

### Speaker:

## Prof. Heiko Schuldt, University of Basel

# Cost-Effective Data Management in the Cloud

### **Abstract:**

The proliferation of Cloud computing has attracted a large variety of applications which are completely deployed on resources of Cloud providers. As data management is an essential part of these applications, Cloud providers have to deal with many different requirements for data management, depending on the characteristics and guarantees these applications are supposed to have. With the pay-as-you-go cost model of the Cloud, literally each user action and resource usage has a price tag attached to it. For the application providers in the Cloud, it is essential that the needs of their applications are provided in a cost-optimized manner; at the same time, from the point of view of the users of a data Cloud, a high degree of data consistency and performance with optimized costs has to be achieved. In this talk, we present the PolarDBMS approach to provide a flexible and dynamically adaptable system for managing data in the Cloud. This includes cost-based and adaptive concurrency control as well as cost-based data archiving.

#### **Bio:**

Heiko Schuldt is professor of Computer Science at the University of Basel, Switzerland, where he leads the Databases and Information Systems (DBIS) group. He holds a PhD in Computer Science from ETH Zurich and an MSc degree from the University of Karlsruhe, Germany.

His research interests include large-scale Distributed Information Systems (Cloud Data management, Service-oriented Architectures), Multimedia Retrieval, Digital Libraries, and Mobile Information Systems.

Date and time: Location: Contact person: Wednesday 4<sup>th</sup> February 2015, 2:00 pm Pérolles II, room G230, Bd de Pérolles 90, Fribourg Prof. Philippe Cudré-Mauroux

The colloquium is free and open to the public.