

KDD 2014

# 2nd Workshop on User Engagement Optimization

## Organizer

Liangjie Hong - Research Scientist, Yahoo Labs

Shuang-Hong Yang - Research Scientist, Twitter Inc.

Amr Ahmed - Research Scientist, Google Research

# Research in #UEO

Industry

Academic

Product

System

Machine learning

Theory

Scalability

Models

Experiments

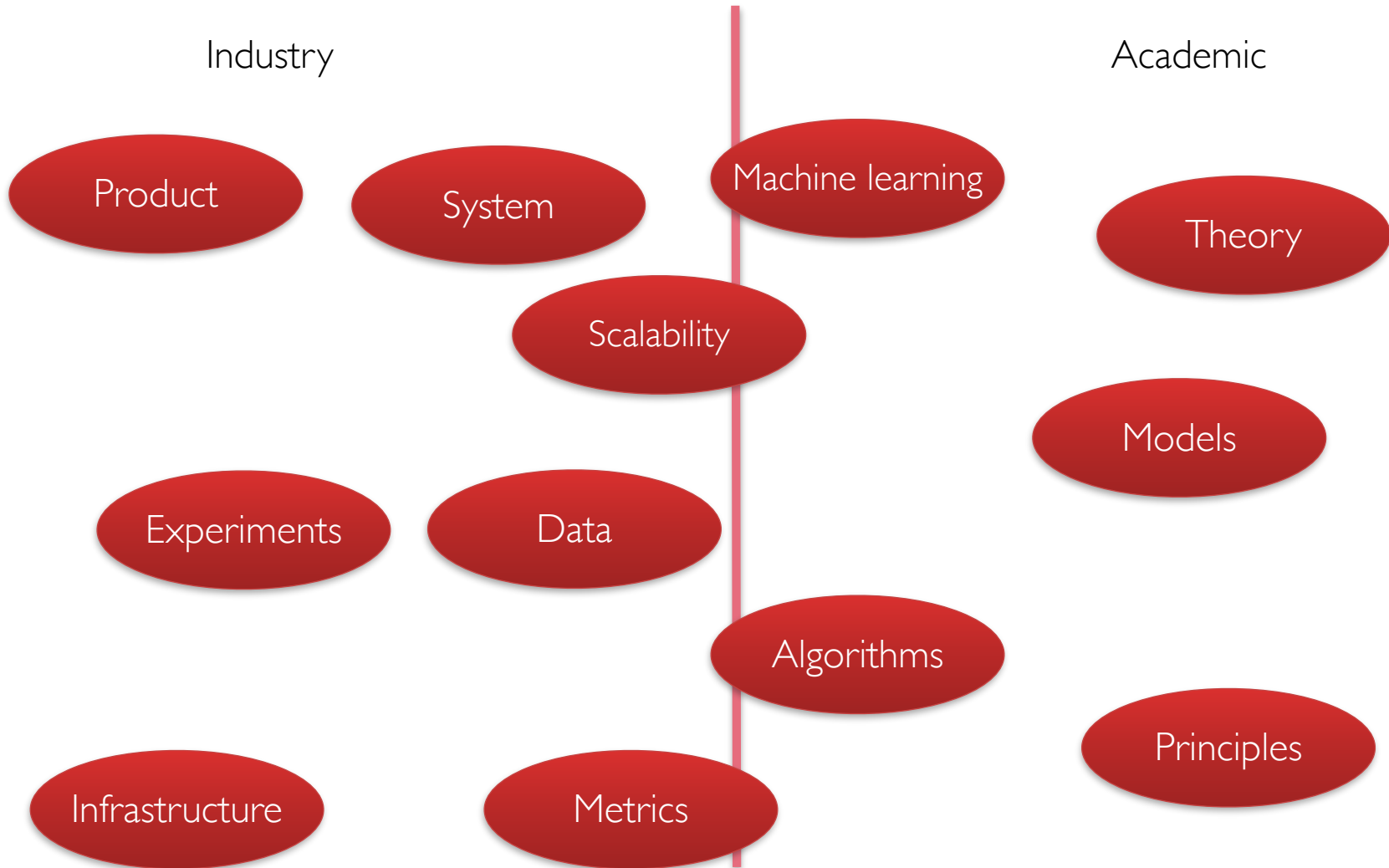
Data

Algorithms

Principles

Infrastructure

Metrics



# Research in #UEO

Industry



# Research in #UEO

Industry



# Research in #UEO

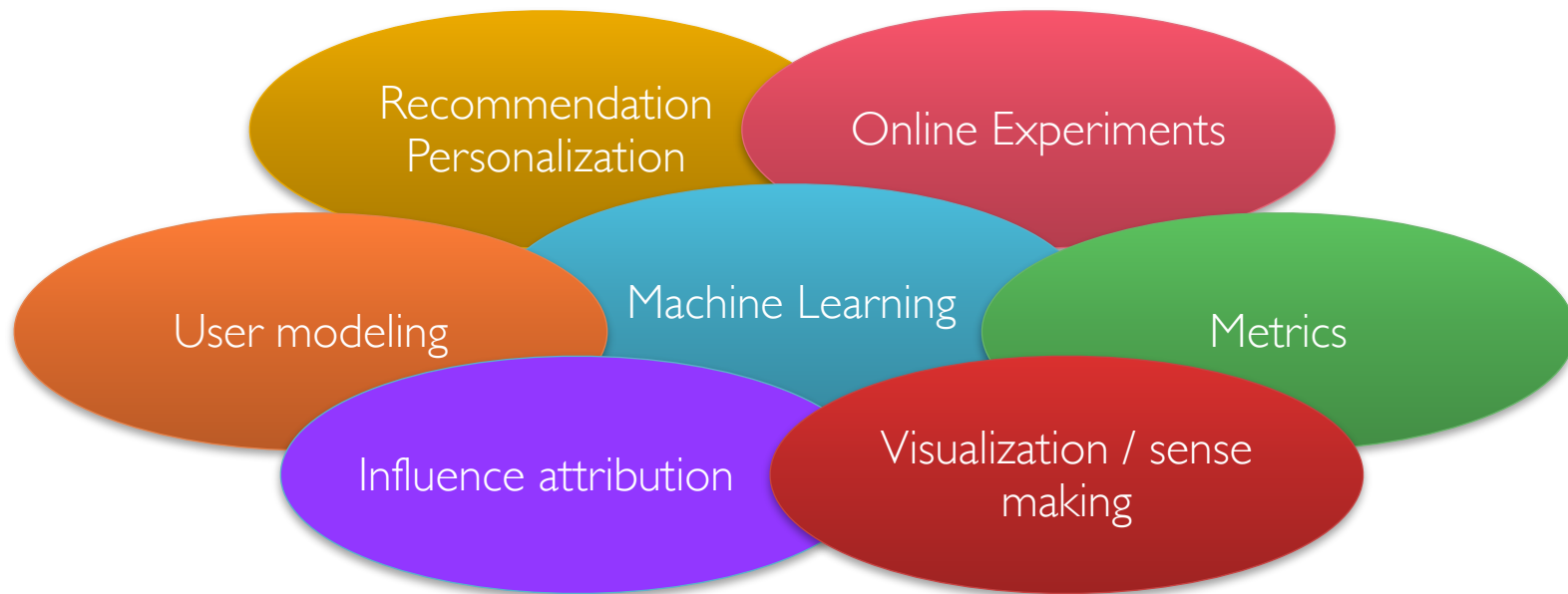
Industry



Academic



# #UEO Workshop



# The 1<sup>st</sup> UEO Workshop at CIKM 2013

## Invited Speakers

**Deepak Agarwal**, Director of Engineering, Machine Learning - LinkedIn Corp.  
Recommending Items to Users: An Explore/Exploit Perspective

**Alek Kolcz**, Senior Staff Data Scientist - Twitter Inc.  
Understanding Twitter Users by Understanding Twitter Content

**Yi Zhang**, Associate Professor of Computer Science – UCSC  
Personalized Recommendation: Machine Learning and Economics

**Ronny Kohavi**, Partner Architect – Microsoft's Online Services Division  
Online Controlled Experiments: Introduction, Insights, Scaling, and Humbling Statistics

**Caitlin Smallwood**, Director of Consumer Science and Analytics – Netflix  
Netflix Optimization: A Confluence of Metrics, Algorithms, and Experimentation

# The 1<sup>st</sup> UEO Workshop at CIKM 2013

## Contributed Presentations

**Janette Lehmann, Mounia Lalma, Ricardo Baeza-Yates, Elad Yom-Tov**

Yahoo Labs

Networked User Engagement

**Jia Huang, Xiaohua Hu**

Drexel University

Information Passing in Online Recommendation

**Ariyam Das, Harish Ranganath**

Yahoo Labs

When Web Personalization Misleads Bucket Testing

**Marina Danilevsky, Eunyee Koh**

Adobe Lab

Information Graph Model and Application to Online Advertising

**Balaji Vasan Srinivasan, Anandhavelu Natarajan, Ritwik Sinha, Vineet Gupta,**

**Shriram Revankar, Balaraman Ravindran**

Adobe Lab

Will your Facebook post be engaging?



# The 2<sup>nd</sup> UEO Workshop at KDD 2014

## Invited Talks



**Lihong Li, Researcher at Microsoft Research**

Multi-armed Bandits on the Internet: Successes, Lessons and Challenges

8:45AM – 9:30AM



**Alex Smola, Researcher at Google and Professor at Carnegie Mellon University**

Least mean squares matrix completion considered harmful or  
Do you really need to know how much I hate "Notting Hill"?

10:30AM – 11:15AM



**Lars Backstrom, Engineering Manager at Facebook**

Generating a Billion Personal Newspapers: News Feed Ranking at Facebook

2:00PM – 2:45PM



**Suju Rajan, Senior Manager of Personalization Sciences at Yahoo Labs**

Making the Stream a Daily Habit : Optimizing for Long Term Behavior

4:00PM – 4:45PM

# The 2<sup>nd</sup> UEO Workshop at KDD 2014

## Contributed Presentations

**Luo Lu – Twitter Inc., Chang Liu – Twitter Inc.**

Separation Strategies for Three Pitfalls in A/B Testing

**Pengyuan Wang – Yahoo Labs.**

A Unified Framework for Evaluating Online User Treatment Effectiveness, with Advertising Application

**Amit Goyal et al. – Twitter Inc**

Detecting User Interests on Twitter via Seed Set Expansion

**Eunye Koh – Adobe, Neha Gupta – Adobe**

An Empirical Evaluation of Ensemble Decision Trees to Improve Personalization on Advertisement

**Athanasios Noulas – Booking.Com, Mats Einarsen – Booking.Com**

User Engagement through Topic Modelling

**El Mehdi Rochd et al. – Aix-Marseille University**

A Topic Model-based Personalization Over Time

**Krishna Kamath et al. – Twitter Inc.**

RealGraph: User Interaction Prediction at Twitter

**Arvind Agarwal – Palo Alto Research Center, Saurabh Kataria – Palo Alto Research Center**

Multi-Task CRF Model for Predicting Issue Resolution Status in Social Media based Customer Care

# (Coffee) Break

10:00AM – 10:30AM - Morning Break

12:25PM – 2:00PM - Noon Break

3:35PM – 4:00PM - Afternoon Break



# Program Committee

Mounia Lalmas – Principle Research Scientist, Yahoo Labs  
Georges Dupret — Senior Research Scientist, Yahoo Labs  
Hongning Wang — Assistant Professor, University of Virginia  
Jian Wang — Senior Applied Researcher, LinkedIn  
Gungor Polatkan — Senior Research Scientist, Twitter Inc.  
Dan Zhang — Research Scientist, Facebook  
Praveen Bommanavar — Data Scientist, Twitter Inc.  
Bo Long — Staff Researcher Scientist, LinkedIn  
Pengyuan Wang – Research Scientist, Yahoo Labs  
Luo Lu — Data Scientist, Twitter Inc.