

Keeping track of Alzheimer's

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UNIVERSITI Putra Malaysia (UPM) researchers have created a tracking device to monitor the spatial movement of those suffering from Alzheimer's disease.

Known as the Alzheimer's Real Time Location System (ARTLS), the gadget uses a wireless tracking device (called "tags") that can be carried by patients in their pockets without interfering with their daily routine.

The tags' position will be recorded through radio frequency, which will enable the caregiver to view the spatial movement of the patients in 2D form.

Assoc Prof Dr Abdul Rashid Mohamed Shariff from the university, said the device can help caregivers monitor patients remotely in real time and potentially protect them from dangers linked to wandering.

"If a patient goes to the dining area numerous times a day to eat, what does that tell you? Caregivers can study the patient's behaviour and take appropriate action," he said.

Dr Abdul Rashid, who is heading the research, said medical practitioners could also monitor the effectiveness of the drugs given to the patients without having to do a chemical analysis.

"Most people normally have a routine but those suffering from Alzheimer's disease do not.

"They forget what they did yesterday. This device can show whether the abnormal frequencies recorded show a pattern," he said.

He added that they were looking to further enhance the features with a view to commercialise the product.

The device won a gold medal at the Design, Research and Innovation Exhibition last month, and is expected to help reduce the number of day-care centre personnel



Nifty gadget: Dr Abdul Rashid shows off the tracking device created by UPM researchers.

required for Alzheimer's patients.

"The government can also give out grants to old folks homes to implement such a system," he said.

Alzheimer's disease is a medical condition that can lead to a deterioration in basic abilities such as judgement, and short and long term memory.

According to a recent World Alzheimer Report, 36 million people worldwide are estimated to be affected with the number doubling every 20 years to 66 million by 2030 and 115 million by 2050.

The prevalence rate of dementia or Alzheimer's disease is estimated to be 14.3% for Malaysians aged 60 and above.