

# Health and Safety Initiatives

With health and safety positioned as a vital foundation of its business activities, the TEL Group promotes “health and safety first” from a range of aspects.

## Our Approach to Health and Safety

As part of our Corporate Social Responsibility (CSR) activities, the TEL Group places great importance on ensuring that our customers, employees, and everyone else involved in its business can work in a safe workplace environment, use our products safely, and enjoy good health.

In fiscal 2010, two experts in system safety—Professor Noboru Sugimoto and Associate Professor Takabumi Fukuda of the Nagaoka University of Technology Graduate School of System Safety—were invited to instruct our designers on the basics of equipment safety design. Based on actual accidents, Professor Sugimoto discussed “intrinsically safe designs—which all designs must be—and the principles and responsibilities designers need to understand and fulfill in terms of safety,” while Associate Professor Fukuda talked on “approaches to international standards and system safety from the standpoint of recent global trends.” Both of these insightful lectures deepened our designers’ understanding of safety issues. We intend to continue organizing these lectures and will continue to develop the content.



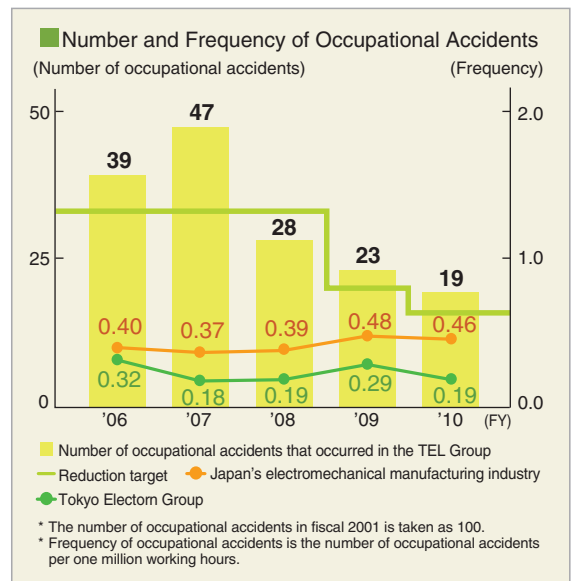
Lecture on the basics of equipment safety design

## Preventing Occupational Accidents

In fiscal 2010, the TEL Group achieved an 18% decline from fiscal 2009 in the number of occupational accidents (excluding minor accidents and injuries that were incurred while commuting), due in part to the decline in product shipments, although this result fell short of the 30% year-on-year reduction goal.

An analysis of the accidents that occurred in fiscal 2010 shows that approximately 70% occurred on worksites related to our group plants. The most common types of occupational accidents were caused by ergonomics<sup>1</sup>, work on high structures, and work near large openings in the floor. Of these, the largest number of accidents remain ergonomics-related, an area which has been under scrutiny since fiscal 2009. We will strengthen safety measures promptly to prevent the reoccurrence of this type of accident and improve the situation.

<sup>1</sup> Ergonomics: a scientific approach that researches both human physical and psychological functions as well as properties and designs to develop equipment and environments to match these. Ergonomics aims to lighten the burden on workers while at the same time enhancing safety and work efficiency.



## TOPICS

### Safety Awareness Training

Tokyo Electron FE Ltd. is providing safety awareness training at major Field Engineer (FE) service bases. These practical training sessions were first held at its Fuchu Office in April 2010, and since May have been expanded to other field service bases in Japan. These activities aim to drive home to engineers the importance of workplace safety and prevent occupational accidents by providing them with simulated experiences of workplace dangers. Permanent training facilities/equipment for this safety program have been installed at the Fuchu office, which has started to carry out activities systematically, including developing simplified moveable training tools for use in training at FE bases as well as dispatching trainers. The training program covers broad areas ranging from the wearing of safety belts during work on high structures, awareness of physical loads suspended in the air, to awareness of the risk of electrocution.



Safety sensitivity training



## Safety Education

Since July 2000, the TEL Group has been promoting the concept of safety education throughout the entire Group. We have produced a manual as a tool for basic safety education that will be provided to Group employees. More advanced safety education is provided for our technical employees who work in clean rooms, using the Semiconductor Equipment Association of Japan (SEAJ) recommended service safety training manual compiled by SEAJ. Following the guidelines in this manual, hands-on training is included in the first training session.

In fiscal 2010, refresher safety training comprised a variety of themes including controlling dangerous energy (importance of carrying out lockout-tagout<sup>2</sup>), effective use of protective gear for the head, hands and feet, safe handling of cutters and other hand tools, as well as risks posed by automatic guided vehicles used at our customers' sites. These safety refresher courses are conducted online; this allows our employees to take the course at their convenience and allows their progress to be monitored.



Refresher training using the TEL website

<sup>2</sup> Lockout-Tagout: to prevent unintended actuation of a power switch on equipment by using tools such as a key to put it out of commission (lockout) and a tag to indicate that use of shutoff or similar equipment is prohibited (tagout).

## Training Using Videos

The TEL Group has created videos for use in safety training to prevent ergonomic accidents caused by factors such as the increased unit weight of equipment due to increased size and reduced work space. The aim of these training videos is to ensure that workers maintain a natural posture while installing equipment or performing maintenance as well as an enhanced understanding of worker comfort, safety, and product quality improvements from an ergonomic perspective. In response to the large percentage of ergonomics-related accidents that have occurred over the past few years, the TEL Group uses this video training as part of its efforts to keep ergonomic risks low, remind workers of the importance of safe, user-friendly equipment, and ensure safety.

In order to prevent the reoccurrence of accidents that have actually occurred during work on high structures or near large openings in the floor, and involving heavy lifting gear or electricity, we have created videos that reproduce actual accidents using 3D images. This visual presentation helps us to check the management system at the time of the accident, the work load status of the injured, and whether or not adequate communication has taken place. These videos are becoming an integral part of our safety training.



Video on preventing ergonomics-related accidents



Video reproducing accidents using 3D images

## TOPICS

### CPR and AED Training

Cardiopulmonary resuscitation (CPR) and automated external defibrillation (AED) are both effective methods of saving lives in the case of cardiac arrest, including certain cases of sudden heart attacks, water accidents or electrocution. The TEL Group invites external specialists to provide employees with periodical CPR and AED training. Feedback from participating employees includes, "Many more people can be saved if more people are able to use CPR and AED in an emergency" and, "It will help if a family member meets with an accident."



New employees undergoing CPR/AED training