





Spanish develop RFID alert system

Tags: Spain

08 Sep 2009

A team of Spanish researchers has developed a system that reminds elderly people and those with special needs when they forget everyday tasks, such as picking up their keys or taking medication.

The system, designed by researchers at the University of Granada in Southern Spain, recognises the everyday actions of the user by using radio frequency identification labels.

The labels are placed on objects that the individual touches most often and used to communicate with a computer or mobile device situated in the house or at a nearby assistance centre.

The activities of users are assessed with artificial intelligence techniques to compile a list of actions such as remembering to take keys or a mobile phone before leaving the house.

The system can monitor the individual's movements by assessing when they touch an object; and a small alarm will go off followed by a reminder on a mobile device to prompt the user to take action.

María Ros Izquierdo, a researcher at the university and the co-author of a study on the system, which is due to published later this month said: "It is a prototype which, in a non intrusive manner, facilitates the control of the activity of people with special needs and increases their independence.

"It is not necessary to use cameras or microphones and the devices which are used do not entail any technological complications for the users, nor do they modify their daily routines."

The researchers have evaluated the system by designing a simulation of the rooms in a house with sensors embedded in them to recognise the behaviour of its occupants.

They monitored users individually to create an individual database and later asked participants to verify the reliability of the system and the degree of intrusion that they felt.

Izquierdo concluded that the system is beneficial to those who often reject the aid of others and demand independence. She said: "The system does not modify the life if the users, but does positively modify that of the people who look after them."

Sarah Bruce

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