

## Large Scale Communication Networks Tutorials

### Tuesday March 12, 2002

- 8:30 *Network Architectures - Design Principles, Evolution and Theory*
- 8:30–9:25 *Check-In/Light Breakfast (Hosted by IPAM)*
- 9:25–9:30 *Welcome Remarks - Mark Green/Walter Willinger*
- 9:30–11:30 **Bob Braden** (USC Information Sciences Institute)  
*Architectural principles of the Internet*
- 11:30–1:00 *Lunch (on your own)*
- 1:00–3:00 **Fernando Paganini** (UCLA)  
*Control Theory and Congestion*
- 3:00–3:30 *Coffee Break*
- 3:30–5:30 **John Doyle** (California Institute of Technology)  
*Toward a theory of complex networks*

### Wednesday March 13, 2002

- 8:30 *Network Protocols - Design and Dynamics*
- 9:00–9:30 *Continental Breakfast*
- 9:30–11:30 **Tim Griffin** (AT&T)  
*IP Routing*
- 11:30–1:00 *Lunch (on your own)*
- 1:00–3:00 **Steven Low** (California Institute of Technology)  
*TCP Congestion Control: Algorithms & Models*
- 3:00–3:30 *Coffee Break*
- 3:30–5:30 **Erich Nahum** (IBM Watson Research Center)  
*Web Servers: Implementation and Performance*



## Thursday March 14, 2002

- 8:30 *Network Simulations - Tools, Topology and Morphology*
- 9:00–9:30 *Continental Breakfast*
- 9:30–10:30 **John Heidemann** (University of Southern California)  
*ns Tutorial: Case Studies*
- 10:30–11:30 **Polly Huang** (ETH, Zurich)  
*Network modeling and traffic analysis with ns-2*
- 11:30–1:00 *Lunch (hosted by IPAM)*
- 1:00–2:00 **Rajive Bagrodia** (UCLA)  
*Large-scale network simulation engines: QualNet*
- 2:00–3:00 **BJ Premore** (Dartmouth College)  
*SSFNet and Routing Simulation*
- 3:00–3:30 *Coffee Break*
- 3:30–5:30 **Ellen Zegura** (Georgia Institute of Technology)  
*Modeling Internet Topology*

## Friday March 15, 2002

- 8:30 *Network Measurements - Data, Inference, and Analysis*
- 8:30–9:00 *Continental Breakfast*
- 9:30–11:30 **Paul Barford** (University of Wisconsin)  
*Network-wide Measurement Infrastructures*
- 11:30–12:30 *Lunch (on your own)*
- 12:30–2:30 **Jennifer Rexford** (AT&T)  
*Traffic Measurement for Network Operations*
- 2:30–3:00 *Coffee Break*
- 3:00–5:00 **David Donoho** (Stanford University)  
*Network measurements: Inference and Analysis*
- 5:00–12:00 *Conclusion*

