

LEXING XIE

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EDUCATION BACKGROUND

Columbia University, New York, NY	Electrical Engineering	PhD	Aug 2005
Thesis: "Unsupervised Pattern Discovery for Multimedia Sequences" Advisor: Shih-Fu Chang			
Columbia University, New York, NY	Electrical Engineering	MS	Dec 2001
Tsinghua University, Beijing, China	Electronic Engineering	BE	June 2000

EMPLOYMENT HISTORY

2010.12 -	Lecturer-Senior Lecturer-Associate Professor Computer Science, Australian National University
2007-2010	Research Staff Member, IBM T J Watson Research Center, Hawthorne, NY
2007-2009	Adjunct Assistant Professor, Dept. of Electrical Engineering, Columbia University.
2005-2006	Josef Raviv Postdoc Fellow, IBM T J Watson Research Center.
2003 summer	Research Intern, Microsoft Research, Cambridge, UK.

RESEARCH INTERESTS

- Social media analysis, multimedia knowledge representation, vision and language
- Machine learning on unstructured data, time series, and graphs

SELECTED AWARDS AND HONORS

- **Chris Wallace Award for Outstanding Research**, 2018
- **IEEE Circuits and Systems Society Distinguished Lecturer**, 2016-2017
- **Best Paper Award**, 2011 IEEE International Conference on Service Operations and Logistics, and Informatics (IEEE SOLI), July 2011, Beijing
- **Best Student Paper Awards**
 - Pacific-Asia Conference on Knowledge Discovery and Data Mining (PAKDD) 2015
 - ACM-IEEE Joint Conference on Digital Libraries (JCDL) 2007, July 2007
 - ACM Multimedia 2005 (ACM MM), Singapore, November 2005
 - IEEE International Conference on Image Processing (ICIP) 2004, October 2004.
 - ACM Multimedia (ACM MM), Juan Les-Pins, France, Dec. 2002.
- **IBM Patent Challenge Award**, January 2010
- **IBM Research 2005 Josef Raviv Memorial Postdoctoral Fellowship**, Oct 2005- Dec 2006.

SELECTED GRANTS

- Australian Research Council Discovery Project, "Promoting fairness in online attention" AUD 330K, lead-PI, 2018-2020
- US Air Force Research Office, "The Anatomy of Social Media Popularity?" lead PI, USD 555K, 2015-2018
- Data61 Collaborative Project, AUD 60K + support for three PhD students, sole-PI, 2012-2020
- Data-to-Decision CRC, "Picturing Everyday Knowledge", sole-PI, 2016-2019, AUD 640K
- Australian Research Council Discovery Project, "Analyzing trajectories in complex information spaces" AUD 440K, lead-PI, 2014-2016

- Department of Innovation, Australia-China Science and Research Fund (ACSRF), “Machine Learning for Social Media and Computational Social Science”, lead PI, A\$86K, Apr-Oct 2013
- IARPA ALADDIN Program on Video Event Recognition, key personnel, 2010-11

SELECTED RECENT PUBLICATIONS

Publications summary: My 60+ cited publications has 4300+ citations, H-index 29. In addition, there are 4 granted and 6 pending patents. Full list at <http://cm.cecs.anu.edu.au/publications/>

- [1] A Mathews, L Xie, X He, “SemStyle: Learning to Generate Stylised Image Captions using Unaligned Text”, Conf on Computer Vision and Pattern Recognition (CVPR) 2018
- [2] Rizoïu, M.; Mishra, S.; Kong, Q.; Carman, M.; and Xie, L., SIR-Hawkes: on the Relationship Between Epidemic Models and Hawkes Point Processes. WWW 2018: The 2018 Web Conference, Lyon, France, 2018.
- [3] Wu, S.; Rizoïu, M.; and Xie, L., Beyond Views: Measuring and Predicting Engagement in Online Videos. Intl. AAAI Conf. on Web and Social Media (ICWSM '18), Stanford, CA, 2018.
- [4] Toyer, S.; Trevizan, F.; Thiébaux, S.; and Xie, L, Action Schema Networks: Generalised Policies with Deep Learning. AAAI Conference on Artificial Intelligence (AAAI), New Orleans, 2018.
- [5] M.-A. Rizoïu, L. Xie, S Sanner, Cebrian, M.; Yu, H.; and Van Hentenryck, P. “Expecting to be HIP: Hawkes Intensity Processes for Social Media Popularity. “ Intl Conf. World Wide Web 2017 (WWW '17), pages 735--744, Perth, Australia, 2017.
- [6] M.-A. Rizoïu, L. Xie, “Online Popularity under Promotion: Viral Potential, Forecasting, and the Economics of Time”. Intl AAAI Conf. Web and Social Media (ICWSM), Montreal, 2017.
- [7] M.-A. Rizoïu, L. Xie, T. Caetano, M. Cebrian, "Evolution of Privacy Loss on Wikipedia", ACM Conf. Web Search and Data Mining (WSDM), 2016
- [8] A Mathews, L Xie, X He, “SentiCap: Generating Image Descriptions with Sentiments”, AAAI 2016, Feb 2016
- [9] H Yu, L Xie, S Sanner, “The Lifecycle of a YouTube Video: Phases, Content and Popularity”, AAAI Intl. Conf. Weblogs and Social Media (ICWSM) 2015, May 2015
- [10] C Chen, W. Buntine, N. Ding, L. Xie, L. Du, “Differential Topic Models”, IEEE Trans. Pattern Analysis and Machine Intelligence (PAMI) Feb, 2015

RECENT INVITED TALKS

- IEEE CAS Distinguished Lecture, Nanyang Technological University, Singapore, May 2017
- Invited speaker, Microsoft Research Asia Faculty Summit, Seoul, Korea, Nov 2016
- Tutorial speaker, “Learning Knowledge Bases for Text and Multimedia”, ACM Multimedia'15
- Invited speaker, Workshop on Frontiers of Multimedia, ACM Multimedia, Oct 2015

RECENT PROFESSIONAL SERVICES

- **Editorial Board Member**, PeerJ Computer Science, 2015-
- **Associate Editor**, IEEE Transactions on Multimedia, 2013-2016; ACM TOMM (Trans. Multimedia Comp.), 2012-2018; ACM TiiS (Trans. Intelligent Interaction Sys), 2015-
- **Workshop Chair**, ACM Multimedia 2015-2016, **Tutorial Chair**, ACM Multimedia 2013; **Area Chair**, ACM Multimedia 2011, 2012, 2014
- **Workshop and Tutorial Chair**, ACML, Asian Conf. on Machine Learning, 2013.
- **IBM Research Campus Relationship Manager** for Columbia University, 2008-2010
- **US NSF (National Science Foundation) Referee, IIS and International Program, 2009-2011**
- **TPC Member and Reviewer** for major multimedia, machine learning, web, social media, information retrieval journals and conferences.