Welcome to the on-line proceedings of NOSSDAV'95!

Revised, and now available in print as Lecture Notes in Computer Science 1018 (Springer-Verlag)!

Advance Reservation Systems, Chair: Kevin Jeffay

- Advance Reservations for Predicted Service, M. Degemark, T. Kohler, S. Pink and O. Schelen
- Distributed Advance Reservation of Real-Time Connections, D. Ferrari, A. Gupta and G. Ventre
- Issues of Reserving Resources in Advance, L. Wolf, L. Delgrossi, R. Steinmetz, S. Schaller and H. Wittig

Operating System Support, Chair: Duane Northcutt

- A Computational and Engineering View on Open Distributed Real-Time Multimedia Exchange, P. Leydekkers, V. Gay and L. Franken
- A Rate-Based Execution Abstraction for Multimedia Computing, K. Jeffay and D. Bennett
- VuSystem Performance Measurements, C.J. Lindblad
- Design of Universal Continuous Media I/O*, C.D. Cranor and G.M. Parulkar

Resource Management and Quality of Service, Chair: Aurel Lazar

- Meeting Arbitrary QoS Constraints Using Dynamic Rate Shaping of Coded Digital Video, A. Eleftheriadis and D. Anastassiou
- Dynamic QoS Management for Scalable Video Flows, A. Campbell, D. Hutchinson and C. Aurrecoechea
- Dynamic Service Aggregation for Efficient Use of Resources in Interactive Video Delivery, S. D. Venkatesh and T.D.C. Little
- System-Level Resource Management for Network-Based Multimedia Applications, L. Schreier and M. Davis

NOSSDAV Retrospective, Chairs: Domenico Ferrari and Dan Swinehart

Audio and Video Systems, Chair: Raj Yavatkar

- An End-to-End Software Only Scalable Video Delivery System, N. Chaddha, G. Wall and B. Schmidt
- A Distributed Real-Time MPEG Audio Player, S. Cen, C. Pu, R. Staehli, C. Cowan and J. Walpole
- Analysis of Audio Packet Loss over Packet-Switched Networks, C. Bolot, H. Crepin and A. Garcia
- **Workstation Video Playback Performance with Competitive Process Load**, K. Fall, J. Pasquale and S. McCanne

### Scheduling and Synchronization, Chair: Chuck Kalmanek

- **A Method and Apparatus for Measuring Media Synchronization**, B. Schmidt, J. Northcutt, and M. Lam
- **Integrated Processor Scheduling for Multimedia**, J. Nieh and M.S. Lam
- **Scheduling and Admission Testing for Jitter Constrained Periodic Threads**, A. Mauthe and G. Coulson
- **A CPU Scheduling Algorithm for Continuous Media Applications**, R. Yavatkar and K. Lakshman

### Multicasting, Chair: Jim Kurose

- **Dynamic Configuration of Conferencing Applications Using Pattern-Matching Multicast**, H. Schulzrinne
- **Wave: A New Multicast Routing Algorithm for Static and Dynamic Multicast Groups**, E. Biersack and J. Nonnenmacher
- **The Role of Multicast Communication in the Provision of Scalable and Interactive Video-on-Demand Service**, K.C. Almeroth and M.H. Ammar

### Invited Panelists

### Network Scheduling and Real-Time Networking Chair: Steve Pink

- **A New Approach to Support VBR Video in Packet Switched Networks**, H. Zhang and E.W. Knightly
- **Determining End-to-End Delay Bounds in Heterogeneous Networks**, P. Goyal, S. Lam and H. Vin
- **Adaptive QoS-Based API for ATM Networking**, V. Bansal, R.J.Siracusua, J.P. Hearn, G. Ramamurthy and D. Raychaudhuri
- **The Case Against Variable Bit Rate Service**, M. Grossglauser, S. Keshav and D. Tse

### Storage Architectures, Chair: Jon Walpole

- **A Novel Video-on-demand Storage Architecture for Supporting Constant Frame Rate with Variable Bit Rate Retrieval**, S.W. Lau and J.C.S. Lui
- **Efficient Data Layout, Scheduling and Playout Control in a Multimedia Storage Server**, M.M. Buddhikot and G. Parulkar
- **Storage Replication and Layout in Video-on-Demand Servers**, S. Stoller and J. DeTreville
- **Scalable MPEG2 Video Servers with Heterogeneous QoS on Parallel Disk Arrays**, S. Paek, P. Bocheck and S. Chang
- **Design of a Variable Bit Rate Continuous Media Server**, G. Neufeld, D. Makaroff and N. Hutchinson