
SHORT COMMUNICATION

Indigenous surgical practices in rural southwestern Nigeria: implications for disease prevention

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Abstract

A qualitative, community-based study was conducted in the rural community of Ago Are in southwestern Nigeria to learn about indigenous surgical practices and their potential for disease transmission. Community leaders as key informants assisted in identifying two types of indigenous practitioner whose work involved blood contact, whose work was observed. The *olólà* are surgeons who specialize in circumcision and making traditional facial markings, while the generic term for healer, *onísegùn*, performed *gbeere*, that is making incisions into which medicinal herbs are rubbed. Although the *onísegùn* used a clean blade for his procedures, he rubbed the herbs into the cuts with his bare hands. The *olólà* used the same knife for all operations and cleaned it simply by rinsing it in a bowl of water. The potential for HIV transmission between practitioner and clients and among clients during these procedures is discussed—as is the potential of health education for reducing the demand for female circumcision and training indigenous healers in hygienic methods.

Introduction

Concern about the increasing prevalence of persons with HIV and AIDS in Nigeria (Mohammed *et al.*, 1988; FMOH, 1992) has led to coordinated national efforts to raise the level of public awareness

about the disease and the need to reduce high-risk behaviors (Oladepo and Brieger, 1994; Development Research Bureau, 1992; Odebiyi, 1992). Most of the focus has been on the major route of HIV transmission, i.e. heterosexual networking (Chickwem *et al.*, 1988; Orubuloye *et al.*, 1990, 1993; Ajuwon *et al.*, 1993–94; Ososanya and Brieger, 1994).

It is, however, important not to lose sight of other ways that HIV can spread, especially as the overall prevalence rate in the community rises, creating more opportunities for the virus to be transmitted through these mechanisms. Contact with blood and blood products is one such route of HIV transmission. While efforts are under way in the formal health sector to protect blood supplies and improve the safety of health worker practices, little attention has been paid to the indigenous health care network where a majority of people seek help.

Indigenous surgical practices of concern include circumcision, medicinal blood letting and scarification or tattooing (Hrdy, 1987). The exact nature and cultural context of these practices require in-depth study so that their potential risk for HIV transmission can be assessed and so that culturally appropriate interventions can be planned to prevent risk. The purpose of this study was to contribute, in a qualitative manner, to a greater understanding of these practices in southwestern Nigeria. Other work in southwestern Nigeria has shown that indigenous healers handle the majority of cases of childhood circumcision (Olamijulo *et al.*, 1983; Onadeko and Adekunle, 1985). Thus the hygienic quality of their work has a major bearing on the control of infections.

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Methods

Ago Are, the site for this study, is a rural Yoruba community situated 150 km north of Ibadan, the capital of Oyo State, Nigeria, and is inhabited by 15 000 residents. In Ago Are, the basic social unit is the extended family compound, which consists of a cluster of houses occupied by paternally related people, their spouses and children. Subsistence farming is the major occupation of the men, while women are mainly petty traders.

Qualitative methods were used to learn about the indigenous surgical practices in Ago Are. These began with interviews of both male and female community leaders who identified the common surgical procedures and their practitioners. These leaders included the heads of two voluntary associations, three religious leaders (Christian, Moslem and African) and two honorary chiefs. Subsequent observations and interviews of the practitioners were conducted by the principal author, after permission was obtained, in the homes of the practitioners or the clients where the surgery was performed.

This study was part of a larger project that looked at local practices that may facilitate the spread of HIV/AIDS in a rural community. Twelve focus group discussions (FGDs) were held, divided equally among both married and unmarried men and women. The interview guide included questions about sexual behavior as well as male and female circumcision.

Results

The findings on indigenous surgery are presented according to four common types—circumcision, facial marks, tattooing and medicinal incisions. The first three practices are performed by an *olólà* (derived from *ilà*, the facial markings that identify family and town of origin). The job of an *olólà* is hereditary. In most Yoruba towns one finds extended family compounds bearing the name *Olólà*, signifying the residence of current *olólà*. In Ago Are, the resident *olólà* died in 1980 without passing the skills on to his son.

The town is now served by two *olólà* from the

nearby town (5 km) of Tede. Both were interviewed, although only one had regular business in Ago Are. This *olólà* came to town every Sunday. He was about 45 years old with 25 years experience. He had no formal education and was also a part-time farmer. The other *olólà* was about 70 years old and mentioned his advanced age as a reason for not traveling to neighboring towns. He also had no formal education and did part-time farming.

Prior to his arrival in Ago Are, the *olólà*'s relatives resident in town would have collected the names and addresses of clients. Observations were made during five visits by the *olólà* who performed 14 circumcisions, five facial markings and one tattoo in the homes of clients. This *olólà* had only one knife, a 7.5 cm diameter metal disc attached to a 5.5 cm metal handle, which was made by a local blacksmith. The second *olólà* had a set of four knives, with 7.5 cm blades with 6 cm metal handles, one each for male circumcision, female circumcision, tattooing and facial marks.

In preparation for the operation the *olólà* removed the knife from his bag and placed it in a bowl of water collected by the client from a well or stream. Operations were carried out behind the client's house, in the open courtyard of the extended family compound where there was adequate light. The mother of the child to be circumcised swept the ground and set out a straw mat with a cloth on top.

Both *olólà* said that the ideal time for operations was early in the morning, before the sun comes up, in order to prevent excessive bleeding. After the sun comes up, 'the blood becomes thin'. The *olólà* arrived in Ago Are by 7.00 a.m. and refused to work after 9.00 a.m., limiting the operations to two or three per visit. Both thought that the ideal age for circumcision and facial markings was during the first month because, 'A child of this age would not feel much pain. Also, wounds heal faster at this age'.

Circumcision

Half of the circumcisions were performed on female children aged 6–24 months, while the male

children were 1–24 months. In only one home were two circumcisions performed. The *olólà* described two main reasons for male circumcision. First, under Islamic faith, it is believed that God will not accept the prayers of an uncircumcised man. Secondly, they believed that dirt could accumulate under the foreskin and destroy the penis. FGD participants in all groups thought that, 'It is shameful for a man not to be circumcised', while in the male groups, dirt was also mentioned. They also said that, 'Circumcision makes penetration of the vagina easier'.

Concerning preference for *olólà* over government midwives, the FGD members said that, 'The *olólà* will do it free of charge for some of us. All we will give is food and kola nut. Since we can get this service for free, why should we take the child to the maternity center where fees are charged?'. The maternity center charged a flat N10.00 (approximately \$1.00 at that time), while fees of the *olólà* could be negotiated.

They also believed that the *olólà* would perform better because of his experience, his magical powders and herbs that prevent excessive bleeding and death, and the blessings he had received from his forefathers. A few married men thought that male circumcision performed by an *olólà* was more likely to enhance erection during sexual intercourse.

The following additional items were required of the family for all of the male circumcisions: local soap (made from ash and palm kernel oil), a bottle of coconut oil, a lump of red clay and a snail (in three operations).

The *olólà* asked the mother to undress the boy, place him on the mat and have two relatives hold him immobile. He dropped the knife in the bowl of water. Some drops of the water were sprinkled on the genitals to 'cool' the area. The *olólà* then made an incantation. He gently pulled the foreskin forward, cut off the tip and dropped it into the water. The *olólà* dropped the knife into the water. The *olólà* peeled back the remaining bleeding foreskin until the end of the penis was fully exposed and removed the foreskin completely. Both knife and foreskin were dropped into the water.

Next he made a paste of red clay and local soap in the palm of his hand. This was rubbed around the wound to prevent excessive bleeding. He then tore a piece from the cloth on which the boy had been lying, dipped it in the coconut oil and tied it around to wound to 'facilitate healing'. The cloth on which the child lay was used to wipe blood from the child's body.

When a live snail was used, its shell was cracked against a stone, and the juice from it dripped over the wound after the paste had been applied. The snail juice was intended to cool the wound and was used only where the client was perceived as being able to afford this costly item. The whole process lasted 7 min on average. For the two brothers who were circumcised on the same day, the *olólà* did not change the water and only rinsed the knife between operations (an interval of 5 min).

After the operation, mothers chanted the child's *oriki* (traditional praise names and ancestral history). They also said, 'The child has become a man, having endured the pain.' At this point an elder said a prayer that, 'The child will grow up and be able to circumcise his own children.'

In cleaning up, the *olólà* rinsed the blood from the knife inside the bowl of water, wiped it with a cloth and put it back into his leather bag. On one occasion the *olólà* simply wiped the knife on the ground. The *olólà* instructed the mother to use hot fomentation on the wound every morning.

The least radical form of female circumcision, Sunna, is performed among the Yoruba (Onadeko and Adekunle, 1985) and was observed in this study. The *olólà* gave four reasons for female circumcision: (1) the clitoris is capable of automatic arousal, stimulating a girl to be promiscuous; (2) if the head of the fetus touches the mother's clitoris during delivery, the child will not grow well; (3) an uncircumcised woman will suffer protracted labor and difficult delivery; and (4) penetration of the penis during intercourse is easier.

Differences in FGD responses concerning female circumcision were found between the married and unmarried groups. For example, married participants strongly favored female circumcision, saying that, 'Prostitution is common in areas where

females are not circumcised'. Only one married woman was not in favor. In contrast, both younger men and women in the groups of unmarried participants were non-committal in their support of female circumcision.

Preparation and materials for female circumcision were the same as for males. Coconut oil and snails were not used in any of the operations observed. The girl was restrained, while the *olólà* used his left hand to hold the clitoris. Because it was slippery, he first rubbed his thumb and forefinger on the earth. After achieving a firm grip, the *olólà* cut off the end of the clitoris. This was dropped in the bowl of water along with the knife. Other procedures were the same as described above.

Since circumcision is also performed by the government midwives, the investigator visited the maternity center. Records were not kept because, 'We are not allowed to do this (female circumcision), but because people demand the service, we carry it out for them. We keep the money for ourselves'.

Other operations

According to both *olólà*, facial markings are done for beautification. This differs from traditional facial marks that denote a person's town and family identity (Bascom, 1969). The first *olólà* said he had performed only three traditional markings in the past 5 years, while the elderly *olólà* said he had done none. Of the five children receiving marks, four were female. Only one, a girl, received both circumcision and facial marks.

Cold water was sprinkled on the face first, then two 2.5–5 cm vertical incisions were made on each cheek, starting about 2 cm below the center of the eye and cutting downwards. The *olólà* wiped the blood off with his hands and rinsed them in the bowl of water, after which he dropped the knife in the water. He then used his fingers to remove soot from inside the lantern and rubbed this into the two cuts to stop bleeding. The knife was rinsed in the bowl, dried and replaced in his bag. He instructed the mother to clean the scars with hot water daily and to continue applying either lantern soot, coconut oil or kerosene until the wound heals.

According to the *olólà*, tattooing is usually performed on the inside of the forearm of the mother immediately after a child's circumcision. This is done so that the mother appreciates the child's pain and encourages her to take good care of her child. Other sympathizers present at the operation may also request a tattoo. These are given free of charge, as a bonus.

During the 19 operations on children observed, only one person requested a tattoo, the senior sister of a girl being circumcised. The same knife and bowl of water used for the circumcision was employed for the tattooing. The design consisted of nine cuts. Lantern soot was applied afterwards.

Medicinal incisions are provided by an *onísegùn* or indigenous healer. The *onísegùn* interviewed and observed in this study reported that *gbeere* are made so that herbs can enter directly into the blood stream. It is believed that some herbs are more effective if introduced directly into the blood. This is both a preventive and curative procedure. A common preventive use of *gbeere* is protection against auto accident, scorpion sting and snake bite. It can also bring relief from severe headache.

The *onísegùn* observed was 61 years old and had no formal education. He had other sources of income—work as a night guard, a farmer and a hunter. He reported that incisions are about 1 cm. Seven incisions is the most common number, but this may vary up to 21 according to the seriousness of the problem. Curative incisions are made on the affected part.

Either a knife or a razor can be used, but these must be brand new. The *onísegùn* prepares the herbs in powder form, while the client brings the knife or blade. The *onísegùn* is required to make the incisions only when the condition is very serious and requires incantations. For less serious conditions, the client may ask any male to make the incisions and apply the herbs. The client must discard, preferably bury, both the blade and the remaining herbs immediately, so another person can never find these, or else the *gbeere* will not work.

The investigator was invited to observe one procedure. The patient was a 30 year old woman

who complained of severe headaches. The woman had brought a new blade. The *onísegùn* had already prepared the powdered herbs wrapped in paper. The client sat on a stool in the sitting room of the *onísegùn*'s house. The man made seven small incisions in the center of the forehead near the hairline producing tiny drops of blood. He rubbed the powdered herbs into the incisions, then recited some incantations. When he finished, he told the woman to dispose of all materials safely and to return in a few days to see if there was any improvement. The procedure lasted less than 5 min.

Discussion

The results of this study have identified health risks of indigenous surgery, but also have pointed toward possible educational interventions that could reduce these risks. Due to the small number of clients on any given day and the time lapse between operations, the chance of HIV spread among clients in Ago Are seems low. Therefore, the most likely scenario for transmission involving indigenous healers in rural Nigeria is a healer as a focus for transmission once he himself becomes infected. Being peasant farmers, these healers could easily have cuts or sores on their hands, or they may cut themselves during an operation.

Health education for preventing infection related to the work of traditional healers should take two directions. One is longer term, preventing the need for some surgeries, while the second is improving hygiene during operations. The lack of strong support for female circumcision among younger (unmarried) FGD members parallels findings by Ebomoyi (1987) and Onadeko and Adekunle (1985) that indicate a natural decline in the practice may be in progress. Health education can reinforce this trend with young people since AIDS education in school is in Nigeria (Development Research Bureau, 1992).

Community education about avoiding female circumcision must proceed with caution, since a major reason why people value female circumcision is prevention of promiscuity. Since this concern fortunately coincides with some AIDS

prevention messages, efforts must be made to emphasize this point during community health education, so that health educators are not seen as undermining traditional values.

Concerning hygienic practices, training of traditional community birth attendants (TBAs) sets a positive example to follow with the *olólà* and other healers (Verderese and Turnbull, 1975). Training needs to be practical, with follow-up supervision (Eades *et al.*, 1993). Positive examples do exist of involving indigenous healers in AIDS education (Chirwa and Sivile, 1988–89; Schoepf, 1992; Karim, 1993).

In conclusion, indigenous surgical practices in rural Nigeria are integral to local culture and meet perceived needs that are not fully addressed by the orthodox health services. Unfortunately, some of the practices pose intrinsic health threats in themselves (e.g. female circumcision) and all hold the risk of disease transmission through blood contact. Health education of younger populations is a long-term approach to reduce the risk. In the short term, practical training of indigenous surgeons that teaches hygienic procedures and is integrated into primary health care systems is recommended.

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