1. Introduction

"Organizational Climate for Realizing Security and Safety"

In view of security and safety for large-scale and complex systems, research is crucial not only on hardware-related reliability improvements but also regarding organizational culture and climate as it affects the overall life-cycle of facility operations. The Laboratory conducted a study on the creation of corporate climate and culture as shown in the figure. The purpose is to create an organization (workplace and staff) that is (1) free from accidents and compliance problems; (2) motivating and lively; and (3) creative and filled with potential. The area of research can be divided into three categories: “Creation of Organizational Climate and Culture,” “Vitalization of Individuals and Teams,” and “Risk Management.”

2. Summary of Research Findings

2.1 Creation of Organizational Climate and Culture

We studied motivation improvement within an organization, safety culture assessment, organizational diagnosis for profit improvement, organizational vitalization, and international comparison of organizational cultures. By now the method of organizational culture diagnosis has been developed to a practical level; and we conduct the diagnosis upon the request of firms while promoting the transfer of technology.

2.2 Vitalization of Individuals and Teams

We proposed how to vitalize individuals and teams by focusing on re-training individuals and teams using methods such as the following: development of teamwork training, new proposals for improving work-life balance, and studies on stress management. More specifically, we conduct training for real companies and measure the effects in order to develop the method to a practical level.

2.3 Risk Management

We focused on practical management tools to prevent accidents in complex and large plants. We also made proposals on topics, such as risk assessment to minimize troubles associated with large information systems, capabilities of project managers who can lead the project to success, and matters to be considered by organizations. In addition, we conducted research on corporate bankruptcy and prevention of compliance breaches.

3. Conclusion

As described above, the Laboratory has been working towards establishing a research base for vitalization, creativity enhancement, and creation of the right climate and culture for organizations, workplaces, teams, and individuals. We also try to contribute to society by offering practical and ready-to-be transferred technologies, such as corporate assessment and training tools.

Next Generation Contents Laboratory

Members: Professor Tetsuro Ogi, Associate Professor Tetsuya Toma, Associate Professor Naohiko Kohtake, Yoshiaki Ohkami (Executive Advisor of SDM Research Institute), and others

Information media technologies are advancing significantly as seen in 4K3D, Virtual Reality (VR), Augmented Reality (AR), and smart phones. As the media develops, the content needs to be created and utilized in such a way that brings out the best of the media used. The Next Generation Contents Laboratory is conducting research on the use of next-generation contents from various perspectives, from developing technologies to create new contents to proposing contents utilization in accordance with the purpose, with an aim to utilize media technologies which continue to advance more effectively. Our research activities often take the form of projects and events, and we carry out projects in collaboration with various firms.

Our recent research includes the followings:

● Sports and Images for Regional Vitalization

Sports are closely linked to the lives of people, young and old alike: One can enjoy by either playing or watching. This project aims to vitalize regional cities using sports by transmitting sports images in a realistic and sensational manner in collaboration with a professional basketball team and video production companies.

● Experiment of Tele-Immersion with the International Space Station

In this project we connected Keio University to the International Space Station (ISS) with a video communication network and conducted a tele-immersion experiment using real-time 2D/3D conversion technology during Astronaut Hoshide’s extended stay on the ISS last year.