The Flinders Digital Psychiatry and Personal Health Informatics Team is part of the College of Medicine and Public Health at Flinders University. We are a multidisciplinary team including researchers, clinicians and healthcare agencies. Our team includes software developers, engineers, researchers, clinicians, community mental healthcare workers and consumers.

We design healthcare solutions using health data and data from smart phones. The applications we develop improve clinical decision making, leading to improved healthcare experiences and outcomes for consumers.

Our health data solutions aim to change the way healthcare is delivered for people with chronic conditions. Healthcare provision in Australia is reactive. The consumer has to take the initiative to contact a clinician when symptoms occur. Actionable Intime Insights (AI²) is a digital web-based application that proactively generates alerts by monitoring Medicare data to inform clinicians of pending problems to enable early intervention. Our first use case is in the management of people with serious mental illness.

The funding for the AI² project and the Consumer and Carer Advisor Group comes from the Medical Research Future Fund Rapid Applied Research Translation Grant through Health Translation SA. The project is a collaboration with South Australian Health and Medical Research Institute (SAHMRI), Barossa Hills Fleurieu Local Health Network, Central Adelaide Local Health Network, SA Health and the SA Mental Health Commission.

**ACTIONABLE INTIME INSIGHTS (AI²) APPLICATION**

Community Mental Healthcare provision is fundamental in the transition of people with bipolar disorder or schizophrenia from acute care to self-management. Adherence to medication is an essential part of the long-term management for these conditions and, essential in avoiding relapse and hospitalisation. The AI² Application can break the cycle of relapse and re-hospitalisation by changing the way in which healthcare is delivered. Instead of waiting for relapse to occur, the AI² application uses Medicare data to check if consumers are adhering to their care plan and medication. Alerts are raised on clinical systems so that healthcare providers can intercede before relapse.

**MINDtick**

MINDtick is a mental health mobile phone app, that gathers continuous measures of how a person is feeling and uses data from the inbuilt sensors in the phone (e.g. location, movement, and social connectivity) to detect subtle and otherwise unnoticeable changes in how a person feels, thinks and behaves. The app is able to detect early warning signs of mental illnesses before they become critical problems and alert healthcare providers via a web-dashboard to facilitate personalised early intervention.