

Public Abstract

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Graduation Term:FS 2007

Department:Computer Science

Degree:MS

Title:CLINICAL CONTENT TRACKING SYSTEM - AN EFFICIENT REQUEST TRACKING VIA A GRAPHICAL USER INTERFACE

Between 44,000 to 98,000 Americans die each year due to medical errors, and about 1 million people are injured. (Institute of Medicine, 1999) Many hospitals use a paper-based system to make requests for Clinical Contents and to get approval from the different divisions at the hospital. Like any system, efficiency is the most important component. However, with advancement of today's information technology, paper-based systems could be greatly improved. Some limitations with the current system used in most hospitals are 1) difficult to track order entries made by users at each step, 2) time consuming because each entry has to get handed to the next department by hand or mail.

To remove all these difficulties and increase efficiency; a new web-based software called Clinical Content Tracking system (CCTS) was developed to replace the current paper-based system. CCTS is a tool that helps physicians build clinical contents, in an electronic format, that will be then used in the CPOE system. This system allows users to track their orders, at which stage the order stands, and the current status of the order. This system records every possible action, approval, and rejection made to any order made by the physician. The ultimate goal for this research is to develop a general-purpose framework that can handle various logic flow, approval constraints, template creation, a library of the building units of a template and a tracking system. The ability to track order entries will facilitate managing and processing patient's records. Moreover by implementing our CCTS, the ability of gathering, computing and analyzing data with just a few clicks is very feasible. This will facilitate gathering information and transform data in the system to statistics and hence, maximize efficiency on the managerial level.