Opinions

MEDICINE

Not as simple as great experience: student volunteers in research

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Abstract

The Coronavirus 19 (COVID-19) pandemic disrupted medical education as we know it. My personal experience volunteering with a coronavirus vaccine research trial prompted me to reflect more broadly on the involvement of medical students in research. In this article I will discuss the benefits I recognised during my experience of assisting with a coronavirus vaccine trial. I will also consider the benefits and issues that can arise from the involvement of medical students in research. The recent removal of points for Educational Achievement from the Foundation Programme Application process eliminates recognition of student accomplishment in research. Widening access in medical education is an important issue and currently students from less privileged backgrounds could be disadvantaged by being unable to take part in unpaid research projects. Student involvement in research is broadly beneficial but the potential inequalities in access to opportunities need addressing.

Abbreviations

COVID-19 – Coronavirus-19 CV - Curriculum vitae FPAS - Foundation programme application system NHS - National Health Service MDT - Multi-disciplinary team

Introduction

In March 2020 hundreds of medical students across the country were sent home due to the worsening Coronavirus-19 (COVID-19) pandemic. COVID-19 is an infectious disease which results in

respiratory illness, a pandemic was declared by the World Health Organization on March 11, 2020.¹ With 3,000 final year students graduating early to support the NHS, junior students were at home navigating online learning. Some students took on roles in community volunteer groups and some returned to jobs within the NHS.².³ By autumn medical students were able to return to university now designated as essential workers.⁴ I was lucky enough to volunteer with a coronavirus vaccine study. Reflecting upon the experience I questioned the benefits and complex issues around medical students volunteering in research.

The benefits

Medical students have high levels of prosocial motivation which means they are motivated by acting to benefit others.⁵ Higher levels of prosocial motivation predict more frequent volunteer behaviour, this is also influenced by the students' feelings of social responsibility.⁵ When the opportunity to volunteer for a coronavirus vaccine research trial arrived, I was eager to take part. Being involved with the fight against the pandemic provided me with a muchneeded morale boost. It was a welcome change after six months of disrupted placements and online learning. I was able to hone my clinical skills in venepuncture and develop my communication skills by meeting the trial participants. I had the opportunity to work in and learn from a multidisciplinary team (MDT) with research nurses, doctors, and healthcare assistants.

The use of students in the role of research assistants meant that staff were free to work on the wards of the hospital.⁶

Another benefit was an improved understanding of how a large-scale randomised control trial operates. I was required to undertake Good Clinical Practice training.⁷ Through this I learnt about the importance of informed consent during research and the logistics of implementing the trial.

More generally, medical students can undertake their own research as part of the curriculum or by participating in a project at their university. This provides an opportunity to explore a topic of interest in further detail. Students develop skills in critical appraisal and critical thinking which may result in long-term research productivity. Students can then publish their findings or present at conferences. These experiences are highly regarded on curriculum vitaes (CVs) and can benefit the student during applications. Students can be involved in research studies during data collection, this is beneficial for them as they make connections with researchers. It is also valuable to the research team as medical students will often volunteer their time, are flexible with working hours and eager to be involved due to their high levels of prosocial motivation.

The issues

Medical students are busy, balancing clinical placements and independent study; therefore, finding time to volunteer can be challenging. In guidance published by the Medical Schools Council they state that a student's priority should be their education and they should not undertake additional responsibilities that could jeopardise their ability to graduate. However, getting the balance right is difficult, especially with the pressure of wanting to gain CV enhancing experiences. This could result in some students overburdening themselves and their education suffering.

Furthermore, medical students come from diverse backgrounds with some also having to balance paid employment. A small Australian study showed that students from widening participation backgrounds may have unique financial challenges and are more likely to undertake part-time employment.¹⁰ Anecdotally medical students' involvement in research is often voluntary, and they are rewarded with the experience. For students juggling employment it can be challenging to justify voluntary work, which could leave them disadvantaged regarding research experience.

The announcement that points for Educational Achievement will be removed from the Foundation Programme Application System (FPAS),¹¹ has de-incentivised publishing research. This raises the question of why medical students would take part in research.

Although a variety of experiences are useful for interviews and later speciality training, they seem a distant prospect to most medical students. The British Medical Association worries that this announcement will have long term implications, with students not fostering their inquisitive nature through research.¹¹



Conclusion

It is clear that medical student involvement in research has many benefits to the student and their future engagement with research. Nonetheless, there are some issues around voluntary research work, as this may exclude less privileged students from being able to undertake the same experiences as their peers.

This is why the inclusion of a research projects within the core curriculum is so important as it provides the chance for all students to take part in research regardless of their background.

The removal of points for publication from the FPAS leaves medical students with little immediate reward for their engagement with extra-curricular research. Further research should be undertaken on the relationship between students from widening participation backgrounds and their ability to take part in research. This could identify an area where medical schools could offer support thus improving equal opportunities for all medical students.

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References

- . Who.int. 2020. WHO Director-General's opening remarks at the media briefing on COVID-19 11 March 2020. Available from www.who.int/director-general/speeches/detail/who-director-general-s-opening-remarks-at-the-media-briefing-on-covid-19---11-march-2020. Accessed 9 June 2021.
- Health Education England. 2020. Almost 25,000 students in healthcare professions opt to join COVID-19 fight. Available from www.hee.nhs.uk/ news-blogs-events/news/more-23000-students-healthcare-professionsopt-join-covid-19-fight. Accessed 10 February 2021.
- Kinder F. and Harvey A., 2020. Covid-19: the medical students responding to the pandemic. BMJ, p.m2160.
- Medical Schools Council, 2020. Statement on Clinical Placements.
 Available from www.medschools.ac.uk/media/2646/statement-on-clinical-placements.pdf. Accessed 9 June 2021.
- Shi Y, Zhang S, Fan L, et al. 2021. What Motivates Medical Students to Engage in Volunteer Behavior During the COVID-19 Outbreak? A Large Cross-Sectional Survey. Frontiers in Psychology, 11.
- Miller D, Pierson L, and Doernberg S., 2020. The Role of Medical Students During the COVID-19 Pandemic. Annals of Internal Medicine, 173(2), pp.145-146.
- Nihr.ac.uk. n.d. Good Clinical Practice (GCP) | NIHR. Available from: www. nihr.ac.uk/health-and-care-professionals/learning-and-support/goodclinical-practice.htm. Accessed 10 February 2021.
- Bennett C, 2016. Why all medical students need to experience research.
 Australian Medical Student Journal, 7(1), p.14.
- Medical Schools Council, 2020. Statement of Expectation. Available from www.medschools.ac.uk/media/2622/statement-of-expectation-medicalstudent-volunteers-in-the-nhs.pdf. Accessed 10 February 2021.
- Brosnan C, Southgate E, Outram S, et al. Experiences of medical students who are first in family to attend university. Medical Education. 2016;50(8):842-851.
- Bates B, Mpako T, Katz D, 2020. Removal of Educational Achievements [open letter]. The BMA. Available from www.bma.org.uk/media/3598/201209final-draft-ukfpo-eas.pdf