TCS/18/09 - ApplTree: Personalised digital reminding to support memory impairment after brain injury

People with brain injury commonly experience difficulties with memory, concentration, attention and judgement, meaning that important everyday actions and tasks are not carried out or not completed, limiting the ability to live independently. Technology-based solutions, including smartphone applications, can help by providing prompts about intended actions at the correct time. However, memory and attention impairments mean people forget to set reminders or fail to set them accurately (e.g. setting the wrong time/date for events). Using co-design methods with prospective users, we developed ApplTree, a smartphone reminding application with design features that can be personalised to individuals. ApplTree prompts reminder setting, supports reminder entry to improve accuracy, and delivers users with prompts at the appropriate times. In this study we will first examine the features of ApplTree that suit participants with different needs based on cognitive ability. Then a pilot randomised controlled trial will be conducted to provide crucial information to inform a future larger scale efficacy trial of ApplTree as an intervention to support memory in people with acquired brain injury.