PROCESS MODEL COMPREHENSIBILITY ASSESSMENT USING BUSINESS INTELLIGENCE TECHNIQUES

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One of the most popular management concepts nowadays is business process management (BPM). It is built on a collection of techniques and instruments used to plan, examine, enhance, and automate organizational business processes. Business processes, on the other hand, are organized sequences of tasks that take one or more types of input and result in a good or service for a specific consumer. BPM utilizes a combination of management science and information technology understanding to operational business activities. It has drawn a lot of interest in the past ten years because of its potential to sharply boost productivity, cut costs, and shorten wait times [1]. Business process modeling is the core BPM approach. It is used to comprehend, record (for training personnel), examine (to identify flaws and assess performance), and enhance the business processes they outline. As a result, it is necessary to create business process models that are simple to comprehend and modify both during business process execution and the transformation from current to future state following improvement decisions reached via the use of Business Intelligence (BI) techniques [1].

As the result, we propose to analyze a set of Event-driven Process Chain (EPC) models taken from the BPMAI [2] project dataset using Microsoft Power BI tool to calculate “density” and “connectivity” complexity metrics (Fig. 1) [3].

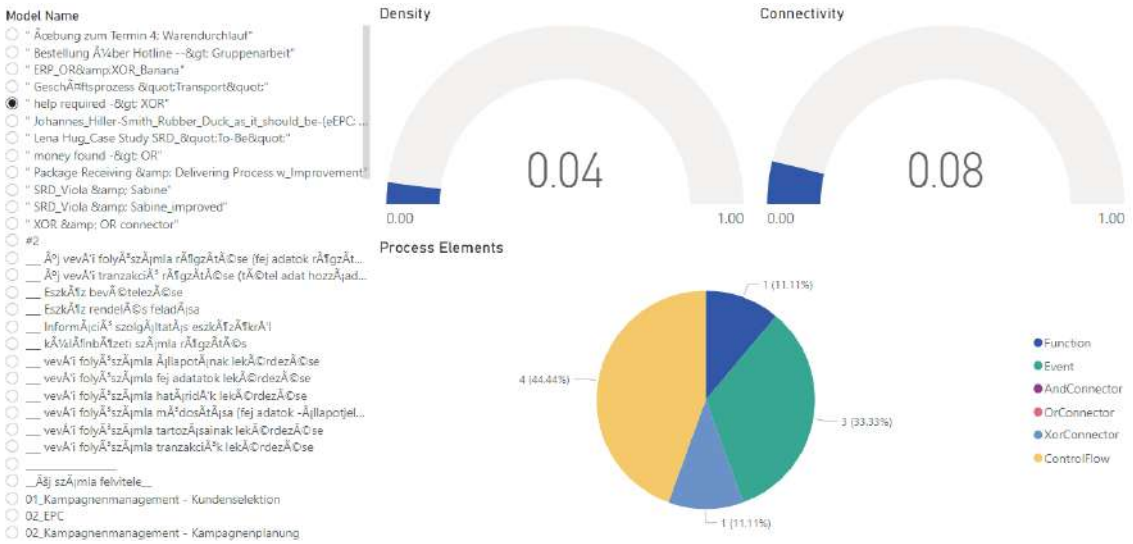

Fig. 1. – Process complexity metrics calculation using Power BI

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3. Копп А. М., Орловский, Д. Л. Анализ и оптимизация моделей бизнес-процессов в нотациях EPC и BPMN. Технічні науки та технології. 2018. №. 4 (14). С. 145–152.