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Sommario/riassunto	<p>We would like to extend our warmest welcome to all attendees to the Second International Workshop on Storage Network Architecture and Parallel I/Os (SNAPI'04). In particular, we would like to thank the authors for submitting their research work to the workshop and to share their ideas and technical contributions with us and the I/O research community. Storage systems have evolved over five decades that have witnessed dramatic technological advances, changes in customer requirements, and emerging engineering challenges. In this workshop, 9 high-quality papers discuss some of the major issues facing the storage industry today, and describe a range of solutions for dealing with these issues. Ajay Gulati and Peter Varman introduce a model of disk bandwidth allocation, and provide efficient scheduling algorithms to assign the bandwidth among the concurrent applications with QoS constraints. Andre Brinkmann et al. use a similar economical motivation that inspired the original RAID in 1988 to propose to virtualize multiple RAIDs with small capacity into a large one. Jose Luis Gonzalez et al. propose an algorithm to add N disks to a RAID 5 while it continues running. Fujita Tomonori and Ogawara Masanori examine the current complicated implementations of iSCSI protocols and design a new simple one without sacrificing the efficiency. Jianqi Tang et al. provide a new solution for out-of-core applications and extend the problem size so that a cluster can solve. Peter Bleckmann et al. design an intermediate iSCSI-enabled device that deploys prefetching</p>

strategies in combination with redundant disks to reduce the I/O latency in the wide area network. Yifeng Zhu overviews the new and promising storage technology MEMS and presents its potential research issues for computer scientists and engineers. Energy is one of the most critical issues for storage systems. Dong Li et al. exploit file access locality to migrate files between a conventional file system and a customized one to save energy. Peng Gu et al. propose a novel solution to boost intra-cluster communication performance by innovatively developing a RDMA-enabled collaborative I/O cache.
