

Diversionsary spaces

A University partnership project has provided dementia patients with a unique retreat, writes Genevieve Costigan

The conversion of a disused corridor in a Melbourne hospital into a calming and pleasurable environment is part of a move to improve severe dementia patients' experience of hospital and to assist in their transition from home to residential care. The pilot project aims to design and implement a 'diversionary space' in the secure dementia ward of the Royal Park Campus of the Royal Melbourne Hospital.

It has been developed in partnership with the Faculty of the VCA and Music (VCAM), and the School of Behavioural Sciences at The University of Melbourne, the National Aged Research Institute (NARI) and the Royal Melbourne Hospital.

Dr Dina LoGiudice, an aged care physician who works in the ward, believes that an increasing body of evidence indicates a need to address the design of clinical settings for people with dementia, particularly at the time of transition from home into residential care where unfamiliar environments can be confusing. "The space will work as a way to engage patients thereby decreasing their distress and agitation and it will be a place where therapists and families can take patients to spend some time together," Dr LoGiudice says.

The patients are usually transferred to the secure dementia ward after admission to a hospital for a medical problem.

"We assess their needs to see whether we can improve their function to a point where they can return home or whether they may be at the stage of needing residential care," Dr LoGiudice said.

"Every person has a unique experience of dementia and trying to work out what they were like when they were functioning well, what habits they had and what activities they enjoyed helps us to determine how to assist them - the family plays a big part in this."

The ward usually houses 16 patients with moderate to severe dementia who are aged about 80 and stay for three to four weeks. The patients are culturally and linguistically diverse and issues of language are a major problem.

"We had a Vietnamese woman with

severe dementia who spent all day just sitting on her bed, she was very quiet and no trouble to the staff. Only when we got a translator in did we discover that she stayed on her bed because in her mind the floor was covered in dead bodies.

"Some of the agitation and wandering common in dementia is prompted by old habits such as women starting to worry at four o'clock about why their children are not home from school or early in the morning when men start preparing for work," Dr LoGiudice says.

The ward was not purpose-built for dementia care but it does have an enclosed walkway which wraps around the ward and looks to the outside and is most commonly used by patients who wander.

"The development of the walkway as a diversionary space, including visual, tactile and auditory stimulation will provide a unique opportunity to improve knowledge on the effect of the change of environment in the behaviour of older people with dementia in a sub-acute ward," Dr LoGiudice says.

VCAM students, Darren Steffen and Ryan Roche, were granted a \$5,000 Dreamlarge Knowledge Transfer grant to develop the project and are supervised by VCAM lecturer in sound, Roger Alsop.

"These kinds of wards can be very institutional and depressing, what we are trying to do is create a retreat outside of the chaos. In the main ward you can have the telly blaring, nurses rushing around and people everywhere and this is a nice spot which had previously been underused," Mr Alsop says.

The project is divided into stages with the first stage involving the observation of how patients currently use the space without any sound or visual stimulation. Then sound will be introduced followed by interactive physical objects.

"Sound is an easy way to alter the experience of an environment. We can broadcast simple sustained pure sounds into the corridor to watch how those sounds influence patients' experience of the space and we can measure the effect of these sounds by monitoring patients' behaviour using video technology. The sounds are not music but sounds which create a calming effect at very subtle levels, it is like air conditioning where we don't notice the sound but it informs us at a psychological level," Mr Steffen said.

"The physical installations will connect to areas of people's lives. We are going to put in things like an old style corner shop, an ATM, a washing line, a photo wall where patients can put photos of their families and a tool shed," Ryan Roche explains.

Associate Professor Neil McLachlan from the School of Behavioural Science in the Faculty of Medicine, Dentistry and Health Sciences is involved in the technical side of the project and is providing video analysis software which can track human movement in a de-identified manner and provide real time data.

"The video analysis can reliably detect human movement and log features such as the length of time a person remains in a certain space and the quality of their movement while they are in that space," Dr LoGiudice says.

DEMENTIA IN AUSTRALIA

The Australian Bureau of Statistics reported earlier this year that deaths from dementia have more than doubled in the past decade with dementia now being the fourth leading cause of death in Australia and that by 2016 dementia is expected to be the largest cause of disability burden in Australia.

Behavioural and psychological symptoms are seen in up to 90 per cent of people at some stage in their dementia and often involve agitation, aggression, depression, delusions, sleep disturbances, pacing and wandering. These are common features of dementia and are difficult to accommodate in hospital environments and often mean families are no longer able to care for their relatives.