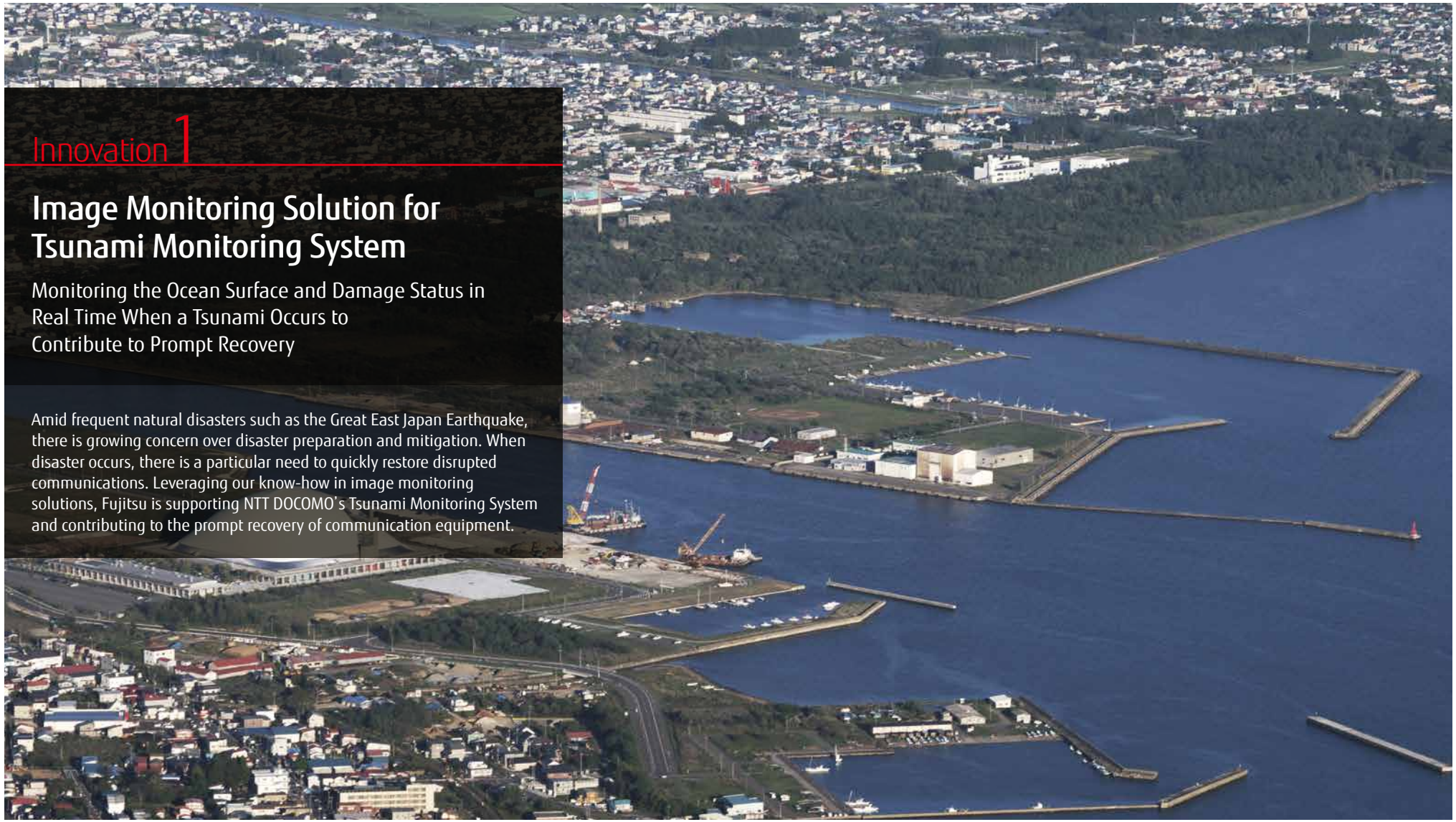


Innovation 1

Image Monitoring Solution for Tsunami Monitoring System

Monitoring the Ocean Surface and Damage Status in Real Time When a Tsunami Occurs to Contribute to Prompt Recovery

Amid frequent natural disasters such as the Great East Japan Earthquake, there is growing concern over disaster preparation and mitigation. When disaster occurs, there is a particular need to quickly restore disrupted communications. Leveraging our know-how in image monitoring solutions, Fujitsu is supporting NTT DOCOMO's Tsunami Monitoring System and contributing to the prompt recovery of communication equipment.

Innovation 1 Image Monitoring Solution for Tsunami Monitoring System

Monitoring the Ocean Surface and Damage Status in Real Time When a Tsunami Occurs to Contribute to Prompt Recovery

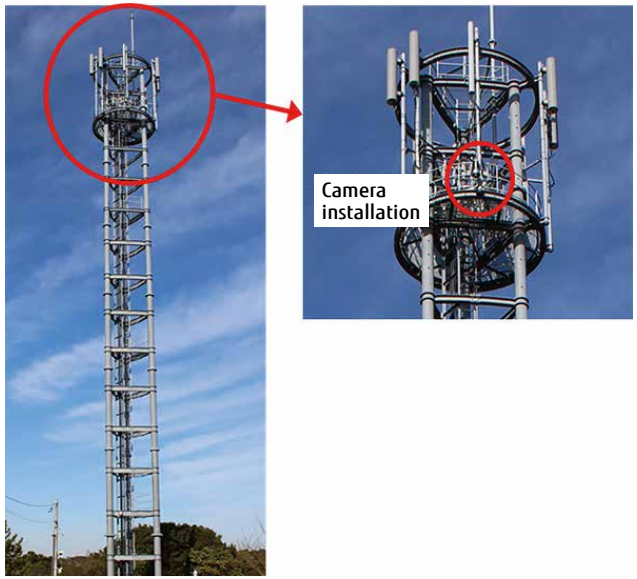
With a variety of natural disasters seen in recent years, concern over disaster preparation and mitigation is rising. For telecommunications carriers in particular, prompt recovery of base stations and other equipment is an imperative following a disaster.

In response, NTT DOCOMO launched operation of its Tsunami Monitoring System in March 2016. The system installs high-performance monitoring cameras in base stations along the coast to monitor the ocean surface offshore when a tsunami occurs. Operated remotely, the cameras can also confirm the damage status of the base stations' communications equipment. Images picked up by the cameras can be assessed in real time, which is expected to aid in the prompt recovery of base stations.

Fujitsu offers an image monitoring solution that includes monitoring cameras and networking equipment, providing total support that extends from high-resolution acquisition, storage, management, and encryption of images to transmission of images to devices. Using advanced compression and transmission technology, the system sends images in real time to NTT DOCOMO's network operation center.

Fujitsu has enabled multi-vendor selection of cameras from among multiple models according to desired features, has enabled a secure network environment to prevent leaks of monitored images, and has enabled the transmission of images to smartphones, tablets, and other devices, achieving a system that offers convenience and reliability. Moreover, as some utilize independent power sources based on solar panels, they can continue monitoring even after a disaster, thus contributing to the reduction of environmental impacts and electricity expenses.

At present, the monitoring cameras are installed in four locations, including the city of Shima in Mie Prefecture. Drawing on our extensive track record of implementing image monitoring solutions, we will support NTT DOCOMO's tsunami monitoring system, cooperate with disaster countermeasure initiatives, and contribute to the creation of a safe and secure society.



Overview of system