

Hacking the Hackathon

Alan Mark Berg

ICTS, University of Amsterdam
a.m.berg@uva.nl

ABSTRACT: Hacking the hackathon: How do we increase the positive influence of the LAK hackathons and better embed into the broader context of the discussion between the Research and practitioner communities? How do we accelerate the trajectory of research impacting on the features and practices around Educational software? This submission explores the mission, organisation and help packages of hackathons to support persistence of effort and continuous exploration of research themes that have the immediate benefit to the enrichment of real systems.

Keywords: Hackathon, Community, Agile, Continuous

1 INTRODUCTION

The LAK hackathon¹(Cooper et al., 2016) is in its fourth incarnation. We have successfully supported; the development² of standard profiles for xAPI (Berg et al., 2016a), a discussion around synthetic data generation (Berg et al., 2016b), open source software such as the Apereo Learning Analytics Initiative³ and the connectivist toolkit (Kitto et al, 2015) and delivered feedback on LA specific themes associated with the learners practices and dashboarding. JISC⁴ and the Apereo Foundation⁵ have in the past kindly provided infrastructure or logistic support and have in return had a timely delivery of feedback for example on the Jisc Student app⁶ or their infrastructure (Sclater, Berg & Webb, 2015).

Each year we strive to improve the value of the hackathon to the research and practitioner communities and amplify the effect of the participants collective experiences. For example, this year for the first time we have a call for proposal for research questions which, we will publish as part of the conference proceedings. We also have at least two pre-hackathon hackathons one in Holland and the other in Australia that will feed their collected experience into the LAK hackathon.

To continue with the improvement of these linked events we wish you to hack at the hackathon by answering the following interrelated research questions:

¹ <https://lakhackathon.wordpress.com>

² <https://lakhackathon.wordpress.com/about/history/>

³ <https://www.apereo.org/communities/learning-analytics-initiative>

⁴ <https://www.jisc.ac.uk>

⁵ <https://www.apereo.org>

⁶ <https://analytics.jiscinvolve.org/wp/2015/08/21/student-app-for-learning-analytics-functionality-and-wireframes>

RQ1: Whom are our target audiences?

RQ2: What is the mission of a permanent space for LA hackathons?

RQ3: How do we fund the mission?

RQ4: How do we organise a permanent space?

RQ5: How do we scaleup any promising findings?

RQ6: How do we persist research questions and associated artifacts across hackathons?

RQ7: What is the definition of a hackathon support package?

Support and data: The hackathon website is permanent and is incrementally improved as new materials and idea's become available. A GitHub location provides a safe coordinating space for the improvements of supporting material. GitHub is also a marshalling point for evidence collected across hackathons. Twitter's role is to advertise critical moments in the event, for example for submission dates for the Call For Proposals (CFP) and potentially we should incorporate communication via Twitter into the main hackathon event. Materials that are available from previous hackathons includes documentation, howto's, code and test plans and an example data generator. We currently expect a significant expansion of available datasets due to the nature of the CFP where we ask the authors to state their logistics and share explicitly.

Methodology: Currently, after a short introduction to potential themes and the supporting materials and practices, the audience organise themselves into groups. The organiser's of the hackathons divide themselves between the teams and support their activities. A couple of times a day the groups discuss together the progress they make, and a summary is prepared. Evidence and software artefacts are permanently stored on Github. This year we also have the opportunity to incorporate the materials generated from the pre-hackathons and defined by the submissions to the workshop. The presentations are expressing global themes that researchers in the field can collaborate and as such have the potential to focus broader efforts lasting longer than the hackathons themselves. We should consider reviewing the value of the digital traces and more determinedly collect data sources for re-use by other events.

2 **IMPACT**

When LA themed hackathons are successfully linked, we can develop a community adopted strategy guide which provides defined objectives, goals and milestones. When these goals are adequately funded, we stimulate the flow of actionable research towards adoption and accelerate the benefits to students, teachers and society.

3 **ACKNOWLEDGEMENTS**

The organisers gratefully acknowledge the logistical support of Jisc, the Apereo Foundation and SOLAR and the conference and especially the hackathon organisers some of whom we mention in this link⁷ including Adam Cooper, Kirsty Kitto and Niall Sclater.

⁷ <https://lakhackathon.wordpress.com/organisers/>

4 REFERENCES

- Berg, A., Scheffel, M., Drachsler, H., Ternier, S., & Specht, M. (2016a). The dutch xAPI experience. In *Proceedings of the Sixth International Conference on Learning Analytics & Knowledge - LAK '16* (pp. 544–545). New York, New York, USA: ACM Press. <https://doi.org/10.1145/2883851.2883968>
- Berg, A. M., Mol, S. T., Kismihók, G., & Sclater, N. (2016b). The role of a reference synthetic data generator within the field of learning analytics. *Journal of Learning Analytics, 3*, 107–128. <https://doi.org/10.18608/jla.2016.31.7>
- Cooper, A., Berg, A., Sclater, N., Dorey-Elias, T., & Kitto, K. (2017). *LAK17 hackathon*. In Proceedings of the Seventh International Learning Analytics & Knowledge Conference on - LAK '17 (pp. 514–515). New York, New York, USA: ACM Press. <https://doi.org/10.1145/3027385.3029435>
- Kitto, K., Cross, S., Waters, Z., & Lupton, M. (2015). Learning analytics beyond the LMS. In *Proceedings of the Fifth International Conference on Learning Analytics And Knowledge - LAK '15* (pp. 11–15). New York, New York, USA: ACM Press. <https://doi.org/10.1145/2723576.2723627>
- Sclater, N., Berg, A., & Webb, M. (2015). Developing an open architecture for learning analytics. *Proceedings of the EUNIS 2015 Congress*. [https://doi.org/ISSN: 2409-1340](https://doi.org/ISSN:2409-1340)