C3 Development of Early Detection Approach of Dangerous Driver of Advanced Age and Dementia

Yasumi Ito, PhD*, National Institute for Longevity Sciences, 36-3, Gengo, Morioka, Obu, Aichi 474-8522, JAPAN; Makoto Kihira, MS, National Research Institute of Police Science, 6-3-1, Kashiwanoha, Kashiwa, 277-0882, JAPAN; Shuichi Yanai, PhD, Akira Inamori, BS, Tetsuya Nemoto, PhD, and Hiroyuki Matsuura, PhD, National Institute for Longevity Sciences, NCGG, 36-3, Gengo, Morioka, Obu, 474-8522, JAPAN

The goal of this presentation is to describe the re-education of a senior driver.

This presentation will impact the forensic science community by providing research that will be useful for establishment of the driving ability recovery approach for advanced age and dementia drivers.

In Japan, the rise in traffic accidents by advanced age and dementia drivers is a social problem, and relevant governmental agencies are seeking solutions to the crisis. Since the early detection of dementia is an advanced subject medically, it is also researched eagerly in medical institutions.

On the other hand, elderly people with a high dependence to a private car are increasing in number by the decrease of the public traffic by local decrease in population. When they are uniformly deprived of a driver's license, there is a danger of diminishing definite goals in life, resulting in decreasing quality of life and increasing the number of bedridden elderly people.

So, it is the object of this research to develop the approach of carrying out early detection of the high advanced age and dementia driver of possi- bility of causing a traffic accident, by the test which uses a driving simula- tor (DS) and a driving recorder. As a result, it will become possible to determine a superior senior driver and allow them to continue driving. Additionally, the development of assistant apparatus and establishment of training approaches for driving ability recovery will be attained for the ad- vanced age or dementia driver on which driving ability has fallen.

As a result of conducting the run experiments by test subjects using simplified mould DS developed by this research, it was confirmed by the easy apparatus which can be used at a hospital or a home by devising a scenario (soft ware) that evaluation of driving ability is possible to some extent. The expression of the test subject under experiment and the relationship of an operation condition are under analyses now with the member who added the researchers of medicine and psychology.

Driving Simulator, Driving Recorder, Dementia Driver