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EDITORIAL

Incentives Programme in Maternal Health: An Example of Evidence Based Policy Development and Its implementation in Nepal

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Uterine Prolapse in Nepal: The Rural Health Development Project's Response

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Abstract-

This paper describes Rural Health Development Project (RHDP)'s experience with women's health and uterine prolapse (UP) in three districts in Nepal. Gynecological and UP surgical camps are discussed and data analyzed in light of increasing interest in UP from a social development perspective. The findings indicate that non-medical contexts and factors play a much more significant role in UP than current literature suggests, both as causation as well as significantly influencing prevention and treatment success. The author links these findings to the greater issues of women's empowerment and poverty alleviation. Promising lessons from the RHDP experience are shared as an important component towards engaging in a more holistic dialogue, and response, to preventing and treating UP.

Key Words: genital prolapse, uterine prolapse, reproductive morbidity, gynecological morbidity, maternal health, Nepal

Introduction

Reducing maternal *morbidity*, however, which causes untold suffering to millions of women, is not accorded comparable priority¹. One of the most common, but often hidden, gynecological morbidities is uterine prolapse (UP). A progressive and chronic public health concern, UP occurs when the muscles of the pelvis no longer support the positioning of the uterus and it drops into the pelvic cavity, and eventually descends out of the vagina. Globally, 30% of all women who have delivered a child are affected².

Nepal has a maternal mortality ratio of 281 per 100,000 live births³. While this number has decreased (from 531 in 2001), it remains one of the highest in South Asia⁴. For every maternal death, an estimated six to 15 women face debilitating morbidity⁵. Population-based studies reveal that between 9-35% of Nepali women are suffering from UP – some as young as 15, and some for as long as 45 years^{1,6,7,8}. Up to 40% of affected women are of reproductive age with only one child, and at least 200,000 are in need of immediate surgical treatment^{1,3,6,9,10}.

This paper focuses on the Rural Health Development Project's (RHDP) Extension Period and Phase VI (2006-2009) response to UP in three districts of Nepal: Dolkha, Ramechhap, and Okhaldhunga. RHDP was designed by the Swiss Agency for Development and Cooperation (SDC) in Nepal in 1991, as part of their ongoing bilateral agreement with the Government of Nepal.

Methods

RHDP's Response to Uterine Prolapse in Nepal

The Rural Health Development Project aims to improve the overall health status of rural people of Dolakha, Ramechhap and Okhaldhunga districts. The project does this

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by strengthening the linkages between demand and supply through positively changing health seeking behavior of community people, especially women, and capacitating local health service providers to respond to priority health needs. RHDP utilizes participatory and inclusive methodologies, working with local community members and groups, health care providers and promoters, and systems and bodies that bring communities and providers closer together¹¹.

One urgent health priority identified by local community members in RHDP districts was UP mitigation. According to most medical textbooks, UP occurs in post-menopausal women who have had multiple vaginal births and large babies. Evidence from developing countries including Nepal, however, suggests that prolapsc occurs in women^{1,2,5,7,9,10,12} vounger much Contributing medical factors include early pregnancy, multiparity, inadequate birth spacing, prolonged labor, large babies, and intercourse too soon after delivery, maternal malnutrition, excess intra-abdominal pressure, and forced abortion 1,2,3,7,9,10. A progressive condition, first degree UP is controllable with diet and exercises; second and third degree managed by ring pessaries inserted into the vagina; and advanced third degree and procedentia cases treated by hysterectomy.

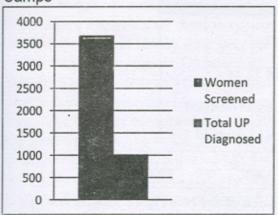
RHDP field staff became increasingly aware of the problem of UP due to the frequency symptoms and side effects were raised in mother's group discussions, and during community outreach activities. UP can compromise basic daily activities such as standing, sitting, lifting, and walking. It can

cause backache, difficulty urinating and defecating, hemorrhoids, abdominal hernias, abdominal pain, unpleasant discharge, ulcers, and infection. It also increases the incidence of reproductive and urinary tract infections fourfold13. RHDP's response to organizing UP included mobile gynecological 'camps' for rural women. Camps were collaborative efforts, involving input and resources from the project, the District Health Office, other local and international organizations working in the area, community leaders, local health workers and volunteers, and mother's group members.

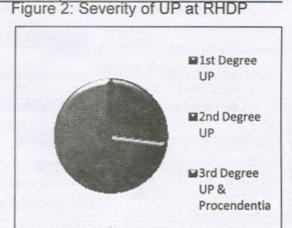
Results

During thirteen camps organized by the project between July 2005 and December 2008, 3675 female clients received gynecological services. In total, 1006 women were diagnosed with UP, a prevalence of 27.4% (see Figure 1). This figure includes a number of women who attended camps, advertised as for all gynecological concerns, and were surprised to learn that their prolapse was not 'normal'. Nearly 40% of UP cases diagnosed were advanced (third degree and procedentia). and nearly 53% of these required surgery, an indication of the rapid progression from first degree to advanced prolapse amongst poc., rural women (see Figure 2 and Figure 4). Concurrent diagnosis included urinary and reproductive tract infections, cystocele, rectocele, infertility, abdomen pain, backache, decubitus, ulcers, and keratinization¹⁴

Figure 1: UP Diagnosis at RHDP Camps Camps



RHDP works to ensure that all social groups in catchment areas had equal access to project activities, including UP camps11, Knowledge about upcoming camps was conveyed to rural women and women's groups through village health workers, pamphlets, FM radio spots, and RHDP's own community health workers, who targeted poor and disadvantaged communities. Despite these efforts, camp utilization by poor Dalits (occupational castes. typically suffering social discrimination and exclusion) and ethnic Janajati minorities, was overshadowed by high participation from privileged Brahmins, Chhetris, and Newars (see Figure



3). Of UP cases diagnosed, 60% are Brahmins, Chhetris and Newars, 28.7% Janajatis, and 11% Dalits, a reflection of attendance patterns. Sixty-four percent of third degree and procedentia cases were Brahmins, Chhetris and Newars, 27% Janajatis, and 9% Dalits. However, of the 42% of cases referred for surgery that dropped out, only 38.2% were Brahmins, Chhetris or Newars, while 52.1% were Janaintis and 39.6% Dalits. This underscores the fact that poor and disadvantaged women have greater difficulty accessing and benefiting from services. It also hints at the possibility that, unintentionally, Janajatis may have been overlooked in the quest to improve data on Dalits participation.

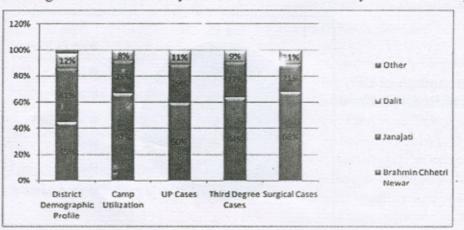
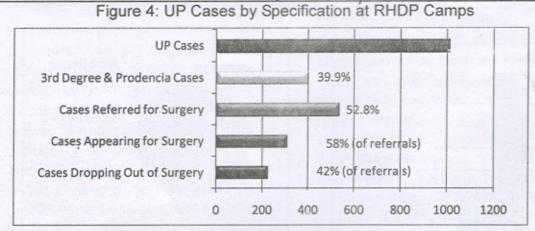
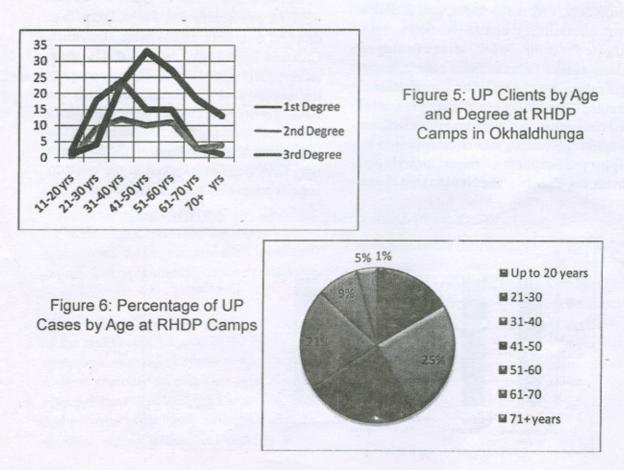


Figure 3: Attendance by District and Caste/Ethnicity at RHDP Camps

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At RHDP camps, UP ranged in women from 18 to 74 years of age (see Figure 5), with half of cases occurring in women between the ages of 31-50, the peak of their productive and reproductive years (see Figure 6). In Okhaldhunga, the mean UP client age was 49.85, but when broken down by ethnic distribution, the mean age for Dalits was 40. This is much younger than for Janajatis, whose mean age was 46.7, or Brahmins, Chhetris and Newars, whose mean age was 52.4. Dalit women, suffering greater hardship at the hands of poverty, are clearly engaging in activities that aggravate their UP more than other, less discriminated, groups.



Most UP clients had suffered for 11-20 years before seeking care, with 3% suffering over 41 years (see Figure 7). Of those dropping out of surgery, most (55%) were between 21 and 50 years of age. In Okhaldhunga, most UP clients had delivered their first child in early marriage, between 14 and 18 years of age. The majority of women aged 21-30 presented with first degree UP, while those 41-50 presented with third degree UP. On average, third degree UP cases had delivered five children, at home, and mostly without skilled birth assistance. This was not casebook, however, for several women were in their early twenties, having delivered only one child. Only 6% had received antenatal care checkups. Many described the use of foreign objects to 'force' delivery of the baby and placenta. Most claimed to have resumed regular domestic chores within the first few days after delivery. All these activities aggravate UP.

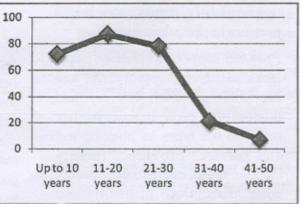
Figure 7: Number of Years Suffering UP at RHDP Ramechhap and Okhaldhunga Camps

Discussion

Causative Practices

While these examples come directly from RHDP experience and literature review of other studies conducted in rural Nepal, the broader categories are true for women, and especially poor women, well beyond Nepal's borders.

- Early marriage. According to the 2006 Nepal Demographic and Health Surveys, 60% of women are married by the age of 18³. Forty percent of Nepalese women have given birth to at least one child before the age of 19¹⁵. Early marriage leads to early childbearing age and a greater number of lifetime pregnancies.
- Female labor burden. Women in Nepal work 11-16 hours a day, much higher than the global average, and 3.1 hours more than men^{16,17,18}. This includes demanding agricultural work in addition to physical household chores. Heavy work and manual labor often continues during



pregnancy, and resumes within a few days of childbirth. The struggle for daily survival means that most households cannot subsist without a woman's labor contribution for more than a few days¹⁰.

 Gender devaluation. Nepal has one of the highest son preferences in the world¹⁶. This results in women having multiple births and short birth intervals, in the repeated attempt for a boy. The low social value accorded girls and women influences genderbased violence. Gender discrimination also leads to a lifetime of inadequate nutrition in both quantity and quality of food, and high maternal malnutrition¹⁵.

- Improper pregnancy and birthing practices. Only 53.4% of rural women receive prenatal care, and 18.8% postpartum services. With more than 81% of births still occurring at home, very few deliveries are assisted by a skilled birth attendant3,15. Some untrained assistants apply significant pressure to the lower abdomen during labor to 'force' the birth and expel the placenta, Following delivery, it is common for the new mother to receive massage, but a masseuse can unknowingly apply too much pressure to the pelvic region.
- Poor health-seeking behavior. Nepal lacks sufficient, appropriate, and accessible prenatal, delivery, and postpartum care. Inaccessibility refers to the types of practitioners and services provided, facility locations, financial and opportunity costs, perceptions of quality and reliability, degree of outreach and follow-up, etc. Additionally, there is a lack of promotion and awareness raising around 'women's' issues. Subsequently, girls and women have poor health seeking behavior. Eighty-three percent of women suffering UP did not seek treatment until it was advanced, and most suffered 21-30 years7,8.

Causative Contexts

These cultural practices play out to varying degrees within a socio-economic context involving a (i) *patriarchal and caste-based social structure* guiding local belief systems, norms, values, behaviors, and roles; and, (ii) widespread *poverty*.

Socio-Economic Lessons and Solutions

Development workers in the field of public health know what medical practitioners are beginning to appreciate - that the only sustainable way to reduce the incidence of UP requires going beyond the medical causes, to the 'sources' of the issue. For a real and sustained impact, development and medical responses need to work in tandem, taking into consideration the socioeconomic practices and contexts that affect women's reproductive health¹³.

Learnings for Prevention

Most Nepalese women are aware of UP risk factors, including early child bearing age, heavy work during and following pregnancy, pressure on the lower abdomen during childbirth, lack of postpartum care, improper diet, and multiple births13. Women are also aware of preventive practices, including postponing marriage, using family planning to space and reduce pregnancies, rest during pregnancy and postpartum, eating a nutritious diet, and having skilled birth attendance^{8,13}. This is largely due to awareness raising and outreach programs conducted by community health promoters, female health volunteers, and mother's group.

Sustained attention to prevention demands action at all levels, including at the health policy level. In 2006, RHDP joined with 32 organizations (donors, non-governmental organizations, networks) to form the UP Alliance (UPA), with a national advocacy agenda. The UPA plays an umbrella role, working on:

UP policy

- Providing programmers with informational and educational materials for community awareness raising
- Training health care providers to detect cases early before surgery is required
- Incorporating UP messages into relevant higher secondary school curriculum.
- Advocating for the inclusion of UP in health policies and strategies, where it currently is only mentioned as a reproductive health problem of post-menopausal women^{13,19}

In 2007, they drafted a National Strategy on Uterine Prolapse. Unfortunately, internal and political conflict seems to have reduced UPA's initial momentum, stalemating activities.

Learnings for Treatment

Unlike prevention, very few Nepalese women knew about UP treatments, and 83% did not seek treatment until they had advanced prolapsed⁷. In the absence of a national prevention and awareness-raising agenda, myths and rumors blaming women for UP are rampant. Unchecked, these rumors discourage women from seeking treatment.

RHDP's approach was prevention first, but where treatment was mandatory, the project preferred to counsel women about exercises and diet, and insert ring pessaries, rather than conduct hysterectomies. Ring pessaries, while simple and ingenious at managing moderate UP, require frequent cleaning and replacement to prevent infection. After documenting cases of women wearing ring pessaries for ten or more years because they were unable to obtain maintenance care, RHDP camp medical personnel began to teach women how to regularly remove, clean, and replace the rings themselves, rather than expect them to make frequent trips to health facilities. Through the UPA, RHDP is campaigning to list UP as an Essential Health Care Service, and ring pessaries as an 'essential' medical supply, ensuring they are stocked at all health facility pharmacies.

Socio-cultural

- Time and location: Initial RHDP . gynecological camp lengths were one day, which resulted in the turning away of many would-be participants due to lack of time. Additionally, referral clients faced difficulties attending surgical camps because of seasonal labor demands. Early on, RHDP increased gynecological camp length to three days, and planned camps in central locations, to increase accessibility and participation, and follow-up surgical camps were scheduled in the winter to avoid peak agricultural and rainy seasons. In Dolakha, RHDP implemented a voucher system for referrals after finding that one-off camp-based surgeries were not convenient for many clients.
- Social stigma: UP is associated with widespread stigma and discrimination against women suffering from UP. To overcome this, RHDP stopped calling camps 'UP' camps, and instead advertised them as 'gynecological' camps, while quietly maintaining the UP focus. This additionally encouraged more women to attend, and resulted in the

camps capturing a larger number of UP cases.

- Health delivery and health-seeking behavior: Strong coordination with political parties and local medial helped to overcome the negative influence a decade of internal violence and political instability, and poor health delivery, had on healthseeking behavior. Collaboration with other organizations working in the districts tapped additional resources and audiences.
- Gender, ethnicity, and language: Most surgeons are male, speak Nepali, and are from privileged caste/ ethnic groups. These factors are potentially intimidating for many rural women who hesitate to have male practitioners address their 'female' problems, may have faced discrimination by 'elite', and might speak Nepalese poorly as a second language. RHDP, therefore, made an effort to have female gynecologists and surgeons whenever possible, and local interpreters (such as female community health volunteers), to act as an interface with providers answering questions, and explaining the risks of incomplete treatment.
- Terminology: For many women and families, the term 'operation' in Nepal is feared as synonymous with death. Women reported seeking surgical treatment only as a last resort after trying many traditional, and sometimes dangerous, remedies. RHDP found that engaging local women who had successfully undergone surgical interventions as spokespersons and surgery

advocates, much of the fear and misinformation was countered, and women were more apt to complete treatment.

Financial

While RHDP and partners underwrote the cost of each surgery, they were unable to underwrite the many other secondary costs including transportation, food, time away from work, and reduced agricultural production. The importance of these secondary costs were particularly telling in Okhaldhunga, where surgical cases were required to travel to Manthali in neighboring Ramechhap District for the actual surgeries. An astounding 50% of Dalits, 72.5% of Janajatis, and 75.4% of Brahmins. Chhetris and Newars never appeared for surgery. To find a solution, RHDP explored ways of mobilizing mother's groups and linking group revolving funds to UP activities, allowing poor and discriminated women the opportunity to take low interest loans to help cover secondary costs. RHDP also looked at ways to reduce transportation expenses. At a higher level, RHDP's efforts through the UPA resulted in the Ministry of Health and Population allocating funds for 12,000 women to obtain free hysterectomies for advanced UP during the fiscal year mid-2008 to mid-2009

Uterine prolapse is a ch ronic and progressive condition affecting up to a third of Nepalese women. 'Hidden' due to shame, fear, and a belief that prolapse is 'normal', studies of UP were rare until a few years ago. Most studies of UP are from a clinical perspective, attempting to flush out the prevalence, etiology, and risk factors. Very few studies look at the socio-cultural practices and contexts affecting and/or

influencing UP. RHDP's experience in the districts of Dolakha, Ramechhap and Okhaldhunga, Nepal, demonstrates the impact these factors have on prevention and treatment-seeking behavior, a message reinforced by their data from UP camps. The lack of non-medical information on the contributing practices and contexts of UP. in Nepal and elsewhere, encourages widespread misinformation and adherence to damaging socio-cultural practice's. Comprehension of the role of socioeconomic factors and gender discrimination on UP is needed to reduce stigmatization, advocate pro-women policies, and improve health care delivery and behavior.

There is no argument that UP has an overarching and negative effect on all aspects of a woman's life. "In that there will always be women, and there will always be poor women, and at least for the foreseeable future in Nepal, there will be poor undernourished women engaged in hard labor with scant access to health care, which they cannot at any rate afford in terms of time ... or money ..., (UP's) impact is akin to that of an infectious disease"10. Only a holistic approach that considers educational. socio-cultural, religious, and economic aspects of health care; that focuses on prevention, early management, and research; and that includes collaboration between public, private, and non-profit bodies and institutions, will succeed in reducing UP and other female morbidities20.

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गर्भवती महिलालाई महिलाको उमेर २० वर्ष पुगेपछि र ३४ स्वास्थ्य संस्थामा नै लगि वर्षको उमेर भित्रै बच्चा सुत्केरी गराऔं, आमा र जन्माएमा आमा र बच्चाको स्वास्थ्य स्रक्षित बच्चाको स्वास्थ्य गरौं। निरोगी राम्रो हन्छ । जिल्ला जनस्वास्थ्य जिल्ला जनस्वास्थ्य कार्यालय कार्यालय धन्षा कन्चनपर