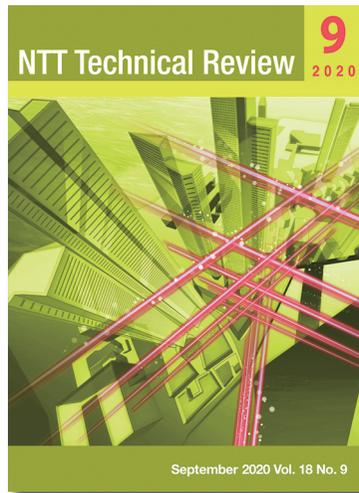


<https://www.ntt-review.jp/archive/2020/202009.html>



## View from the Top

▶ Teruyuki Kishimoto, Executive Vice President, NTT WEST

## Front-line Researchers

▶ Yutaka Miyamoto, NTT Fellow, NTT Network Innovation Laboratories

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### Digital Twin Computing for Advanced Interaction between the Real World and Cyberspace

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## View from the Top

### Teruyuki Kishimoto, Executive Vice President, NTT WEST

#### ▼Overview

According to a survey conducted by the Tokyo Chamber of Commerce and Industry in early June during the novel coronavirus pandemic, 67.3% of small- and medium-sized enterprises based in Tokyo have implemented teleworking (remote working). Companies that have not yet introduced teleworking have cited changing internal systems and ensuring security as issues preventing implementing teleworking and have asked the government for support and to provide usage examples of teleworking. We interviewed Teruyuki Kishimoto, executive vice president of NTT WEST, about how the company should respond to these needs and the outlook and attitude of the company, which has reached a turning point since its founding 20 years ago.



## Front-line Researchers

### Yutaka Miyamoto, NTT Fellow, NTT Network Innovation Laboratories

#### ▼Overview

The development of information and communication technology (ICT) has revolutionized people's social lives. Amidst the current unprecedented situation due to the worldwide spread of the novel coronavirus, services and applications that use ICT, such as teleworking and online diagnosis, have been supporting people's lives and economic activities. We asked NTT Fellow Yutaka Miyamoto, NTT Network Innovation Laboratories, about his research and development on the optical communication infrastructure that supports these ICT services and application and path to its practical application and his attitude as a researcher.



## Feature Articles

### Digital Twin Computing for Advanced Interaction between the Real World and Cyberspace

### Digital Twin Computing Initiative

#### ▼Abstract

*Digital twins*, which connect the real world with cyberspace, have been achieved through advances in the Internet of Things and other information and communication technologies. NTT announced its Digital Twin Computing Initiative in June 2019 for envisioning a future in which the digitalization of all types of objects (things) and their fusion with the real world accelerates in parallel with the evolution of the network and computing environment. This article provides an overview of this initiative, describes the scope of its application, and presents its architecture and main issues surrounding implementation.

