





## Ethical Review Report 2 Deliverable D10.3

# FaSMEd Independent Ethical Advisor: Professor Vivienne Marie Baumfield

Centre for Research in Professional Learning
Graduate School of Education
University of Exeter

December 2016

FaSMEd: Improving progress for lower achievers through Formative Assessment in Science and Mathematics Education

Grant agreement no: 612337

### The FaSMEd project aims and methods

The FaSMEd project worked in partnership with researchers and educators from eight countries to explore the use of technology by teachers in raising attainment levels among the lowest achieving students by engaging in formative assessment. From its inception, FaSMEd was identified as an international 'learning project' bringing together developers of research-informed pedagogical interventions in science and mathematics to explore how to adapt and develop their implementation at scale. The project co-ordinating team were committed to a socio-technical approach, characterized by iterative, collaborative, process-focused activities and the engagement of participants in systematic reflection and evaluation at all stages of development. The initial proposal recognised that the necessity of translating the ideas and methods of the international partners across local contexts and then extrapolating general principles would be one of the most important outcomes of the project whilst also presenting the greatest challenges. The differences in definitions, policies and practices regarding the identification of 'low attaining' students and models of teacher professionalism presented issues in the co-ordination of the parts into a meaningful whole and proved to be an early test of the project's consensual ethos.

The strategy identified in the previous Ethical Review Report (Deliverable D10.2¹) to address these areas of difficulty was the adoption of a 'redesign' stance (Ruthven, 2010); building on existing practices and research and inviting active participation in a project-wide mediation of issues regarding implementation in local contexts as and when they arise. The synergy between the research process and the principles of the intervention was maintained and grew in significance as the project developed. The 'socio-technical approach' enabled the inclusion of diverse perspectives and promoted respect for the different 'voices' of participants. It is evident from the position papers², working papers and reports of meetings that were produced that the goal of being a 'transformative' experience for everyone was realised over the lifetime of this complex project. Full use was made of a range of innovative resources, such as the film and the comic book³ designed and developed by students, to

<sup>&</sup>lt;sup>1</sup> https://research.ncl.ac.uk/fasmed/deliverables/

<sup>&</sup>lt;sup>2</sup> https://research.ncl.ac.uk/fasmed/positionpapers/

<sup>&</sup>lt;sup>3</sup> https://research.ncl.ac.uk/fasmed/disseminationactivity/FaSMEd%20Comic.pdf

communicate ideas and the process of producing these artefacts was itself informative, formative and transformative. One of the significant legacies of the project is the capture of this process through these material artefacts.

### The FaSMEd project governance structure and ethical framework

As was reported in the previous Ethical Review, the forum for resolving emerging risks and disputes in the FaSMEd project is the Steering Group (SG). The SG included the Coordinator, the Scientific Coordinator along with the Principal Investigator representing each international partner. The SG met formally at every Project Meeting to oversee the overall legal, contractual, ethical, financial and administrative management of the consortium. In addition, advice was accessed through the independent members of the Strategic Advisory Committee<sup>4</sup> and the Evaluation Team<sup>5</sup> both of which were fully appraised of emerging issues on a regular basis and invited to propose courses of action for their resolution for consideration by the SG. The Independent Ethics Advisor was also invited to attend Strategic Advisory Committee meetings and the launch conference. Unfortunately, funding constraints meant that the Ethics Advisor was not able to attend international meetings but was kept informed through email, Skype meetings and by regular reports posted in the Newsletter and on the project website.

The formal ethical procedure followed by the project co-ordinating team based at Newcastle University was in accordance with the guidelines established by the National Research Ethics Service (NRES) and ethical approval for the gathering and storing of data was granted by the University's Research Ethics Committee. Additional guidance and experience was also accessible through their membership of BERA (British Educational Research Association), the professional organisation for educational researchers in the UK. BERA's Guidelines unequivocally recognize and celebrate the diversity of approaches in educational research. They promote respect for all those who engage with it: researchers and participants, academics and professional practitioners, commissioning bodies and those who

<sup>&</sup>lt;sup>4</sup> https://research.ncl.ac.uk/fasmed/meettheteam/strategicadvisorycommittee/

<sup>&</sup>lt;sup>5</sup> https://research.ncl.ac.uk/fasmed/meettheteam/evaluationteam/

use the research. They represent the tenets of best ethical practice that continue to serve the community of educational researchers well<sup>6</sup>.

Built into the consortium agreement was provision for each international partner to obtain ethical approval for their contribution to the various work packages from their respective institution and the process was documented and monitored through the management work package. The South African partners followed the procedures of their affiliated university, Stellenbosch University, and also followed the British Educational Research Association (BERA) guidelines in the interest of consistency. Examples of the ethical conduct of the researchers can be found in the procedures for filming some of the classroom intervention activities as reported in the first report; the sub-contractor employed to capture some of the interactions was supported in negotiating an access agreement at a local level according to the school's policy and procedure. Good practice relating to research with partners in developing countries has also been observed and the contribution of the SA partner played a major role in developing approaches within the work of the project to mitigate the imposition of inappropriate Eurocentric values.

The plan outlined in the previous Ethical Review report included in the project an opportunity for consortium partners to visit South African classrooms was realised as part of the penultimate full team consortium meeting. The commitment to this aspect of the work of the project was tested by the constraints on resources, both time and money, and the imperative to complete the contracted work packages. However, the benefits in terms of the engagement with colleagues in schools in South Africa were recognised and the highlighting of the relationship between technology, low-tech tools and the use of feedback to promote learning justified the effort. The focus of the project and the reporting of outcomes was improved by the role of the South African colleagues as critical friends and the posers of testing questions as to what can and what needs to be done to realise the goals of the project.

<sup>&</sup>lt;sup>6</sup>https://www.bera.ac.uk/researchers-resources/publications/ethical-guidelines-for-educational-research-2011

#### Ethos of the project

The experience of the co-ordinating team was a feature identified as an important factor in the formation of the project's ethos and values in the previous Ethical Review Report. The Research Centre for Learning and Teaching (CfLaT)<sup>7</sup> at Newcastle University, is widely recognised for its record of working in authentic partnerships in collaborative projects. In particular the expertise in developing 'soft-links' between participants as the best guarantee of a continuous flow of information in an environment of mutual trust proved to be invaluable over the life span of FaSMEd. The combination of the use of formal means of communication (eg project newsletters<sup>8</sup>) with the extensive use of electronic media (e.g., the internal project website with file sharing capabilities); in particular, the use of Skype to maintain personal contact and promote a community of inquiry has already featured in previous comments.

During the period of the project this experience of the co-ordinating team in building and maintaining positive relationships was tested and proved more than equal to the challenge. The tenor of the meetings, both face-to-face and virtual, was guided by an inclusive ethos embedded in all aspects of the aims and working practices of the project. The Strategic Advisory Committee were employed to good effect and fully engaged in the iterative review and planning of each stage of the development of the different work packages.

In the course of the work an open and transparent approach to identifying and addressing issues was sustained. The strength of the collaborative spirit was exemplified by the way in which the use of electronic media to augment meetings was used effectively.

## **Sharing Perspectives to Mediate Understanding**

As was discussed in the first Ethical Review report, issues which emerged at the inception stage of the project posed an early test for the principles and mode of working in the FaSMEd project. As the minutes of Strategic Advisory Committee meetings report, discussions with partners revealed varying interpretations of key educational concepts in the

<sup>&</sup>lt;sup>7</sup> http://www.ncl.ac.uk/cflat/

<sup>8</sup> https://research.ncl.ac.uk/fasmed/newsletters/

previously agreed Work Packages and some of these proved intractable. However, FaSMEd as a community of researchers proved equal to the task and in keeping with the ethos of the project, devised a problem solving approach based on sharing perspectives and providing a research informed body of evidence to assist in the contextualization of experiences in practice. The researching and writing 'position papers' provided clarification and a common understanding of terms and issues. The papers promoted participation rather than opposition as key areas of expertise were recognised: partners volunteered to draft individual papers with two other partners taking responsibility for reviewing the paper and providing feedback to inform subsequent revisions. The Strategic Advisory Committee also provided the impetus for webinar discussions to promote a community of inquiry to explore emerging issues and seek a basis for shared understanding across the different research cultures and national contexts.

Additional steps to mediate understanding through enhanced communication and 'soft links' in this first period included the convening of face-to-face meetings to address issues and the meetings in Lyon and Germany assisted greatly in the scientific management of FaSMEd, by agreeing on case study analysis and developing data collection tools and developing a shared framework for analysis of the toolkit<sup>10</sup>. The meetings also developed the working practices underpinning the principle of being a 'learning project' and over the life of the project have proven to be effective in alleviating any potentially disruptions and maintaining the trajectory of the project.

It is a moot point as to whether planning at the beginning of the project could have mitigated some of the issues such as different levels of awareness regarding the importance of building professional development into the core activity of participants. However, the principle embedded in the project design that learners can articulate their own interpretations and create their own connections, proved to have a 'mirror effect' (Wikeley, 1998) in facilitating the learning of everyone involved and so had tangible 'added value'.

<sup>9</sup> https://research.ncl.ac.uk/fasmed/positionpapers/

<sup>10</sup> http://www.fasmed.eu/

The strategy in the first period of the FaSMEd project was to discuss issues as they arose openly and honestly and to maintain an emphasis on collaborative inquiry using multiple channels for communication. In the second period of FaSMEd the proposals for evaluation to support reflection on the principles and criteria that are pivotal to the scientific rigour and the ethos of collaboration were explored. Steps were taken to make better use of the project website and intranet to facilitate a community of inquiry and offset some of the cost of additional meetings. The experiences of participants in the EU SATORI project was discussed at the meeting in Germany and the criteria for evaluating engagement and the processes of participation, particularly fair deliberation, iteration and criticalness, proved to be very relevant in the subsequent stages.

The drawing out of lessons from the analysis of cases to furnish guidance for the professional development of teachers required recognition of differences in the promotion of shared understanding in a notoriously complex area. Employing 'pedagogies of engagement' alongside 'pedagogies of contingency' was as challenging as anticipated and not always fully realised. However, the processes as well as the outcomes have informed the guidance for future researchers, policy makers and practitioners in this key area of teaching and learning. The success of the participants in negotiating differences and establishing what could be 'held in common' to form a warrant for productive action without requiring consensus is one of the achievements of the project. The mode of working is a timely contribution to the development of ethical practices as outlined in the Horizon 2020 strategy advocating responsible research<sup>12</sup>. The FaSMEd project has captured elements in the development of ways of working that have relevance for public engagement and the cocreation of projects to promote the inclusion of a diversity of perspectives. The mutual learning in the mode of working resonates with the promotion of democractic, participatory action in key areas of public concern. In equal measure, FaSMEd exemplifies the tensions between processes and outcomes that such modes of working present for participants and funders.

<sup>11</sup> http://satoriproject.eu/

<sup>12</sup> https://ec.europa.eu/programmes/horizon2020/node/766

#### Deliverable D10.3: Ethical Review Report 2

It is often the messiness of real world problems that is the impetus for creativity and the challenge to be addressed, as in all such projects, is how to ensure that 'toolkits' can frame experience without constraining initiative and becoming a cage. The success of the FaSMEd project in igniting debate through the exploration of differences as much as by identifying commonalities was time consuming and put a strain on limited resources of time and money. Opportunities to work in this way are hard won and require a strong ethos and commitment to core principles and values.

#### References

Wikeley, F. (1998) Dissemination of Research as a Tool for School Improvement? School Leadership and Management, Vol. 18 (1), p.59-73.