

Informatics Institute of Technology

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Self-Education Assistant for Diabetic Patients:

Approach on using Business Process Diagram Notation to represent Knowledge Models

A dissertation by

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Abstract

Diabetes mellitus (DM), normally spoken as diabetes disorder, could be a cluster of metabolic disorders during which there are high glucose levels over a protracted amount. Prevention and treatment involve maintaining a healthy diet, regular exercise, a traditional weight, and avoiding use of tobacco. Management of blood pressure and maintaining correct foot care are vital for individuals with the disorder. In the first chapter of the document, an introduction, aim and objectives were defined for the field of study and about the research area. Objectives were discussed to in order to highlight the progress of the study. Second chapter of the thesis consists of the literature review to differentiate the proposed study with the similar approaches. Second and third chapters include the design and implementation details of the self-education system for the diabetic patients and the fifth chapter discussed the test cases. In the last chapter includes the conclusion which is having the limitations and the further work of the proposed study.

However, the case study is based on using Knowledge Models (KM) to deliver services for the users. So the Business Process Modeling Notation (BPMN) is used as Knowledge Models. So the intended technical outcome of this study is to show that BPMN diagram can be used as knowledge models and can be converted in to machine readable languages such as XPDL to filter the information and to give a better output for the end user.

Keywords : Business Process Modeling Notation, XML Process Definition Language, Rule Based Approach, Business Process Execution Language