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EHRs at King Fahad Specialist Hospital: An overview of professionals' perspectives on the use of biometric patient identification for privacy and confidentiality, taking into consideration culture and religion

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Adel Abdulrahman Khwaji

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Abstract

The Kingdom of Saudi Arabia is focused on expanding use of biometric technologies and it is a matter of time before this expansion includes medical institutions. However there is a lack of research on Electronic Health Records (EHRs) in Saudi Arabian hospitals, especially on the staff views and attitudes in relation to confidentiality, privacy, and security policies in the context of Saudi society, which is governed largely by culture and Islam. This research utilised an online survey tool to ask doctors, managers, and IT professionals, at the King Fahad Specialist Hospital (KFSH) about these aspects and explored if they recommend the classic non-biometric access method over the rather intrusive, yet more advanced, biometric patient identification (BPI) technology. Encouragingly, all the participants recommended BPI methods with the least favoured method being the facial recognition method for Saudi female patients. This study also focused on whether staff believed that religious and cultural issues influence EHR privacy and confidentiality, as the literature showed that in certain cases unauthorised revelation of an EHR could lead to honorary killing of the patient. Implications of this research include the need for comprehensive staff training on being culturally aware, as well as training on EHR security policy, privacy, and confidentiality.

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Abbreviations

BPI	Biometric Patient Identification
EHRs	Electronic Health Records
HIE	Health Information Exchange
HIPAA	Health Insurance Portability and Accountability Act
HIPs	Health Information Professionals
HIS	Health Information System
HITECH	Health Information Technology for Economic and Clinical Health
ICTs	Information and Communication Technologies
KFSH	King Fahad Specialist Hospital
MOH	Ministry of Health
MUHEC	Massey University Human Ethics Committee
PHC	Primary Health Care
SANHS	Saudi Arabia's National Health Services