Informatik-Kolloquium

Der Fachbereich Informatik der Johannes Kepler Universität Linz[1] lädt in Zusammenarbeit mit der Österreichischen Gesellschaft für Informatik (ÖGI) zu folgendem Vortrag ein:

Dr. Niranjan Suri
Florida Institute of Human and Machine Cognition, USA

An Overview of Agile Computing and Process Integrated Mechanisms

Do, 26.5.2011, 16:15 Uhr
Johannes Kepler Universität Linz, Raum HS 14

Abstract:

Agile computing is an innovative metaphor for distributed computing systems and prescribes a new approach to their design and implementation. Agile computing may be defined as opportunistically discovering, manipulating, and exploiting available computing and communication resources. The term ***agile*** is used to highlight the desire to both quickly react to changes in the environment as well as to take advantage of transient resources only available for short periods of time. This talk will discuss the agile computing metaphor, as well as a concrete middleware implementation that supports communication, discovery, information dissemination capabilities, and dynamic service-oriented architectures.

[1] Der Fachbereich (http://informatik.jku.at) besteht aus folgenden Instituten:
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In addition, the talk will introduce the notion of Process Integrated Mechanisms (PIMs) – a novel approach to coordination of distributed systems. PIMs use state capture and migration to create a logical virtual machine that spans multiple physical nodes, thereby supporting a single process, designated as the Coordinating Process (CP), which can control all of the nodes as though they were part of a single, integrated mechanism. PIMs combine the simplicity of programming offered by centralized approaches with the robustness of distributed approaches. PIMs can also reduce bandwidth utilization in certain distributed applications by moving the processing to the data as opposed to moving large quantities of data to other nodes for processing.

Short Biographical Sketch:

Niranjan Suri is a Research Scientist at the Florida Institute of Human and Machine Cognition (IHMC). He received his Ph.D. in Computer Science from Lancaster University, England, and his M.Sc. and B.Sc. in Computer Science from the University of West Florida, Pensacola, FL. Niranjan's current research activity is focused on the notion of Agile Computing - which supports the opportunistic discovery and exploitation of resources in highly dynamic networked environments. He also works on Process Integrated Mechanisms - a novel approach to coordinating the behavior of multiple robotic, satellite, and human platforms. Niranjan's other research interests include distributed systems, networking, communications protocols, virtual machines, energy-aware computing, and software agents.

o. Univ. Prof. Dr. Hanspeter Mössenböck
Institut für Systemsoftware

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