Databases in a Wireless World

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Abstract

The traditional view of distributed databases is based on a number of database servers with regular communication. Today information is stored not only in these central databases, but on a myriad of computers and computer-based devices in addition to the central storage. These range from desktop and laptop computers to PDA's and wireless devices such as cellular phones and BlackBerry's. The combination of large centralized databases with a large number and variety of associated edge databases effectively form a large distributed database, but one where many of the traditional rules and assumptions for distributed databases are no longer true.

This keynote will discuss some of the new and challenging attributes of this new environment, particularly focusing on the challenges of wireless and occasionally connected devices. It will look at the new constraints, how these impact the traditional distributed database model, the techniques and heuristics being used to work within these constraints, and identify the potential areas where future research might help tackle these difficult issues.

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