Factors influencing graphical user algorithm for mobile banking user authentication: a systematic literature review

ABSTRACT

The usability and security issues associated with mobile banking user authentication techniques and security have been constantly mentioned. With the increasing number of mobile users, which currently is estimated to be about 500million users by 2015 according to a study done by the Yankee Group in 2011, the main objective of this study is to review studies on mobile banking usability factors and graphical user authentication algorithms on the suitable algorithm to be adopted for mobile banking user authentication. A total of 84 articles were extracted using a predefined search string. A quality criterion was applied on the set of articles and a total of 22 articles were determined for further analysis. 8 factors were determined to influence our scope of research study with the main factors for mobile banking usability being mobile banking user adoption and usability features and for graphical user authentication being graphical passwords and graphical authentication.

Keyword: Mobile banking; Graphical user authentication; Systematic review