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# Studying Mental Health in Schools: A Participatory Action Research (PAR) Approach in Public Mental Health

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**Abstract:** Despite a rising prevalence of mental health difficulties in the young, existing prior to, but also exacerbated by the current COVID-19 pandemic, mental health needs in this population remain unmet even in economically wealthy countries. Increasingly, supportive school environments have been suggested as having a significant impact on young people's mental health. The idea of health-promoting schools, initiated by the World Health Organisation (WHO), highlights the ongoing need for both health education via the curriculum but also a school environment that is conducive to students' health and emotional well-being. Despite this promising public health measure, existing studies into mental health-related interventions delivered in schools have been found to have a small or no effect. One explanation for this is that previous studies did not sufficiently address or focus on the school environment, which may in itself pose barriers to acceptability and successful implementation of mental health interventions. This paper will highlight a novel methodological approach to public mental health research - Participatory Action Research (PAR). The PAR method is unique in enabling study participants to become co-researchers of their own experiences in

a specific context. A growing body of educational PAR research suggests that this method can also generate collaborative and participative processes foundational to positive school culture and mental health outcomes. This paper will provide an overview of such outcomes, as well as outline methodological strengths and challenges common to the PAR approach in educational mental health settings.

**Keywords:** Brief Commentary; Public Mental Health; School Culture; Mental Health Interventions; Young Populations; Participatory Action Research (PAR).

### **Background: School Culture and Mental Health**

Young people across the world are experiencing increasing levels of mental health distress. Recent studies indicate high rates of self-harm, increases in substance use and abuse, as well as poorer educational achievements and interpersonal relationships (Doyle, Treacy & Sheridan, 2015; Murali & Oyebode, 2004). Additionally, a recent NHS (National Health Service; UK) report indicates that there has been a significant rise in mental health problems among children and young people, including anxiety and depression (Roberts, 2020).

Mental health distress amongst young populations has been further exacerbated during the ongoing COVID-19 pandemic. A recent report comparing children's mental health in England between 2017 and 2020 suggests that mental health problems have increased in 5–16-year-olds, as well as difficulties that jeopardise mental health, including an increase in disrupted sleep, loneliness, fearfulness, and fatigue. Despite these issues, both adult and child populations rarely sought mental health help during the pandemic (Newlove-Delgado et al., 2021).

Prior to the pandemic, mental health support access in economically wealthy countries such as the UK had already been described as poor due to a lack of mental health staff and practitioners, concerns about confidentiality, and for young populations in particular, a preference for informal sources of help due to mental health stigma (Salaheddin & Mason, 2016). It is believed that these issues intensified during lockdowns: children have been largely physically distanced from adults (including pastoral and mental health support staff) who could monitor their wellbeing and intervene, leading to unreported and unresolved mental health issues (Newlove-Delgado et al., 2021).

Partly in response to these ongoing challenges in mental health service access, other public mental health measures have been suggested, such as creating more supportive school environments (MacNeil, Prater & Busch, 2009; Hudson, Lawton & Hugh-Jones, 2020). The World Health Organisation (WHO, 2015) suggested the concept of a *health-promoting school*: a holistic approach, which involves not only health education via the curriculum but also a school culture and ethos that are conducive to health and wellbeing and other factors relevant to young people's mental health (e.g., belonging in the community, socioeconomic gaps). School environment has been described as a unique opportunity to foster a sense of belonging, shared values, and positive staff-student relationships (Allen, 2016), particularly because it provides an observational lens to children and adolescent mental health and wellbeing, which in turn enables early intervention and support. The use of mental health interventions that address the broader aspects of the school environment, however, have been poorly documented and fragmented due,

in part, to inconsistency in research terminology, particularly around the terms *school culture* and *school climate*.

The term *school climate* is typically viewed from an anthropological perspective, focusing specifically on the values and norms of the school (MacNeil et al., 2009). These values, although shared between school staff and students, have been largely viewed as separate dimensions from psychological and behavioural components of the school environment. However, Thapa et al. (2013) suggested that the values present in a school climate can affect a wide range of emotional and mental health outcomes; a non-mental health outcome such as absenteeism, for example, can affect students' sense of belonging in the classroom. The term *school culture*, on the other hand, is typically associated with psychological perspectives of school environment, such as students' cohesiveness, their sense of shared purpose and values, and sense of belonging (Schoen & Teddlie, 2008). A school culture perspective might be more focused on how demographic factors contribute or, indeed, lead to psychological outcomes, such as feelings of exclusion amongst students due to cultural differences experienced in student-staff relationships.

As noted in our study protocol (Kaluzeviciute et al., 2021) and as suggested by other educational researchers (Schoen & Teddlie, 2008; Deal & Peterson, 1999), it is important to consider the relationship between the psychological and demographic factors in schools. Shared beliefs and values ('culture' components) are directly influenced and intertwined with the geographical setting, social system and staff/student populations ('climate' components). Therefore, although we use the term school culture throughout this paper, we emphasise that this involves *a relationship between anthropological factors and psychological outcomes* in the school (e.g., how factors like gender, ethnicity or culture impact feelings of belonging between students and staff).

Despite the unique opportunity that school environments present for the promotion of positive mental health among youth, it is at times also a 'missed' opportunity. There are a limited number of studies going beyond pilot or cross-sectional designs that seek to measure mental health outcomes in schools by introducing specific changes or interventions to the school culture itself. This may be, in part, due to the fact that most studies employ discreet interventions to improve mental health (Caldwell et al., 2019). It is important to acknowledge that creating *cultural change* (i.e., a lasting change that addresses a significant structural element within the school environment) is more complex and, often, more demanding in terms of resources and activities. However, interventions that *actively* address (by enabling but also by 'disrupting') the entirety of the school system (e.g., by introducing new activities, systems, interventions that change the school curriculum, pastoral and mental health support or value systems) have the potential to create significant and sustainable school culture changes and to improve mental health.

Participatory action research (PAR), a method positioned within the qualitative paradigm, has been identified as one such intervention that can transform, rather than merely inform, collaborative and participative processes within a specific environment, including education and schools (Baldwin, 2012). Early findings indicate that PAR can be utilised to promote mental health and creatively involve students in developing their own school culture (Berg et al., 2018). However, given that PAR is a relatively novel approach in public mental health, there are outstanding questions about 1) its feasibility and applicability in school culture, and 2) the generalisability of PAR findings onto broader educational contexts. This paper will seek to review both challenges and strengths

of the PAR method in the educational research context, as well as highlight its utility as a public mental health intervention.

### **Participatory Action Research (PAR) in public health research**

Participatory Action Research (PAR) differs from traditional public health research methods in several ways. First, PAR seeks to enable *action* within a specific research context by involving *study participants as co-researchers*. Participants collect and analyse data (about the environment in which they participate), implement changes and/or interventions (to further develop or improve the environment), and reflect on whether these changes created a lasting (significant) outcome (Baum, MacDougall & Smith, 2006). This means that participants are involved in a continuous cycle of data collection, reflection, and action (Act-Observe-Reflect-Plan cycles; Kindon, Pain & Kesby, 2007). These cycles are crucial, as they can help researchers understand how participants bring about (*act*) and evaluate (*reflect*) change.

This leads to a second difference between PAR and traditional public health research methods; the PAR method is unapologetically focused on subjective experiences. Unlike quantitative methods (e.g., statistics), which seek to measure the frequency of occurring phenomena, or traditional qualitative methods (e.g., case studies and interviews), which seek to understand participants' subjectivity via interpretation, PAR is dubbed as a "*new paradigm science*" (Baum, MacDougall & Smith, 2006) precisely because it seeks to position participants' subjectivity through their own involvement in research. As such, PAR highlights not just the subjective experiences of researched agents but also their capacity for reflexivity and self-change (Kindon, Pain & Kesby, 2007).

Lastly, the PAR method approaches data dynamically in the sense that it seeks to understand complex processes within a particular context. Although this is not a novel point in qualitative research, it is a relatively new methodological approach in public health research, which generally prioritises large samples over smaller, contextualised populations and instances. This brings both strengths and challenges. On one hand, PAR highlights health outcomes that are specific to certain environments (e.g., marginalised groups within a specific school culture), but on the other, this can make PAR data difficult to generalise to other environments (e.g., school environments and cultures in other regions or countries).

### **Research utilising PAR methods in education**

Despite its novelty in public health research, the PAR method has been utilised to challenge and change culture in schools. Berg, Willis-Stewart and Kendall (2018) used PAR to empower students in 10 schools by providing training, opportunities, teacher guidance and 'change agents' (who acted as PAR facilitators). PAR research cycles involved planning, acting, observing and reflecting; during which, each school had an opportunity to develop their own enquiry question (an issue they want to address, act on or improve), e.g., "*How will improving school spirit and school participation create a healthier school environment?*". To measure the changes, 10 semi-structured focus groups were conducted involving 2-8 student participants in each session and at least one lead teacher per school. Results revealed that most participants gained a sense of connectedness to their school and peers as a direct result of PAR interventions, which improved health awareness and further facilitated student engagement. The

study also highlighted a need for baseline and follow-up measures of students' perceptions of their school culture and environment.

Similar PAR research conducted by Ozer, Ritterman and Wanis (2010) sought to understand how economically disadvantaged students experience school culture. PAR interventions included enabling student participation in school governance by actively shaping school practices (e.g., improving alliances between staff and students), engaging in school-wide inquiries, conducting research, and taking part in school advocacy activities. PAR facilitators were trained in both PAR and observational research methods; sessions occurred weekly over the course of one year with 32 students. Given that this PAR study sought to understand a marginalised (economically disadvantaged) student group, students from within this group at times struggled to voice their experiences, while teachers had difficulty managing the classroom dynamics. In response to these challenges, PAR sub-groups were created to conduct more intensive work and enable a more in-depth discussion about student experiences. This allowed PAR student participants to develop a group rapport, which subsequently strengthened their community bonds, collaborative group work and communication skills in the school.

PAR has also been used to address specific gaps in the involvement of key stakeholders within school communities, for example, by including parents' voices in the special education system (Ditrano & Silverstein, 2006), developing family-school partnerships with economically disadvantaged and culturally and linguistically diverse families (Ho, 2002), and developing student-led mental health initiatives (Berg et al., 2018). Our current study (Kaluzeviciute et al., 2021) is utilising a PAR approach to study how various school culture components (e.g., student diversity, physical environment, local environment and geography, staff composition, curriculum, student voice) can be changed to improve student mental health in UK secondary schools.

### **PAR strengths**

Historically, health research has been conducted to include participants' experiences and knowledge, but has not necessarily directly involved participants in the research process (Garwick & Seppelt, 2010). However, the latter is increasingly important for mental health research, as it not only focuses on potentially sensitive psychological topics (e.g., depression, trauma, suicide, loss), but it also seeks to ensure that participants benefit from the knowledge gained in the research process. PAR methodology seeks to tie both in by placing a high priority on partnering with study participants - from early planning, decision-making, and from measurement to reflection - PAR research ensures that participant experiences are at the heart of the study.

In a mental health context, this can also lead to *empowering marginalised or 'overlooked' populations*. Ditrano and Silverstein (2006) emphasise the significance of family-school collaboration, particularly in the context of ethnic minority families who find developing effective partnerships with school personnel to be challenging. A PAR approach to family-school partnership can increase collaboration between parents and school staff and improve services to children in schools (Ditrano & Silverstein, 2006):

Despite the stresses that these families continued to experience, participating in the project generated a sense of optimism. The parents told a story of perseverance and advocacy for their children. Their

unquenchable need to see their children succeed was evident in their statements: *“I made up my mind that I was going to fight for my child.”* Another mother stated her belief that *“you can make a change with a child.”* The parents reported that their children were exhibiting positive changes since they began attending the PAR group. *“Our kids know we are involved in their education and that really makes them feel good.”* *“Our kids have changed for the best.”* In contrast to their previous sense of hopelessness, they became determined that their children would be successful in the future. They believed that their children could achieve happiness and self-love (p. 363).

Our forthcoming (Jessiman et al.) study findings also indicate that PAR methodology is particularly suitable for tracking and identifying experiences of marginalised populations (e.g., ethnic, LGBTQ+ minorities). This can highlight important mental health outcomes, such as feelings of belongingness and sharedness, access to pastoral staff, and an ability to openly express oneself in the classroom. Involvement in PAR-initiated activities that promote mental health and self-expression may directly influence students’ emotional wellbeing in the school environment and beyond.

From a methodological perspective, PAR is positioned within the qualitative paradigm. Typically, alongside PAR groups, researchers conduct qualitative semi-structured interviews with study participants (in a school culture study, this may involve not just students but also school staff and parents), as well as focus groups and observations to measure PAR impact and compare study participants’ experiences pre- and post-PAR. PAR group facilitators do not need to have a background in research; however, training in facilitating, observing and moderating group dynamics within a specific context is useful. This means that most people can productively participate in PAR processes and contribute with their expertise, insights, and knowledge, thus making research more accessible to non-academic populations.

### **PAR weaknesses**

As with all qualitative methods, critics raise the persisting issue of generalisation of PAR findings to other environments and populations. Since the PAR method is used to study deeply contextualised environments and populations, such as school cultures and environments within a specific geographic location, it is unclear how (if at all) findings from a single PAR study can be generalised or transferred onto other environments.

It is worth noting that the question of generalisability has become a dividing point between qualitative (relying on in-depth, contextual data obtained by researchers from first-hand observation, interviews, questionnaires, case narratives, participant observations, etc.) and quantitative (relying on data acquired through experimental control, manipulation of variables, and statistical analysis) research methods (Tacq, 2010; Lincoln & Guba, 2000). Indeed, some would argue that PAR (and other qualitative methods) does not seek to produce findings that are generalisable. Since qualitative methods (e.g., interviews) have a different process and end-goal (capturing subjective experiences rather than producing decontextualised data) (Yin, 2013), researchers should maintain *particularisation* (e.g., particularising the mental health experiences of marginalised groups) rather than seek to generalise the data. It is also important to bear in mind that the specific aspects of the PAR process (e.g., facilitation, observation, reflection) can be

generalised onto other environments (e.g., schools in other regions with their own sets of structural components), even if the specifics of the school culture (e.g., curriculum or diversity components) are likely to be less generalisable.

It is nevertheless important to consider how PAR study findings might be generalisable (or transferrable) between different school environments; which cultural, demographic, economic factors are specific to one school, but are less pertinent to other school contexts? Epistemological guidance for identifying such important variations in PAR studies is yet to be developed, although similar epistemic considerations have been put forth for other qualitative methods, such as case studies in mental health and psychotherapy (Kaluzeviciute, 2021).

From a pragmatic standpoint, it is also important to have some form of guidance on: 1) *PAR group facilitation* - in the context of our study (Kaluzeviciute et al., 2021), facilitators were trained not only in the context of PAR and reflective cycles but also about the concept of school culture and the relevant school culture components; 2) *developing a PAR cycle plan* - this ensures that PAR sessions are productive and involved in a continuous cycle of data collection, reflection, and action; 3) *maintaining communication between researchers, facilitators and participants* (who simultaneously act as co-researchers) to ensure effective data exchange and research progress. Explicit methodological and epistemic guidance (clarifying knowledge generation practices between PAR group sessions and research findings) for these points would strengthen the position of PAR method in public health research further.

### Conclusion

This short commentary has focused on the use of the PAR method in school environments, particularly when trying to study and measure the relationship between school culture and student mental health. PAR has been identified as an intervention that unlike other methods (which do not directly involve participants in the study process), seeks to enable participants (who ultimately become co-researchers of their own experiences) to collaboratively participate in the research project. This has been particularly useful for implementing mental health interventions in schools by providing training opportunities and building staff-student relationships (Berg, Willis-Stewart & Kendall, 2016), understanding and improving experiences of marginalised and disadvantaged student groups (Ritterman & Wanis, 2010), developing family-school partnerships with culturally and linguistically diverse families (Ho, 2002), and developing student-led mental health initiatives (Berg et al., 2018). We have highlighted the benefits of PAR methodology in public health research, particularly in terms of participant involvement and empowerment in mental health contexts, while noting ongoing shortcomings, such as how far learning can be transferred to other contexts and the lack of methodological and epistemic guidance on PAR group facilitation. Addressing these points in future studies will strengthen PAR methodology as a valuable public mental health research incentive.

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#### **Availability of data and material**

Data collection toolkits and interview topic guides used in the project can be found in a published study protocol: <https://doi.org/10.1177/16094069211047753>

#### **Author's contributions**

GK developed the paper. TJ, JK and ML conceived the study. All authors contributed to the paper writing and approved the final version.

#### **Ethics and informed consent**

N/A.

#### **Ethics Approval**

Ethical approval to conduct the study was given by the Faculty of Health and Medicine Research Ethics Committee (FHMREC) at the University of Lancaster (Ref: FHMREC19100).

## **References**

- Allen, R. (2016). Fostering a School Culture and Climate Where Creativity Can Thrive: A Case Study of an International School Principal. *Theses and Dissertations - Education Sciences, 19*. <https://doi.org/10.13023/ETD.2016.456>.
- Baldwin, M. (2012). Participatory action research. In Midgley, M., Gray, J., Webb, S. A. (Eds.), *The SAGE handbook of social work* (pp. 467-481). SAGE Publications Ltd. <https://www.doi.org/10.4135/9781446247648.n31>.
- Baum, F., MacDougall, C., & Smith, D. (2006). Participatory action research. *Journal of epidemiology and community health, 60*(10), 854–857. <https://doi.org/10.1136/jech.2004.028662>.
- Berg, S., Bradford, B., Robinson, D. B., Wells, M. (2018). Got Health? Action researching a student-led health promotion program in British Columbia, Canada. *Canadian Journal Of Action Research, 19*(1), 33-47. Retrieved from <https://journals.nipissingu.ca/index.php/cjar/article/view/374>.
- Caldwell, D. M., Davies, S. R., Hetrick, S. E., Palmer, J. C., Caro, P., López-López, J. A., Gunnell, D., Kidger, J., Thomas, J., French, C., Stockings, E., Campbell, R., Welton, N. J. (2019). School-based interventions to prevent anxiety and depression in children and young people: a systematic review and network meta-analysis. *The Lancet Psychiatry, 6*(12), 1011-1020.
- Ditrano, C. J., Silverstein, L. B. (2006). Listening to parents' voices: Participatory action research in the schools. *Professional Psychology: Research and Practice, 37*(4), 359-366. <https://doi.org/10.1037/0735-7028.37.4.359>.
- Doyle, L., Treacy, M. P., Sheridan, A. (2015). Self-harm in young people: Prevalence, associated factors, and help-seeking in school-going adolescents. *International Journal of Mental Health Nursing, 24*, 485-494. <https://doi.org/10.1111/inm.12144>.

- Garwick, A. W., & Seppelt, A. M. (2010). Developing a Family-Centered Participatory Action Research Project. *Journal of Family Nursing, 16*(3), 269–281. <https://doi.org/10.1177/1074840710376175>.
- Ho, B. S. (2002). Application of participatory action research to family-school intervention. *School Psychology Review, 31*(1), 106-121.
- Hudson, K.G., Lawton, R., Hugh-Jones, S. (2020). Factors affecting the implementation of a whole school mindfulness program: a qualitative study using the consolidated framework for implementation research. *BMC Health Services Research, 20*, 133. <https://doi.org/10.1186/s12913-020-4942-z>.
- Jessiman, P., Kidger, J., Spencer, L., Geiger-Simpson, E., Kaluzeviciute, G., Burn, A., Leonard, N., Limmer, M. (forthcoming). *School culture and student mental health; A qualitative study in UK secondary schools*.
- Kaluzeviciute, G., Jessiman, T., Burn, A., Ford, T., Geijer-Simpson, E., Kidger, J., Limmer, M., Ramsay, S. E., & Spencer, L. (2021). Participatory Action Research on School Culture and Student Mental Health: A Study Protocol. *International Journal of Qualitative Methods*. <https://doi.org/10.1177/16094069211047753>.
- Kaluzeviciute, G. (2021). Appraising psychotherapy case studies in practice-based evidence: introducing Case Study Evaluation-tool (CaSE). *Psicologia: Reflexao e Critica, 34*(9). <https://doi.org/10.1186/s41155-021-00175-y>.
- Kindon, S., Pain, R., Kesby, M. (2007). *Participatory Action Research Approaches and Methods: Connecting People, Participation and Place*. Routledge.
- Lincoln, Y. S., & Guba, E. G. (2000). The Only Generalization Is: There Is No Generalization. In R. Gomm, M. Hammersley & P. Foster (Eds.) *Case Study Method*. Sage Publications.
- MacNeil, A. J., Prater, D. L., Busch, S. (2009). The effects of school culture and climate on student achievement. *International Journal of Leadership in Education, 12*(1), 73-84. <https://doi.org/10.1080/13603120701576241>.
- Murali, V., Oyebode, F. (2004). Poverty, social inequality and mental health. *Advances in Psychiatric Treatment, 10*(3), 216-224. <https://doi.org/10.1192/apt.10.3.216>.
- Newlove-Delgado, T., McManus, S., Sadler, K., Thandi, S., Vizard, T., Cartwright, C., Ford, T. (2021). Child mental health in England before and during the COVID-19 lockdown. *The Lancet Psychiatry, 8*(5), 353-354. [https://doi.org/10.1016/S2215-0366\(20\)30570-8](https://doi.org/10.1016/S2215-0366(20)30570-8).
- Ozer, E.J., Ritterman, M.L., & Wanis, M.G. (2010). Participatory Action Research (PAR) in Middle School: Opportunities, Constraints, and Key Processes. *American Journal of Community Psychology, 46*, 152-166. <https://doi.org/10.1007/s10464-010-9335-8>.
- Tacq, J. (2010). Causality in Qualitative and Quantitative Research. *Quality & Quantity, 45*, 263–291.
- Roberts, M. (2020). *Rise in mental health problems among children, young people*. National Health Executive. Retrieved from <https://www.nationalhealthexecutive.com/articles/nhs-england-mental-health-children-young-people>
- Salaheddin, K., Mason, B. (2016). Identifying barriers to mental health help-seeking among young adults in the UK: A cross-sectional survey. *British Journal of General Practice, 66*(651), e686-e692. <https://doi.org/10.3399/bjgp16x687313>.
- Schoen, L. T., Teddlie, C. (2008). A new model of school culture: A response to a call for conceptual clarity. *School Effectiveness and School Improvement, 19*(2), 129-153. <https://doi.org/10.1080/09243450802095278>.

- Thapa, A., Cohen, J., Guffey, S., Higgins-D'Alessandro, A. (2013). A review of school climate research. *Review of Educational Research*, 83(3), 357-385.
- WHO (2015). *Global School Health Initiatives: Achieving Health and Education Outcomes*. Retrieved from <https://www.who.int/healthpromotion/publications/global-school-health-initiatives-report-meeting-2015/en>.
- Yin, R. K. (2013). Validity and generalisation in future case study evaluations. *Evaluation*, 19(3), 321-332.