
Abstract

Barriers and Facilitators to Patient Portal Implementation From an Organizational Perspective: Qualitative Study

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Abstract

Background: Patient-centeredness is an important element of high-quality care. Patient portals can contribute to the patient-centered care and are defined as “an online gateway for patients to gather and share information mostly provided by one health institution.” While portals can have positive effects, its implementation has a major impact on the healthcare institutions providing those. Little is known about the organizational factors that facilitate or hinder successful implementation. Knowledge of the specific barriers and facilitators of different stakeholders may be useful for future implementations.

Objective: The objective of this study is to identify the barriers and facilitators of patient portal implementation among different stakeholders within the hospital organization.

Methods: Purposive sampling was used to select hospitals of different classes. Two university medical centers (UMCs), 3 mid-size hospitals and 2 general hospitals were included. Per hospital three stakeholders were interviewed including: 1) medical professionals, 2) managers, and 3) IT employees. Semi-structured interviews were conducted using the comprehensive model of Grol and Wensing, which describes barriers and facilitators of change in healthcare practice. Barriers and facilitators can occur on six levels: 1) Innovation, 2) Individual professional, 3) Patient, 4) Social Context, 5) Organizational Context, 6) Economic Context. Two researchers independently selected and coded quotes by using this model. Additional factors related to technical and portal characteristics were added by using the model of McGinn et al developed for implementation of electronic medical records

Results: In total, we identified 382 quotes in 34 categories. Twenty-five categories were common for all stakeholder groups, including 16 barriers and 13 facilitators. Positive aspects related to ‘advantage in practice’ were mentioned most frequently, followed by positive ‘attitude’ and ‘motivation to change’. The main barriers were ‘resources’ (eg lack of staff), ‘opinion of colleagues’ (eg, negative beliefs) and ‘privacy and security’ (eg, strict regulations). Similarities and differences were found between stakeholder groups and hospital classes. For example, medical professionals and IT employees considered ‘resources’ as an essential barrier. However, their perspectives differed regarding ‘opinion of colleagues’ as this was a major barrier for medical professionals (eg doctors with negative attitudes), but a facilitator for IT employees (eg, portal implementation can drive a positive change). Results of mid-size and general hospitals were largely comparable, whereas differences were identified for the UMCs.

Conclusions: The model of Grol and Wensing proved to be useful in elicitation and classification of barriers and facilitators to portal implementation. However, technical and aspects related to portal characteristics (such as ‘privacy and security’ and ‘perceived ease of use’) were missing, and were added from the McGinn model. Barriers and facilitators occurred at various levels and differed between hospital classes and stakeholder groups on several aspects (eg ‘opinion of colleagues’ and ‘cost issues’). This underscores the added value of involving multiple stakeholders in future portal implementations. The identified set of barriers and facilitators may be useful to make strategic and efficient implementation plans.

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KEYWORDS

implementation; Patient portals; Health Information Technology

Multimedia Appendix 1

Full poster.

[\[PDF File \(Adobe PDF File\), 241KB-Multimedia Appendix 1\]](#)

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