



## Control and Development of High-efficiency Synchronous Motors

Mutuwo TOMITA

Professor, Ph.D.(Engineering) (Nagoya University)

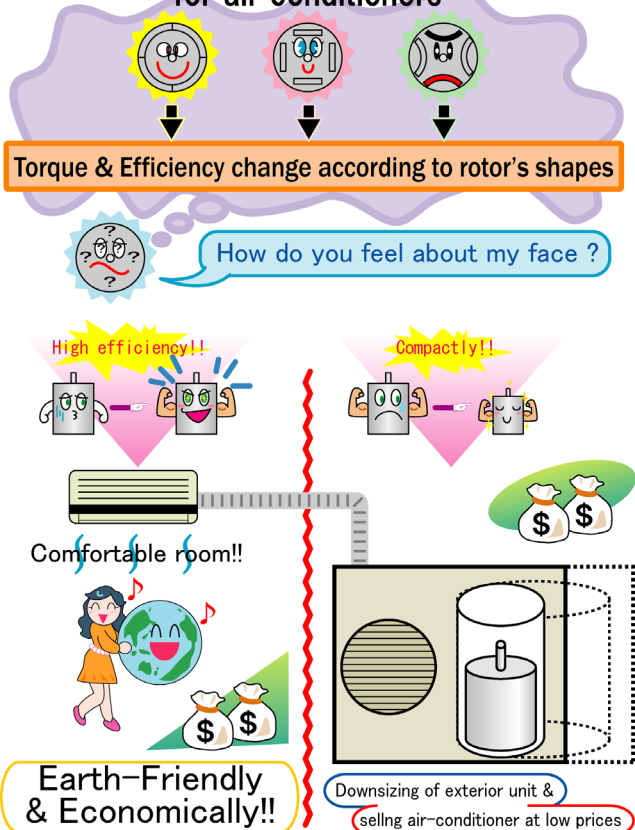
Email : tomita@gifu-nct.ac.jp

**Research Fields** Energy-saving, Reduction of loads on the environment

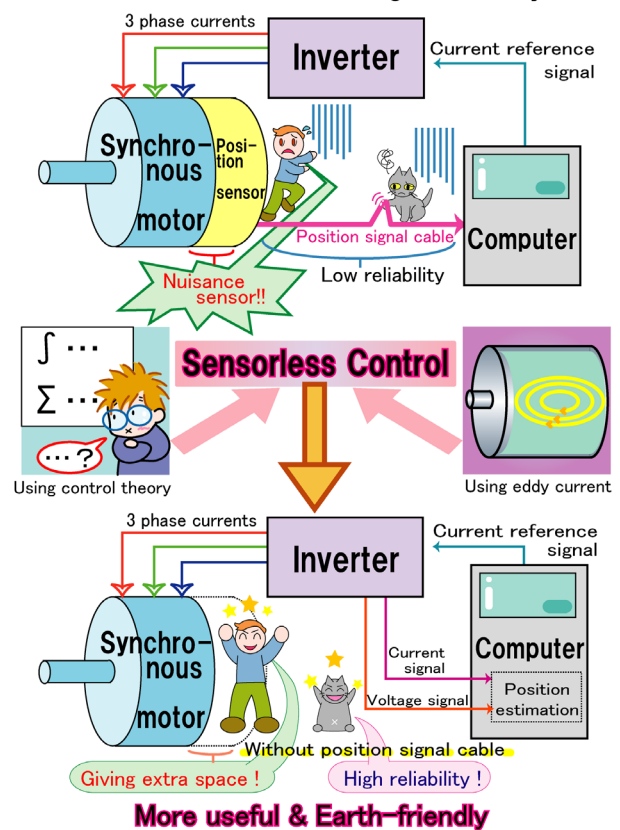
**Keywords** Global warming, Power electronics, Heat pump

### Research Outline

#### Development of compressor motors for air conditioners



#### Position sensorless control of high efficiency motor



### Prof. Dr. Mutuwo Tomita 's Lab. News

● In Aug. 2017, a student of Prof. Mutuwo Tomita's Lab. gave two presentations at an international conference (ICEMS2017-Sydney) which was held in Sydney, Australia. A paper which was presented by him was selected as the "Best Paper Award" from "ICEMS2017-Sydney". He also received "IEEE Nagoya Section Conference Presentation Award" from IEEE Nagoya Section.

### Prof. Dr. Mutuwo Tomita 's biography

● Mutuwo Tomita was born in Nagoya, Japan, in 1965. He received the B.E. degree from Mie University, Tsu, Japan, in 1988, and the M.E. and Ph.D. degrees from Nagoya University, Nagoya, in 1995 and 1998, respectively, all in electrical engineering. He was an Electrical Engineering Teacher at Shizuoka Prefectural Technical Senior High School, Japan, from 1988 to 1993. Since Oct. in 2013, he has been a Professor at National Institute of Technology, Gifu College, Gifu, Japan. His research interests are synchronous motors drives and machines. **Prof. Dr. Mutuwo Tomita received the Paper Award from the Institute of Electrical Engineers of Japan(IEEJ).** He is a member of the IEEE and a senior member of the IEEJ.