SRIRAM KARTHIK BADAM

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EDUCATION

Direct Ph.D. **(GPA: 3.81 / 4.0)**
Purdue University
West Lafayette, IN, USA

School of Electrical and Computer Engineering
Aug 2012 – present

Bachelor of Technology **(GPA: 8.78 / 10.0)**
Indian Institute of Technology Hyderabad (IITH)
Hyderabad, India

Department of Computer Science and Engineering
Aug 2008 – May 2012

PROFESSIONAL EXPERIENCE

Purdue University
Graduate Research Assistant

West Lafayette, IN, USA
Sep 2012 – present

- Working under the supervision of **Dr. Niklas Elmqvist**, Assistant Professor at Purdue University

SKILLS

Expert at C, C++, Java, C#, Python; HTML, JS, CSS; Matlab;

PUBLICATIONS

Journal Papers (peer-reviewed)

J1. E. R. Fisher, S. K. Badam, N. Elmqvist. Designing Peer-to-Peer Distributed User Interfaces: Case Studies on Building Distributed Applications. *International Journal of Human-Computer Studies,* 72(1): 100-110, 2013.

Conference Papers (peer-reviewed)

C1. Z. Zhao, S. K. Badam, S. Chandrasegaran, D. G. Park, N. Elmqvist, L. Kisselburgh, and K. Ramani. skWiki: A Multimedia Sketching System for Collaborative Creativity. *Proceedings of the ACM CHI Conference on Human Factors in Computing Systems,* 2014.

C2. S. K. Badam, S. Chandrasegaran, N. Elmqvist, and K. Ramani. Tracing and Sketching Performance using Blunt-tipped Styli on Direct-Touch Tablets. *Proceedings of the ACM Conference on Advanced Visual Interfaces, to appear* May, 2014.

CURRENT PROJECTS

PolyChrome (submitted to IEEE InfoVis 2014)

PolyChrome is an application framework for creating **web-based collaborative visualizations** on multiple devices. The PolyChrome system consists of three distinct components: (1) a **distributed web browser** framework supporting co-browsing for both new collaborative visualizations as well as legacy websites (via proxy server); (2) a **web developer API** for building new collaborative web applications supporting multiple devices with different capabilities, displays, and modalities; (3) server-side modules storing state and interaction events for **consistency management** in synchronous collaboration and for interaction replay in asynchronous collaboration.

Proxemic Lenses (submitted to IEEE InfoVis 2014)

Proxemic Lens is an **interaction technique** for exploring **multi-scale visualizations** using explicit **gestures** as well as **proxemics**: the spatial relations between people and physical artifacts such as their distance, orientation, and movement. This technique is intended for collaborative environments with large wall displays and is based on **focus+context lenses** that show a detailed view of selected content from an overview visualization. Each lens is controlled by both proxemics and gestures.

UNDERGRADUATE MAJOR PROJECT

Mobile Applications for DISANET

DISANET - **Information Network for Natural Disaster Mitigation and Recovery**, is a joint research project between India and Japan on the use of information and communications technology to mitigate the after-effects of natural disasters.

As a part of this research group, I developed mobile applications for victim registration to support rescue and recovery operations. As a common platform for such applications, under the guidance of my advisors, I designed a data synchronization protocol for post-disaster situations using multi-hop, peer-to-peer communication.

Advised by: Dr. Ravindra Guravannavar and Dr. Naveen Sivadasan, Assistant Professors at IITH.

HONORS AND AWARDS

- University of Tokyo - Mori Seiki Co. IIT **Undergraduate Scholarship** for the years 2009-10, 2010-11 (Also known as '**Todai IIT Scholarship**').

REFERENCES

- **Niklas Elmqvist**, Assistant Professor, Purdue University. email: elm@purdue.edu
- **Avinash C. Kak**, Professor, Purdue University. email: kak@purdue.edu