



Action research: Exploring the adoption of Generative AI in Welsh language medium courses

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INTRODUCTION

The world of higher education has been disrupted. We know that technology can be of great assistance to both educators and students. However, the rapid developments of Generative AI has raised many concerns since its launch in November 2022 (JISC, 2024). For example, its impact on literacy, writing and critical thinking skills (UK Parliament, 2024), and the impact on assessment and academic integrity (JISC, 2024).

However, regardless of the concerns raised to date, none of the advice or guidance at a local level includes reference to how this new technology can be harnessed by students through the language of Welsh. With the many benefits that Generative AI can bring to course design, student support and employability, we need to ensure that our Welsh language students are not being excluded or deprived of the knowledge and skills required to live and work in the future world of AI (QAA, 2023a).

METHODOLOGY

Action research methodology adopting the Critical Participatory Action Research approach, leveraging practitioners' knowledge and understanding of the subject (Kemmis, et al., 2014)

According to Kemmis, et al., (2014), critical participatory action research does not always follow the cyclical steps of planning, acting, observing, reflecting. Instead, they emphasise that the research should be critical, and should interrogate our own practices, focussing on initial concerns with the help of others. This secures the commitment of those most affected by this topic, leading to suitable action outcomes (Dick, 2000).

WHAT WE KNOW...



Welsh language in higher education

Students have a right to study through the language of Welsh. Aligning to Welsh Government initiatives such as the Welsh Language standards and the Cymraeg 2050 strategy, designed to facilitate the use of the Welsh language and reach 1 million speakers by 2050.



Generative AI and higher education

Leading education organisations such as JISC, QAA and Advance HE are advocating the use of Generative AI in higher education. Benefits and considerations are outlined but no guidance available on the adoption of Generative AI suitable for the delivery of Welsh language courses.



Welsh language and Generative AI

Welsh Government taking a lead on working with organisations such as Open AI to improve the use of Generative AI tools through the language of Welsh; as stated in the Welsh Language Technology Action Plan (Welsh Government, 2018). Promising improvements, but still no guidance on its use in education.



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3,100 students studying through the language of Welsh accounting up to 21% of total students in 2021/22.

FINDINGS



Barriers and considerations

Participants confirmed a lack of confidence when using Generative AI in the development of Welsh language content and resources in their courses. They confirmed that Generative AI tools are not yet good enough to be used through the language of Welsh. However, they acknowledge the benefits and requested that more time would be needed to explore and experiment with new tools.



Using Generative AI

Although the use of Generative AI in some areas were poor, participants still provided activities in developing student AI literacy such as content creation, communication and collaboration. Although not yet explored, one participant would like to use it for creating historical characters and checking pronunciation.



Professional development

Participants recognised this is a growing field and will eventually form part of their teaching toolkit. They requested training and support in order to develop suitable ways to integrate Generative AI into their teaching that meets the needs of Welsh language courses to ensure students are developing their AI literacy skills.

RECOMMENDATIONS: Aligned with the '8 Conditions that Facilitate the Implementation of Educational Technology' (Ely, 1990)



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