

# Shinshu University presents:



Research in  
Germany  
  
Land of Ideas



Federal Ministry  
of Education  
and Research



Three days after hurricane Hagibus (#19) made its landfall in Japan, a group of researchers and industry members from Germany arrived safely in the city of Nagano. (Those effected by the typhoon are in our thoughts and we hope for their speedy return to daily life.)



Having visited the office of the prefectural mayor earlier in the day, representatives of the Granite project group, consisting of Sabine Ganter-Richter, co-founder of LYOGroup International, and the Fraunhofer Institute for Applied Information Technology FIT, hope to build a bridge between Japanese small and medium sized enterprises (SME) and German partners. Many SMEs feel trepidation at incorporating the latest technology even though they understand it can make their enterprise more efficient and profitable. The Granite project brings together Shinshu University and other stakeholders within Japan and Germany for collaboration to ensure ease of automation and data collection to improve their business.



The afternoon began with a greeting from the Shinshu University president, Dr. Kunihiro Hamada, who welcomed the Granite group initiative to engage in collaborations in Nagano.





Dr. René Reiners of Fraunhofer FIT and the leader of the Granite project gave presentations on the services that the Fraunhofer FIT institute provides and examples of current projects so that attendees, local businesses based in Nagano, could see how they could benefit from working together. Dr. Reiners was joined by his colleague Constanze Ritzmann, Research Associate of Fraunhofer FIT.



Another guest from Germany was CEO Patrick Buchholz of the fourth generation family-owned machine knife company Steinstosser who gave a talk on how his company of 56 employees have introduced emerging IoT technologies into their workflow to better their outcome.

Professors of Shinshu University also gave talks on their research and how businesses can benefit from collaborations.



Dr. Kiyoshi Tanaka, Vice President of Shinshu University (Intl- Affairs) and host of the evening gave a talk on behalf of Dr. Aguirre Duran Hernan of the Engineering department who could not return from Ecuador in time for the presentation. Dr. Hernan's research looks at smart cities. Data was taken from the transportation system in the city of Quito, Ecuador, to maximize efficiency of movement and reduce air pollution.



Dr. Kazuki Kobayashi gave a talk demonstrating how his IoT/Smart Agriculture system uses cameras and algorithms to give farmers more information about their fruit and produce. The system is called smart field monitoring with IoT. His presentation included many colorful photos from the field, and the audience comprised of local businesses, faculty of Shinshu University, and guests from Germany showed keen enthusiasm when Dr Kobayashi aired a video of how such systems can deter pests such as crows by effectively targeting unpleasant sounds to crows only when they appear.





Mr. Shuichi Fukuda, the head of the Nagano Prefectural Government SME department, gave a talk on the vision for the role of new technology in SME in the Nagano area. Shinshu University has very strong collaborative relationships with both local government and businesses.



The panel discussion which followed provided an opportunity for an exchange of views and questions between all the presenters and the audience.



The evening ended with a networking reception where participants were able to further discuss collaborative possibilities while enjoying food and wine from Shinshu.