Harnessing the nursing contribution to COVID-19 mass vaccination programmes: Addressing hesitancy and promoting confidence

The need for a mass vaccination programme for COVID-19 is considered a pivotal public health strategy to reduce rates of infection, hospitalizations and deaths which have been so much a feature of the past year of the COVID-19 pandemic (DHSC, 2021). Vaccinating whole populations quickly is key to control the global spread of the disease, reduce and prevent the long-term effects of COVID-19, and limit the opportunity for mutations of the coronavirus to emerge (Bagcchi, 2021; Pagel, 2021). After the social restrictions in daily living and the economic upheaval experienced by people across the world, vaccines offer hope and the promise of better days to come, but this can only be fully realised if sufficient numbers of people across all sectors of the population take up the offer of a vaccine (DHSC, 2021; Schoch-Spana et al., 2020).

Critical to the success of COVID-19 mass vaccination programmes is the nursing contribution (ICN, 2020). Nurses have for a long time been instrumental in the success of immunization programmes across the life cycle, through key engagement activities concerned with awareness raising, education, vaccine administration, prescribing, and policy development (Bajnok et al., 2018; RCN, 2021). The challenge this time, over and above the scale and urgency of the endeavour, is the need to promote vaccine confidence and acceptance against a background of misinformation and mistrust, arising in part due to the pervasive influence of social media combined with long standing distrust in public health measures in certain communities (Ashwell & Murray, 2020; Harrison & Wu, 2020; Schoch-Spana et al., 2020). Approaches which are broader than simply the administration of vaccines in vaccine clinics are required (Harrison & Wu, 2020; ICN, 2020). From our own involvement in the UK National Vaccination Programme, we suggest that partnership working between nurses, individuals and communities is the key to addressing vaccine hesitancy and promoting vaccine confidence.

1 | EMPOWERING INDIVIDUALS

In planning and delivering mass vaccination campaigns, approaches that value and acknowledge individuals' perspectives and experiences are vital if sufficient uptake of COVID-19 vaccines is to be achieved (Schoch-Spana et al., 2020). Though mass vaccination has been a widely used, cost-effective measure to prevent more than 20 common infectious diseases, low uptake in and across communities can lead to reduced herd immunity and outbreaks of preventable disease (Siciliani et al., 2020; WHO, 2021a). This has become an increasing issue in recent years, with vaccination rates in many countries decreasing, and particular communities or groups reluctantly engaging or actively refusing vaccines offered (Larson et al., 2014; Paul et al., 2021; Siciliani et al., 2020). Referred to as *vaccine hesitancy*, decisions to delay accepting, or refusing a vaccine are complex and contextual; they may vary depending on time and vaccine offered, and perhaps may better be considered as a continuum, rather than a binary pro- or anti-vaccine choice (Larson et al., 2014; MacDonald, 2015).

Decisions by an individual to accept, delay or refuse a vaccine may be taken on the basis of an assessment of individual benefits (risk of contracting the disease and the health effects of the disease) against perceived costs (monetary, vaccine safety, injection phobia and discomfort). Societal benefits from vaccines such as protection of others and achievement of herd immunity, may also inform an individual's decision (Siciliani et al., 2020). To achieve the primary goal of the UK COVID-19 vaccination programme, that as many people as possible across all communities decide to take up the vaccine when offered (DHSC, 2021), individuals need to have confidence in the safety and efficacy of the available vaccines, and confidence in the health systems and staff delivering vaccines. They need to be persuaded of their individual role in contributing to societal protection, (rather than relying on others) to achieve and benefit from herd immunity, and they need convenient access to vaccination centres (MacDonald, 2015).

So, what are the implications for nursing practice if the goal of high uptake of COVID-19 vaccine is to be truly realized? It is suggested that a reframing of the issue of *vaccine hesitancy* may yield benefits; vaccine hesitancy and vaccine promotion has become an emotive topic in recent years (Ashwell & Murray, 2020). Instead of focusing on an individual's hesitancy and perhaps refusal, practitioners should work from a broader health promotion perspective and seek to work in partnership with individuals to promote vaccine confidence, rather than mere acceptance (Harrison & Wu, 2020). In this frame of practice, establishing a trusting relationship and facilitating open and personalized discussions can positively influence immunization decisions. Exploring and responding to concerns and signposting to

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credible sources of information are also important (Hill et al., 2021). Core areas identified that should be addressed in discussions include the safety, efficacy and purpose of the vaccine (Larson et al., 2014). To support these discussions for the COVID-19 vaccines, a range of specific resources have been developed (Lewandowsky et al., 2021). However, the potentially challenging nature of such discussions has been brought to the fore in recent weeks. Vaccinators have needed to assimilate and communicate complex information to people attending busy vaccination clinics, regarding safety concerns raised in several European countries with respect to the Oxford Astrazeneca vaccine (EMA, 2021; MHRA, 2021; WHO, 2021b). Skilled communication strategies which focus on risk and address individual expectations (Harrison & Wu, 2020; Lewandowsky et al., 2021), have been fundamental to support positive individual decision-making and confidence in the vaccine offered.

2 | COMMUNITIES

Despite the disproportionate impact of COVID-19 on Black, Asian and other minority ethnic communities, the uptake of COVID-19 vaccines has been slower in these groups, including amongst health and social care staff (Martin et al., 2021). This is consistent with previous vaccine uptake trends across ethnic minority groups (Razai et al., 2021; SAGE, 2021). The reasons why people have refused to accept the vaccines are numerous and complex, but many reasons stem from mistrust of healthcare systems, structural systemic racism and discrimination (Schoch-Spana et al., 2020).

Medical mistrust has historical roots. For example, the United States (US) public health service Tuskegee Study of Untreated Syphilis (TSUS) in African American men between 1932 and 1972, was a non-consented 40-year study to observe what happened to the natural progression of untreated syphilis in 400 men through to death (White, 2000). In 1996, in Kano, Northern Nigeria, one company tested the efficacy of a new antibiotic during a meningitis epidemic on 200 children, without parental knowledge. Several children suffered adverse complications including death during the study. Slow settlement of the case and secrecy surrounding it has contributed to some believing that Black Africans are targeted for human experimentation (Evuleocha, 2012). Such historical beliefs and practices continue to contribute to controversies regarding vaccine trials in Africa (Etutu, 2020; Okwonga, 2020) at a time when it is critically important to understand how COVID-19 vaccines perform in populations of greatest need of protection (Makoni, 2020).

Public trust is crucial in promoting public health and plays a pivotal role in community engagement with public health interventions (Schoch-Spana et al., 2020). Built on trust, sensitive to local communities, health needs and different religious and cultural concerns, community engagement is key to the success of any COVID-19 vaccination programme (SAGE, 2021). In the UK, insight and influence groups including healthcare professionals from a wide range of specialisms were set up initially with the aim of communicating directly with diverse communities. The goal was to enable all to make an JAN

informed choice about taking the vaccine and create a direct touchpoint (DHSC, 2021). Whilst many people were influenced by misinformation circulated on social media platforms, it was important to not to label everyone with this assumption (Lewandowsky et al., 2021; SAGE, 2021). Employing a cultural humility approach, where power imbalances are addressed and non-paternalistic partnerships with communities are developed (Greene-Moton & Minkler, 2020; Tervalon & Murray-Garcia, 1998), enabled any assumptions viewing individual vaccine hesitancy as the problem, to be challenged. Instead, community engagement addressing contextual, individual and social group determinants of vaccine hesitancy could be addressed with the objective of promoting vaccine confidence (Larson et al., 2014; SAGE, 2021).

Communication in meaningful ways, which responds to community concerns, tackles misinformation and provides consistent messages of the benefits of COVID-19 vaccines over the disease risks is crucial (DHSC, 2021; Lewandowsky et al., 2021; SAGE, 2021). To address this, many interactive webinars, listening and stakeholder engagement events have been held to elicit the views of community and faith group leaders regarding uptake of the vaccine and dispel the myths surrounding the COVID-19 vaccine. Involvement from health and social care staff from minority ethnic communities was encouraged, as it was known that mistrust, particularly amongst Black African and Caribbean staff was a major concern, and was likely to affect their confidence in, and uptake of any vaccine (Martin et al., 2021; Razai et al., 2021). Staff had expressed feeling pressured or stigmatized rather than having their concerns addressed. In addition, there were heightened concerns for pregnant Black women or those wanting to start a family. Messaging was tailored to acknowledge mistrust issues and Black and Asian experts in the fields of obstetrics, gynaecology, infectious diseases and virologists were involved in the delivery of the information sessions. At local and national levels, a range of tailored social media resources have been produced to support vaccine communication in minority ethnic communities (NHS Leeds, 2021).

In London (UK), to support vaccine delivery, local health and social care staff were contacted through Black and Minority Ethnic networks and The Chief Nursing Officer for England's Strategic Advisory Group. Working with local Community Champions, trusted members of minority ethnic communities, were trained by COVID-19 nursing vaccine leads to provide vaccine advice and administer COVID-19 vaccines under nurse supervision (MHCLG & DHSC, 2021). Together professionals and the local community set up vaccination clinics in community halls, churches and mosques to encourage uptake of the vaccine. COVID-19 buses and mobile units were deployed to housing estates, high streets and town centres, encouraging access. Such health and community-based partnerships have been much in evidence across the whole of the UK (Ford, 2021; Haynes, 2021).

Staff who were initially hesitant about getting vaccinated have shared their stories about how they developed vaccine confidence and decided to have the COVID-19 vaccine (NHSGGC, 2021). Although many staff were encouraged to use social media to share WILEY-JAN

their experiences of being vaccinated, it was also essential that people did not feel pressured to have the vaccine. Thus, the consistent message has been the benefits of taking the COVID-19 vaccine over the risks of contracting COVID-19 (MHRA, 2021; WHO, 2021).

3 | SUPPORTING PROFESSIONALS

Healthcare professionals are central to the success of mass vaccination programmes. Not only are they at the forefront of vaccine administration; they are also key to changing hearts and minds in relation to vaccine acceptance amongst the general public (Mantel et al., 2020). Of all healthcare professionals, nurses provide the closest patient facing care and as such possess a real opportunity to advocate for and promote important public health messages (Bajnok et al., 2018). When applied to the vaccine programmes it is important that nurses and other healthcare professionals lead by example, through role-modelling, to reassure the public that vaccines are safe, low risk and can be easily administered (Hill et al., 2021). Generally, the public place trust in healthcare professionals, relying on their knowledge, expertise and experience to guide them through difficult healthcare decision-making (Mantel et al., 2020). However, this role-modelling has faltered as, despite all healthcare staff being offered the COVID-19 vaccine, many have still not taken this up, with a disproportionate number being from ethnic minority backgrounds (lacobucci, 2021; Mantel et al., 2020). This has the potential to create public uncertainty around why some supposedly informed healthcare professionals are refusing the vaccine. In response, England's Chief Medical Officer has suggested that all healthcare professionals have a professional responsibility to receive the vaccine (Kituno. 2021); this is important for promoting good vaccine effectiveness and a high vaccine uptake amongst healthcare colleagues and the public (Godinot et al., 2021).

Media coverage of doctors and nurses administering and receiving the vaccine may go some way to assuage public concerns and increase confidence in the vaccine programme. In addition, over the past year the clinical research nursing workforce has made an outstanding contribution to the global vaccination endeavour, with clinical research nurses working tirelessly to safely and rapidly deliver multiple COVID-19 vaccine trials. This has involved screening trial participants to check their eligibility, undertaking clinical assessments, obtaining informed consent, randomizing participants, administering vaccines, monitoring for adverse reactions and collecting high quality trial data (Iles-Smith et al., 2020). This momentous effort over a very short space of time has led to pharmaceutical companies reporting excellent safety and efficacy data, resulting in numerous COVID-19 vaccines being licensed for use across the globe. The raised profile of clinical research nurses working to deliver these vaccines trials rigorously, transparently and to a high quality, has served to provide reassurance and increased confidence for the public and healthcare workers, who may have had concerns about vaccine safety and efficacy (Karafillakis et al., 2016).

Healthcare professionals sit on national and regional COVID-19 vaccine taskforce groups and their frontline insights into some of the perceived challenges and barriers to successful vaccine uptake can be used to inform national and international guidance (DHSC, 2021). However, reasons for vaccine hesitancy are complex, multifaceted and must also be addressed at a local level (SAGE, 2021; Schoch-Spana et al., 2020). To maximize the nursing contribution to vaccine delivery programmes, there is a need for high quality vaccine related education and training so that nurses can be well-positioned to provide comprehensive guidance to individuals, enabling them to make fully informed choices about whether to proceed with their vaccinations (Lewandowsky et al., 2021). In addition, an ability for nurses to recognize the needs, views and perspectives of individuals in different communities is key to breaking down barriers and boundaries and to allaying fears that may have originated in different community networks (Larson et al., 2014). Issues such as limited vaccine knowledge, misinformation, government and pharmaceutical company mistrust and perceptions of equality and discrimination in health and public services, may all serve to limit uptake in and across different factions of society (DHSC, 2021). To address these issues, nurses need to be supported to develop close partnership working with community leaders, who are gatekeepers to local populations, and need to understand the diverse range of issues influencing vaccine hesitancy, if high vaccine uptake across all population groups is to be achieved (DHSC, 2021; SAGE, 2021).

4 | CONCLUSION

Acknowledgement of the determinants of vaccine hesitancy is crucial to any COVID-19 mass vaccination programme (Larson et al., 2014; Schoch-Spana et al., 2020). To achieve high uptake of vaccines across all population groups in the UK, community engagement programmes built on established trusting relationships between health professionals, including nurses, and the voluntary sector, faith groups and community organisations are key (DHSC, 2021). Nurses also have a part to play in enabling appropriate information to be disseminated and promoted at the right time, at the right level and in the right format (Bajnok et al., 2018; Hill et al., 2021). Through the use of person-centred approaches, building partnerships with individuals and communities, vaccine hesitancy may be addressed and vaccine confidence, rather than simply vaccine acceptance, may be achieved.

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CONFLICTS OF INTEREST

None.

AUTHOR CONTRIBUTIONS

All authors have agreed on the final version and meet at least one of the criteria recommended by the ICMJE (http://www.icmje.org/ recommendations/).

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