

Marcus A. Louie

Carnegie Mellon University
5000 Forbes Ave.
Baker Hall 129
Pittsburgh, PA 15213

Office: +1 412-268-4765
Mobile: +1 412-916-3871
Email: mlouie@andrew.cmu.edu

- Research Interests** Dynamic network analysis; dynamic-network multi-agent models, alliance formation among sub-national groups, human security; nation-state failure; model-to-model comparison, docking, model replication; simulation validation.
- Education** Ph.D., Engineering and Public Policy (expected May 2008)
Carnegie Mellon University
Thesis: Developing a Relational Theory of Intra-State Conflict Dynamics: How Coalitions are Formed and Utilized
Thesis Chair: Dr. Kathleen M. Carley, Professor of Computation, Organization and Society at Carnegie Mellon
- B.S., Computer Science (*College Honors*)
Carnegie Mellon University
- Peer-reviewed Papers** Marcus A. Louie and Kathleen M. Carley (2008). "Balancing the Criticisms: Validating Multi-Agent Models of Social Systems." *Simulation Modelling Practice and Theory* 16(2): 242 - 256.
- Peer-review Presentations** Marcus A. Louie, Kathleen M. Carley (2004). VISualizations of Threats and Attacks (VISTA): A Decision Support Tool for Urban Threat Environments. In Proceedings of the North American Association for Computational Social and Organizational Science 2004, Pittsburgh, PA
- Marcus A. Louie, Kathleen M. Carley, Laleh Haghshenass, John C. Kunz, Raymond E. Levitt (2003). Model Comparisons: Docking ORGAHEAD and SimVision. In Proceedings of the North American Association for Computational Social and Organizational Science 2003, Pittsburgh, PA
- Marcus A. Louie, Kathleen M. Carley, Raymond E. Levitt, John C. Kunz, Ashwin Mahalingam (2002). Docking the Virtual Design Team and ORGAHEAD. In Proceedings of the Conference on Computational Analysis of Social and Organizational Systems, Pittsburgh, PA
- Technical Reports** Marcus A. Louie and Kathleen M. Carley (2007). The Role of Dynamic-Network Multi-Agent Models of Socio-Political Systems in Policy. Pittsburgh, PA, Institute for Software Research, School of Computer Science, Carnegie Mellon University: CMU-ISRI-07-102
- Kathleen M. Carley, Marcus A. Louie and Michael P. O'Connor (2004). VISualization of Threats and Attacks (VISTA): A Decision Support Tool for Urban Threat Environments. Pittsburgh, PA, Institute for Software Research, School of Computer Science, Carnegie Mellon University: CMU-ISRI-04-103
- Michael J. Ashworth and Marcus A. Louie (2002). "Alignment of the Garbage Can and NK Fitness Models: A Virtual Experiment in the Simulation of Organizations," Carnegie Mellon University.

