Enquiry on a page: To what extent do wholeschool mandated processes develop the enquiry mindset of teachers?

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ABSTRACT

This study explores the development of an enquiry mindset among teachers through the "Enquiry on a Page" (EoaP) process, a mandated whole-school initiative responding to shifts in educational policy emphasising evidence-informed practices. Existing literature underscores the importance of structured professional development in fostering such mindsets (Tripney et al., 2018; Sharples et al., 2019). The research involved semi-structured interviews with five teachers, selected based on survey responses to explore diverse perspectives. Thematic analysis revealed perceived benefits of the EoaP process, alongside challenges related to autonomy and workload. The findings indicate that while the EoaP process can enhance pedagogical reflection and collaboration, it must be tailored to individual teacher needs to maximise engagement and effectiveness. This study contributes to the discourse on action research in education by providing insights into the complexities of implementing systemic change in professional development practices.

Keywords: enquiry mindset, professional development, evidenceinformed teaching, action research, teacher collaboration

Introduction

This study investigates the potential of developing an enquiry mindset among teachers through a mandated, whole-school initiative,

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specifically the 'Enquiry on a Page' (EoaP) process. The impetus for this research stems from significant shifts in educational policy emphasising evidence-informed teaching practices, as highlighted by the Welsh Government's new curriculum (Wales Government, 2024) and broader UK trends (Sharples et al., 2019). The theoretical framework established by Tripney et al. (2018) underscores the importance of structured professional development and institutional support in cultivating such mindsets.

The EoaP process seeks to balance close-to-practice research focused on pedagogy with broader school demands on pupil attainment. By integrating reflective practice and structured professional development, the EoaP aims to enhance teachers' pedagogical skills and foster a sustainable enquiry mindset. This approach aligns with the recommendations of Evans et al. (2017), who advocate for professional development that combines collaborative learning and active experimentation.

Literature

The literature (Sharples et al., 2019) underscores the significant shifts in educational policies aiming at teacher development and curriculum changes across the UK. These changes emphasise the importance of evidence-informed teaching practices, as highlighted by the Welsh government's rollout of the new curriculum for Wales (Wales Government, 2024). More widely evidence-informed teaching has gained in prominence as shown by the UK government's publication on the evaluation of progress in evidence-informed teaching in England (Sharples et al., 2019).

Research on professional development and systemic change, such as that of Tripney et al. (2018), provide a foundation for understanding how enquiry mindsets can be developed. They discuss how deeply ingrained teacher beliefs and practices are influenced by structured professional development and sustained institutional support.

Articles from the Welsh Centre for Public Policy, Tripney et al. (2018) and the EEF Implementation Guidance Report, Nelson et al. (2017) suggest that supportive institutional frameworks are crucial in facilitating teacher development. These frameworks help in aligning the mandated processes with the teachers' daily practices and professional growth needs.

Research by Evans et al. (2017) explores various professional development strategies that encourage the adoption of an enquiry mindset. Their findings advocate for professional development that integrates collaborative learning and active experimentation, aligning well with the objectives of whole-school policies.

The study by Nelson and Campbell (2019) highlights that teachers often perceive mandated processes as either opportunities or constraints, depending on how these initiatives align with their intrinsic motivations and the perceived relevance to their instructional practices. This perspective is crucial for understanding the potential impact of 'Enquiry on a Page' and is developed during the research process.

The importance of collaboration in fostering an enquiry mindset is discussed in several studies, including the work by Bryk et al. (2011), which emphasises that sharing best practices and collaborative enquiry are instrumental in successful professional development.

Tripney et al. (2018) highlight the need for policies that adapt to individual teacher needs and contexts. Effective professional development must consider the diverse educational environments and teaching backgrounds, ensuring that the development programs are relevant and accessible to all teachers.

Finally, the literature (Sharples et al., 2019; Tripney et al., 2018) consistently points to the positive outcomes of well-implemented school-wide policies on both teacher practice and pupil learning. These studies provide valuable insights into how policy can be shaped to support the sustained development of enquiry mindsets among teachers.

This brief review concludes that developing an enquiry mindset through mandated whole-school processes requires a balanced approach that considers both the systemic support structures and the individual needs of teachers. It also calls for further research into the specific impacts of such processes on teacher development and student outcomes within the context of the new curriculum in Wales.

Methods

Ethics

This research was conducted with a strong commitment to ethical standards, ensuring the rights and welfare of all participants were

prioritised throughout the study. Informed consent was obtained from all participants before their involvement, ensuring they understood the purpose of the research, their rights, and how their data would be used (Denscombe, 2017). Participants were assured of their anonymity and confidentiality, fostering a safe environment for honest and open communication. Furthermore, participants were informed of their right to withdraw from the study at any time without any repercussions (BERA, 2024). Senior leaders approved the study adhering to the principles outlined in the British Educational Research Association's guidelines (BERA, 2024).

This commitment to ethical practice aligns with the broader educational research community's standards, ensuring that the integrity of the research is maintained while safeguarding the participants' dignity and rights (Wyse et al., 2021). By creating a transparent research environment, the study aimed to promote trust and encourage meaningful engagement from participants.

Sampling procedure and description

The sample for this study was generated through a systematic approach aimed at capturing a diverse representation of teaching staff involved in the 'Enquiry on a Page' (EoaP) process. Initially, a short survey was distributed to all teaching staff to gather preliminary insights and identify areas of interest for further exploration. The survey aimed to capture a wide range of perspectives on the EoaP process, ensuring that the sample reflected varying levels of engagement and experience among the teachers. The survey was not mandated and was not sent out by a senior leader, removing any implied mandate.

From the survey results, five teachers were selected for semi-structured interviews. To ensure a diversity of opinions on the EoaP process teachers were divided into five groups based on the response to the survey question 'completing the "Enquiry on a Page" supported my professional development'. The groups were; strongly agree, agree, neither agree nor disagree, disagree and strongly disagree. This approach not only facilitated a deeper exploration of individual experiences but then facilitated the selection of teachers from different subject areas and different years of teaching experience, thus enhancing the richness of the qualitative data (Cochran-Smith and Lytle, 2009).

The sampling method acknowledges the limitations inherent in a small sample size and the potential for self-selection bias, as those who responded may have been more inclined to engage with the research due to stronger opinions about the EoaP process (Denscombe, 2017). Nevertheless, the insights gained from the diverse sample contribute valuable perspectives on the implementation and effectiveness of the action research initiative.

Data generation and analysis

Data for this study were generated through the qualitative method of semi-structured interviews. The semi-structured interviews were conducted with the five selected teachers, allowing for an in-depth exploration of their experiences and insights regarding the EoaP initiative. This method facilitated a conversational flow, enabling participants to share their thoughts while ensuring that key topics were covered (Cohen et al., 2018).

The interviews were recorded, transcribed, and thematically analysed to identify recurring themes and patterns that emerged from the data. This approach is consistent with qualitative research best practices, allowing for a nuanced understanding of the participants' experiences (Braun and Clarke, 2017). The thematic analysis was conducted in several stages: familiarisation with the data, initial coding, theme development, and review of themes, ensuring a rigorous analysis process that accurately reflected the participants' voices (Braun and Clarke, 2012). The interviews were conducted by a member of the teaching staff body. They were not part of the senior leadership team, and participants knew their responses would be anonymised before senior leaders read them.

The analysis revealed several key themes, including the practical relevance of the EoaP process, the role of collaboration among teachers, and the challenges faced during implementation. By employing a systematic approach to data generation and analysis, the study provides insights into how close-to-practice action research can meaningfully inform teacher development and enhance educational outcomes (Cochran-Smith and Demers, 2010).

In conclusion, the methodological framework adopted in this study emphasises the importance of ethical considerations, thoughtful sampling, and robust data analysis in exploring the complexities of teacher-led

inquiry within the context of the EoaP process. This framework not only contributes to the existing body of literature on action research in education but also serves as a practical guide for future studies seeking to bridge the gap between research and practice.

Results and discussion

The findings from the semi-structured interviews have been organised into three themes: perceived benefits of the 'Enquiry on a Page' (EoaP) process, limitations and challenges, and the impact the EoaP process had on the enquiry mindset.

Perceived Benefits of the EoaP Process

The following quotes suggest that the EoaP process provided structured time for teachers to focus on specific areas of development, which many found valuable for reflecting on and improving their pedagogical practices:

'As it's been a long time since my training it was useful to rethink pedagogy and rethink the learning I have acquired over the years.' – Amy

'Reflecting on whether it [the enquiry] actually works has been helpful.' - Bea

'It supported me mainly because of the time given to focus on and look at something in particular that you wanted to develop. The dedicated time to develop something was really helpful.' – Em

The literature underscores the importance of structured professional development in enhancing teacher practice (Sharples et al., 2019; Tripney et al., 2018). The EoaP process provided teachers with dedicated time and a structured approach to reflect on and improve their pedagogical practices. Participants like Amy showed reflection is critical for continuous professional growth, as emphasised by Evans et al. (2017). The structured nature of the EoaP process allowed teachers to focus on specific areas they wanted to develop. The current landscape of professional development can often feel fragmented, with variable quality and coherence. In Wales, the revision of professional standards aims to

align teacher expectations with curriculum reforms. Structured professional development is integral to this alignment, helping teachers progress from understanding research to making pedagogic decisions based on it. The EoaP process provided structured professional development which fostered peer-to-peer collaboration among teachers. The EoaP process also enhanced the sharing of both experiential and research-based knowledge, leading to improved teaching practices across the school.

Limitations and Challenges

Despite the benefits, several teachers expressed concerns related to autonomy, relevance, and added workload. These included:

'We do it naturally and this took away some of the autonomy over our own professional development.' - Dani

'It was nice to have time to do something but it is better to use that time on what we want, need to do.' - Caz

'Reading added to the workload when there were other things to do. I did not find it easy to do. It was quite daunting to put the hours into reading things that may not have had a benefit to my subject.' – Amy

Resource availability was also a concern, particularly around finding relevant literature. As Bea stated: 'Finding subject-specific academic literature was difficult.'

Professional development should be context-specific and tailored to individual teacher needs (Tripney et al., 2018). However, some teachers felt that the mandated nature of the EoaP process limited their autonomy and added to their workload without clear relevance to their specific contexts. Dani expressed this concern. Amy found the additional reading burdensome. Tripney et al. (2018) acknowledge that teachers often feel overwhelmed by the demands placed on them, particularly in relation to engaging with research evidence. This recognition validates the experiences of teachers who struggle to balance their teaching responsibilities with the need to stay informed about best practices and research findings. Tripney et al. (2018) highlight the necessity for structured and coherent support systems. They point out that school leaders often make decisions about which types of support to accept

without having the time or knowledge to evaluate their quality. This suggests that a more organised approach to professional development could alleviate some of the workload pressures by providing clearer guidance and support.

Impact on Enquiry Mindset

The EoaP process aimed to foster an enquiry mindset among teachers, encouraging critical questions and reflection. The interviews revealed mixed outcomes:

'It taught me to think and approach things differently and it led me to sharing my own experiences with pupils more.' – Bea

'It would help to have more time to build across department relationships.' - Amy

Some found it motivating due to its structured nature, while others felt it was an additional chore.

'It made me have to do it - it forced me to do it. When I actually did it I quite enjoyed it which motivated me.' – Bea

'I looked at it as an opportunity to develop and I did sort of enjoy it and see how it changed things I would do in class.' – Caz

'There is a difference between how it motivates me as a person rather than how it motivates me as a teacher. I don't respond well to being told I have to do something.' – Amy

Participants suggested ways to adapt the EoaP process to better support motivation, for example:

'Motivators? - the time to do it, choice of focus, who I could present it to, how I could present it.' - Dani

'Maybe asking staff when the best time of year to carry it out would be.' - Em

Motivation and engagement were key themes, with mixed responses from teachers. Some found the mandatory nature of the EoaP process motivating, while others felt it was an additional chore. This reflects the findings of Nelson and O'Beirne (2014), who highlight that external

evidence is sometimes viewed as an imposition on teachers' professional autonomy. This perception can create barriers to accepting and integrating research findings into teacher practice, as teachers may feel that their expertise is being undermined. Bea found mandatory participation beneficial, however Amy emphasised the need for greater personalisation. The EoaP process aimed to develop an enquiry mindset among teachers, encouraging critical questioning and reflective practice. While some teachers reported positive developments, others felt the process could be more effective if it incorporated more collaborative and context-specific approaches. Fostering more collaboration within and across departments could enhance the process. Collaborative discussions about research findings are essential for teachers to understand and apply external evidence effectively (Nelson and O'Beirne, 2014).

Conclusion

The Enquiry on a Page process effectively bridges the fragmented landscape of teacher development by establishing a systematic approach to action research for all teachers. Through purpose-driven collaborative inquiry cycles, teachers gain new insights into their practices. EoaP encouraged reflective practice and evidence-based decision-making. This process was effective at contextualising external research evidence into practical pedagogical strategies to use in the classroom. By embedding these enquiry cycles into continuous professional development schools can ensure that teachers continuously engage with research, making it a regular part of their professional practice rather than a one-time event.

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References

Clarke, V. and Braun, V., (2017). Thematic analysis, *The journal of positive psychology*, 12(3), pp. 297-8.

- British Educational Research Association (BERA) (2024), *Ethical Guidelines for Educational Research, fifth edition*. [online] Available at: https://www.bera.ac.uk/publication/ethical-guidelines-for-educational-research-2024
- Bryk, A. S., Gomez, L. M., Grunow, A., and Hallinan, M. T. (2011). Getting ideas into action: Building networked improvement communities in education. In M. Hallinan (ed.), Frontiers in sociology of education (pp. 127–62). Springer. https://doi.org/10.1007/978-94-007-1576-9_7
- Cochran-Smith, M., and Lytle, S. (2009). Inquiry as stance: Practitioner research for the next generation. Teachers College Press.
- Cochran-Smith, M., and Demers, K. (2010), 'Research and teacher learning: Taking an inquiry stance. In O. Kwo (ed.), Teachers as learners. CERC studies in comparative education (Vol. 26). Springer. https://doi.org/10. 1007/978-90-481-9676-0_2
- Cohen, L., Manion, L., and Morrison, K., (2018). *Research Methods in Education*. 8th ed. London: Routledge.
- Denscombe, M., (2017). The Good Research Guide: For Small-Scale Social Research Projects. 4th ed. Maidenhead: Open University Press.
- Evans, C., Waring, M., and Christodoulou, A. (2017). Building teachers' research literacy: Integrating practice and research. Research Papers in Education, 32(4), 403–23. https://doi.org/10.1080/02671522.2017.1322357
- Nelson, J. & Campbell, C. (2019). Using evidence in education. In: A. Boaz, H. Davies, A. Fraser S. Nutley (eds), What works now? Evidence-informed policy and practice revisited (pp. 131–49). Policy Press.
- Nelson, J. and O'Beirne, C. (2014). Using Evidence in the Classroom: What Works and Why? NFER. http://dera.ioe. ac.uk/id/eprint/27753
- Nelson, J., Mehta, P., Sharples, J. and Davey, C. (2017). Measuring teachers' research engagement: Findings from a pilot study. Education Endowment Foundation
- Tripney, J., Gough, D., Sharples, J., Lester, S., and Bristow, D. (2018). Promoting teacher engagement with research evidence. Wales Centre for Public Policy. https://discovery.ucl.ac.uk/id/eprint/10067753/1/Tripney%20et%20al.%20 %282018%29.pdf
- Sharples, J., Albers, B., Fraser, S., and Kime, S. (2019). Putting evidence to work: A school's guide to implementation: guidance report. Education Endowment Foundation. https://files.eric.ed.gov/fulltext/ED612284.pdf
- Wales Government (2024). Curriculum for Wales: Guidance for the new curriculum. Available at: https://gov.wales/curriculum-for-wales
- Wyse, D., Brown, C., Oliver, S., and Poblete, X. (2021). Education research and educational practice: The qualities of a close relationship. *British Educational Research Journal*, 47(6), 1466–89.

Appendix

Whole Staff Questionnaire

Multiple Choice Answers: Strongly Agree; Agree; Neither agree nor disagree; Disagree; Strongly Disagree

Completing the 'Enquiry on a Page' supported my professional development.

Completing the 'Enquiry on a Page' increased my interest in education research.

The mandated nature of the 'Enquiry on a Page' motivated me to participate.

If the 'Enquiry on a Page' was voluntary, I would have participated in the process.

The 'Enquiry on a Page' process improved the teaching and learning in my classroom.

Semi-structured interview questions

Some of you answered on the questionnaire that the EoaP process supported your professional development. Could you explain how it has? Or what has changed for you as a result of the EoaP process? Maybe consider the activities you undertook as a result (peer obs, reading, discussions, collaboration, looking at your class differently, etc.)

Some of you felt that it the EoaP didn't support your professional development. Could you explain why you felt that and what would you like to see done differently so that in a future year it did support you?

We would like to understand if the EoaP process has helped you develop your enquiry mindset (asking critical questions, being objective, being inquisitive, not pre-judging the solutions to problems). Do you feel you are a better enquirer now than at the start of the year? What do you think would help you be a better enquirer?

There was a split in the questionnaire that suggested some of you were motivated to take part in the EoaP process but wouldn't do it if it wasn't compulsory. Others were not motivated by the process at all. Can you explain why it motivated you, what would have to change to make you motivated to do it and what would change to make you want to do it voluntarily?