Abstract

With the fast evolution of information technology, traditional healthcare is moving towards a more electronic stage. As a result, the e-Health term appears, and Electronic Health Records (EHRs) become a critical application of e-Health management systems. These computerized records have been widely used by clinicians, healthcare providers, patients, and health insurance companies for the purpose of creating, managing, and accessing the health information of patients everywhere. Moreover, these information resources can be shared by different healthcare parties for monitoring the patients’ health, delivering effective treatments, and decreasing costs. In this paper, we present a survey of various EHR applications in e-Health systems. These applications include using EHRs for diagnosing, monitoring diseases, and selecting the most efficient paths of treatments. In addition, we discuss the usage of EHRs as a source for building a knowledge base for Clinical Decision Support Systems (CDSS). Finally, the challenges of EHR implementations in the healthcare environment and current research topics will be highlighted.
Electronic Health Records: Applications, Techniques and Challenges

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**Index Terms**

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