

Aligning Software Systems with Business Operations

Marlon Dumas

Abstract

It is well accepted that IT does not directly generate business value. Instead, IT enables innovation and change in organizations, and innovation and change may lead to business value in the form of new products or services, or improved ways of delivering products or services. A key challenge for software engineers, especially in organizations with years or decades of software legacy, is to understand how a given change in the way an organization operates will affect its existing software systems. Two emerging paradigms related to software engineering seek to address this challenge by increasing the alignment between software systems and business operations, namely Service-Oriented Architecture (SOA) and Business Process Management (BPM). These paradigms are complementary: SOA addresses the question of “what an organization does?” while BPM deals with “how it does it?” This talk will present some principles and methods behind these two paradigms and show how they work together to facilitate integration and evolution of enterprise software systems. The talk will present a number of case studies and discuss open questions and trends.

About the speaker

Marlon Dumas is Professor of Software Engineering at University of Tartu and part-time Associate Professor at Queensland University of Technology (Australia). His area of expertise is enterprise software with an emphasis on business process management and service-oriented architecture. He has co-authored around 100 research and industry papers and he is co-editor of a textbook on Process-Aware Information Systems (Wiley 2005). In 2008, he will be program co-chair of the 6th International Conference on Business Process Management.