ARTICLE IN PRESS

Vaccine xxx (2017) xxx-xxx

Contents lists available at ScienceDirect

Vaccine

journal homepage: www.elsevier.com/locate/vaccine

Health professional feedback on HPV vaccination roll-out in a developing country

Collette Venturas, Kanayo Umeh*

School of Natural Sciences and Psychology, Faculty of Science, Liverpool John Moores University, Byrom Street, Liverpool L3 3AF, United Kingdom

ARTICLE INFO

Article history: Received 17 September 2016 Received in revised form 17 February 2017 Accepted 23 February 2017 Available online xxxx

Keywords: HPV Vaccination Zambia Health professionals

ABSTRACT

Background: Worldwide, Zambia has the highest cervical cancer incidence rates (58.4/100,000 per year) and mortality rates (36.2/100,000 per year). The human papilloma virus (HPV) vaccine is considered a vital preventative measure against cervical cancer, particularly in sub-Saharan countries, such as Zambia. Past research suggests health professionals' experiences with HPV vaccination rollout can have practical implications for effective delivery.

Objective: To explore health professionals' perspectives on the HPV vaccination programme in Zambia. *Methods:* Researcher travelled to Zambia and conducted semi-structured interviews with fifteen health professionals working in private, government, and missionary clinics/hospitals. Observation was conducted for triangulation purposes. Thematic analysis was used to analyse the data.

Findings: Five main themes emerged; medical misconceptions about the HPV vaccination, particularly with regards to infertility; fear of the unknown, including possible side effects and inadequate empirical research; need for prior desensitisation to resolve cultural barriers prior to vaccination rollout; a ruralurban divide in health awareness, particularly in relation to cancer vaccines; and economic concerns associated with access to the HPV vaccination for most of the Zambian population.

Conclusion: Overall, the findings indicate that an essential avenue for facilitating HPV vaccination rollout in Zambia is by implementing a pre-rollout community effort that removes or softens cultural barriers, particularly in rural areas. It is also essential to correct erroneous HPV presumptions health professionals may have around infertility. Affordability remains a seemingly intractable hindrance that hampers HPV vaccination rollout in Zambia.

© 2017 Elsevier Ltd. All rights reserved.

1. Introduction

Cervical cancer is a major global health problem, rated as the third most common cancer in women [1]. Around 85% of cases occur in developing countries [2,3]. Zambia in particular has the highest cervical cancer incidence rates (58.4/100,000 per year) and mortality rates (36.2/100,000 per year) worldwide [4]. Today, cervical cancer is the first cause of female cancer in Zambia, and the most common female cancer in women aged 15–44 years in this country [5]. Tackling cervical cancer in sub-Saharan countries is difficult, partly because multiple and complex socio-cultural factors contribute to its high mortality rates in these geographical regions [6].

HPV (human papilloma virus) infection is extremely detrimental for women in countries like Zambia, where the known adult HIV prevalence rate is 16% [7]. HIV and cervical cancer rates are

* Corresponding author. E-mail address: f.k.umeh@ljmu.ac.uk (K. Umeh).

http://dx.doi.org/10.1016/j.vaccine.2017.02.052 0264-410X/© 2017 Elsevier Ltd. All rights reserved. strongly correlated [3]. HPV infection can double a woman's risk of acquiring HIV as it causes lesions in the cervix and vagina, which act as transmission sites for the virus [8]. Not only are HIV positive women more likely to develop cervical cancer, but once contracted, cervical cancer develops even faster in HIV positive women [8]. Although systematic cervical cytology screening programmes are considered an essential tool for addressing cervical cancer in developing countries, research suggests these schemes aren't necessarily feasible in some developing countries [9]. One systematic review suggests lack of resources faced by less economically developed countries, like Zambia, limits women's access to both treatment and screening services, possibly contributing to the high prevalence of cervical cancer in such countries [3]. Knowledge of HPV is poor in many developing regions. For example, a study of 500 women in Sudan found that only 39.2% had heard about the HPV vaccination [10]. A similar investigation in Lebanon reported a knowledge score of just 52.7%, suggesting limited awareness of the vaccine [11]. However, knowledge of HPV appears to be relatively high in Zambia, with one study suggesting 74.7% of adult





Please cite this article in press as: Venturas C, Umeh K. Health professional feedback on HPV vaccination roll-out in a developing country. Vaccine (2017), http://dx.doi.org/10.1016/j.vaccine.2017.02.052 2

C. Venturas, K. Umeh/Vaccine xxx (2017) xxx-xxx

women have heard about cervical cancer, and 73.3% consider it preventable [12].

1.1. Pilot HPV vaccination programme in Zambia

The HPV vaccine was one of four new vaccines planned to be introduced into the routine immunization system in Zambia (the others comprising the rotavirus vaccine, pneumococcal, and the second dose of measles) [13]. However it has only been introduced on a pilot basis in three districts in the Lusaka province [14]. On 27 May 2013, the pilot scheme was launched, targeting schoolgirls (aged 9-13) in grade four. During the initial phase (2013-2014) approximately 50,000 girls were targeted [15]. Girls out of school were meant to receive the vaccine through outreach strategies and health centres [15]. Over the course of the pilot programme, from 2013 to 2014, an estimated 33,733 young girls were vaccinated with the full three doses [16]. The international organization Pink Ribbon Red Ribbon is donating an extra 30,000 vaccines [16]. As the HPV vaccine is one of the most expensive recommended inoculations, its success is pivoted upon its affordability in limited resource settings [17]. The Global Alliance for Vaccines and Immunisation (GAVI) have taken steps to increase affordability and access to routine vaccines in low income countries [18]. Zambia was one of the countries approved for GAVI support, although at present the HPV vaccine does not appear to be one of the inoculations subsidised by the GAVI alliance [19].

1.2. Role of health professionals

It is estimated that about 500 health workers were trained (and 50 clinics involved) in the HPV vaccination programme in Zambia [20]. As Zambia has a doctor-patient ratio of just 0.173/1000 [21], and relatively few qualified gynaecologists – currently, there are only 40 members of the Zambia Association of Gynaecologists and Obstetricians [22] – how health professionals interact with their female patients, and their role in delivering the HPV vaccination, is an important issue to consider [23]. Health professionals can significantly amplify HPV vaccine uptake, for example by recommending vaccination during routine doctor-patient consultations [24]. It has also been argued that the potential success of the HPV vaccination can be improved if the challenges faced by healthcare providers are understood [25].

Some research has explored HPV-related knowledge and attitudes amongst health professionals from developing countries, including African countries [26-28]. For example, a questionnaire-based study of 602 Nigerian healthcare professionals concluded that while they had good knowledge of HPV, their awareness of the vaccine was low [26]. Nurses in particular had the lowest level of knowledge about the HPV vaccine, or even its existence. Another quantitative study conducted in a South African hospital reported similar findings [27]. Using self-report questionnaires administered to 345 nurses, this study attempted to determine the factors that affect recommendations of HPV vaccination to patients. They found that the majority of the nurses lacked understanding of HPV infections and vaccinations, but yet were still willing to recommend vaccinations to patients. These findings mirror those of another questionnaire based study of 178 female nurses in Nigeria [28]. The South African study also found that nurses who thought their patients would accept HPV vaccination were more likely to recommend it [27]. The authors concluded that before a HPV vaccination programme could be successful nationwide, nurses needed to receive more education on HPV in general, as well as the HPV vaccination specifically.

1.3. The present study

Overall, past research has shown that exploring health professionals' knowledge and views on HPV vaccination can yield valuable insights for vaccine implementation [27,28]. Health workers' perceptions can influence their administration of the HPV vaccine. For example, interviews with 15 health professionals in exploring their views on cervical cancer screening concluded that professionals' perceptions of screening barriers influenced their management goals, practices and decisions surrounding how best to deal with cervical cancer [29]. Despite Zambia being particularly burdened by cervical cancer, and having recently benefited from a HPV vaccination pilot, no such study had been conducted in the region. The fact that Zambia has some of the highest cervical cancer mortality rates in the world emphasises the severity of the issue, and the requirement for health professional feedback on how to more effectively administer the HPV vaccination [4.5.30]. The views of health professionals involved in the HPV pilot scheme will be particularly helpful in identifying themes that may impede or facilitate vaccination rollout campaigns in this region. Thus, the current study aimed to address this gap in the literature, by exploring health professionals' experiences of the HPV vaccination rollout in Zambia.

2. Methodology

Thematic analysis was used as it allows the researcher to explore issues without the constraints that might otherwise be imposed by more structured analytical techniques, such as Interpretative Phenomenological Analysis (IPA) or GT [31]. A total of 15 healthcare professionals (4 males, 11 females) involved in cervical cancer were recruited from several health organisations in Kabwe, and also a private hospital/clinic, government hospital and district health centre in Lusaka. Participants consisted of two gynaecologists, one oncologist, and twelve nurses. One professional worked in a private clinic, eight in a government hospital, one in a missionary hospital, one in a district health centre, two in an NGO hospice, and two at a cervical cancer clinic. The health worker (a nurse) from the district health centre was directly involved in running the pilot vaccination programme. Two professionals (nurses) working in Lusaka were parents/guardians of girls targeted for vaccination. Given that there are only about 40 obstetrician/gynaecologists in Zambia [22], finding anyone who knew about the HPV vaccine, or who worked on oncology wards, was a challenge. Health workers in charge of addressing cervical cancer found it hard to suggest who to talk to.

A Dictaphone was used to record the (semi-structured) interviews. The device was an Olympus VN-711PC with 2 GB memory (circa 823 h of recordings), battery life of up to 72 h, and USB connection for fast downloading to a PC. In order for the interviews to be standardized, each participant was asked the same ten core open-ended questions. These are presented in Table 1. Ethical approval was obtained from Liverpool John Moores University Research Ethics Committee (UNZABREC, Ref. No. 004-06-15), and the Zambian Ministry of Health.

Fig. 1 illustrates the key procedural steps. One of the researchers travelled to Zambia to recruit participants. Purposive sampling (specifically snowball sampling) was used. Recruitment was implemented through third-party recommendations (friends, family and acquaintances). Although an hour was allocated for each interview, on average, an interview lasted about 30 min. Participants were informed both in the consent form and verbally that they had the right to withdraw from the study at any given time. With gate-keeper's approval, observation of some of the participants' places

Please cite this article in press as: Venturas C, Umeh K. Health professional feedback on HPV vaccination roll-out in a developing country. Vaccine (2017), http://dx.doi.org/10.1016/j.vaccine.2017.02.052

دريافت فورى 🛶 متن كامل مقاله

- امکان دانلود نسخه تمام متن مقالات انگلیسی
 امکان دانلود نسخه ترجمه شده مقالات
 پذیرش سفارش ترجمه تخصصی
 امکان جستجو در آرشیو جامعی از صدها موضوع و هزاران مقاله
 امکان دانلود رایگان ۲ صفحه اول هر مقاله
 امکان پرداخت اینترنتی با کلیه کارت های عضو شتاب
 دانلود فوری مقاله پس از پرداخت آنلاین
 پشتیبانی کامل خرید با بهره مندی از سیستم هوشمند رهگیری سفارشات
- ISIArticles مرجع مقالات تخصصی ایران