
From the Editor

Infrastructure Systems Company, Hitachi, Ltd. has formulated a vision of “becoming the best solutions partner by providing answers to business challenges faced by global customers.” In April 2014, the company reorganized its business into four domains: Urban & Energy Solutions, Water & Environment Solutions, Industrial Plant Solutions, and Components Business. This issue of *Hitachi Review* focuses on the Urban & Energy Solutions domain, presenting example systems used in typical applications, and describing the components they use, which include power electronics, surveillance cameras, and information and control platforms. This issue’s Expert Insights, meanwhile, carries an article contributed by Dr. Aidan Rhodes of Imperial College London in the UK about that nation’s latest power systems and the environment in which they operate.

In Technotalk, Infrastructure Systems Company staff working in the electric power, railways, and platform fields, as well as R&D staff working on information services and energy give their respective perspectives on developments in technology and the role of research laboratories in relation to information and control systems.

The Overview section describes the three forms of value provided by Hitachi’s information and control systems, namely (1) eliminating what is “unreasonable, wasteful, and uneven” (smart & smooth), (2) building a social infrastructure that can continue to grow (sustainable growth), and (3) ensuring that infrastructure is safe, secure, and resilient (security & resiliency).

Articles on the “smart & smooth” theme describe an island smart grid model, a smart grid demonstration project that uses photovoltaic power generation, energy management systems for condominiums, power conditioners for renewable energy, and video surveillance systems. Articles on “sustainable growth” cover the upgrade of the Tokyo region railway train management system for the JR Chuo Line, a system for planning, operation and maintenance of water supply and sewage, and steel industry control systems.

Our aim at Hitachi is to combine the knowledge we have built up through the application of the latest information technologies, including big data and cloud computing, in areas such as railways, electric power, water, and the steel industry in order to continue delivering new forms of value to our customers. We also look forward to delivering improvements in the future that use advances in information and control technology to coordinate the operation of multiple systems rather than just optimizing each system on its own.

I hope this issue will provide you with a better understanding of Hitachi’s efforts to drive social innovation.

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