Social Media Mining

Twitter

Collaborating with [Bodong Chen](http://meefen.github.io/), assistant professor in Learning Technologies at the University of Minnesota and [Xin Chen](http://web.ics.purdue.edu/~chen654/), PhD candidate in Engineering Education at Purdue University, we aim to uncover new insights about the learning analytics community by analyzing Twitter archives from the past four Learning Analytics and Knowledge (LAK) conferences.

Through descriptive analysis, interaction network analysis, hashtag analysis, and topic modeling of 10,736 tweets by 1,217 unique Twitter users, we found: extended coverage of the community over the years; increasing interactions among its members regard less of peripheral and in-persistent participation; increasingly dense, connected and balanced social networks; and more and more diverse research topics.

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Yammer

Collaborating with [Marcela Borge](https://www.ed.psu.edu/directory/mbs15), assistant professor in Learning Sciences at Penn State University, we evaluated a theoretically informed approach to using Social Media (Yammer) as a means to support the development of a community of learners in an introductory human computer interaction course.

Our primary design goals were (1) to use the social media environment to help develop a learning community that lived outside of and yet fed into the classroom environment and (2) to connect classroom to real world experiences in ways that students could explore in personally meaningful ways. We hypothesized that we could create opportunities for collective sense-making and reflection through these connected experiences. Social network, communication analysis, and multivariate analysis were used to examine the form and function of social interactions in Yammer.

Relying on multivariate analysis, social network analysis and qualitative communication analysis, the results suggest that the theoretically informed approach to using Yammer succeeded in encouraging processes associated with a community of learners. The methods used in this paper may contribute to more effective ways of assessing the quality of discourse in socio-technical environments and the findings provide potential models for using social media as new contexts for developing conceptualization and discourse practices.

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Relevant publications

Check out the [Twitter paper](https://conservancy.umn.edu/bitstream/handle/11299/170829/lak15.pdf;jsessionid=A9A88C62A94F1DD732CAC1661804D440?sequence=1) published in ACM Learning Analytics and Knowledge (LAK). The Yammer paper is currently under development.