokdo departs at 14:00 in Ulleungdo. It takes 1.5 hours. Caution: Service conditions vary largely upon weather condition.

How much is the fee? 161,100 KRW for a round-trip to Dokdo (adult).

Reporter Lee Sang-min