The SMART health program involves developing a mobile device-based clinical decision support system (CDSS) to help primary healthcare workers improve optimal preventive treatment in primary health care. SMART health was originally developed for primary care in Australia, after which it was substantially re-developed for primary care systems in more resource-constrained countries.

Background:
SMART health Extend – Indonesia was a demonstration project that aimed to determine whether SMART health can be appropriately and rapidly customised, and then successfully implemented in a rural community in the Indonesian province of East Java.

Aims:
The program was implemented in Kabupaten Malang in East Java, Indonesia, with trained primary care doctors and non-physician healthcare workers (Kaders) serving a population of approximately 48,000. It focused on increasing the use of effective preventive medicines in people at high risk of cardiovascular disease (CVD).

Methods:
SMART health resulted in a significant increase in the use of optimal combinations of preventive medications (a blood pressure lowering drug together with a statin and aspirin in those with previous CVD) among high-risk people - 15.5% in SMART health villages compared with 1.0% in control villages.

In particular, SMART health resulted in large increases in the use of blood pressure lowering drugs in the intervention villages compared to the control villages - 57% compared to 16% - resulting in large reductions in blood pressure.

The Malang district government will now embark on a three-year program to scale-up SMART health to all ~400 villages in the district. Technical assistance for, and evaluation of this scale-up, will be provided by the research consortium, with funding from the National Health & Medical Research Council (NHMRC)/Global Alliance for Chronic Diseases.

Impact:

In 2010, stroke, heart disease, diabetes and chronic kidney disease were ranked 1st, 7th, 5th, and 11th, respectively, as the causes of premature mortality in Indonesia.

About one-in-five Indonesians aged 41-50 are at high risk of cardiovascular disease. This proportion increases sharply to 70% for those aged 51-60.

Project cycle:
2017 - 2019

Partners:
The George Institute, Australia
The George Institute, India
University of Brawijaya, Indonesia
University of Manchester, UK

Supporters:
A grant from Give2Asia on the recommendation of the Pfizer Foundation

Contact:
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