

# The Open University Partnership in Wales

## PGCE Programme: Research Bulletin



Issue 4: October 2022

Welcome to the PGCE Programme's research bulletin, and welcome to new student teachers and partnership schools joining the programme this year. These bulletins include examples of published research, with key findings and implications for practice summarised. A wide range of journals are used and links to full papers are provided. The bulletins will also include a brief overview of research being conducted by individuals or teams linked to the PGCE Programme and other studies of interest. Issues may also include social media links for educational /research organisation/s.

If there is any research you and/or your setting are involved in we would welcome the opportunity to share this across the Partnership, or if you wish to know more about any of the research included in these bulletins please contact Alison Glover ([alison.glover@open.ac.uk](mailto:alison.glover@open.ac.uk)).

### In this issue .....



**Pioneer teachers:** The nature of teacher agency experienced by those working on the expressive arts area of the curriculum.



**Computer-based reading programme:** A randomised pre-test post-test design to inform a larger study. A significant effect on reading reported.



**Music making outdoors:** Teachers' perceptions and interviews with children examine the impact of primary school pupils' music making in outdoor locations.



**STEM engagement:** Science capital is used as a lens to examine participants' and teachers' views of science and education in terms of aspirations, attainment and social obstacles.



**Evaluating the curriculum and assessment reforms in Wales:** Members of the PGCE Team worked with Arad Research and others to evaluate the readiness of the sector for the reforms.



**PGCE Programme activities** – Information and links to the publication showcasing effective mentoring practices across the partnership and the first conference proceedings for the research conference held in summer 2022.



**Pioneer teachers** *'Leaders of curriculum reform need to fully understand and address the operation and interplay of agency in different contexts, particularly at institutional level.'*

Teacher agency is considered through a framework of different levels: the micro-level focuses on the individuals and their personal contributions; the macro-level considers Pioneers' work at national level, liaising with teachers from across the country and taking responsibility for creating the curriculum; the meso-level refers to where the two former levels come together, i.e. the Pioneers' work within their own institution, trialling the new curriculum. The evidence indicates that teacher agency was easier to achieve at micro-level and macro-level, than at meso-level. It is suggested, therefore, that achieving teacher agency at institutional level is more complex and challenging than is the case at the other levels. Greater understanding and attention are, therefore, needed about how to achieve teacher agency in teachers' different spheres of work, particularly when working at institutional level.

Kneen, J., Breeze, T., Thayer, E., John, V. and Davies-Barnes, S. (2021) 'Pioneer teachers: How far can individual teachers achieve agency within curriculum development?' *Journal of Educational Change*, doi.org/10.1007/s10833-021-09441-3.



**Computer-based reading programme** *'Headsprout Early Reading had a significant effect on reading skills when compared with 'education as usual', with large effect sizes on the main outcome measure'.*

Increasing evidence indicates that people with intellectual disabilities might benefit from phonics-based reading instruction. An online phonics-based programme – Headsprout Early Reading provides the focus for the study. Twenty-six learners (aged 5-19 years) with mild to moderate intellectual disability were recruited from three Special schools in North Wales. Eighty online episodes of around 20 minutes each delivered instruction to each learner. Reading assessments were completed pre- and post-intervention. Exploring possibilities before conducting a larger scale piece of research can be critical. Six months was not long enough to complete the intervention. Three different assessments were investigated for their suitability for any future application in a full-scale randomised controlled test.

Roberts-Tyler, E.J., Hughes, J.C. and Hastings, R.P. (2020) 'Evaluating a computer-based reading programme with children with Intellectual Disabilities: feasibility and pilot research', *Journal of Research in Special Educational Needs*, 20(1), pp. 14-26. doi.org/10.1111/1471-3802.12458.



**Music making outdoors** *'Teachers report that the pupils' multisensory experiences afforded them an improved creative experience.'*

There has been increasing interest in the potential benefits of the outdoor environment and children's development. In this study interviews with seven teachers who observed their classes as they took part in music making and semi-structured interviews with six groups of children reported that children became immersed in, and focussed on, their music-making. The key themes explored are i). improved behaviour; ii). use of space, iii). soundscape, iv). impact of the environment on music-making/creativity, v). more experimental and expressive, vi). immersion and improved focus. Improved behaviour and focus were reported.

Adams, D. and Beauchamp, G. (2021) 'The impact of music making outdoors on primary school aged pupils (aged 7–10 years) in the soundscape of nature from the perspective of their primary school teachers', *Journal of Outdoor and Environmental Education*, 24, pp. 37-53. doi.org/10.1007/s42322-020-00072-5.



**STEM engagement** *'Interviews with teachers showed that they try to prevent their pupils from experiencing stereotypes stemming from socio-economic status, but struggle to overcome their own assumptions.'*

Sixty-one young people were surveyed and three teachers interviewed after participating in a STEM (Science, Technology, Engineering and Mathematics) activity. Using the lens of science capital views of science and education in terms of aspirations, attainment and social obstacles were collected. Broadly, participants are enthusiastic and ambitious, and confident in their abilities in both science and wider skill areas. However, certain aspects of ambition were found to be linked to socio-economic status. The intervention had the greatest impact with those in the extremes of socio-economic deprivation, particularly in terms of bolstering existing science and education aspirations and increasing the 'thinkability' of attending university.

Bryan, R., Gagen, M.H., Bryan, W.A., Wilson, G.I. and Gagen, E. (2022) 'Reaching out to the hard-to-reach: mixed methods reflections of a pilot Welsh STEM engagement project', *SN Social Sciences*, 2(10), doi.org/10.1007/s43545-021-00311-6.



## Evaluating the curriculum and assessment reforms in Wales

Members of the PGCE Team contributed to the Welsh Government’s scoping study for the evaluation of the curriculum and assessment reforms in Wales. [A report](#) presenting the findings of 48 interviews with school senior leaders and practitioners explores what aspects of implementing the curriculum are working well and less well. [The final report](#) applied the theory, assumptions, evidence and readiness that underpins the reforms and develops recommendations for future monitoring and evaluation. [The Welsh Government’s response](#) to the final report’s recommendations includes the intention to publish a detailed programme of research, evaluation and monitoring activity in summer term 2023.

### Effective mentoring in Initial Teacher Education

[A collection of 10 case studies](#) showcase some effective mentoring approaches across the Partnership.



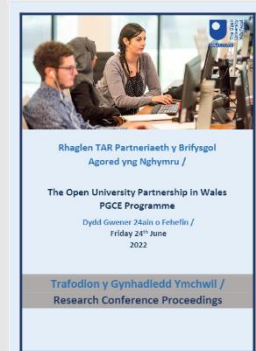
Themes include:

- The future’s so bright I gotta wear shades
- Handing over the reins: a student-centred approach
- With greatness comes responsibility
- Reciprocal learning during the mentor-student experience
- Embracing opportunities and challenges
- Collaborate, defend and protect
- Finding the joy
- Developing independence and professional identity
- Supporting a range of experiences for student teachers
- The importance of empathy and building relationships

### Research Conference Report 2022

The PGCE Programme held its first research conference in June 2022 ([Conference Proceedings](#)).

Following an inspiring keynote by Honorary Professor Charlotte Williams (OBE), Year 2 student teachers delivered excellent presentations of their findings on a range of very interesting and topical small-scale studies.



These presentations covered themes such as: drama in Welsh lessons; the Growth Mindset Approach; Philosophy for Children; collaborative homework; children’s writing; classroom communication and collaboration; Mathematics; effects of Covid-19; and role play and oracy.

A closing panel discussion also offered insight on approaches to research and what student teachers could expect as they begin their teaching careers.



OECD Education and Skills Today

[OECD webinars](#) are available looking at what is going on in education today – and what education might look like tomorrow.



[A blog](#) also looks at global perspectives on education and skills.

Earlier editions of the Research Bulletins can be found [here](#) in the Professional Learning and Research tile on SharePoint.