

# Intention to use mHealth mobile applications among medical doctors in Malaysia – an online survey

Clarence Kavetha SS Daniel, MRCPH<sup>1</sup>, Aqil M Daher, PhD<sup>2</sup>, Chandrashekhar T Sreeramareddy, MSc<sup>3</sup>

<sup>1</sup>School of Postgraduate Studies, IMU University, Kuala Lumpur, Malaysia, <sup>2</sup>Department of Public Health and Community Medicine, School of Medicine, IMU University, Kuala Lumpur, Malaysia

## ABSTRACT

**Introduction:** Health-related mobile applications are useful in medical practice, but their use is reported to be low among Malaysian medical doctors. We aimed to study the intention to use, and the factors associated with their intention to use. **Materials and Methods:** An online survey was conducted among a convenient sample of medical doctors affiliated with the Malaysian Medical Association (MMA). We constructed a questionnaire based on the Theory of Planned Behaviour that includes attitude, perceived behavioural control, subjective norms, benefits, and barriers. Construct, discriminant validity and reliability were tested using structural equation modelling on SmartPLS software. Multiple linear regression was used to ascertain factors associated with intention to use mHealth. **Results:** Of 289 doctors invited, 208 (72%) completed the survey. The construct and discriminant validity and reliability indices of the questionnaire were satisfactory. Forty per cent of the doctors showed a positive intention to use mHealth applications. Intention to use was associated with participants' attitude ( $\beta=0.33$ ,  $p<0.001$ ), subjective norm ( $\beta=0.248$ ,  $p<0.001$ ), and perceived behavioural control ( $\beta=0.238$ ,  $p<0.001$ ). Benefit ( $\beta=0.142$ ,  $p<0.05$ ) also showed an association with intention to use mHealth apps. **Conclusion:** In conclusion, doctors' intention to use mHealth applications is influenced by positive attitudes, positive encouragement from peers, and those who perceived high self-control and efficacy. Factors identified would help develop strategies to improve the utilisation of mobile health apps to improve healthcare services.