Put Together Regional Powers to Realize Disaster Mitigation! DISASTER MITIGATION RESEARCH CENTER

Creating models to realize disaster mitigation by deepening many types of cooperation in the whole region based on advanced disaster mitigation research





Disaster Mitigation Research Center, Nagoya University



Disaster Mitigation Research Center, Nagoya University

ES Building 4F (431) Nagoya University Furo-cho, Chikusa-ku, Nagoya 464-8601

Tel: 052-789-3468 Fax: 052-789-5023 E-mail: dmrc-office@gensai.nagoya-u.ac.jp HP: http://www.gensai.nagoya-u.ac.jp/ (Prepared on February 28, 2013)

Message for the Foundation of Disaster Mitigation Research Center

Disaster Mitigation Research Center was founded in December 2010 to drastically mitigate damage caused by great earthquakes along the Nankai Trough and wind & flood that may accompany possible climate warming. As well as promoting the advanced research on disaster mitigation for more than a year, concurrent professors, who belong to four graduate schools of environmentology, engineering, medical fields and education and human development, have been dedicated to the creation of disaster mitigation models by deepening cooperation between different research fields, between universities in different regions, and with various disaster prevention providers such as industrial circles, governments, and citizen groups. The Great East Japan Earthquake occurred on March 11, 2011, just after the Center started its activities in preparation for similar disasters. The Center Foundation Memory Symposium, originally scheduled for March 26, 2011 was restructured as a disaster memorial symposium, where everyone tried to share the extent of the damage known at that point. At the same time, the Center opened a clearinghouse called Mega-Disaster Information Center "MeDIC" for information sharing purpose. After the Earthquake, the "Urgent Proposal Council concerning the Enhanced Promotion of Measures against Earthquake Disasters in Nagoya," which is represented mainly by professors at the Center, put together its proposals in a report entitled "Urgent Proposal - Protect People and Towns in Nagoya from Looming Earthquakes along the Nankai Trough." At a disaster prevention conference in Nagoya on June 14, 2011, (then) previous Director of the Center Ryoichi Fujii handed the report to Nagoya Mayor Takashi Kawamura. The Center since then has involved in the preparation of disaster prevention strategies and the survey on damage prediction in cooperation with Aichi Prefecture and Nagoya City. In June 2011 or later, the Center held symposiums in a row on the campus of Nagova University, such as "Thinking of the Great East Japan Earthquake" in June, "Disaster Medical Care and Regional Cooperation Learned from the Great East Japan Earthquake" in September, "120 Years since the Great Nobi Earthquake - Looking Back the Lessons Learned" and "How Local Media Reported the Great East Japan Earthquake" - In Preparation for Looming Great Earthquakes along the Nankai Trough" in October, and then symposiums such as a disaster prevention expert networking seminar in December. The Center has spent a lot of time sharing the lessons learned from the stricken areas and discussing what future

Director of the Center Nobuo Fukuwa

measures against earthquakes should be like. Furthermore, the Center held Disaster Prevention Academies and Disaster Mitigation Café at regular intervals as learning forums for disaster mitigation. To develop diverse disaster prevention experts in cooperation with the Aichi Prefectural Board of Education, the Center has also been involved in planning of joint high-school/university disaster prevention seminars for high-school students. This effort included developing disaster prevention experts across industry-government-academic-private sectors. These activities in the past year or so have made us more convinced of the need of further promotion of disaster mitigation research, in order to mitigate possible damage by great earthquakes along the Nankai Trough, a potential national crisis we face. Given such background, the Center reorganized itself in January 2012 to be able to work on full-scale cooperative research by allocating six full-time professors at the Center. The Center set up two divisions: Social Cooperation Division and Research Cooperation Division. Social Cooperation Division set up Social Cooperation Promotion Council, invites outside professionals who are playing active roles in industry-government-academic-private sectors, discussing what future disaster mitigation cooperation should be like. This division will also serve as a promotion organization for regional collaboration. In April 2012, three endowed research divisions were set up within Social Cooperation Division, starting their activities as headquarters of full-scale cooperative research with the industry sector. On the other hand, Research Cooperation Division allocates professors to four research fields that constitute basics of disaster mitigation research, moving forward with advanced research jointly with 32 concurrent professors belonging to graduate schools of enviromentology, engineering, medical, and educational and human development, and in cooperation with related parties in the University. In addition, this Division will promote disaster mitigation research with seven visiting professors invited from leading disaster research institutions. Disaster Mitigation Research Center will strengthen cooperation with Disaster Management Office to help make our research results conducive to the improved disaster prevention capability of Nagoya University. Your cooperation will be appreciated in our efforts to realize disaster mitigation society.

April 2012

Mission of Disaster Mitigation Research Center

Build disaster mitigation models through interdisciplinary cooperation. Realize a safe and secure society through regional collaboration.

Creation of "Intelligence" for Disaster Mitigation

Realize interdisciplinary cooperative research and regionally integrated disaster itigation research capitalizing on collective regional powers. Take on roles of strengthened cooperation between researchers inside/outside the University, liaisons between local communities, information transmission, and the planning, coordination and promotion of disaster mitigation research projects and regionally cooperative activities

Regional Cooperation

Promote framework building that helps implement regional cooperation. Interface research results through "visible" regional networks.



International Cooperation

Transfer the best practice of regional disaster mitigation strategy models to overseas countries, so that such disaster mitigation strategies will develop in Asia.



Disaster Management Office, Nagoya University

Disaster Management Office was established in October 2002 with the aim of developing a disaster prevention system inside the University and improving the regional disaster prevention capability. While driving disaster prevention efforts in the University such as earthquake disaster drills or disaster information system development, the Office has been developing practical research and social activities in the areas of expertise across academics, sociology and natural science, in collaboration with on-campus and outside researchers including those in Graduate School of Environmental Studies and citizens in the region. In particular, the Office set up and operates a regional disaster prevention networking hall and a disaster archive as its headquarters for those individuals conscious of getting involved in disaster prevention. Knowing about them through Disaster Prevention Academy and Nagoya Area Earthquake Disaster Prevention Study Group, a number of ordinary users and experts are visiting the facilities. In addition, the Office has been focusing on the development and expansion of on-campus disaster-related information, such as earthquake early warnings, safety confirmation systems, and weather information, and preparation of educational materials for enhanced awareness of disaster prevention. With the start-up of Disaster Mitigation Research Center, Disaster Management Office decided to put more emphasis in and after FY2011 on the construction of on-campus disaster prevention systems than it had done before. The Great East Japan Earthquake occurred at the very same time, pressing for the review and improvement of the University's existing disaster prevention capability. Disaster Management Office is committed to continue on-campus disaster prevention efforts in close cooperation with Disaster Mitigation Research Center.

Members of Disaster Management Office: Jun Tobita; Hirofumi Kawabata; Naoko Inayoshi



Organization Chart of Disaster Mitigation Research Center



Regional Disaster Prevention Networking Hall



Disaster Archive

Earthquake Disaster Drill at Nagoya University

Research Projects to Realize Disaster Mitigation

To build disaster mitigation strategies for region-specific, large-scale disasters, Disaster Mitigation Research Center will pursue academic projects aiming at "Prediction of Great Natural Disasters to Hit the Tokai Area and Realization of Safe and Secure Communities by Comprehensive Disaster Mitigation Measures." This initiative will allow Disaster Mitigation Research Center to achieve the following goals through cooperation between different fields, industry-academic-government sectors, regions, and universities: (1) Preparation of disaster mitigation scenarios for great earthquakes along the Nankai Trough; (2) High-accuracy hazard and damage predictions of great earthquakes along the Nankai Trough; (3) High-accuracy hazard and damage predictions of Super Isewan Typhoon; (4) Development/sophistication of next-generation monitoring methodologies; (5) Social consensus on optimum disaster prevention standards.



for Disaster Prevention Experts

Training programs to cultivate disaster prevention experts (tentatively named):

In December 2010, "Committee on What Should Be Done to Cultivate Disaster Prevention Experts" was set up by volunteers representing group members of "Aichi Disaster Prevention Cooperation Society Promotion Council*," reviewing education programs for disaster prevention experts. In December 2011, the Committee worked out a new draft plan for (tentatively named) "Education Training for Disaster Prevention Experts," which is scheduled to start in FY2012 as a model project. Disaster Mitigation Research Center has proactively participated in this project, and will continue to do so in the future.

* "Aichi Disaster Prevention Cooperation Society Promotion Council," which was established in July 2007, is a meeting structure in which administrative agencies,

a emergency rescu andy eco-supplies - Life-saving and

Lectures for students:

trade associations, regional organization

volunteers and other groups in Aichi Prefecture participate.

Teachers involved in Disaster Mitigation Research Center offer classes of "Be Ready for Imminent Earthquake Disasters" for liberal arts students, and "Comprehensive Disaster Prevention Theory I-IV" for postgraduates. In cooperation with Japan Bousaisi Organization, Disaster Mitigation Research Center provides a framework in which students who took classes of "Comprehensive Disaster Prevention Theory I-II" are granted qualifications of candidacy for disaster prevention experts.

Mass Media Course

Workshops for mass media:

In the Tokai area, in preparation for large-scale disasters caused by large earthquakes and other natural hazards, members from mass media, researchers, administrative agencies, NPOs, and infrastructure companies (operating mainly in the area) started NSL (Network for Saving Lives) in 2001 for the purpose of exchanging their opinions and information. Teachers involved in Disaster Mitigation Research Center proactively participate in the NSL workshops.

Holding Disaster Prevention Academies

Disaster Mitigation Research Center holds a lecture related to disaster prevention every month for citizen groups and ordinary citizens who support disaster prevention activities. These lectures had been held 67 times before FY2010. Lately, as many as 100 participants come to receive a lecture each time. In FY2011, there was a lecture that featured the Great East Japan Earthquake.



Mega-Disaster Information Center (MeDIC)



Holding Gen Science Cafés

Gen Science Café is an event where teachers in their respective areas of expertise respond, through talks with an MC, to questions from ordinary citizens about a number of phenomena relating to natural disasters in a comprehensive way. With teachers involved in the Center serving as lecturers (guests) and MCs, Cafés are held at a pace of once a month mainly on the theme of the Great East Japan Earthquake. The total number of Cafés that had been held before March 2012 was 10. The short distance between the MC (guests) and audience, and the horizontal line of sight, encourage participants to make more comments and ask more questions than they would in typical meetings of this kind. The Center will continue to hold Gen Science Cafés on new themes.



Holding Symposiums and Other Events

In and after December 2010, Disaster Mitigation Research Center has organized, held, and participated in many symposiums as listed below: March 26, 2011: Great Earthquake Memorial Symposium by Disaster Mitigation Research Center, "How Should We Do with Looming Great Earthquakes?"

June 11, 2011: Symposium on the Earthquake Disasters, Nagoya University, "Lessons Learned from the Great East Japan Earthquake" September 3, 2011: Symposium on Disaster Prevention and Mitigation, Nagoya University, Japanese Red Cross Society and Asahi Shimbun, "Disaster Medical Care and Regional Cooperation Learned from the Great East Japan Earthquake" October 28, 2011: Symposium on Disaster Prevention and the Rebirth of Japan "120 Years since the Great Nobi Earthquake - Looking Back the Lessons Learned'

December 10, 2011: Networking Seminar for Disaster Prevention Experts January 6, 2012: Symposium by Disaster Mitigation Research Center, Nagoya University, "Thoughts about Disaster Mitigation in the Future -Striving for Cooperative Research that Protects People and Towns" and others

On March 14, 2011, the following week after the Great East Japan Earthquake occurred, an information center that would collect data about the mega earthquake was set up at Disaster Mitigation Research Center. MeDIC has collected and distributed information about the mega earthquake as much as possible, including newspapers, magazines, press releases from various organizations, videos, and photos. Various types of people, such as ordinary citizens, students (including foreign students), media, businesspersons, and researchers, have visited MeDIC, with the total number of visitors exceeding 1,000. MeDIC was temporarily closed at the end of March 2012. However, our plan is to reopen the center as a spot to share the information about possible great earthquakes along the Nankai Trough that may hit this region in the near future, and the update on other earthquake disaster prevention activities.

Introduction of Members (Endowed Research Divisions)

Introduction of Endowed Research Divisions

In April 2012, Disaster Mitigation Research Center set up three new endowed research divisions: Research Division on Disaster Precautions in the Energy Supply Area(Chubu Electric Power Company); Disaster Precautions in the Soil and Lifelines Area(Toho Gas); Research Division on Disaster Mitigation Planning for Regional Communities(OYO Corporation) Endowed Research Division. This section provides a summary of the work being pursued by these research divisions.

Research Division on Disaster Precautions in the Energy Supply Area (Chubu Electric Power Company)

This research division is working on the following research themes to contribute improving regional disaster prevention capabilities through stable and safe energy supply:

(1) More accurate estimates of the magnitude of seismic ground motions and tsunamis caused by great earthquakes along the Nankai Trough

(2) More accurate estimates of damage at energy supply facilities in the event of great earthquakes along the Nankai Trough (3) Study on preventive and early recovery measures that keep energy supply facilities functional in the wake of disasters Great earthquakes along the Nankai Trough have occurred repeatedly at intervals of 100-150 years. Therefore more accurate estimates of damage caused by seismic ground motions and tsunamis would require estimation of the extent of damage in past earthquakes based on the investigation of the historical documents. To avoid unexpected circumstances as seen in the Great East Japan Earthquake, it is necessary to estimate accurate damage and measures for every possible contingency. Taking fully into account the practical capability of energy supply, and the viewpoint of users and regional communities as well, this research division will study measures to improve disaster prevention capabilities in the energy supply. In parallel with research efforts, this research division will develop experts, who will lead future disaster mitigation research and education, through day-to-day research activities, and pursue cooperative activities in industry-academic-government-private sectors and information distribution for regional communities.

Disaster Precautions in the Soil and Lifelines Area(Toho Gas)

This endowed research division will conduct adequate verification of ground-failure disasters and other earthquake-induced disasters in the wake of the Great East Japan Earthquake, with particular emphasis on gas supply networks. At the same time, the research division will pursue the following research themes to help mitigate future seismic damage by making the most of the latest knowledge, such as seismology, civil engineering, geotechnical engineering, and architectonics:

(1) Assessment of earthquake resistance of underground utilities, such as pipelines, and aboveground structures, based on the latest assumption about great earthquakes and tsunamis along the Nankai Trough.

(2) Assessment of the impact of long-lived seismic ground motions on ground liquefaction and lifeline damage

(3) More sophisticated prediction methodologies for underground pipeline damage caused by great earthquakes

Through day-to-day education for researchers, such endowed research activities will help contribute to the education and development of leading experts in the disaster prevention and mitigation fields. Furthermore, through cooperative activities between industry-government-academic-private sectors and between different universities, this research division will pursue cooperative activities and information distribution truly viable to the society.

Research Division on Disaster Mitigation Planning for Regional Communities(OYO Corporation) Endowed Research Division

Based on the ongoing scientific approach focused on geophysics and engineering, such as civil engineering and geotechnology, this endowed research division will pursue the following research themes, with the aim of creating disaster mitigation plans for regional communities that will help prevent and mitigate earthquakes and complex disasters particularly in the Tokai area: (1) More sophisticated ground models based on the analysis of ground and geographical information in the Tokai area

(2) More sophisticated predictive assessment methodologies for earthquake and tsunami damage

(3) Development and application of predictive assessment methodologies for economic damages

(4) Building effective and efficient disaster mitigation measures, applying them to city planning, and assessing their effectiveness and appropriateness

Through a series of research to promote disaster mitigation activities in regional communities, this research division will contribute to the education and development of experts who will lead future disaster mitigation research and education efforts. At the same time, through cooperative activities between industry-government-academic-private sectors, this research division will pursue cooperative activities and information distribution truly viable to the society.

Masayuki Takemura	research institute, after finishing his doctor's course at Graduate School of Science, Tohoku University in 1981. After working at the company's Kobori Laboratory, he took the position of Deputy Director of Takuji Kobori Research Institute in 2010. He took the current position in April 2012. He has served Director of The Seismological Society of Japan, Deputy Chairman of Japan Association for Earthquake Engineering and others. Present Chairman of The Society of Historical Earthquake Studies. His specialty is seismology. Doctor of Science.	ha in ea w re nc th co
Mitsuo Tsuzuki	Associate Professor Tsuzuki finibad Graduate School of Science and Engineering, Waseda University in 1966. He took the current position after working for an electric power company. His specially is earthquake-resistant engineering. Master of Engineering, First-class registered architect I worked at an electric power company for 26 years, and I have been engaged mainly in the areas of thermal power plant development and seismic evaluation and reinforcement of buildings for electric power publy. The Great East Japan Earthquake in March 2011 proved the weakness to natural disasters of the recent Japaness ocidently supported by technically developed Heilnes. Damage of the earthquake makes It clear that disaster prevention for energy supply liellenes, such as that for electric power, has very important miglications for the construction of disaster-resistant communities. Making use of my career experiences, I am committed to contribute to improve the regional disaster prevention capabilities of Chubu District, where great earthquakes are likely to occur, through stable and safe energy supply.	I I se ye na m ve Le ca I a oc en
Kenji Toratani	Assistant Professor Toratani finished Graduate School of Engineering, Kyushu University in 1997. He took the current position after working for an electric power company. His specialty is urban environmental systems engineering. Doctor of Engineering.	In su su ex ot an co th
Tetsuji Kitano	Professor Professor Tesuji Kitano graduated from Graduate School of Engineering at Kobe University in 1992, and then he joined a gas company where he pursued research and development on the earthquake disaster prevention, construction of high-pressure gas transmission pipelines. From 2004 to 2007, he got a temporary assignment at The Japan Gas Association. After serving the construction project of Undersea Natural Gas Transmission Pipelines across Ise-Bay as a general manager, he took the current position in 2010. He is interested in lifelines earthquake engineering and disaster mitigation. He has a Doctor of Engineering and also a Professional Engineer (construction).	Th di di Su th siz w co w co
Junichi Miyakoshi	Associate Professor After finishing Graduate School of Engineering, Tohoku University in March 1992, Miyakoshi joined a construction company. In April 1999, he got enrolled in a professional doctoral course at Graduate School of Engineering, Nagoya University, receiving a doctor's degree (engineering) in March 2002. His specialty includes earthquake resistant engineering and earthquake disaster prevention. Doctor of Engineering.	I t w yc pr ha in ea In di
Toshihiro Nonaka	Assistant professor After finishing his master course at Civil Engineering, Graduate School of Engineering, Nagoya University in 2009, and then working for supply & disaster prevention department of a gas company, Nonaka took the current position. His specialty includes geotechnique and earthquake disaster prevention for lifelines. Master of Engineering	W fo es in Se di pr ef re lif
Yoshinori Sone	Professor Sone finished his later period of doctor's course at Resource Engineering Department, Graduate School of Engineering, Tohoku University in 1983. He joined a geological survey company in 1983, where he took positions of deputy branch manager at Chubu office in 1999, Sapporo branch manager in 2003, Tohoku branch manager in 2007, vice director general at engineering headquarters in 2010, and then transferred to the Center. His specialty is rock engineering. Doctor of Engineering. Professional Engineer (applied science)	The weath acc To di di be
Kazumi Kurata	Assistant Professor Kurata finished his master course at Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies, Nagoya University in 2004. He developed WebGIS (geographical Information system) at a software development company, and was involved in the development of disaster prevention education/awareness systems as a member of collaborative research with Nagoya University. He took the current position in April 2012. His specialty is earthquake disaster prevention. Master of Engineering.	W prin sy of al do m ea
	Assistant Professor Yamazaki finished his later period of doctor's course at Department of Global Environmental Studies, Graduate School of Global Environmental Studies, Sophia University in 2010. He took the present position after having served as fellow at Safety Science Research Division, National Institute of Advanced Industrial Science and Technology, and postdoctoral fellow, Ritsumeikan Global Innovation Research Organization, Ritsumeikan University. His specialty is simulation	TI pr ac st th ec pr

Research

Division on Disaster Precautions in the Energy Supply Area (Chubu Electric Power Company)

Disaster Precautions

in the Soil

and Lifelines

Area

Research Division on Disaster Mitigation Planning (OYO Corporation)

for Regional Com

Masato Yamazaki Doctor of Environmentology

(Toho Gas)

The Great East Japan Earthquake not only deprived people of lives and property but also extensively disrupted economic activities there. Economic ctivities are the base of our daily life through consumption and work. Many tricken areas still have not been able to restart their local industries, making he region's restoration more difficult. Our research predicts the vulnerability of conomic activities to mega earthquakes using simulation models, and then an University. His specialty is simulation presenting effective disaster mitigation measures.

Professor Takemura joined a construction company's technical have been single-mindedly studying earthquakes and earthquake disasters, thore have been single-mindedly studying earthquakes and earthquake disasters. For 31 years at a private company where earthquake-resistant structures were designed, I vestigating the Great Kanto Earthquake, in particular, which brought the largest dama the history of our country. After the investigation. I keenly realized that though an arthouake triggers earthouake disasters, the size of disasters depends on how people cope ith them. What it takes to mitigate disasters, therefore, is cooperation across many search fields, ranging from earthquake sources to human communities. Furthermore othing is more important than cooperation between citizens and experts, who should take e leading role in disaster mitigation activities. Taking a larger view of our mission, I am mmitted to live up to the name of Disaster Mitigation Research Center.

I have been involved mainly in the areas of thermal power source development and seismic reinforcement of power supply buildings at an electric power company for 26 years. The Great East Japan Earthquake in March 2011 exposed the vulnerability to natural disasters of the modern Japanese society supported by sophisticated lifelines, making it clear that energy-related disaster prevention, such as that for electric power, has very important implications for the construction of disaster-resistant communities. everaging my past experience, taking fully into account the existing disaster-resistant apability of energy-related companies, and digesting demand from regional communities, am committed to contribute to the Chubu District, where great earthquakes are likely to occur, for improved regional disaster prevention capabilities through stable and safe nergy supply

n the wake of an earthquake or other disasters, if it takes time to restore energy upply vital to everyday life, such as electricity, living in shelters and the ubsequent reconstruction might be hampered. Leveraging my hands-on xperience at an energy company, I am going to fulfill my roles together with ther members of this research center so that we can deliver energy in a safe nd stable manner even during disasters. Through these efforts, I am ommitted to contribute to mitigation of and early restoration from disasters in he region. I will appreciate your support.

he Great East Japan Earthquake on March 11, 2011, gave a historic great earthquake lisaster. That devastated regional communities, had deprived people mostly in the Tohoku listrict of daily lives, families, and workplaces in a moment. The Typhoons No.12 and Io.15 gave the enormous damage in Chubu region as well on September 2011. To achieve ustainable growth of the Japanese economy, strengthening the response capability to and he resilience from natural and complex disasters are an urgent challenge considering the ize of industry accumulation in Chubu region. To protect "lives" and "towns" from the operation in Government-Industry-Society-Academia is very important and effective. I vill contribute to the realization of disaster prevention and mitigation in regional ommunities, our livelihoods, to the best of my ability.

took the current position after finishing my graduate school program and then vorking at a construction company's technical research institute for some 20 rears. I have been engaging myself in research relating to building damage rediction in the event of an earthquake, ground motion prediction, and seismic azard assessment. With respect to ground motion prediction, I have been nvolved with the preparation of input earthquake motions needed for the arthquake-resistant study of buildings by the Research Council on Design nput Motions in Aichi Prefecture. I will do my best to help contribute to isaster mitigation from both research and business standpoints

When working at a section of a gas company responsible for disaster prevention measures or gas supply networks, I had been involved in the replacement of seismic damage stimation systems for gas facilities and the study on the installation of seismic gas supply nterruption systems. In the wake of the Great East Japan Earthquake, I had stayed in endai for about two weeks to support gas restoration operations. In the endowed research livision of Disaster Mitigation Research Center, leveraging my past disaster revention-related knowledge and experience, I want to contribute to disaster mitigation fforts in the Chubu District and enhanced cooperation for disaster prevention in the whole egion, focusing on technical development that helps improve the earthquake resistance of

The Great East Japan Earthquake was really a supernatural, mega earthquake. By earning thoroughly from the frustrating experience of the great earthquake disaster, e should make sure that we are fully prepared for looming mega earthquakes along he Nankai Trough. Leveraging my experience cultivated on the front line of field ctivities, such as inspections for road disaster prevention in three prefectures in okai area and road disaster prevention doctor in Takayama district, I will pursue isaster mitigation in the Tokai area. I think it very important to get involved in isaster mitigation activities from the viewpoint of people in the region. I will do my est to maximize disaster mitigation in the region in collaboration with the residents.

With my social and professional involvement in earthquake disaster prevention, which started after entering my graduate school, I have pursued the mprovement of disaster prevention capabilities from the perspective of both ystem development and hands-on awareness activities. Though a large amount f diverse disaster prevention-related information is available in recent years. I lways wonder where I can get the information I really need, and how I want to o with it. It feels we are getting more and more confused. I am committed to nake preparations as much as possible within a time frame till a mega arthquake happens in this region.

Introduction of Members (Visiting Professors)



Yukinobu Okamura



School of Science, The University of Tokvo, After working for Technology Research Center of Japan National Oil Corporation and Technology Research Institute of Ohbayashi Corporation, he joined Japan Marine Science and Fechnology (now National Institute of Besearch Advancement) in 1997 Project Leader of the research on earthquake and tsunami disaster prevention since 2009.



After graduating from Sophia University in 1980 Kumamoto joined NHK as a reporter. As a reporter and desk of News Department responsible for news about special events. cities, and science & culture, he covered largely earthquake, disaster prevention, and medical care related stories. He belonged to News Department of NHK Nagoya from 2000 to 2005. After leaving NHK in 2005, Project Professor, Communicators in Science and Technology Education Unit, Hokkaido University. Professor, Media Communication Department, Edogawa University since 2008.

Saito finished his doctor's course at Graduate Saito finished his doctor's course at Graduate School of Engineering, Tohoku University in 1990. Doctor of Engineering. After serving as an assistant at Department of Construction, School of Engineering, Tohoku University, he joined Building Research Institute, Ministry of Construction in 1996. Since April 2004, Senior Scientist, International Institute of Seismology and Earthquake Engineering, Building Research Institute. Concurrently part-time lecturer, Graduate School of Engineering, Chiba University, and Coordination Professor, National Graduate Institute for Policy Studies. His specialty is earthquake resistant

Taiki Saito





In March 1992, Tomita tinished his doctor's course at Department of Civil Engineering, Graduate School of Engineering, Nagoya University. After serving as an assistant professor and lecturer of Nagoya University, he transferred to the Port and Harbour Research Institute (PHRI), Ministry of Transport in April 1997. After organization change from PHRI to the Port and Airport Research Institute in 2001, he held positions such as Head of Storm Surge and Tsunami Laboratory, and Research Director of Tsunami Research Center, and has served Deputy Director-General of Asia and Pacific Center for Coastal Disaster Research since May 2012.

Engineering, Tottori University in 1981. After working for Ministry of Construction,

Ministry of Land, Infrastructure, and Transport, Japan Institute of Construction

Director, International Center for Water

Works Research Institute. He has been involved mainly in coastal disaster



Hiroyuki Fujiwara

After finishing Graduate School of Science, I have been studying geology, a natural phenomenon that is occurring in an Nagoya University in 1980, Okamura joined Geological Survey of Japan, Agency of Industrial Science and Technology, Ministry of International Trade and Industry, where he engaged himself in marine geological survey in the surrounding sea areas of Japan for about 24 years. Then he participated in the research of tsunami deposits in 2004, and came Director of Active Fault Research Center at Geological Survey of Japan, National Institute of Advanced Industria Science and Technology in 2009.

extremely long period of time, and long believed that seismic activities and the subsequent crustal movements are integral part of geology as well. The research of tsunami deposits, which I had started based on my belief, drew attention in the wake of the Great East Japan Earthquake. I regretted so much, however, that my research results had not been applied to prevent that particular disaster. Such a bad memory in mind encourages me to contribute to future disaster mitigation efforts through more accurate, geology-based analyses of past earthquakes and tsunamis.

In 1979 Kaneta finished his master course Though a year has passed since the Great East Japan Earthquake, there is a long way to go at Department of Geophysics, Graduate before we see the victims supported fully and the stricken areas restored. Furthermore, many people are talking about how imminent earthquakes occurring directly beneath the Tokyo Metropolitan Area are, and even conceivable seismic intensities. For Disaster Mitigation Research Center, Nagoya University, nothing is more important than promoting the disaster mitigation research that would be able to minimize damage from mega earthquakes and tsunamis, which may occur again along the Nankai Trough. I will contribute to disaster mitigation research, to the best of my ability, from the standpoint of surveys and observational studies, real-time monitoring, and simulation studies. I will continue to work hard in line with the following keywords: "learning from the lessons of the Great East Japan Earthquake," "driving seismological research activities," "spreading the awareness of disaster mitigation," and "improving the readiness among individuals, regions, and public sectors." Your support will be appreciated.

> I joined Disaster Mitigation Research Center in February 2011, presiding "Gen Science Café" once every month. I am doing my best to try to play the role of a bridge between citizens, communities, and universities. Unless they make for the region's disaster prevention and mitigation, the world's most advanced research programs on which Nagoya University is working will end up, so-called, "Better spent than spared." Let's get together and stand up against a mega earthquake coming next.

> Amid earthquakes frequently happening, it is natural that everyone feels uneasy about whether towns and buildings where he/she lives are protected from earthquakes and tsunamis. To get rid of the concern and to mitigate disasters, I think it necessary for experts like us to have the right information distributed to the society. With researchers cooperating over different fields for this intended purpose, I expect Disaster Mitigation Research Center to become the place to distribute the most updated research results in response to social needs. In addition, I, who have involved in collaborative earthquake disaster prevention programs for developing countries in many years, hope that the Center's activities will help promote disaster mitigation not only in Japan but also all over the world. I will do my best to be part of the effort, and will appreciate your support.

Tanaka finished Graduate School of I was engaged in coastal disaster prevention and river improvement-related research and tasks in Ministry of Construction and Ministry of Land, Infrastructure and Transport. During my temporary assignment at Japan Institute of Construction Engineering, I engaged in the basic policy for river improvement and research tasks for associated river development projects in accordance with the Amendment to the River Law in 1997. Then I got involved in planning the Engineering, he is currently Deputy river development plan for Toyogawa as Director of Toyohashi River Office. In the wake of the Hazard and Risk Management (ICHARM) under the auspices of UNESCO, Public Tokai Rainstorm (Keinan Rainstorm) in 2000, I organized "Round-Table Conference on the Environment of Yahagi River." inviting Prof. Tetsuro Tsujimoto as chairman. At ICHARM, I investigated Hurricane Katrina disaster in 2005, Cyclone Sidr disaster in 2007, and the flood prevention and river improvement related tasks. Doctor of Engineering. inundation of Chao Phraya River in 2011. I will contribute to disaster mitigation from a risk management perspective, including that for the Asian region where flood disasters abound.

In March 1992, Tomita finished his doctor's I was terribly shocked at the news of the Tohoku area being devastated by the Great East Japan Earthquake and Tsunami. The tsunami disaster claimed the life of many people, but at the same time, many people evacuated to save their lives. We learned lessons from the disasters: for example, there were many issues such as how to distribute necessary information and the way disaster prevention system should be managed in emergencies. In addition, the disaster revealed the effect and limit of protective structures. There are a number of locations around Japan where large earthquakes and massive tsunamis may hit. Isewan is additionally prone to storm surge. To avoid repeating damage similar to that seen in Tohoku, the cooperation among experts in both science and culture fields will become necessary more than ever in preparation for tsunamis and storm surge in the future. I have high expectations for Disaster Mitigation Research Center, Nagoya University, where such collaboration can be put in place. I will contribute to the Center's success.

Fujiwara dropped out of Graduate School of Ever since joining NIED, I have been consistently involved in a series of research Science, Kyoto University in 1989. He joined National Center for Earth Science and conducive to earthquake disaster prevention. Particularly since the Great Hanshin-Awaji Earthquake, I have been given the leading role of national research Disaster Prevention, Science and Technology Agency (now National Research Institute for projects, such as the development of nationwide strong-motion seismographs Earth Science and Disaster Prevention), He (K-NET), the preparation of maps for ground motion prediction, and the was involved in the development of construction of integrated subsurface structure database. Together with researchers strong-motion seismographs, the preparation of maps for ground motion prediction, and the in a wide range of fields, I have participated lately in disaster prevention and mitigation oriented activities, such as efforts to share, utilize, and apply disaster risk construction of integrated subsurface structure database. His specialty is applied information. Based on the lessons learned from the Great East Japan Earthquake, I seismology. Research Area Director, Social Disaster Prevention System since April 2011. will be tackling with new challenges to strengthen our nation's disaster prevention and mitigation capabilities. and mitigation capabilities.

Introduction of Members (Professors)



Division Fukuwa finished Graduate School of Engineering, Nagoya University in 1981. After working for a construction company, he came back to Nagoya University to take the posts of Associate Professor, School of Engineering in 1991, Professor, Cooperative Research Center for Advanced Science & Technology in 1997, and Professor, Graduate School of Environmental Studies in 2001. Then he took the current responsibility. His specialty is earthquake engineering for soil and structures. Doctor of Engineering. Structural design first-class registered architect.

Deputy Director of the Center / Professor, Research Cooperation Division Noda finished his later period of doctor's course at Graduate School of Engineering, Nagoya University in 1994. Before taking the current post, he was a research associate at School of Engineering, Nagoya University in 1994, and Associate Professor and Professor, Graduate Associate Professor and Professor, Graduate School of Engineering at the University in 1996 and 2008, respectively, and then the current position. His specialty is civil engineering, particularly geomechanics, geotechnical engineering, and anti-seismic geotechnical engineering. Doctor of Engineering. Toshihiro Noda

> Professor, Research Cooperation Division Sagiya dropped out of his doctoral course at Department of Geophysics, Graduate School of Science, The University of Tokyo School of Science, The University of Tokyo in 1990. After serving Geographical Information Authority of Japan, he took the post of Associate Professor, Graduate School of Environmental Studies, Nagoya University in April 2003. Professor of the same in January 2008, and then the current position. His specialty is crustal movement study. Doctor of Science.



Takeshi Sagiya

rofessor, Research Cooperation Division, Suzuki finished his doctor's course at Department of Geography, Graduate School of Science, The University of Tokyo. Research associate at Nagoya University in 1991. Associate professor at Aichi Prefectural University in 1993. Professor, Graduate School of Environmental Studies, and General Manager of Disaster Management Office, Nagoya University in 2004, and then the current position. His specialty includes geography, tectonic geomorphology and active fault studies. Doctor of Science, University President Adviser,

Yasuhiro Suzuki



Division Mori finished his doctor's course at Department of Mori finished his doctor's course at Department of Architecture, Graduate School of Engineering, Nagoya University in 1991. After working for a construction company for 15 years, he took the post of Associate Professor, Graduate School of Environmental Studies, Nagoya University in October 2006, and then the current position. His specialty includes seismic engineering, building foundation, and earthquake disaster prevention. Doctor of Engineering. Structural design first-class registered architect.

Associate Professor, Research Cooperation

Associate Professor, Research Cooperation



Hiroi dropped out of his doctor's course at Hiroi dropped out of his doctor's course at Department of Urban Engineering, Graduate School of Engineering, The University of Tokyo in March 2007. In April 2007, Project Assistant Professor at this department, and then the current position. His specialty includes urban disaster prevention (disaster prevention measures for big cities, and risk & human behavior), and urban analysis. Professional social researcher, Doctor of Engineering.

Contract Researchers:

Hiroyuki Isawa (Genesis Research Institute), Yukihiro Kasugai (Kota-cho), Yoshimichi Senda (Nakanihon Air Service), Takehiro Takahashi (Ichijo Co., Ltd.), Kazuyasu Nomura (Mikuniya Corporation), Tomonori Hasegawa (Tamano Consultants), Shinichiro Yamamoto (Aichi Prefecture), Shinichiro Kuze (Nakasha Creative), Hitoshi Nakajo (KCS) Social Cooperation Promotion Council:

Aichi Prefecture: Masavuki Kobayashi, Chief of Disaster Prevention Bureau, Nagoya-shi: Hiromitsu Miwa, Secretary for Disaster Prevention & Crisis Management, Chubu Economic Federation: Akifumi Sugawara, Managing Director, Nagoya Chamber of Commerce: Toshiharu Furuhashi, Managing Director & Secretary General, The University of Tokyo: Takashi Komura, Professor, Kyoto University: Katsuya Yamori, Professor, Tohoku University: Fumihiko Imamura, Professor, Nagoya Institute of Technology: Hidetaka Umehara, Director & Vice President, Shizuoka University: Toshiaki Masuda, Professor, Mie University: Shigemitsu Hatanaka, Professor, Gifu University: Akiyoshi Takagi, Professor, Toyohashi University of Technology: Seishi Yamada, Professor, Jiji Press: Kazuyuki Nakagawa, Chief Correspondent, Ministry of Land, Infrastructure and Transport: Satoshi Nishikawa, Manager, Land Market, Itabashi-ku: Hajime Kagiya, Deputy Branch Manager & Director of Crisis Management, NPO Rescue Stock Yard: Nobuyuki Kurita Representative Director, Nagoya Broadcasting Network: Nobuhiro Igarashi, Director of Disaster Prevention (NSL representative)

Project Professor: Fumiaki Kimata (earthquake & volcanology) Project Researchers: Nobuhisa Matsuda

Technical Assistant (disaster prevention education): Hiroko Kondo (disaster prevention adviser) Administrative Assistants: Yumi Ito and Fumiko Kurata



After my involvement in theoretical studies on the behavior of soil and structures in the event of an earthquake and other studies such as base isolated structures, space structures, and computational engineering at a construction company, I returned to Nagoya University to engage myself in experiments and observational studies such as environmental and housing vibrations. Since the Great Hanshin-Awaji Earthquake, I have been working on strong ground motion and seismic damage predictions, which increases my engagement in disaster prevention related information, education/awareness, and policy planning, with the escalating threat of earthquakes along the Nankai Trough. To spread disaster mitigation activities, I will do my best in a lively, constructive manner.

I am involved in the development and application of analysis codes to better understand the static/dynamic behavior of grounds, and studies on the prediction of ground behavior, the reassessment of earthquake resistance, and the development of reinforcing technologies for mega earthquakes. Packed with a number of facilities for use in major industries, commerce, and residential guarters on soft grounds and man-made islands, seaside cities including the Tokai area abound with a welter of lifelines such as road and water & sewage systems. Those areas raise a concern about ground disasters such as ground liquefaction and embankment failure. Through collaborative studies with our counterpart of advanced research, I will contribute to disaster mitigation as much as possible particularly for this region.

A large earthquake is triggered by crustal strain that plate motions have accumulated during an extremely long period of time. I have been studying the long developing process of large earthquakes by means of geodetic surveys of crustal movements. From now on, based on my past studies, I will strive to link the findings to long- and short-term earthquake predictions.

Human society is built on the nature called the earth. Through extended knowledge of natural science, I will contribute to disaster mitigation by having human society and the nature bridged.

Brought up in the times of the theory of plate tectonics being at the height of its rise, and captivated by the dynamism of active fault movements shaping terrains. I have engaged myself in this subject of research. Shocked by the Great Hanshin-Awaji Earthquake, however, I came to realize that the study of active faults didn't make sense unless it was linked to disaster prevention. After the Great East Japan Earthquake. I came to think it important to foster disaster awareness based on a good understanding of Japanese environment, and to implement specific action. Challenged by this national crisis today, why don't we loosen up to "reset" our country to what it is supposed to be?

After finishing my graduate school and working at a construction company's technology research institute for 15 years, I had been studying seismic ground motion and the non-linear dynamic soil-structure interaction. I had two-year-long temporary assignment at the Headquarters for Earthquake Research Promotion, where I was involved in the preparation of the "National Seismic Hazard Maps for Japan." After arriving at a new post of the University, I continued the studies I had been doing in the past, and at the same time, focused on earthquake prevention and awareness activities. Making the most of the remaining time available, I will do my best so that we will be able to protect this region from forthcoming large disasters.

I am studying urban disaster prevention particularly on measures for metropolis. In the event of a disaster occurring in urban regions, the "risk of gathering," such as collapsed houses, Fire-spread, evacuation activities (including stranded commuters), and the capacity of insurance systems, could become a major problem. To solve this problem, I believe the following points are important: 1. Looking for hidden risks in cities (Mining), 2. Devising the ideal model of "excellent" cities (Vision), and 3. Jointly implementing mechanisms that put the vision in practice (Conversing & Implementing). As to the latter point, involving not only administration and researchers but also companies and citizens, and making full use of the characteristics of respective mechanisms, I want to derive the optimum strategy that will help build disaster mitigation society.

Introduction of Members (Concurrent Professors)



Hiroshi Omori

Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Mechanics of Building Structures

I am specialized in the development of the structural analysis and design of buildings, particularly those of big spatial structures such as indoor arenas, halls, theaters, and stadiums. The design of large telescopes and space structures is part of my professional territory. In particular, I think the succession of the principle of structural mechanics to the next generation is another important micron



Associate Professor Position: Department of Civil Engineering,

Graduate School of Engineering Specialty area: Coastal Engineering, Coastal Environment Engineering Even today coastal areas suffer enormous natural

disasters, such as tsunamis, storm surges, and high waves. Not only in my specialized field but also through cooperation with many other fields, I will push along disaster prevention and mitigation activities in coastal areas



Position: Department of Psychology and Human Development, Graduate School of Education and Human Development Specialty area: Clinical-community psychology

I have been involved with post-disaster/incident/accident psychological supports at schools and mental health education from a preventive perspective. I keenly realize the need of defining the capacity development of mental disaster mitigation for educational purposes, which helps school children deal with crises more flexibly.



Yuki Kubota

Associate Professor Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental

Studies Specialty area: Architectural planning, community development

I am studying the roles of public facilities/spaces and community development in local communities under the age of low birthrate, aging, decreasing population. My belief is that anything that can works at ordinary times also can serves as the base in emergencies.



Hisashi Komatsu

Prosition: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Environmental systems engineering

My approach is based on the measurement of the "weight" of cities, analyzing the connection between living, environment, and economy through the movement of goods. The study is designed to achieve a low-material/low-carbon stock society by analyzing material/energy flows in a city or a regional area, using geographic information systems (GIS) and remote carrier techniques and ultimately to actimate the amount of sensing techniques, and ultimately, to estimate the amount of rubble that will have to be disposed of in the wake of an

Hiroki Tanikawa



Position: Department of Civil Engineering, Graduate School of Engineering Specialty area: Hydraulic engineering, river engineering

management and emergency support services.

On the basis of studies such as hydrology, watershed geography, disaster prevention, and ecology related to river ovement, water utilization, and environment, I am striving to develop the integrated management of rivers and their basins. On the disaster prevention side, in addition to river improvement planning, I am providing assistance to research/education and administration such as crisis

Professor Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Construction structure,

-resistant design, steel-reinforced concrete

Tetsuro Tsujimoto



Masaomi Teshigawara



Kentaro Nakai

Associate Professor Position: Department of Civil Engineering, Graduate School of Engineering Specialty area: Geotechnical engineering,

I am studying mainly on steel-reinforced concrete (RC) structures. Excellent in earthquake resistance, durability, and fire resistance, RC structures are being widely used in a variety of applications, such as general apartment buildings, ultra high-rise buildings, spatial structures, and infrastructure facilities. I am willing to contribute to rationalization and ensured safety of structural designs through destruction experiments of near life-size members and frame structures.

geotechnical engineering for disaster prevention I am trying to investigate and interpret the mechanism of ground disaster which may occur during and after

an earthquake, such as liquefaction for sandy ground and long-term consolidation for clayey ground. Through my research effort, I will do my best to contribute to disaster prevention and mitigation in this region



Hirokazu Kato

Yasuo Kitane

Position: Department of Environmental Engineering and Architecture, Graduate School of Environment Studies

Specialty area: Low-carbon traffic/city planning, regional public transportation strategy

I have studied building attractive, comfortable communities and transportation systems while reducing environmental burden on the earth, and engaged in the formation of policies for local governments around Nagoya. I will come up with specific measures for this area highly vulnerable to disasters.



Associate Professor Position: Department of Civil Engineering, Graduate School of Engineering Specialty area: Structural engineering

My research area is the load carrying capacity of steel and composite structures. I will contribute to disaster mitigation through enhanced earthquake resistance performance of structures.

Assistant Professor



Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Seismic Engineering

Through vibration measurements such as the seismi observation of buildings and grounds, I am trying to uncover the earthquake resistance performance those buildings actually have. I will do my best to contribute to disaster mitigation in this region.

Associate Professor

Professor

Position: Department of Environmental Engineering and Architecture, Graduate School of Environmenta Studies

Specialty area: River hydraulics, ecology and civil enaineerina

On the basis of river hydraulics that addresses the flow of water and earth & sand in rivers at the same time looking at natural phenomena unique to the region, I am engaged in the studies on the management and reduction of flood disasters and the evaluation, maintenance, and reproduction of ecosyst



Takashi Tashiro



over-investment. I set it as one of major tasks for the rest of my life to contribute to construction and community development in ways that measures for environmental load reduction will go a long way in future disasters

Lecturer Position: Graduate School of Engineering (Campus



Gen Taniguchi

design, city/regional planning, facility management I am responsible for the management of Nagoya University's facilities/equipment and operation, and part of a design team for the new building of Disaster Mitigation

Specialty area: Architectural planning, construction

Research Center. I am intended to contribute to facility management for disaster prevention, ranging from the Kazuhisa Tsunekawa campus, city to the region.

Planning & Management Office)



Jun Tobita

Masaki Nakano

Professor Position: Disaster Management Office Specialty area: Earthquake engineering

I am working at Disaster Management Office to provide a solid foundation for the disaster prevention system of the University that accommodates as many as 20,000 people. On the front line of practical disaster prevention research, I leverage my knowledge of earthquake engineering such as hardware protection measures, system construction, promot and awareness building.

Position: Department of Civil Engineering, Graduate School of Engineering Specialty area: Geotechnical engineering

My main research field is effective utilization of various types of geomaterials, from natural materials to artificial materials, based on evaluation of their mechanical properties in terms of soil skeleton structure concept. I will contribute to disaster prevention and mitigation by effective utilization of disaster waste as geomaterial for the immediate ction after disasters restoration/recon-

Introduction of Members (Concurrent Professors)

Assistant Professor



Specialty area: Observational volcanology

Through earth observation, I have uncovered the subsurface structure of volcanoes and the mechanism of earthquakes occurring there. From now on, I will look at volcanic eruption phenomena as an interes theme in the science field of predicting disasters.



Tadatoshi Furukawa

Haruhisa Nakamichi

Associate Professor Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Architectural structure (mainly wooden structures)

I am studying the safety of a wide variety of (mostly wooden) architectural structures, such as large spatial structures and quake-absorption/damping structures. To reduce casualties in the event of an earthquake, I will continue my research and development that will contribute to disaster mitigation such as the promotion of earthquake-resistant, wooden house

Position: Graduate School of Medicine Specialty area: Disaster, emergency and critical care



As acute care medicine, I am teaching the medical treatment and knowledge of emergency medicine and critical care medicine, and has started bringing up these specialists in Japan. At the same time, I will pursue the construction of acute-phase medical management systems and the development of acute-phase innovative drugs as crinical and basic research. I am committed to improve the emergency medical service, providing medical treatments suited for disaster mitigation in Nagoya, Tokai area.

Associate Professor

Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Building material science, cement chemistry, steel-reinforced concrete structure, thermodynamics of porous media

Starting with the issues of building materials. I am driving the Starting with the issues of building materials, I am driving the performance assessment of decontaminated, naturally aged structures. My recent engagements include the performance assessment of concrete structures that are kept exposed to radioactivity in nuclear power plant facilities. None of these issues is something easy to solve in a short period of time, but I think I should make steps forward steadily on a long-term here.

Professor

Position: Environmental Sociology, Graduate School of Environmental Studies Specialty area: Seismology, historical geography



Tsunetoshi Mizoauch

Ippei Maruyama

In Japan, we learn about natural disasters, such as earthquakes thunders fires wind and flood damage. from modern archives and illustrations, considering measures against disasters. We are accumulating data from the living survey of flood-prone areas in Bangladesh in South Asia.

Professor



I am studying methods to better deal with uncertain future risks. I think it important to efficiently improve the safety of the whole society with limited resources by weighing the cost-effectiveness of disaster

mitigation targets/measures in mind, based on linear safety assessment, rather than simply whether safe or Yasuhiro Mori not



Yasushi Yamaquchi

Sciences, Graduate School of Environmental Studies Specialty area: Remote sensing

I used to be a geologist walking around fields. I am now studying the environmental diagnosis of the earth using remote sensing techniques as observation tools. I will apply these sensing techniques to better understand the state of disasters

Position: Department of Earth and Environmental





I am specialized in severe injury/emergency care. Recently, I am engaged mainly in the studies on health care systems that are designed to provide safe, high-quality medical care. I am intended to contribute to disaster mitigation research and activities, aiming at saving lives from disasters and reducing health damage as much as possible.





Yasuhiko Nishizawa



Muneyoshi Furumoto



Mariko Matsumoto



Norimi Mizutani



Akito Murayama



Koshun Yamaoka



Yoshiko Yamanaka

Associate Professor

Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies Specialty area: Architectural history, technological istory, and civil engineering history

The start of my search on the severity and influence of the Great Nobi Earthquake in the stricken area, as part of my research effort aimed at architectural history, encouraged me to get involved in disaster mitigation. I am determined not to forget the history of Japanese architecture having battled with fires and earthquakes, but to apply the lessons learned from past hazards to mitigate disasters in the future.

Professor

Position: Earthquake and Volcano Research Center, Graduate School of Environmental Studies

Specialty area: Solid-earth planet physics

I believe the Tokai area is where we should be prepared for not only ocean-trench mega earthquakes but also inland earthquakes. I want to contribute to disaster mitigation by figuring out what types of earthquakes can happen.

Professor

Position: Nagoya University Center for Developmental Clinical Psychology and Psychiatry

Specialty area: Clinical psychology

My main research theme is the international comparison and child profiling relating to the environment surrounding Japanese children and their nental health. From now on, I will add to my research themes, children's ability to mitigate mental disasters.

Professor

Position: Department of Civil Engineering, Graduate School of Engineering Specialty area: Coastal engineering

I am engaged in studies on coastal disaster prevention and the utilization and maintenance of coastal and marine areas. I am recently focusing on tsumani disaster prevention-related studies. Human lives, assets, and economic activities concentrate in coastal areas in Japan. I will pursue my studies so that these spaces can be utilized and applied in a safe, comfortable manner

Associate Professor

Position: Department of Environmental Engineering and Architecture, Graduate School of Environmental Studies

Specialty area: Urban planning, urban design, community development

My research and practice focus on urban/regional-scale spatial planning and local-scale community development. What interests me most these days is how I can incorporate elements that will contribute to disaster mitigation in my research and practice.

Professor

Position: Earthquake and Volcano Research Center, Graduate School of Environmental Studies

Specialty area: Seismology, volcanology

I have been involved in disaster mitigation activities since NSL 10 years ago, and am working more closely with Ministry of Education, Culture, Sports, Science & Technology, and the Nuclear Safety Commission. Leveraging such experience, I hope I can help mitigate disasters in this region.

Associate Professor

Position: Earthquake and Volcano Research Center, Graduate School of Environmental Studies

Specialty area: Seismology

Conscious of what science can do to reduce disasters in the event of next huge earthquake along the Nankai Trough, I am engaged in the study on the mechanism of great earthquakes developing between the plate boundaries. Recognizing recently the importance of archives, I have started to delve into appropriate archives