Cultures and Contexts Matter

Understanding and Preventing HIV in the Pacific

Warning: This publication addresses sexual practices in the Pacific, which are critical to understanding and preventing the spread of HIV. Please note that parts of this publication contain explicit subject matter and language that some readers might find offensive.

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Abbreviations

ADB	Asian Development Bank
ARV	antiretroviral drugs
AusAID	Australian Agency for International Development
BSS	behavioral surveillance survey
EAPRO	East Asia and Pacific Regional Office
ECPAT	End Child Prostitution, Child Pornography and Trafficking in Children International
EXPAT	End Child Prostitution, Child Pornography, and Trafficking in Children
FSM	Federated States of Micronesia
HSV	herpes simplex virus
IDU	intravenous drug users
ILO	International Labour Organization
KHATBTF	Kiribati HIV/AIDS/TB Task Force
KNACC	Kiribati National Advisory Committee on Children
MDG	Millennium Development Goal
MHMS	Ministry of Health and Medical Services
MOH	Ministry of Health
MSM	men who have sex with men
NAC	National AIDS Council
NACS	National AIDS Council Secretariat
NGO	nongovernment organization
NHASP	National HIV/AIDS Support Project
NSRRT	National Sex and Reproduction Research Team
PAHP	Pacific Action for Health Project
PICT	Pacific Island countries and territories
PLWH	person living with HIV
PNG	Papua New Guinea
PNGIMR	Papua New Guinea Institute of Medical Research
PRB	Population Reference Bureau
PRHP	Pacific Regional HIV/AIDS Project
RMI	Republic of the Marshall Islands
SPC	Secretariat of Pacific Communities
STD	sexually transmitted disease
STI	sexually transmitted infection
UN	United Nations
UNAIDS	Joint United Nations Programme on HIV/AIDS
UNESCAP	United Nations Economic and Social Commission for Asia and the Pacific
UNFPA	United Nations Population Fund
UNGASS	United Nations General Assembly on AIDS
UNICEF	United Nations Children's Fund
UNODC	United Nations Office on Drugs and Crime
USAID	United States Agency for International Development
VCCT	voluntary confidential counseling and testing
WAC	Women's Action for Change

Introduction

HIV in the Pacific

By the mid-1980s, a few of the 22 Pacific Island countries and territories (PICT) from the three subregions of Melanesia, Micronesia, and Polynesia began reporting HIV infections through passive surveillance. The first HIV infections were reported in the Republic of the Marshall Islands in 1984, followed by French Polynesia and Guam in 1985, New Caledonia in 1986, and Papua New Guinea (PNG) and Tonga in 1987. By close of the decade, Fiji Islands and the Federated States of Micronesia had joined the list. During the 1990s, HIV continued to spread to other countries in the Pacific, including Western Samoa (1990); Kiribati (1991); and Palau, the Solomon Islands, Tuvalu, and Wallis and Futuna (by 1995). In the new millennium, the Northern Marianas, Nauru, and Cook Islands (2000); Vanuatu (2002); and American Samoa (2004) for the first time reported people living with HIV. Thus, by the end of 2004, surveillance data confirmed HIV infections in all PICT, except for Niue, Tokelau, and Pitcairn (Sladden, 2005).

The HIV epidemiological situation varies greatly within and between PICT, with epidemics increasing in different places at different speeds and with different intensities (NACS, 2005b; Sladden, 2006; UNAIDS, 2005). By the end of 2004, many countries were identified as low prevalence epidemics reporting less than 10 HIV infections (e.g., American Samoa, Cook Islands, Nauru, Solomon Islands, Tuvalu, Vanuatu, and Wallis and Futuna). While statistics of PLWH might appear small in many countries, these can reflect high rates of infection because of their tiny populations—and the potential impact can be great. As Jenkins (2005) explains, "the distribution of recorded infections might be viewed in different ways. The 'cumulative incidence per 100,000' is a good indicator of the potential impact of HIV on the local population. Even small numbers of cases in small populations (e.g., Tuvalu), particularly if found among young working men, can have a devastating impact at the local level." Only nine people in Tuvalu have been diagnosed with HIV. However, with a population of only 9,600, the rate of infection

in Tuvalu is close to that of French Polynesia and Guam, which have some of the highest numbers of HIV infections in the Pacific outside of PNG.

As of the end of 2004, some countries were reporting rising numbers of PLWH and accelerating trends (Fiji Islands, French Polynesia, Guam, New Caledonia, and PNG), with sharp increases seen in some countries (Fiji Islands). PNG is in the midst of a serious generalized epidemic, with the number of infections increasing about 30% per year since 1997 (UNAIDS, 2005). More than 90% of reported HIV infections in PICTs were in PNG at the end of 2004 (UNAIDS, 2005; NACS, 2005a). Outside of PNG, Fiji Islands, French Polynesia, Guam, and New Caledonia accounted for 84% of HIV infections among PICT.

While the number of reported infections continues to grow, the epidemiological situation in the Pacific remains uncertain, and reliable estimates are unavailable. Limited passive surveillance data on people diagnosed with HIV in PNG leave important questions unanswered about how HIV is being transmitted, whether AIDS-defining illnesses are present at diagnosis, and what are the ages and gender of those testing positive for HIV. Much of the essential data for PNG was missing as of the end of September 2005: 68% of HIV surveillance data did not identify whether an AIDS-defining illness was found; the mode of HIV transmission was not known in 75% of the cases; and age was missing in 38%, while the gender was unknown in 6% (NACS, 2005b). Country HIV passive surveillance data reported to the Secretariat of the Pacific Community by the end of 2004 had much less missing information. In the data on HIV infections from PICT outside of PNG, the mode of transmission was missing for only 3%, the age was unknown for 3%, and the sex of the person diagnosed with HIV was missing for only 1%. What is becoming clearer is that HIV in the Pacific is most prevalent among young people and young adults 15–34 years old. This group in its reproductive and productive years—whether defined as youth or adults because of biological or social markers—represents 61% of reported HIV infections in PICT outside of PNG.

However, it is highly probable that HIV in the Pacific region is underreported and underestimated. Widespread voluntary and confidential counseling and testing is not accessible, and the availability of blood screening, particularly in rural areas, varies. A perceived lack of confidentiality in health systems, limited knowledge and fear about HIV and

AIDS, and stigma and discrimination towards PLWH can create avoidance. These factors do not create enabling environments for testing, or encourage PLWH to be open about their situation. Underdeveloped HIV surveillance and the lack of probability sampling do not clarify the changing HIV epidemics in the Pacific, which "leaves the observer wondering what is missing" (Jenkins, 2005). Considering the limitations of surveillance and other data, the complex contexts of vulnerability and risk in the Pacific must be understood and addressed to slow the spread of HIV.

What has created the environments for HIV to spread more rapidly in some countries, such as PNG, than in others? Is it possible that HIV is spreading quietly undetected in some Pacific island countries? What is known—from HIV prevalence studies with sex workers and rural women; HIV sentinel surveillance with antenatal mothers and sexually transmitted infection (STI) patients in PNG; data about STIs and teenage pregnancy in Pacific island countries; and limited behavioral surveillance and other research—indicates that behaviors and sexual practices create considerable risk for HIV transmission (Buchanan-Aruwafu, 2002; Mgone et al, 1999 and 2002; NACS, 2005b; NSRRT and Jenkins, 1994; UNAIDS, 2005; UNFPA, 2005; WHO, 2006). However, to prevent the further spread of HIV in the Pacific, a better understanding is needed of the cultures, traditions, ideologies, practices, and contexts in which people live, as these influence HIV epidemics.

Culture, Contexts, Practice, and HIV

The Joint United Nations Programme on HIV/AIDS (UNAIDS) has long acknowledged the need to look at the factors that create vulnerability to HIV, including socioeconomic situations, legal and political contexts, instability and armed conflict, migration, sociocultural ideologies and practices, and social change (UNAIDS, 1998). However, few in-depth studies are available on the interrelationships between culture, contexts, ideologies, norms and values, sexualities, attitudes, and behaviors in the Pacific. This publication seeks to fill that knowledge gap, providing insight into the great diversity of cultures and traditions in the Pacific; the changes that these cultures have undergone and their impact; and the similarities

and contrasts in contexts, ideologies, attitudes, and practices that might be facilitating the spread of HIV epidemics in PNG and in other PICT.

Available data suggest that sexual transmission accounts for the majority of HIV infections reported worldwide; this also appears to be the case in the Pacific. Thus, it is essential to understand the integrated nature of people's lives, how culture and other factors relate to sexuality, and how these can contribute to HIV epidemics. In the first part of this publication, Carol Jenkins identifies and discusses in detail the cultural traditions, values, and scenarios that impact sex and sexuality in PNG—and the concepts and patterns of sexual behaviors most likely to put people at risk of HIV. Drawing on 15 years of research and experience in PNG, Jenkins aptly illustrates how historical and cultural changes over the years are relevant to HIV programs and policies in PNG today. In the second part, Holly Buchanan-Aruwafu focuses on the majority of the population of the Pacific—the young people. Through a review of available literature, she discusses from global and Pacific perspectives what is known about the epidemiology of HIV and other STIs in this group, young people's knowledge of HIV, their sexual practices and involvement in highly vulnerable groups, the similarities and contrasts in the contexts of young people's lives, and the structural factors that constrain them. Drawing on ethnographic research in Malaita, Solomon Islands, she illustrates how culture, sociocultural change, taboos regarding discussions about sex, age and gender inequalities, and conflict affect young people's vulnerability and risk of HIV infection.

Both authors discuss contextual and structural factors, including culture, which can impede HIV prevention efforts in the Pacific. Both also conclude that the power and strength of the diverse cultural traditions of the Pacific must be tapped to reduce HIV prevalence. By creating opportunities for sharing and discussing information, and engaging a wide range of cultural groups, local communities and leaders, and young people, locally adapted solutions and change can be created from within.

HIV/AIDS, Culture, and Sexuality in Papua New Guinea

Carol Jenkins, PhD

Executive Summary

Papua New Guinea (PNG) is undergoing a serious HIV epidemic that has not been dampened by any interventions. The cultures of PNG are diverse and unique. While the historical conditions in PNG have altered many of these cultural forms, concepts and values underlying these forms remain strong in many parts of the country, especially in rural areas. The aim of this paper is to explain some of the most common cultural forms, and show their relationship to the risk of acquiring an HIV infection. Except for specific high-risk groups, such as sex workers, standard approaches to HIV/AIDS prevention and care that have been successful in other countries, near and far, are unlikely to be appropriate for PNG, unless very sensitively adapted. Only Papua New Guineans can do this. The design of educational messages, types of behavior change programs, and ways to deliver care and treatment need to be adapted to local conditions and concepts. Designing programs in urban areas, especially in Port Moresby, is inappropriate for the majority of people at risk or infected who live in rural areas. Methods must be developed to localize the analytical work, design, and implementation of HIV prevention and care projects to fit the real lives and identities in PNG. Culturally competent persons need to be trained to provide educational and other prevention and care services. The processes developed over the past decade in PNG's environmental movement provide a good model for sustainable participatory action.

INTRODUCTION

PNG is experiencing a serious and widespread HIV epidemic. By the end of 2005, an estimated 57,000 persons between 15 and 49 years old were living with HIV/AIDS,[1] with a national prevalence of about 2%.[2] Women accounted for 49% of new infections. Approximately 66–70% of all infections are found in rural areas (National AIDS Council/National Department of Health, 2006). Despite claims that PNG is experiencing an epidemic similar to those in southern Africa, PNG is not an African look-alike. While certain aspects of social structure, kinship, and ritual are more like those in parts of Africa than in most of Asia, the cultures that evolved in PNG are distinctly different. Their diversity covers an enormous range of beliefs, practices, and structural elements relating to sex, gender, and fertility and reproduction—as well as their intrinsic relationships to all aspects of life.

Historical forces contributing to the development of contemporary PNG societies have played a major role in the nature of the current HIV epidemic. These biological, social, and economic processes have been documented better than those of the more distant past. The most salient studies are reviewed and examined in this paper for insights into improving the design of HIV prevention programs in PNG.

The aim of this paper is to summarize the critical issues arising from historical and cultural change, and their relevance to current programs and policies for HIV in PNG. Part 1 reviews what is known about the dynamics of HIV transmission, and alludes to how PNG cultural practices contribute to the spread of the virus. Part 2 addresses in more detail the elements of traditional (pre- and post-contact) sexual cultures. Part 3 reviews the documented cultural, biological, and historical factors contributing to PNG's HIV epidemic. Part 4 explores some of the cultural responses to HIV/AIDS in the contemporary context of PNG life, and suggests a way to improve the inclusion of cultural strengths in the design of interventions.

1 The estimates for the number of people living with HIV/AIDS range from 23,154 to 90,909.

2 The estimates for national prevalence range from 0.8% to 3.2%.

Most quoted material used in this paper comes from published and unpublished work conducted at the Papua New Guinea Institute of Medical Research, the Government's main medical research institute, from 1991 to 1997. These studies represent thousands of in-depth interviews (most of which were tape-recorded and translated from one of about 50 languages), observations, and a few quantitative surveys. As none of these studies utilized probability sampling, biases in the descriptive statistics are unknown. They are cited here merely to give an approximate notion of frequency of response, but research with proper probability sampling is required. In addition, this paper draws on my own 15 years of experience in conducting ethnography and human biology studies in PNG.

PART 1. WHAT DO WE KNOW ABOUT HIV EPIDEMICS?

An understanding of the scientific facts about HIV and AIDS is important before attempting to discern what places people at risk of acquiring an HIV infection.

HIV is spread from human to human by three routes:

- Sexual transmission;
- Blood transmission (contaminated transfusions, needle sharing during drug use, needle-stick injuries); and
- Vertical transmission (mother to offspring during childbirth or breastfeeding).

Sexual transmission of HIV accounts for more than 75% of infections worldwide. The probability of transmission of HIV by different sexual routes per episode of intercourse varies. Transmission of HIV from men to their female partners is more efficient than from women to men. Transmission of HIV through anal intercourse is more efficient than other sexual behaviors and particularly risky for the receptive partner. In addition, transmission per episode of intercourse is affected by the stage of disease of the infected subject. During the early acute stage of infection, when high levels of virus are present, the chances of transmission range from 1 in 10 to 1 in 1000; during a long 7–10 year asymptomatic phase, the range is 1 in 1000 to 1 in 10,000; and when the disease becomes symptomatic—becoming AIDS—the rate rises again to a range of 1 in 50 to 1 in 1000. Oral intercourse (either cunnilingus or fellatio) have very low probabilities of transmission unless blood is present. Other sexually transmitted diseases (STD), including gonorrhea, chlamydia, trichomoniasis, and herpes, make HIV-infected people more infectious to their partners and make HIV-negative people more likely to acquire HIV. Sexual practices that increase trauma and/or inflammation in the genital tract, such as certain vaginal cleansing practices, also increase risk for HIV transmission. Male circumcision (full removal of the foreskin) has been shown to significantly reduce the risk of acquiring HIV, as well as reduce the risk of transmission of HIV to men's partners (Auvert et al., 2005).

While treating HIV with antiretroviral drugs (ARV) can reduce the amount of virus significantly, it does not eliminate the capacity to transmit HIV.

A host of social, economic, cultural, and political factors facilitates the spread of HIV through populations. HIV spreads more widely where sexual networks are extensive, e.g., where a person is mobile or traveling and having sex with partners in multiple locations. Having multiple partners concurrently creates a node of transfer from one sexual network to another, when social distances between at least one pair of partners are significant (Gorbach et al., 2005). Where sexual networks are smaller and more circumscribed, HIV can spread but less widely. HIV spreads more easily where populations have high levels of other STDs, particularly those that produce ulcers. In all-male situations, such as prisons, mines, or construction camps, the risk of HIV transmission is high. Where economic differences between groups within a country are great, poorer men and women exchange sex for money, services, and goods with those having more resources. At the earlier stages of many epidemics, wealthier men acquire HIV more often than poorer men. However, as epidemics mature, the pool of infections tends to accumulate among poorer classes. This occurs because poorer and more marginalized people (including disadvantaged minorities of all sorts) have less access than others to information, services, and social power to protect themselves. In many countries, women in general fall into this category.

Hence, the specific actions needed to control the HIV epidemic include lowering the rate of partner change, reducing the efficiency of transmission, and shortening the duration of infectiousness. The consistent and correct use of male and female condoms effectively blocks transmission. Reducing the number and duration of other STDs also can slow the spread of HIV. Besides the need for preventive and curative health services, effective action requires intensive educational efforts. The political, social, economic, and cultural factors impeding such efforts have proven to be difficult to alter. In PNG, these factors interact in ways that have yet to be described and analyzed clearly. This paper will attempt to identify the concepts and patterns of sexual behavior that are most likely to place people at risk of HIV in PNG. While many of the practices of the past have been attenuated or have disappeared, ideologies and cultural forms remain alive, as Papua New Guineans seek to integrate their past and their present.

PART 2. SEXUAL CULTURES AND EARLY HISTORY

Even though cultures are studied by component (i.e., religion, politics, or kinship), these are simply heuristic devices, ways to organize thinking. In reality, humans live integrated lives, for example, with their religious beliefs permeating almost everything they do, and with power dynamics operating on all levels between people. Sexuality is a broad vague term. For the purpose of this study, we need a definition of the aspects of culture that apply to sexuality.

Sexual cultures can be understood to be constellations of ideas, practices, artifacts, and their meanings and contexts in which people participate, either as a lifelong involvement or at various times of their lives, which are adapted to meet felt erotic needs. The erotic components are linked to the body through (i) gender or role presentations; (ii) expectations and actions; (iii) larger kinship and social roles and structures; (iv) demographic dynamics; (v) economic environments; (vi) beliefs and political forces; and, as is becoming increasingly apparent, (vii) disease and its meaning. A myriad of factors influences sexual cultures, which vary through time and place.

Most earlier ethnographic studies on PNG analyze sexual aspects of culture in terms of symbolic, ritual, and kinship or exchange systems. Some explore gender relations, though fewer have attempted to examine cultural norms and values in relation to behaviors (Berndt, 1962; Knauft, 1993 and 1994; Kulick, 1993; Langness, 1969; Leavitt, 1991). Norms and behaviors rarely are highly congruent, in the past or today. When speaking with elder Papua New Guineans, many refer to the past as a "golden age" when sexual behaviors adhered to strict norms. However, numerous ethnographic accounts testify to the frequent breaches of norms and the consequences that ensued. Like today, social, political, economic, and religious factors played out in a wide variety of ways to produce cultural scenarios that gave a central role to human sexuality.

Geographically, PNG has extremely rough terrain. Barriers, such as gorges, swamps, and rugged, high mountains, constrain the movement and communication between one small area and the next. As a result, extraordinary variation between groups has evolved, particularly lin-

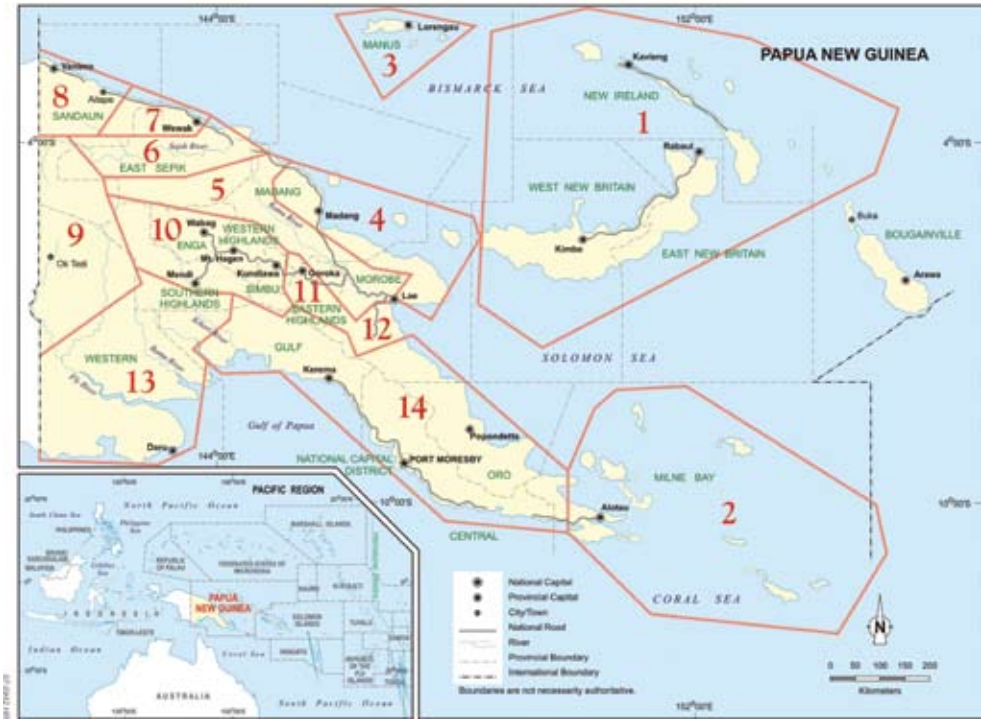
guistically. Variation in traditional sexual cultures is also great, ranging from highly permissive (e.g., the Trobriands) to extremely repressive (e.g., the Huli), sometimes right next to each other. Yet, throughout Melanesia several specific, apparently ancient themes are common, though they are expressed somewhat differently from place to place.

Traditional cultures in PNG held sexuality in high regard as a source of life, as well as group and individual identity. Sexual power, certain sexual practices, and sexual relationships were expressed in art displayed in stone, wood, and painting in natural dyes on various surfaces, including the human body. These also could be expressed in drama, dance, storytelling, and even song, focusing on various themes associated with sexuality. Moral principles, as well as origin stories, were illustrated through these modes of expression and enacted during ritual. Much of the variation depended on kinship, intergroup relations, and property claims which in turn helped define marriage customs, as well as norms regarding premarital sex, social definitions of gender, and other social facts. Ecological zones and subsistence patterns also played a part in influencing sexual cultures through the mediation of customs that influenced reproduction and population growth.

In the following section, major themes found in the sexual cultures of PNG (as well as the rest of Melanesia) are illustrated with quotes from focus group discussions and private interviews that took place over a decade ago during the fieldwork for the National Sex and Reproductive Knowledge and Behavior study conducted by the Papua New Guinea Institute of Medical Research (National Sex and Reproduction Research Team [NSRRT] and Jenkins, 1994). The copious literature on many of these themes can only partially be reviewed here. Regional designations indicate that the reported beliefs and practices are representative of a common geographical pattern, though exceptions always exist. Boundaries are approximate[3] (Map 1). These quotes and brief discussions illustrate clearly the culture change issues with which people in PNG have been coping.

3 To keep the number of areas manageable, several smaller ones were combined under one designation. For example, the Trans-Fly area was placed with Papuan Plateau. North Solomons was not included due to the presence of armed conflict at the time of study.

Map 1: Culture Areas in Papua New Guinea



1 = Islands, 2 =Massim, 3 =Manus, 4 = North Coast, 5 = Schrader-Ramu, 6 = Sepik River, 7 = Sepik Plains, 8 = Torricelli, 9 = Ok, 10 = Central West Southern Highlands, 11 = Eastern Highlands, 12 = Anga, 13 = Papuan Plateau, 14 = Papuan Coast

Sexuality in Childhood

Understanding how children learn about sex is an important component of developing appropriate educational efforts in the fight against HIV.

Childhood sexual play occurs everywhere. In PNG, only a few reports have surfaced of societies that tried to repress it, e.g., the Kwoma (Whiting, 1941). In some societies, such as the Trobriand islanders, sexual play was lightheartedly encouraged. Male-to-male sex play in childhood occurred in a number of societies, often long before sex between males and females. Some earlier ethnographies remark on the relaxed attitudes parents had about sexual teasing and play among children, including mothers mouthing

boys' genitals (Berndt, 1962; Langness, 1990). Children often observed adults having sex, and learned gradually that sex was an important part of life. With the approach of puberty, the social responsibilities associated with sex were imparted to girls and boys in a variety of culturally specified ways.

Menarcheal rituals (rites for the first menstruation) were common, but not universal, in PNG. Although in a minority of cases sexual activity began before menarche, the majority of societies considered it inappropriate until after menarche. In some areas, girls were thought to attain menarche by engaging in sexual intercourse (e.g., in Manus), an observation that could cause public shame.

Box 1: The Boy Must Grow Up Properly

"In the past, in our parents' and grandparents' time, boys never had heard of sex and had no knowledge at all. The boy will live and grow with his mother. When time comes that he is grown up to a young boy approaching manhood, that is when he would be put in the haus tambaran and taught about sexual knowledge, fishing, hunting, and he is taught every kind of traditional cultures that the man must have. At the same time he is initiated, which signifies his acceptance as a man and adult. When he comes out, he now has all kinds of knowledge and knows what to do. In the haus tambaran, he is taught by his relatives, such as uncles on both sides, uncles—either father's brothers or cousins or mother's brothers or cousins, or the boy's cousins—it may be a brother-in-law. The boy without knowledge was prohibited from having sexual intercourse. The boy must grow up properly that his body development must not be interfered by sexual intercourse. Sexual intercourse participation at an early age was bad for a boy." (60-year-old man, Sepik River)

Male initiations could start as early as 7 or 8 years old, but more often took place from early puberty to later adolescence. Many initiations were lengthy procedures during which boys lived through a transition period aimed at removing them from their mothers and turning them into men.

These rituals included physical and psychological practices that often involved pain, such as penile bleeding or other scarification and purging, dietary prohibitions, and a variety of ways to make the initiates "feel" the lessons they were learning and turn them into hardened warriors. In areas where formal rituals did not exist, traditions of storytelling functioned similarly. Through these rites, the elder generation reinforced its power over the younger generation. In some areas, more pragmatic tests of manhood were required, such as planting a garden, or building a house or canoe, were required.

These rituals provided an institutionalized form of socialization into proper gender roles in adult life, including one's sex life, and inculcated values that encapsulated the main symbolic themes of their culture. The secretiveness of most of these rituals made sacred what was being transmitted to the young. While menarcheal rituals often were held for a single girl, the male rites always were performed on groups of boys and intensified age-class bonding among males. This ensured better combined action during periods of fighting, and ensured that men would support each other in maintaining control of women. Today the blood-related practices in these rituals pose an additional risk of HIV transmission through shared, possibly contaminated, skin-cutting blades. More importantly, the factual knowledge and responsible attitudes about sex that could help young Papua New Guineans avoid becoming infected with HIV are largely missing in these traditions. As yet, sound modern means of transmitting information and values have not replaced these rituals.

Courtship and Premarital Sex

In the past, patterns of courtship, premarital sex, and eventual marriage defined the primary sexual networks in a person's life. These components of culture have changed profoundly. Many now facilitate a wider and perhaps larger network of sexual partners, thereby increasing the risk for HIV.

Many PNG cultures had courting rituals, which gathered together young unmarried people from neighboring villages for dancing, singing, and inevitably pairing up. Until about a decade ago in the Eastern and Central

Highlands, for example, dark, smoky houses could be observed full of young people from neighboring villages. They were permitted to sit opposite each other in pairs and rub legs, cheeks, or noses as they sang together all night. In other areas, such as the Trobriand Islands, courting parties are explicit sexual events. Boys are called out from villages A and B to have sex with the girls from village C; host and guest roles were reversed on the next occasion. In yet other societies, such as the Bena Bena, courting parties had little to do with eventual marriages, as these were arranged by parents (Langness, 1969).

Box 2: Rubbing Noses

"We have thrown out our good ways completely. I mean rubbing noses—we rubbed noses with different boys and that is where we met our husbands. It is because of the changes that were brought about by white people through schools and missions. When I was young, my mother and my aunty told me I can sleep with boys my age, only rubbing noses and I did it. I was told if a boy is moving his hands around a lot, touching your breast, you should run away from him because he knows sex, not just rubbing noses, so be aware. The stories that were passed on were good; we had sex when we were older. But now as long as you have your period, you can have sex. Our minds are now full of sex. We see white people naked and kissing on the TV screen and books. So our people today think that they are missing something in life, so they try to do the same, but it brings all sorts of problems. Like having fatherless children so people miss out on the bride-price." (36-year-old woman, Eastern Highlands)

In the Simbai area of Madang Province, men gathered together to dance from dusk to dawn wearing heavy, shiny, beetle-impounded headdresses, while the women watched. Married men also could participate in such events, as they might gain a second or third wife. In a few societies, such as the Huli of the Southern Highlands, only married men attended

courting parties. In Simbai, any woman could take her pick of men during the night, and the couple then would disappear into the nearby bushes. In the morning light, women could be seen carrying men's headdresses. Each couple then went to the man's house, and word was sent to her parents to come and discuss a bride-price. She might not have known the man of her choice before that evening. However, since they were all from not-too-distant villages, the sexual network was quite localized. Today sexual networks are far wider and contribute significantly to the spread of HIV.

Box 3: That Space You Left Must Be Filled

"There were no bride-prices. Sisters were exchanged. If you marry over there, you still have a brother; that space you left must be filled. So another woman is brought in. If you are a boy and I am girl, the couple will go to aunties and uncles. The aunties and uncles will collect dogs' teeth, pigs' tusks, and they would carry these things to the girl's house. The girl's parents will know already and would expect the girl. When the talk is straight, a rope is tied on the girl's hand. She can't go out or be engaged to another man after the rope is tied. No sexual relationship is permitted. Girl sleeps with her mother and boys in the man's house. They just look at each other." (Women's focus group, Papuan Plateau)

Virginity

Reducing the number of sexual partners, an important part of HIV prevention, is often considered to begin with delaying the initiation of sexual intercourse among the young. Emphasis on virginity in some PNG societies was facilitated by biological and cultural factors that have been altered. In others, virginity never

was emphasized. Therefore, a review of what is known about the ideal of virginity at marriage in traditional cultures is important.

In the Sexual and Reproductive Knowledge and Behavior in Papua New Guinea national study, older men and women from several parts of the country reported customs that placed a high value on virginity, particularly among girls. However, in most areas, the greater shame appears to come from a girl getting pregnant before marriage. Hence, young women used numerous devices, practices, and plant medicines, often given to them by female relatives, to avoid pregnancy or induce abortion. In several areas, babies conceived out of marriage were absorbed easily by families, and the girls continued to have good options for marriage. Once parents arranged a marriage, sex between the engaged couple was overlooked. Early betrothals were common in the past, even arranged before birth. However, if the arrangement held until puberty, the girl usually would live with the boy's family for a few years before the marriage ceremony.

Box 4: No Feeling of Sex Desire in Their Minds

"In those days, they made their dressing of tapa cloths taken out of a tree called tomoru and beaten off the skin to make it soft, so that they can cover the penis or vagina with that skin of the tree as stated above. While in the Elavo, house girls are not to be seen by boys, or boys are not to be seen by girls. And there is no feeling of sex desires in their minds. The girls and boys were well looked after by the older people. When the time of their public appearance, a very big feast was hosted with many pigs to be killed and the garden food stuff was provided by the parents, and the whole village gathered in front of the Elavo house to see the Morihova and the Hehova coming out of the Elavo house well dressed in traditional costumes and the singsing took place to end the Koke days for the Hehova and Morihova. The rules were again stated to them before the feast broke up at the end the ceremony. At this point in time,

they are free to have sex. Most of their marriages were already arranged by parents." (55-year-old woman, Papuan Coast)

Boys also were taught not to have sex before marriage, particularly with unmarried girls or married women, because it would cause fighting between the families, via sorcery or outright violence. Young men were told their strength would be sapped, they would not grow properly, and they would face other threats to their person and body. Overall, while these proscriptions were taught to boys in many places, attitudes toward boys' experimenting with sex were more relaxed than for girls. Minor rituals often could cleanse boys of their transgressions, enabling their inclusion in the initiation rites. Sex with an unprotected woman, such as a widow, or with another boy had fewer social ramifications and could be overlooked if detected.

Marriage: Sister Exchange and Bride-Price

PNG has several types of marriage patterns. As of the mid-1990s, about half of all marriages were arranged by parents (NSRRT and Jenkins, 1994). Now that HIV has entered the scenario, certain forms of marriage appear to contribute to greater risk behaviors. This is especially true if the marriage arrangements are stalled for any of a number of reasons, creating a longer period for premarital sexual activities.

Sister exchange marriages ("sisters" are usually cousins, but are called "sister" in the kinship system terminology) are fairly common in PNG. However, these often present allocation problems. Some families have no young women to offer in exchange for the woman being given to their son, or vice versa. Until an alternative arrangement can be made (e.g., a substitution or compensation), marriage is stalled. Among the Hagahai of the Schrader Range, who prefer to practice sister exchange, young men complained a great deal about having to wait a long time to get a wife. Meanwhile, some sneaked around having sex with other men's wives, or "stole"

a young unmarried woman off into the bush. If the couple was found, angry parents would insist on marriage. Still, the exchange issue always arose and led to some women being forced to marry men they did not like at all, even though the society supported a woman's right to select her husband.

Bride-price—a transfer of wealth from the groom's lineage to that of the bride's—continues to be practiced widely in PNG, particularly in the Highlands and Papuan Coastal societies. Over time, other groups have adopted the practice as well. The ideology of this practice is based on the desire to bring families together in cooperative alliances—for future marriage exchanges, trade, or other efforts. In some Eastern Highland groups, marriages took place between "enemy" clans, i.e., clans that had fought previously, but were now at peace. The bride-price contributed to peacekeeping. However, underlying fears often remained that the in-marrying bride could "poison" her husband by securing something from his body, such as some of his semen, and giving it to a member of her lineage for sorcery. Tensions over bride-prices are legion throughout the country. If a stipulated amount is not paid promptly, continual complaints drive marital conflicts, domestic violence, and bad relations all around. In some island societies, a man can inherit a bride-price debt from his father and be expected to continue to make payments on his mothers' bride-price long after her death. As the cash economy took hold in PNG, the cost of marriage rose in most groups, a social change that has had numerous negative consequences. Now, as people in Bundi say, "Meri em i samting bilong bisnis" (women are something to make money on).

One important consequence is that the escalating bride-price has caused many families to delay their sons' marriages until they can accumulate the needed cash. Young men are expected to wait a long time between their biological readiness for sex and the socially approved marriage arrangement. While they also were forced to wait in earlier times, they were engaged more often in culturally approved activities during that period (i.e., long initiations; learning subsistence-related skills from their fathers and others; participating in clan fighting; and, in more recent times, spending at least a few years away from home on labor contracts). As the decades pass, more and more PNG young men are idle while waiting to get married—a condition that contributes to higher levels of premarital

partner change. Consequently, more "marriages" are taking place without bride-price payment, a situation that increases the fragility of such unions.

Another consequence is the increasing perception among young women that they—i.e., their sexual and reproductive capacities—are valued only for the money they bring to their families. This has generated a fairly resentful attitude in some women and a determination to use their bodies to earn money for themselves, not for their brothers or parents. In many societies, the low social status of women has not risen significantly in recent times compared to earlier, traditional periods. Evidence suggests that a patriarchal Christianity and the western-style modern state have reinforced the lower status of women in the economy, the home, and elsewhere (Dundon, 2004; Gewertz, 1981; Knauft, 1997; Nash, 1981; Zimmer-Tamakoshi, 1993).

As shown almost everywhere in the world, women's lack of social power is a strong determinant of HIV vulnerability. Today, courtship, premarital sex, and marriage arrangements have been altered greatly, contributing to greater risk of unwanted adolescent pregnancies, as well as sexually transmitted infections, including HIV.

Semen, Blood, and Life Force

The ideologies associated with core belief systems remain strong in PNG, even when they are transformed in the modern setting. Where manhood has been defined largely by the making of warriors through male initiations, and females are viewed as naturally powerful and dangerous, these concepts continue to underlie cultural interpretations of contemporary experience. The complex of beliefs and practices that have evolved around gender definitions are expressed in a language of symbols representing forces inherent in body fluids, particularly blood and sexual body fluids. These must be understood by those involved in HIV/AIDS education to develop salient and meaningful messages.

Sexual fluids are important in the cosmologies of most PNG cultures. They are symbolic of forces or processes that are essential to life, and embody the principles of maleness and femaleness. PNG cultures developed a rich set of explanatory paradigms and rituals that used these symbols in a language of myth. Vaginal fluids and blood, particularly menstrual blood and the blood of childbirth, were viewed as powerful and dangerous, as they were associated with waste but also with the mystery of reproduction. Women were viewed as dangerous when they were menstruating. In most PNG societies, women were taught they must never cook for their husbands, and should remain secluded or separated, during their menstrual period. People believed that contact with even the smell of menstrual blood contaminated the environment, made men weak, and caused sickness (in pigs as well). Periodically removing some "tainted" blood, thought to be acquired through contact with women—by bleeding the nose (Eastern Highlands), the penis (North Coast), or the tongue, or by swallowing canes and vomiting (Eastern Highlands)—could keep a man fit and healthy.

Box 5: Great Stories of the Ancestors Are Already Dead

> "You wait, I must make it clear. The young boys now have not been given instructions and they get married as they like, we haven't given them the instructions that are given when their young betrothed wives first menstruate. It seems that women have poison in their vaginas and before we used to tell the boys clearly about this. They don't know this now. These instructions are dying with us elders; the great stories of the ancestors are already dead. Now we are merely babbling." (45-year-old man, Anga)

Semen, on the other hand, was seen as a powerful substance that required a strong and healthy body to produce. The loss of semen for sexual pleasure or making babies was believed to weaken a man and contribute to his aging. Hence, repeated sexual intercourse with one's wife was considered hard work in many societies, especially in the Highlands. In at least one society, oral insemination of young women was thought to build up breast

milk. However, the most powerful secret was seen as the mixture of blood and semen—the components for a new life. In other cultures, the mixture of vaginal fluids or even breast milk and semen was considered powerful. In either case, the symbolic basis for the meanings associated with body fluids is fairly obvious. What is less obvious is why specific patterns of manipulation arose in specific culture areas, and how and why these are changing today.

Box 6: Power to Make Their Words Come True

"A long, long time ago there were initiation houses for women too. I never saw them but my father told me about them. It must have been about 80 years before I was born. The girls went into the house before they got their periods. They were put inside the house and their skins were cut also. After they were cut, their dokta fixed them up. There isn't any reason why they abandoned the haus tambaran for women. It is just that the men felt the women were running things, so the men closed it down. When the women came out of their haus tambaran, they had a lot of power to make their words come true. The men saw that the women had power, so they diminished the women and made themselves stronger. Now only men have a haus tambaran." (62-year-old man, North Coast)

Many *tumbuna storis* (ancestor tales) throughout the country explain that power (over reproduction, ritual knowledge, and so on) once rested in the hands of a woman (or women, or a cassowary, which is always seen as female). However, she was tricked by men, who took the power from her. Women were not supposed to know what went on in the men's ritual houses or anything about the sacred flutes or bullroarers, even though they could hear them. They were commonly threatened with rape or murder if they dared come too close to the men's cult activities, but older ethnographies imply that women knew a great deal more than they were letting on (Berndt, 1962). More frightening to men is the power of menstrual blood, which women could secretly put in a man's food and use to seduce him.

The ritual for many cults and initiation ceremonies was based on the manipulation of these fluids as symbols of power. In general, the northern half of PNG utilized bloodletting as a symbol of the removal of pollution from boys (associated with having been born and attached as a child to women). Bleeding the boys from their penises was seen as a kind of male menstruation, a removal of polluted blood. In much of the southern half of the country, semen is the substance elaborated in symbolism. In a few places, both bloodletting and semen-related practices were present.

Basically, though women bear boy children, adult men are required to turn boys into men—i.e., social reproduction as opposed to biological reproduction. The semen of adult men (usually from the mother's side of the family) was transferred to the boy through anal intercourse, oral intercourse, or simply by rubbing it on his body to enable him to grow up properly. In a few societies, what anthropologists call "rituals of reversal" took place, allowing married people to have sex with people they were not married to for a single day or duration of the event. These were conceptualized to bring together sexual fluids of the whole village and promote fertility of crops, women, and animals. In other areas, rituals of plural copulation were held to reduce the impact of epidemics (Vogel and Richens, 1989).

Missionaries condemned these practices as willful erotic acts. While focused on the genitals, the ritualized initiations generally were not seen as a source of pleasure, and can be interpreted as essentially acts of social reproduction and kinship. They took place mostly in societies with cross-cousin sister-exchange marriage patterns. The boys who went through these initiations as semen-recipients later became semen-givers. However, with few exceptions, they married women and had children.

Anthropologists have tried to explain these rituals from the point of view of myth creation, ecological adaptations, evolution of kinship-based political systems with their associated marriage and gender systems, and the relative contribution of men and women to production and exchange (Allen, 1998; Barth, 1987; Elliston, 1995; Herdt, 1989; Herdt and Poole, 1982; Herdt and Stoller, 1985; Knauft, 1993, 1994; Kurita 1994; Lindenbaum, 1972; Meigs, 1983; Schieffelin, 1982). Ultimately, these rituals were concerned with ensuring the continued fertility and strength of the group. Unlike western concepts of

homosexuality, these practices did not signify a homosexual orientation psychologically, or imply anything about a man's sexual identity (Jenkins, 2004b).

However, consensual male-to-male sex certainly did, and does, take place in PNG. The nature of this difference was explained well by a 70-year-old elder in the Gogodala area (Box 7).

Box 7: This Sex Was to Make Us Grow Up to Be Strong Men

"There was one thing that happened to us that I did not enjoy. That was anal sex, which took place during the initiation ceremony. We initiated boys were f***ed by a number of older men in a special hut (bidi gena) built for the purpose just before the ceremony took place. It did not have any windows and was quite dark inside. We did not know who f****ed our ass but we were told not to refuse because the purpose of this sex was to make us grow up to be strong men. The sperm is supposed to go into our bodies and make us strong and fearless. Well, when this was all over, my ass was very sore. It was bleeding from skin tears. You young people are lucky it disappeared before you were born…We were told not to have sex before marriage, but sexual activities did take place in the men's house. This was anal sex and I did take part in these. All you had to do was arrange with one of the boys and take turns in f***ing each other's ass. As for sex with a female, only those boys who had sisters got married quickly, because to get married one's sister had to get married to your intended wife's brother. In other words, there was double marriage. As I have mentioned before, the couple had sex after marriage except for some cases where they married secretly because the time to wait was too long." (70-year-old male elder, Gogodala)

The homosexual acts that took place during initiations might not have been a source of pleasure to many, but a duty to be endured. However, the same acts, carried out of one's own volition with a person of one's own choice, had a different meaning and were considered pleasurable. In some societies, many men regularly had sex with women and men for pleasure (Ernst, 1991; Knauft, 1986) or in an effort to avoid overpopulation.

Today, few young people in those areas are likely to know about the beliefs and practices of their grandparents,[4] largely due to the arrival of Christian missionaries. Moreover, the Government made people feel so ashamed of their sexual cultures that they do not want their children to understand them (Jenkins, 1993a; Knauft, 2003). Reclaiming that understanding would be useful in helping people analyze and consider their evolving sexual cultures. HIV prevention, or the destigmatization of people living with HIV, is unlikely until frank and honest discussions about sexuality are conducted (Lepani, 2002).

Extramarital Sex

Almost everyone in PNG eventually gets married at least once. Adultery ordinarily is forbidden, even in the most permissive societies. Yet, a wide variety of concepts and practices encourage extramarital sex among men. While these practices might not have been seriously destructive in the past, in an era of AIDS they contribute to the wider spread of HIV through the general population.

Many social control mechanisms were enshrined in belief systems and punitive practices in an attempt to control adultery in earlier times. In most areas, a woman's sexuality was controlled by brothers and parents when young and by husbands later. In a legal sense, a married woman was chattel in many culture areas. While males had far greater freedom than females, at all ages, they were subject to sanctions by sorcery and violence for ma-

4 Unless they read ethnographies or browse the Internet. In one instance, a web page that rather sensationally presented some of these practices to the public evoked a response from a Papua New Guinean, who wrote that the page was full of lies and no such thing ever happened in PNG.

jor infringements of the sexual rights of others. This meant that the males in charge of a young woman were responsible for her virginity and honor, and could retaliate by raping or stealing a woman of the offending clan and fighting with its men. At least in post-contact times, they also could be compensated for her loss of honor. When adultery occurred among married persons, compensation was usually the solution, sometimes given only to the offended man and sometimes to both offended parties (Trompf, 1994).

Box 8: Turned to Rubbish

> "Another thing now, you young people f*** married women belonging to other men. The old laws were not like that. In the past, both women and bamboo arrows were placed on this ground together in the Marawaka area. If you were a man who f***ed a married woman, they would shoot you with the bamboo arrows. During initiations before, they showed you this. Later, you would think of this and remain afraid and behave properly. Looks like the younger generation of men and women have turned to rubbish." (45-year-old man, Anga)

Men's links with maternal kin were fundamental to the functioning of the social system. While public transactions were dominated by men, women's roles as the producers of food and children were valued highly, even though men controlled their production. A general cline can be seen—moving out of the Highlands, toward the coastal, Island, and Massim areas—in which women's exchange transactions and property rights increased. Such societies were more permissive sexually, and women held more respected social roles. However, these cultures limited how far men or women could go in their sexual behavior, using sorcery and other social control mechanisms to punish transgressors. Punishments for adultery in these more matrilineal societies, however, were and are less severe than in the more patriarchal, male-dominated societies.

In PNG, extramarital sex on the part of men is often excused when their wives are pregnant on the belief that semen could be dangerous to

the baby (or the mother during birthing), or a similar mechanism would spoil the milk while the wife is breastfeeding. This was taught to young men in initiations and in other ways by their fathers. Where this belief was strong, men were expected to stay away from their wives, either by remaining in the men's house or going out hunting all the time. Other societies discouraged extramarital sex by men during a wife's pregnancy. People believed that if a man had sex outside of marriage during his wife's pregnancy, the baby would be harmed. Masturbation does not seem to have been widely practiced, though one Engan man in the national study said his father told him to substitute masturbation for extramarital sex during pregnancy. In Box 9, a man generalized his fear of damaging his baby to his living children's health throughout his later years of marriage.

Box 9: I Think I Killed the First Child

"I tried to have a girlfriend but made a mistake. This was when my wife was pregnant for the first baby. I think I killed the first child who died because I was seeing another woman. She was my girlfriend who was about 20 years old at that time. I never did such sex act again after my wife had an operation after our later children because of fear that we would lose all our children. Yes, even after the third child. (43-year-old man, Islands)

Extramarital sex in PNG has several significant drivers. Some are more likely to be related to modernization, but others are rooted in traditional marriage patterns, such as polygyny (a man having multiple wives simultaneously).

Box 10: Their Style of Marriage Was Different

"In the past, our parents, grandparents, their style of marriage was different from ours today. Regarding marriage these days between a couple, if the husband goes and has love affairs with another lady and the wife finds out, then the two start having fights and other problems within the family. In the past,

a husband could go and sleep or even have sex with another lady and later could marry her as a second or third wife. The first wife would not say anything or do anything." (22-year-old woman, Sepik River)

The acceptance of polygyny as an alternative marriage pattern underlies permissive attitudes toward married men having extramarital partners. As of 1996, 14% of married women were in polygynous unions, with regional variation reaching 25% in the Highlands (National Statistical Office, 1997). In most PNG societies, polygyny functions to enlarge a man's access to productive resources—i.e., more gardens, pigs and, children—as well as to satisfy his sexual needs during pregnancy and post-partum abstinence. Polygyny enhances a man's status. It also provides a legitimate way to attempt to solve apparent infertility, which is perceived publicly as a female problem in PNG. Rising levels of infertility caused by sexually transmitted infections (STI) over the decades (Jenkins, 1993b) has increased the perceived need for additional wives. When men can take on additional wives, they tend to "sample" many women before selecting another wife, as shown in Nigeria and Ghana (Anarfi and Awusabo-Asare, 1993; Mitsunaga et al., 2005).

Similarly, where serial monogamy is common, which is characterized by high levels of divorce and remarriage, people are also at risk. In these societies, marriages break up relatively easily. Before, during, or after the breakup, people search for new partners. Researchers in other countries report lower condom use during sex with new partners, as well as with the prior partner, during this period, which can be especially difficult for emotional reasons (Bajos and Marquet, 2000). In PNG, serial monogamy appears to be more common among the matrilineal groups, though recent data on marital dissolution are not available.

Having several partners concurrently (or closely after one another) raises the risk of spreading an HIV infection far more than having serial partners separated in time. Further, during post-partum abstinence, while a mother is breastfeeding, husbands frequently acquire STIs outside of marriage (Cleland et al., 1999; Mola, 2005). If men acquire HIV at this time, transmission to the mother and onto the child through breast milk is highly likely (Gray et al., 2005).

Love Magic

Because love magic is widely believed in, and very often projects responsibility for one's own actions in sexual relationships onto the substance and its owners or perpetrators, it should be considered a cultural risk factor for HIV.

Between 1991 and 1995, life history interviews and specialized interviews using vignettes describing love magic-related stories were collected. More than 500 persons were interviewed. In the national study, some people spoke of love magic "missing" its target and ending up "hitting" close relatives, thus explaining incest. Among youth, opinions were sought regarding love magic and vulnerability to HIV infection.

Box 11: Seeing God's Vision

"I am from village X and married to another village. I was happy and enjoyed life there. I had my first child all right. Nothing went wrong. When I had my second son, I faced problems. In 1983, my friends used meguva, this means when you are talking using leaves or leya, it will change people's minds. This is what it has done to me. They used it by calling my name. At that very moment I pulled down our house and threw my things outside. I never did such a thing before. I did all these things after seeing God's vision that there was a light from heaven shining through my house. From that time on, I just hated my husband, even to listen to him. Whenever I saw my husband, I felt as though a spear was in my eyes. I was spoilt by those others, even in my legs, I couldn't walk well. Since 1983 until now, I live happily even though my husband is already married to another woman." (30-year-old woman, Massim)

While the reported practice of love magic appears to be diminishing among many young people, especially in urban areas, belief that it can manipulate a person into uncontrolled sexual situations remains strong. Considerable amounts of money are spent by women to buy love magic from specialists in attempt to control their men's sexual behaviors, to lift a spell placed on them, or to seduce a man of their choice. Men buy various spells for similar reasons, but also have a body of practices, including magical ones, to make their penises grow larger. The study inquired if young people thought love magic could constitute a risk factor for HIV. While a minority recognized that such beliefs allow little room for safe sex, many thought love magic could be useful to AIDS prevention by ensuring more faithful couples. In either case, the respondents clearly believed in the power of marila (Jenkins, 1998).

Transgressions and Sanctions

Shame is a public phenomenon. For the most part, PNG cultures continue to be shame, as opposed to guilt, cultures. The difference is in getting caught and exposed. Serious transgressions or affronts are sanctioned primarily through payback or retribution.

A variety of threats meant to deter people from breaking the rules were common. If a sexual transgression was discovered, however, punitive actions were possible. These were seen largely in their historical and kin group contexts. Retributive justice (payback) was not directed necessarily against the perpetrator alone. The juristic "person" in PNG was rarely a single party, but the individual imbedded in a social group (i.e., a clan or a lineage). In societies that earlier were in nearly a constant state of warfare, survival of the group had highest priority. Any social disruptions that could diminish its capacity to fight collectively and vanquish its enemies were strongly discouraged. In most earlier PNG societies, many sexual indiscretions apparently were overlooked, with teasing and gossip used to shame a person. If considered serious, compensation could be demanded or public beatings carried out. However, as some cases of adultery or premarital sex were considered highly disruptive to important group relations, they brought about

repeated payback killings, sorcery, punitive rape, suicide, and other dire consequences (Attah-Johnson, 1992; Counts, 1987; Counts and Counts, 1991).

Group rape of women as well as murder took place in certain societies when women refused to marry who their parents chose or when a woman was considered seductive. These were similar to the honor killings and punitive group rape still practiced in some Islamic tribal cultures today. In some traditional societies, rape was a permitted way of disciplining a woman or wreaking revenge on the males of her lineage. It was socially offensive only if the parties involved were of the same clan (Strathern, 1975). The colonial administration and imposition of the village court system derailed most of the more severe punishments for sexual transgressions. However, during the period of review leading to decriminalization of adultery, most PNG communities continued to consider adultery a greater crime than murder (Wuillemin et al., 1986).

No matter what the adaptive value of some of these earlier customs, they no longer operate in the same milieus as before. While some might be adaptable to the current era of AIDS in a protective manner, others are likely to contribute to the spread of HIV. Larger issues of women's rights and male sexual privilege are beginning to become foci of contention in PNG. The HIV/AIDS epidemic is a particularly intense challenge to the people of PNG, because older cultural scenarios and values surrounding sex and sexuality have not adjusted yet to the widely altered attitudes and behaviors that have been well documented for at least several decades. The shifting scenario has become a major threat to the lives of individuals, as well as the survival of families and clans.

PART 3. CHANGING TIMES

Several important historical factors, biological and cultural, have contributed to the current levels of HIV risk in PNG.

In PNG, rapid and dramatic cultural changes have taken place in a relatively short period. Papua New Guineans might have been shocked when first encountering strange ghostlike white people (Schieffelin and Crittenden, 1991), but they quickly incorporated Europeans into their views of the world. The cultural scenarios discussed earlier provided frameworks for sex and marriage in PNG's communities for centuries. These provided structural supports for achieving the expected norms, such as men's houses; separate residences for men and women, especially for unmarried youth; and perhaps greater surveillance by elders. Populations were certainly smaller, people lived in different housing arrangements, and mobility was far less pronounced than in more recent times. Cash has entered all cultural systems and new notions of gutpela sindaun (the good life) have emerged. As the contexts have changed, so have the practices.

Box 12: We Forgot All About Our Customs

"As the white people came into our country and as we lived with them we got ourselves accustomed to Europeans' lifestyle. We forgot all about our customs. And we used to say where are all our good customs, are they hidden or what? This new life came in and spoiled all our societies. Bad things came and good things have gone." (Male focus group discussion, Eastern Highlands)

Contact with missionaries and colonial administrators changed PNG's cultures forever. Multiple epidemics followed upon contact, wiping out sizable proportions of many societies. The cultural mechanisms (i.e., divination, sorcery, murder, and raiding) people relied upon to explain diseases

that were killing their kin and to avenge their ghosts, were prohibited. Other cultural forms that were never understood or appreciated by the colonial administrators and missionaries, and that contravened the moral principles of western law and religion, were attacked as sinful or poorly adapted to a modern way of life (Trompf, 1994). This included almost all religious beliefs and practices; many initiation and men's cults; scaffold or cave burials; sister-exchange marriage (Lattas, 1991); divination (Lohmann, 2003); bilineality or ambilineality (inheriting rights through either or both the mother's and father's lines); indigenous cloths and furniture; traditional graphic arts, songs, and drama; and numerous other cultural traits. The cultural collision with western change agents led to the prohibition of even small features of life, such as the pre-mastication of solid foods for babies; as well as major complexes, such as head-hunting, cannibalism, and ritual homosexuality.

People actively resisted specific demands of missionaries and government personnel, e.g., refusing to provide labor for German plantations (Madang) or hiding important ritual objects. However, most people eventually gave up many of the ways of the past, sometimes throwing them away with lightning speed as if they had been a burden all along. Medicine, trade goods, and Christianity (followed soon by government) often arrived together in a miraculous package. Christian belief systems offered reward (or punishment) in the afterlife—a relatively new concept in many PNG cultures—salvation, and the promise of relief from fear of cannibal witches (sangguma), the treachery of neighbors, and the dangers of ghosts (masalai) and other nature spirits. The Gospel emphasized the "life of grace through faith" in which Papua New Guineans expected to participate. Modern medicine offered effective cures for visible diseases, such as tropical ulcers and yaws. Missionaries came with schools and health services, as well as an apocalyptic explanation for the new order. Given that a group's ritual techniques were essential for its wealth and fertility, it was not illogical for people to believe that Christianity was the means to the abundant life.

As the decades pass, however, many people have expressed resentment and disappointment with the entire colonial project. Cargo cults emerged in reaction to perceived deprivation (Lindstrom, 1993). Some people have begun to believe that they should have been more selective and held on to more of what they had. For example, many cultural systems included mechanisms to establish peace among enemies, manage drought and times of

hunger, heal sickness and social relationships, redefine and incorporate new groups of people, limit overuse of natural resources, redistribute unwanted babies, and reduce the damage done in warfare. When ritual assemblages were attacked and lost, many linked cultural traits were thrown out as well.

As the issues pertinent to a modernizing society began to reach village life (e.g., courts; cash cropping; access to services and markets; employment and migration; and, eventually, loss of natural resources, inflation, and politics), fewer and fewer domains of life were directly under local control. Subsistence producers turned into peasants, subject to the forces of international commodities trade. For years, people hoped that the Government would provide. Although many people have acquired some temporary wealth, social imperatives to redistribute one's wealth generally have not permitted accumulation and wealth-building in a truly capitalist sense. Mismanagement, corruption, and the gradual decline in the performance of the central Government and the civil service have left an increasing number of Papua New Guineans poorer with each passing decade.

The HIV epidemic has entered PNG at a time of high political instability and economic stagnation. Other development indicators, such as education and health status, show little recent improvement (World Bank, AusAID, and ADB 2005). With languages vanishing (Nettle and Romaine, 2000), and familiar frameworks of sex, gender, and family life shifting in ways that are perceived as threatening to the integrity of society, many people express a sense of helplessness and even doom. Diminishing this negativity will require greater involvement of key Papua New Guineans in their own development and HIV programs.

BIOLOGICAL FACTORS

Nutrition and Age at Sexual Maturity

When improved urban and rural diets lead to earlier menarche and sexual maturity for girls and boys, as in much of PNG, the time between puberty and the age at marriage becomes problematic. This factor is likely to lead to more premarital sex than the elders saw in the past. While many people around the country recognize that menarche and sexual activity are taking place earlier, they are generally unaware that nutritional changes have played a large part in this process.

During the 1960s and 1970s, studies of children documented slow rates of growth and development. The estimated mean ages at menarche in several PNG societies at that time were among the latest ever recorded: 18.8 years in Bundi, 17.5 in Chimbu (Malcolm, 1970), 18.4 in Lumi (Wark and Malcolm, 1969), and 18.4 in Gainj during the 1980s (Johnson, 1990). A follow-up study conducted in Bundi in 1983–1984 showed the median age at menarche of rural girls had dropped to 17.2 years, while a small sample of urban Bundi girls reached menarche at 15.8. Bundi boys were showing similar endocrine patterns (Zemel et al., 1993).

Box 13: They Learn Many Things From the Video Shows

Small girls are already having their menstrual cycle and also small boys nowadays are getting married. These changes are taking place because they learn many things from the video shows or such other places, which gets young peoples' attention. (43-year-old woman, Islands)

Today rural and urban girls from all backgrounds are reaching menarche much earlier than girls did in the past. Zemel and Jenkins (1989) demonstrated that adolescent growth spurts, menarche, and full breast development among girls, and adrenarche among boys, are occurring much earlier than previously. In one study in Port Moresby comparing women under 18 years old with a randomized group between 20 and 29 years old, all first-time new mothers, the mean age at menarche was 13.3 years compared to 14.6 (Klufio et al., 1997). Most of the women under 18 year olds were of Highland parentage and initiated intercourse earlier, at a mean age of 15.8 years versus 21.4 among the older group. These findings are consistent with studies elsewhere showing the strong influence of hormonal sexual maturation on sexual behavior among boys and girls. While the influence is clearly strong, it is not fully determinative. Social and cultural factors also can play a major role, as found in Hong Kong, China, where girls start sex later than boys even though they mature earlier (Lam et al., 2002). In countries where studies have examined these factors, e.g., Denmark (Wielandt and Boldsen, 1989), South Africa (Buga et al., 1996), and Zimbabwe (Campbell et al., 2005), the majority of young people have initiated sex within a few years (2–4) of biological maturity.

Studies elsewhere show that as age at menarche drops, the gap between sexual maturity and emotional maturity can be 4–5 years. While emotional maturity might be difficult to measure across cultures, no studies in PNG have explored the full ramifications of earlier menarche. With much effort over the past decade, adolescent pregnancy rates have declined significantly in many parts of the United States, mostly due to the increase in condom use and the adoption of hormonal contraceptives (Klein and the Committee on Adolescence, 2005). With a similar effort, PNG could have similar effects on the sexual behavior of youths.

Many stakeholders in PNG have not taken a firm stance on making condoms or other contraceptives easily available to the married or unmarried. Where the culture has not adapted to encouraging contraceptive use among the unmarried, HIV and STIs and unwanted pregnancies are frequently the unfortunate consequences. Promoting abstinence until marriage might enable some young people who do not want to be involved in sexual relationships to find support for their preferences. However, several important and large studies have shown that unless these

young people are given a full education on the options for sexual safety, including the use of condoms, they eventually have sex without protecting themselves. In the end, they have the same prevalence of STIs as those who did not try to abstain (Brückner and Bearman, 2005; Santelli and Ott, 2006).

Sexually Transmitted Infections[5]

High prevalence of STIs places a whole population at considerable risk of acquiring HIV. A brief summary presented here describes how the major STIs spread before the modern era when traditional sexual cultures were more intact and people moved less extensively than today.

Early in the 20th century, a serious outbreak of donovanosis occurred in the southwestern part of the nation, presumably brought in by laborers who had worked in northern Queensland, Australia, where aboriginal populations were known to be infected. Farther west, along the coast in Dutch New Guinea, donovanosis had become a public health problem by the 1920s. The problem was exacerbated by influenza epidemics among the main affected ethnic group, the Marind-Anim, which provoked renewal or fertility rituals requiring plural copulation (van Baal, 1966). In 1917, a special hospital was built at Daru to handle the high numbers of gonorrhea and donovanosis cases (Maddocks, 1967). Outbreaks of donovanosis were documented in the Trobriand Islands and among the Goilala people of inland Papua over the following several decades (Zigas, 1971). By the 1970s, high rates of donovanosis per month were recorded in Port Moresby, associated with recent in-migration (Kuberski et al., 1979). Recently, Mola (2005) reported seeing one case per month of donovanosis among antenatal patients at the Port Moresby General Hospital.

Gonorrhea and syphilis entered along the Papuan coast in the late 1800s, around the site of the present capital, Port Moresby. Both infec-

5 Many infections are asymptomatic, which is the basis for the distinction between STIs and STDs. Only when people have symptoms can it be called a disease. In addition, some people have symptoms but do not recognize them as anything abnormal.

tions then spread along the southern side of the nation through neighboring coastal villages. Named after the most well-known missionary, gonorrhea was called Chalmer's disease. By 1905, a special hospital had been set up at the far eastern end of this chain of communities in Milne Bay to handle the alarming amount of syphilis cases (Kettle, 1979). On the other side of the nation, on the Bismarck Archipelago, German planters brought in Chinese laborers, and syphilis and gonorrhea spread widely. By the early 1900s, Australian administrators raised the alarms, claiming that high infertility threatened depopulation, especially on the island of New Ireland (Scragg, 1957). A specialist medical officer was sent into New Britain in 1921 to examine the explosive spread of syphilis. He found high prevalence, often with frequent anal and oral lesions, in several contiguous villages, but with absences in others (Neligan, 1920).

Chlamydia was probably present during pre-contact times (i.e., before the 1860s in the lowlands and 1930s in the Highlands), as trachoma was found to be widespread as early as the 1950s (Mann and Loschdorfer, 1955).

The human populations in the Highlands of PNG were not known until the 1930s. During the early years of STI spread along the coasts and among the islands, the high concentrations of population in the Highlands region were largely unaffected. In 1936, officers of the Australian administration, a few miners, and policemen from Papua and East New Britain conducted the first exploratory patrol, opening up the Highlands for government control. As has been well documented, even on film, these men exchanged trade goods for sexual access to local women (Connolly and Anderson, 1987). After World War II, a road was constructed from the north coast into the Highlands, and gonorrhea and syphilis spread into the dense mountain populations. During the post-war years, large numbers of men from the Sepik and Highlands regions were recruited to work on plantations in Papua, Bougainville, and New Britain. In 1969, the first case of syphilis was documented in Chimbu, in the Central Highlands (Sterly, 1973). A meeting in 1970 noted that increasing prostitution was contributing to the spread of syphilis. Commercial sex work was documented in urban and rural areas before independence (Anderson, 1949/1950). Mines were cited as a contributor to the growth of prostitution as early as 1900 (Hart, 1973).

Further, by PNG's independence in 1975, a massive urban migration, mainly to Port Moresby, had taken place. Many rural males left their homes to seek opportunities in the city. Between 1966 and 1971, the urban population grew very rapidly at an overall rate of 15.4% (National Statistical Office, 1994). Since then, the further development of mines, oil fields, hydroelectric dams, and other major economic activities has helped to move people and pathogens deeper into previously isolated areas. Tari, once a remote area of the Southern Highlands, received a road in the late 1970s. As a result, men began to migrate out, many to work on coffee plantations in Mt. Hagen, in the Central Highlands. Between 1987 and 1989, attendance at the Tari STD clinic doubled (Hughes, 1991). Even the poorly maintained Government statistics on STDs showed a threefold rise in gonorrhea and syphilis between 1974 and 1986, with most cases reported among 15–24 year olds.

The prevalence of STIs is now high in males and females, whether they are considered high-risk persons or not. A 1997 survey of sex workers in Port Moresby and Lae found high levels of chlamydia (31%), syphilis (32%), and gonorrhea (36%), as well as 17% HIV prevalence in Port Moresby and 3% in Lae (Mgone et al., 2002a). A later study of sex workers in Goroka found no HIV, but significant rates of gonorrhea (21%), chlamydia (19%), syphilis (24%), and trichomoniasis (31%); 74% had at least one STI and 43% had more than one (Gare et al., 2005).

A study of rural women in the Eastern Highlands, randomly selected from villages within an hour's ride of the main highway, found that nearly 60% were infected with STIs (Mgone et al., 2002b). Prevalence was high for trichomoniasis (42.6%), chlamydia (26.5%), and gonorrhea (18.2%). A previous study of the same group also found syphilis at 4% (Passey et al., 1998). Chlamydia prevalence among men in the same area was found to be 25% (Tiwara et al., 1996). Around the same time, in East Sepik villages farther from main towns or arteries of transport, 25% of a nonprobability sample of women was found to be infected with STIs, mostly with trichomoniasis (Jenkins and Lupiwa, Papua New Guinea Institute of Medical Research [PNGIMR], unpublished data). A recent study by PNGIMR at Porgera (a voluntary sample) showed high levels of syphilis among men (6.9%) and women (9.5%) (National AIDS Council/National Department of Health, 2006). Syphilis is a major cause of stillbirths at the Port Moresby General Hospital (Amoa et al., 1998) and of neonatal mortality in Goroka (Duke et al., 2002). Moreover, chla-

mydia has been found to be the major cause of infant pneumonia in Goroka (Lehmann et al., 1999). Another recent study in remote areas of Western Province showed 27.4% of 351 adults were infected with herpes simplex virus type 2 (HSV-2), known as a potent facilitator of HIV infection (Suligoi et al., 2005).

To date, no community-based urban studies of STD prevalence have been conducted. However, results of self-reported current or past STDs among urban youth indicate rates of between 35% and 50%; a quarter of all females reporting had never sought treatment (Jenkins, 1996a).[6] Overall, about one in three sexually active persons of all ages sampled in the national study, as well as the youth study, reported past or current STD symptoms. Approximately half of these have had multiple bouts of STDs.

While male circumcision has an impact on the spread of HIV and another viral STI named human papilloma virus (which causes cervical cancer in women), the usual bacterial STIs are not affected. In PNG, a wide variety of penile incisions are carried out in initiations. Although often called "circumcision" and interpreted to be biblical (Kempf, 2002), these operations are not real circumcisions, because they do not remove all the foreskin and Langerhans cells in it that attract HIV. In the 1990s, numerous reports surfaced of young men obtaining homemade circumcisions in the village, or circumcising themselves in small groups. As this often led to severe infections and was not an effective substitute for condom use as protection against HIV or other STIs, efforts were made to discourage this trend (Jenkins and Alpers, 1996).

In 2000, the World Health Organization (WHO) estimated that more than 1 million new cases of STIs occur every year in PNG, two thirds of them being chlamydial infections (WHO, 2000). However, viral STIs were not considered. In sum, over about 150 years, the spread of newly introduced STIs changed patterns—from highly localized epidemics in the regions of introduction to outbreaks in areas with known high-risk community practices to widespread endemicity. This change has been fueled by an increasingly intensive and extensive movement of individuals around the nation, creating much wider sexual networks and a loosening of traditional constraints on many sexual practices.

6 Self-reported symptoms for males are fairly accurate. However, females tend to overreport natural or non-sexually transmitted genital disturbances, while not reporting high levels of asymptomatic infections they simply cannot recognize.

CONTEMPORY CULTURAL FACTORS

Expanding Sexual Networks

Epidemiological studies clearly show that the number of sexual partners (i.e., the size of a sexual network) and the nature of those partners (i.e., infection status, geographical or social distance) determine the spread of HIV and other STIs.

Before the 1900s, few inland people traveled far from home for fear of being killed or even eaten by their more distant neighbors. The most common marriage pattern in PNG requires mates to be found outside of a stipulated kinship distance, usually from other clans or subclans. Nonetheless, these groups stayed relatively close to each other for purposes of defense and support. Rural marriage patterns usually show that at least 80% of spouses come from the same or contiguous villages. In cities, however, wider mixing is far more common.

Box 14: Following the White Man's Culture

"But nowadays, the young people do whatever they like to do. People are no longer scared of sorcery or sanguma anymore because some of our customs and traditional beliefs have died away. Young people say we are an independent country and we can do whatever we like to do. They have freedom to choose whoever they want to get married to. Today many young people get married to people from many different parts of our country and also other parts of the world. People are now following the white man's culture and have freedom of movement and freedom of marriage. People never think of our culture and traditional customs, and our traditional customs now have died and are going down. New Christian beliefs were put into practice and many young and old people are practicing it and using it as their culture and beliefs." (Older married man, Torricelli Range)

Despite apparently uncrossable rivers and unscalable mountains, trade goods, ideas, women, and genes moved in a "pinball" fashion, often across very great distances. Person A traded with his neighbor B, who traded with his neighbor C, who traded with his neighbor D, and so on. Rarely did A actually travel all the way to D. Even in the prehistoric period of much greater internal and external isolation, genes—and possibly certain STIs—could flow slowly and gradually among the nation's peoples. Coastal peoples were far more likely to be exposed earlier to all outside influences. This reality is reflected in population genetics and oral histories of introduced diseases, items, and ideas.

Urban lifestyles, though numerically not predominant, exert strong influence on the rural majority. The population of PNG is 83% rural and 17% urban. The population is also young, with 48% of persons under 20 years old, and highly masculine, with a sex ratio as of 1990 of 112 as of 1990 (National Statistical Office, 1994). During the intercensal period (1980–1990), the number of small urban centers rose from 67 to 80. Several medium-sized towns lost people, while the capital, Port Moresby, continued to gain relative to others. By 2000, urban population had grown again by several percentage points. More importantly, the sex ratio has declined steadily in Port Moresby, showing that an increasing number of female migrants have left their rural homes for the city. Urban-rural disparities in health services, education, and the formal and informal economy continue to grow. For example, despite significant progress, gender disparities remain a serious concern especially at the secondary level where only a third of pupils are girls. While 40% of the population is of school age, less than 15% are enrolled by secondary school, and most of these are urban residents (Center for International Economics, 2002).

Extensive circular migration between the rural and urban areas, as well as numerous urban-like economic developments, such as mines, agricultural industries, and others, contribute greatly to the diffusion of new ideas and practices. Media, especially video and pornographic magazines, also play a large part in the changing ways of sex. The eroticism of more complex and commercial societies, both Asian and western, presents issues of contention in sexuality to Papua New Guineans. Sexual cultures, such as they were, have been influenced by greater options at the level of imagination and practice.

Youth and the Media

While the influence of media on young people is a contentious issue in many countries, scientific studies show exposure has many different kinds of influence, both positive and negative. Contemporary parents and youth represent the first generation of Papua New Guineans to be confronted seriously with these issues.

The media in PNG—TV, magazines, books, films—often are considered highly influential with regards to sexuality and modernization (Gewertz and Errington, 1996; Foster, 1996–1997; Lipset, 2004; Nihill, 1994). In a multisite study (Jenkins, 1996a), young people were asked to discuss the last film they saw, the last type of print media they read, and what their aspirations were.

Box 15: I Want To Be a Businessman

"The last time I saw a video was a blue movie. I can't remember the title but it was acted by white people. I saw different types of sexual behavior. You know when I saw it, it gave me sexy feelings. I think this is not a good film because it spoils our minds. I saw them naked, they played around with their sexual organs, sucking each others sexual organs—they f*** like wild dogs. When I saw it I didn't feel happy, but on the other hand got sexy feelings. I couldn't control my feelings. I lost control, my penis expanded and expanded. Some of the boys, when they saw it, they held on to their expanded penis and tried to control it, but they couldn't. I don't know about others, myself afterwards when I came outside, when I saw girls I really was tempted to rape them. I wanted to put into practice what I saw that made me sexy. You know, the feeling we got was hard to control. How can I express it, ah… Now these days I see business people living in luxury, expensive house, car, clothes and so forth. If I need to buy a wife, I use money; to buy car, I use money; or to do anything, it will always require money. So to start I would save up to K100 and then start with a trade store.

As money grows, I would buy a car for public motor vehicle, then go on to starting a poultry project. In that way, money would come from three different ways. I want to be a businessman, because I want people to know that I got everything. I want to be respected by all people. I want to be well off among the others." (20-year-old periurban male, Eastern Highlands)

In focus group discussions, pornography was held responsible for increased rape, heightened sex drive, and the spread of STIs. In private, however, many young men and women thought that *Playboys* were a good source of sex education, providing them with new techniques to try the next time they had sex. Very few endorsements for viewing pornography were unambivalent, and the majority of young people still reported they learned most information about sex from their peers.

Young women read books about relationships, either of a religious nature on family and marriage, or romance. They viewed pornography and found it exciting, but less often than boys. Overall, urban areas offered a far wider variety of reading and viewing material than rural areas. Pornography might simply expand the repertoire of sexual acts or positions; or it could have a deleterious effect on some youth. To delineate such an effect, research would have to separate all other influences, an extremely difficult task.

What does it mean to be a man in contemporary PNG society? The larger issues affecting young men concern definitions of manhood and opportunities to realize their masculinity. Sexual activities might have become a far more important domain for demonstrating masculinity than in the past, largely because the former roles of young men as warriors, or builders of boats, gardens, and houses, have been devalued. Cash has become the measure of a man. Men with cash can have many women and can have many material symbols of status, thus gaining respect in their communities.

Whatever lessons pornographic material might disseminate to young Papua New Guineans, honest and sound sex, gender, and relationship education conducted in the dual contexts of family and school is greatly needed. Young men and women desperately need more opportunities for actualizing their adult roles in society.

Box 16: I Want To Be a Prostitute

"I am 16 years old and completed my grade six in 1993. The last movie that I saw was about three little kids, and the title is called the Three Kung Fu Kids. In the movie they fought for their sisters. She will be going to school and the enemies will kidnap her and take her away and the brother will fight for her. The last book I saw is about playboy, and in the book I saw two men and one woman all naked. For my future I don't want to settle down because I want to enjoy myself by going around with all sorts of men in the village. I don't want my future to be good, because I don't want to get married. I want to be a prostitute and get feelings. Get feelings like happiness." (16-year-old girl, who returned to village in Asaro Valley after 6 years in Port Moresby)

The interviews above illustrate several common themes from the multisite youth study: social status, money, and consumerism. Boys were concerned about the ability to earn money, gain status, marry, and care for families. Many who were poorly educated expressed fear that they would become subsistence farmers. Boys and girls were sorely disappointed when their parents refused to pay school fees, forcing them to drop out of school. Girls frequently said they wanted to marry men with jobs and have good houses with washing machines. However, far more girls than boys rejected marriage entirely, as in the two female interviews above. Nonetheless, despite some rebellious attitudes and some socially transgressive behavior, almost all young people stated they did not want to shame or disappoint their parents. When someone acquires an HIV infection and develops its visible syndrome of AIDS, the exposure of past behavior is patent and extremely shaming.

Plurality of Partners

If persons with multiple partners always used condoms, HIV transmission would decline greatly. This approach has been successful in some at-risk groups with little reduction in the number of partners (Smoak et al., 2006). For many men and women, reducing the number of sexual partners might seem easier. However, promotion of faithfulness to one partner, though morally acceptable, is a weak prevention stratagem, because married women are often faithful yet still acquire HIV from unfaithful husbands. In addition, newly married couples often have HIV from prior sexual relationships. In PNG, the reduction of partners will not be effective unless much higher condom usage is achieved.

Compared to the past described by elders, people today have far greater freedom to engage in sex. This sense of freedom is personal, engendering less fear of personal damage, and social, instilling less fear of social sanctions. Whereas an unwed mother once was stigmatized in many PNG societies, babies born of unwed mothers today usually are handed over to their grandparents and the young woman remains free. The majority of young men feel justified in renouncing any responsibility for parenting a child, because their girl friends are rarely without other sexual partners as well. In some rural communities, social disapproval expressed through gossip remains a strong force inhibiting sexual freedom within the community. However, visits to other villages and, most importantly, to larger towns offer opportunities for experimentation. Many people actively seek such opportunities. For married men, going to the city during a wife's pregnancy is a good way to maintain the prescribed abstinence taboo and still have a sex life. For young people, the city represents all the forbidden pleasures of sophisticated sexual partners, alcohol, and marijuana. For women of all ages, the city allows for the sale of sex, an opportunity to have fun and make money too.

The national study of sexual behavior in rural and periurban areas found the reported number of lifetime sexual partners among men aver-

aged about 10 during adolescence to more than 20 by age 60. Nearly half of men and women had more than one sexual partner the previous year (NSRRT and Jenkins, 1994). Among married persons, about 73% of men and 21% of women reported having extramarital partners. In a large, randomly sampled family planning survey of men and women in 1993 (in Lae, Goroka, Mt. Hagen, and the Highlands Highway periphery), 75% of women stated they knew or suspected their husbands had other sexual partners (Jenkins and Pataki-Schweizer, 1991). A study among Eastern Highlands youth found that recent numbers of partners were also high, whether these young people were married or not (Jenkins, unpublished data 1998, Table 1).

Table 1: Results of 1998 Eastern Highlands Youth Survey

Risk Factor	Married Men	Single Men	Married Women	Single Women
Number of partners last year (median)	5	5	2	4.5
With 10 partners or more last year (%)	29	22	11	20
Accepted cash for sex (%)	28	8	36	20
Paid cash for sex (%)	28	12	7	20
Paid gifts for sex (%)	40	30	7	24
Paid both cash and/or gifts for sex (%)	20	7	2	15

Source: E. Highlands Youth Survey, 1998. Papua New Guinea Institute of Medical Research. Unpublished data.

Motivations for having many sexual partners are multiple, often at the same time, and differ by occasion. Most narratives from men emphasize the need for release of sexual tension, as well as the desire to trick or seduce, to "taste" something new, and sometimes to punish. They almost always reflect a clear pride in being highly active sexually. Telling others about one's multiple partners establishes one's strength and virility. Women's narratives include motives such as revenge (*bekim* or payback), material gain, fun and excitement, a quest for new experiences, and an appreciation for good sex. Unlike the women of many Asian cultures, PNG women gener-

ally have little trouble expressing their enjoyment of exciting and satisfying sex in collected narratives, both within marital and nonmarital sex. Men too make distinctions between "deep" sex and other sexual experiences.

Wardlow (2002a, 2005) points out that Huli women increasingly have become pasinja meri (loose women) out of anger at the devaluation of their traditional pivotal roles. Their reported negative attitudes toward bride-price have similarly been recorded in other parts of the country. Whether or not the term sex worker should apply to these women, the gradual incorporation of capitalist-style monetization into most aspects of PNG life would seem to underlie the facile shift from sexual exchange of other more traditional types (i.e., ritual exchange of partners, hospitality sex, sex for meat, sex for garden foods, sex for protection, sex for garden labor, sex for trade goods) to the sale of sex for money. Not unlike the use of women's bodies to sell commercial goods, women's bodies have value in the marketplace in modern PNG, for themselves and their families. In a 1996 study of poverty undertaken for the World Bank, unemployed urban men frequently pointed out that women had an advantage over men, as they could always sell their "coffee," whereas hungry unemployed men in the settlements were left with few options besides theft (Jenkins, 1996c).

Increasingly, villagers state they are observing married men seeking extramarital partners from among the pool of single, divorced, or separated women in their own or nearby villages, paying for these liaisons with cash, beer, or both. More than half of the sex partners sought by married men appear to be paid in cash and/or kind, whether these women consider themselves sex workers or not, according to the results of several studies. Many men do not like to admit they pay for sex, as it implies one cannot seduce a woman simply on good looks and finesse. In this regard, PNG has a greater similarity to southern African societies than to those of many of its neighbors in Southeast Asia. As in southern Africa, many women might not consider themselves sex workers, and their casual partners might not think they are purchasing sex (Wojcicki, 2002). While self-identified, full-time sex workers are recognized, primarily in urban or urban-like areas, far more women are engaging in what has been labeled "transactional sex."

Box 17: They Pay Me With Money

"After my first sex, the next partners are 12 and their ages are as follows: 16, 16, 17, 19, 20, 18, 18, 21, 20, 17, 18, 16. All of them are single boys. Last year I have slept with five and this year seven. For some, they paid me for sex, but some no. When I rejected to sleep with them, they pay me with money. They pay at least K5.00 or K10.00. With that money, I use to buy clothes or soap." (19-year-old village girl, Lufa)

Rural areas provide opportunities for commercial and transactional sex. In a small rural sample of 67 women who exchanged sex for cash, and 90 who did not, no significant differences were found in their exposure to town. Thus, urbanity per se is not an important mediating influence. Overall, nearly half of rural and periurban women reported selling sex for cash sometimes. One study that sampled young urban unemployed women found that 48% claimed to at least partly support themselves through sex work (Levantis, 2000). In studies conducted in 1991–1996 through the PNGIMR, urban-rural differences in risky sexual practice among adults and among youth were not significant. However, knowledge and services related to sex and reproduction, including availability of condoms, are far less adequate in rural areas (Lemeki, et al., 1996; Lupiwa, et al., 1996; Wardlow, 2002b).

Box 18: That's Why I Go Out With Lots of Men

"Some mothers have told me that if I have sex with only one man, I will get pregnant, but if I have sexual intercourse with plenty different kinds of men, I will not get pregnant. That's why I go out with lots of men. I've heard this from married women." (17-year-old female, Eastern Highlands)

Long-term sexual involvement with a single partner implies the likelihood of pregnancy and should be avoided unless one is ready for com-

mitment. This is buttressed by the widespread notion that pregnancy cannot take place unless a man has sexual intercourse with a woman at least about six times. Thus, many girls and boys have been taught that changing partners frequently is safer. In one study (Klufio et al., 1997), significantly more of the youth under 18 (81%) thought more than one act was required to get pregnant, compared with 56% of the older cohort.

Basic facts about sex and reproduction remain widely misunderstood in PNG. All opportunities to improve peoples' knowledge should be utilized, including through programs for parents as well as young people. However, monitoring what is being taught is essential, as copious examples are available of health educators and others in positions of "authority" giving out incorrect information. Given PNG's tradition of providing false information about sex to young people to discourage unwanted behavior, attitudes about disseminating facts, making condoms and other services available, and letting informed people make up their own minds about sex in their lives must be addressed as well.

Commercial and Transactional Sex

Although the epidemic has begun to spread widely outside of commercial sex networks, targeted interventions for those practicing commercial and transactional sex remain the most cost-effective interventions possible.

The definitive history of the sex trade in PNG has yet to be written, but evidence suggests that women's sexual services were exchanged for goods from the time of earliest contact, as happened elsewhere in the Pacific. Before contact, numerous customs existed that prefigure commercial or commodified sexual exchange. Hence, it is not surprising that a large proportion of women and men do not consider such transactions a major moral lapse.

The commercial sex trade in PNG has grown substantially over the decades. Although it is not a new phenomenon, it is better recognized in cities. The contemporary rural scene includes young women who expect

to be paid; others who accept cash "to be nice"; and others who accept gifts, such as beer, food, and clothes, and do not expect cash. Many of these same women sometimes have sex without any sort of remuneration just for fun. In small towns and at markets, some women define themselves as sellers of sex and openly negotiate price. In all areas, especially the larger urban centers, many women depend almost completely on the sale of sex for their income, and who support several other family members on this income as well (Jenkins, 1994a). Half of the women 15–24 years old in the multisite youth study stated that they accepted cash, gifts (including alcohol), or both in exchange for sex. In the 1991 national study, 66% of the women under 25 years old and 43% of those over that age stated the same. However, as these were not probability samples, they cannot be interpreted as the actual proportions nationally.

Box 19: Old Men Have a Lot of Money

"Yes, I went to school and had completed grade 8, but they suspended me from school because I smoked marijuana with some boys during lunchtime in the classroom and they caught us. So now I'm just a simple cashier. When I see my classmates working in offices, I usually think back to my school days and feel worried about what I have done. I earn money from my salary and also from my boyfriends. You know ol lukim mipela ol meri, ol ino inap wari long moni ya, ol bai givim mipela tasol bikos ol laik lukim skin bilong mipela ya (they see us women and don't worry about money; they will give it to us because they want to see our bodies). To tell you the truth, I learned sex from a magazine. When I saw this magazine, I felt wet and I really wanted to have sex.

You know, people like us, we know how to read and write, and when we read some books, we get some ideas already to go about it. I don't recall how many men I had sex with last year, but I think it's about 30–33 men last year. Some are married old men and young boys at my age. I want old men just because I want their money, young men and married men don't have enough money, but old men have a lot of money so we

just grease them and they give us a lot of money. I have sex just because I want money, and if no money, no sex." (20-year-old woman living in an urban settlement, Port Moresby)

Among women 15–24 years old interviewed in 1994, those who never took cash for sex had a median number of partners in the previous year of 1 (although 32% had more than 1); for those who only accepted noncash gifts for sex, the median number of partners in the previous year was 5.5 (with 23% having 15 or more); and among those who accepted cash for sex, the median number of partners in the previous year was 16 (46% had 30 partners or more). However, the number of partners for self-defined, full-time commercial sex workers was far higher—on the order of 150–300 or more in the previous year (Jenkins, 1994a, 1996a, 2000; Mgone et al., 2002a).

Box 20: I Also Built a House on My Own

"I don't give a single toea to my husband from my earnings. And I also built a house on my own from the money I got from selling sex. If I made K10 per drop, I kept this money until I made more. When I reached K50, I used this money for my child's school fee. And then I used some for her clothes." (30-year-old woman, Port Moresby)

Wardlow (2005) points out the motivation for selling sex among the Huli is often anger, revenge (*bekim*), and the expression of personal agency. Others emphasize poverty and the lack of options to earn money. Yet others note that family members sometimes "push" a woman into selling sex, including reports of parents selling their daughters to men or to brothels (Banks, 2000; Hammar, 1999). The factors driving the formal and informal sex trade in PNG are not essentially different from those found elsewhere. The most significant differences salient to the HIV epidemic in PNG between self-identified sex workers and women who engage in opportunistic transactional sex is the number of partners in a given period, and the degree to which internalization of risk and subsequent behavior

change relates to self-recognized identity. While self-identified, full-time sex workers clearly have the highest number of partners per year, the number of clients is relatively low compared to that in other countries. On the other hand, about 15% of other women appear to have nearly as many partners as sex workers. This implies a convergence of risk levels among women in the sex trade and the most active of those practicing transactional sex. Such extensive multi-partnering can fuel a widespread "hot" epidemic. Their clients and boyfriends are at equally high risk.

In urban areas, most customers come from the civil service and commercial firms in the city, with a high proportion of their trade taking place at noon and at around 4 o'clock. The most frequent customers for sex workers in Port Moresby and Lae were reportedly as office workers, businesspersons, foreigners, police officers, loggers, truck and bus drivers, and soldiers, in that order (Mgone et al., 2002a). Sex workers at the top of the trade provide escorts and party women for politicians, wealthy businesspersons and the like. Others ordinarily operate out of hotels, small guest houses, and discos. Mobile phones have entered the scene and are likely to play a major role in coordinating the sex trade in the near future.

Many, however, are "two kina bush" women. These women sell sex in the daytime in the high grasses and bushy areas around the city; many are homeless. Their customers are usually low-income men. In rural areas, commercial sex is available at clubs, discos, and markets. At least a few women willing to sell sex can be found at most small urban-like centers, called government stations, where men who work for wages can be found. In a study of Eastern Highlands women working along the Highlands Highway, sex workers reported self-employed villagers, public mother vehicle drivers, and businesspersons as their most common clients (Gare et al., 2005). In the World Bank poverty study, remote rural women spoke of walking 10 hours on pay days to government stations to sell sex for cash to purchase used clothes (Jenkins, 1996c). Canning factories, logging camps, mines, petroleum and gas installations, and other major economic projects foster the growth of sex trade. As the stigma associated with these sexual exchanges among villagers is not too great, particularly when women share their earnings with family and friends, the main limit on commercial sex appears to be the number of clients ready to pay.

The nationwide study of rural and periurban men found 36% have paid for sex with cash; most were married. In addition, 33% of the men usually paid with gifts (NSRRT and Jenkins, 1994). Studies of occupational groups carried out in 1998 showed varying proportions of men accessing commercial and casual sex in the previous week: seafarers 54%, security guards 52%, police officers 49%, dockworkers 30%, and truckers 15% (Jenkins, 1994b, 2000).

Box 21: I Got Really Ashamed

"My husband now is running around too much with women. We adopted a little girl from his sister, so I kept myself busy looking after her. My husband here is a bus driver; he goes around f***ing ladies outside and doesn't give me money to feed our baby and that behavior really changed my mind. I got really ashamed because my relatives and neighbors used to feed my adopted child. So I started selling sex to have money for our own. I am selling sex for 4 years now. I started in 1991." (34-year-old woman, Port Moresby)

The Highlands Highway has been associated with commercial sex since it was built (Hart, 1973; Sterly, 1973). A WHO-sponsored study of sex along the highway conducted during the mid-1990s (Jenkins, 1995b) documented numerous examples of commercial and transactional sex, some of which were loosely organized as a trade.

Anecdotal evidence suggests that such family-driven sex work is increasing in urban areas. Residences with numerous women available in them are also known. In addition, research on the high end of the trade has documented clearly organized communications, fee schedules, modes of access, and types of clients. As an increasing number of sex workers become homeless, the potential for a more Asian model of the sex trade with real residential brothels is considerable.

In the rural and periurban national study, 38% of men said they had experienced anal intercourse; women spoke about this far less often, but this was not specifically queried in either case. In one study of

urban sex workers, however, high levels of anal intercourse were documented (63%), but may represent only 'ever' having had anal sex, as this higher-risk practice was not statistically associated with a greater risk of STIs. Group sex (*lain-aps*), however, has been associated with a greater risk of syphilis and chlamydia (Mgone et al., 2002; Gare et al., 2005).

Forced lineups of sex workers often involve members of the police force. In 1994, sex workers in Port Moresby frequently stated that they were picked up and harassed by police officers. In exchange for not booking them, they were placed in police barracks and made to serve a whole precinct full of men until dawn. The police called on their car radios to other precincts to invite other officers to join them. Sex workers were unable to bring a complaint of rape to the courts. In-depth interviews with police officers (conducted by ex-police officers) corroborated the sex workers' statements (Box 22). In a 1996 quantitative survey of 130 Port Moresby police officers, 10% admitted having been in a lineup the previous week (Jenkins, 2006, in press). The degree to which this continues is not well documented in any recent studies. However, in a small study of 79 sex workers in Port Moresby in 2004, 61% reported that physical and sexual abuse by police was their greatest problem (Human Rights Watch, 2005). A short intervention with police in 1996 designed to address the risk of exposure to the semen of other men in lineups seemed to halve the incidence of group rape, but the intervention was discontinued.

Box 22: We Always Bash Them Up

"Bro, I think we know each other for quite a long time. Bro, I think you been in the system yourself and you know it. I would tell you that I don't normally go out looking for girls for sex in nightclubs or discos. The public is against us and I don't want to be beaten up in the night clubs. You mean pay for sex? That is quite new to me. I f*** for nothing, why pay? I'm telling you the facts. Policemen f*** like nobody's business. How many times we bring girls into this single barracks, they never demand money. That's correct, we do group sex too. Well, you know the system yourself, brother boy! Policeman can f*** at anytime, any place. I get girls or women, no matter single or

married, so long as she agrees to f*** when she comes to the police station to lay complaints, such as she was beaten by the husband, brother, father; or their money was stolen; or any complaints. You just pay a visit to any of the police stations in town and see. You will see that people are always there, some arguing, screaming, and shouting at each other; and others laying complaints at the duty counter. You know, any girl taken out in a police car to attend her complaint and look for the suspect that she wants to be arrested, she has to be asked for a f***. If she agrees, that's it, f*** her. No, we don't pay her too. Group sex does not apply in this case. Because we don't want to create trouble, such as get reported for rape or group sex. If she is forced against her will to have sex with all the policemen who are in the car, then we expect a rape charge the next day. In this case, the person who is in charge of her complaint or report only f***s her. There are certain girls that we know of. They are regular faces to policemen, and we f*** them whenever we meet them and that is when group sex comes in. We call them 'public toilets'. Whenever we feel like f***ing, we go looking for them. As soon we spot them, we tell them to climb into the car or van. If they refuse, we use force to get them in. We always bash them up, so they know our ways. We pick them up any place—streets, outside the clubs, any place. Yes, sometimes we bash them up and order them to get into the car. Well, where will they go and report or lay complaints? Every policeman and policewoman in town knows them very well. Nowadays, they don't come to the police station because they know very well that their reports won't be heard. (25-year-old police officer, Port Moresby)

Male-to-Male Sex

The lack of recognition of the frequency of male-to-male sex in many countries in the Asia and Pacific region is contributing to the continued spread of HIV. PNG is no exception.

Sexual identity has little meaning in PNG. The terms heterosexual, bisexual, or homosexual do not exist in most local languages. This implies that, despite the presence of same-sex activities, publicly committing oneself or another person to a particular sexual orientation was not considered important. Traditional third gender identities, as found in many Polynesian societies (e.g., the *fa'afafini* of Samoa), are rarely found in PNG (Jenkins, 2004b).

Same-sex activities take place among men and among women, particularly when young. In the youth study, 22% of males and 4% of females stated they had engaged in same-sex intercourse and/or mutual masturbation to the point of climax. In the national sample, 12% of men questioned told of their same-sex experiences. Men often reported male-to-male sex for payments when drunk and in enforced all-male residential scenes, such as boys' dormitories, jail, mining camps, or on oil rigs. What is significant to western minds is that these events do not imply anything about one's identity.

Recognition of the male sex trade in PNG has been very slow. Several studies, however, make it clear that such a trade, though much smaller than the female sex trade, exists in Lae, Daru, Port Moresby, and probably elsewhere. Public places where men may meet and engage in commercial or noncommercial sex are emerging in Port Moresby. While earlier studies documented the existence of *geli-geli* (feminized males who provide sex to seafarers and others), more recent observations reveal the gradual public recognition of such men, who call themselves *logohu* (birds of paradise) in the Motu language or gay in English. Their degree of feminization is not as great as the traditional fa'afafini found in most Polynesian societies, but some informants state such a partially transgendered role is traditional in Motu-speaking villages along the coast near Port Moresby. Many of these logohu also sell sex. Male-to-male sex activity as a whole has a strong bisexual component, i.e., a sizable proportion of men who

are the partners of logohu, as well as other homosexually active men, are likely to be married and/or have sex with females as well (Jenkins, 1996b).

Box 23: Man, Woman, Boy, or Girl

"Here in Moresby, I always have sex with women and young boys who want money. My payment is from K5 to K30 per person—man, woman, boy, or girl. I never have any problem with the police or the community in which I live. I don't show this kind of activity where everyone else can see. I always play under cover, and always teach my partners to use condoms when they have sex with me. They always do what I want them to do. I never had an STD. I have been involved with buying sex for more than 4 or 5 years now. I might have spent more than K2,000–K3,000 on sex alone during those years." (30-year-old man, Port Moresby)

This bridging population, especially in larger cities, urgently needs to be reached with effective prevention and care. Outdated sodomy laws (carnal knowledge against the order of nature) have created barriers in accessing this population. Male-to-male rape and male-to-male child abuse—both acts of nonconsensual sex—are not differentiated well from consensual male-to-male sex among adults in the current legal framework. Many men who have sex with other men in consensual relationships experience considerable damage due to blackmail, which is made possible by the nature of the present law. The removal of this threat would improve the ability of nongovernment organizations (NGO) and other agencies to carry out much-needed HIV prevention programs with men who have sex with men.

Sex, Threats, and Violence

Sexual and nonsexual violence against women have been associated with increased HIV prevalence in several countries. The extent of both types of violence in PNG represents a serious HIV risk that has not received adequate attention.

Coercive sex and sex-related violence in many forms are common in PNG, as elsewhere. The most common and widely acknowledged form is wife-beating. A wife refusing sex to her husband is the most common reason for such beatings. Rape within marriage was recognized only recently by law. In many parts of the country, the bride-price is seen to give full property rights to a man over a woman. Rape, for which most cultures have no clear concept, can be seen as opportunistic or deliberate (planned), single or multiple (number of participants). Most people understand coercive sex, but it can be considered justified, normal, and expected. Older ethnographies of the Eastern Highlands pointed out that men guarded their women as they walked to the gardens, because they easily could be attacked and raped, particularly if a woman stopped to urinate. Any man seeing her sexual organs had a "right" to rape her. Such formulations of male sexual privilege are being strongly contested in modern times (Dowsett et al., 1998).

Child-rearing techniques continue to reinforce aggressive behavior among boys, particularly if their social standing among peers is threatened. A comparative study of young (15–25 years old) Papua New Guinean, Fijian, and Samoan men found that Papua New Guineans had the highest frequency of violent responses when a girl refused a request for sex and had the lowest level of self-reported self-control (Jenkins, 1997).

Most contemporary rape in PNG has a culturally specific pattern. Unlike in some societies, at least half of all rapes in PNG are perpetrated by groups of men together. This is called lineup, deep line, single file, and (in older ethnographic literature) plural copulation. In recent studies, the term "group sex" has been used because it is not clear that all instances can be considered rape in a legal sense. In this practice, between two and 50 men (average of 10) literally line up to have sex with a single woman. They often take "rounds," returning for a second or third time. Each watches the previous man, and men on the sidelines often act as guards. Most such events occur after attendance at discos, clubs,

and video parlors in urban and rural areas. Alcohol and marijuana play an important role. Sometimes, the woman has agreed to have sex with one of the men involved and does not expect to take on others. Sometimes, however, she sets up the situation by drinking with numerous men and willingly takes on the whole bunch. The latter is more common among sex workers who might not consider it rape, as described by one 16-year-old urban sex worker (Box 24).

Box 24: K20 Plus Earrings

"These two who picked me up from the XX club, they took me to their friend's house. His wife was at the village. Four of us had drinks together. Each of them had sex with me until dawn came. I could remember the first and last part of the action, but not the middle part—I was so drunk. In the morning, the owner of the house was not happy with my being there. He asked his friend to take me home as soon as possible. He gave me K20 plus earrings. The first partners gave me K70, then they dropped me off on the road that leads to our house." (16-year-old urban sex worker)

While men discuss these lineups with comparative ease, most women have difficulty revealing experiences that are so loaded with shame. Sex workers, on the other hand, are generally more willing to talk about it, as they can be hired by a group. However, most simply give in to the force of a group of men due to the influence of alcohol and marijuana, and the realization that alone they can do little to stop it.

Men give many reasons for group sex or lineups, most of which are punitive or misogynist and corroborate the interpretation that this is often group rape. As a very small proportion of these events ever come to the attention of the courts, legal definitions have not been clarified. In the youth study, young men frequently stated they had no money to pay for sex. They justified rape on the grounds that so many women refuse to have sex unless paid, which is seen essentially as a type of theft. Statements such as the one in Box 25 from a 19 year old living in a rural village are heard often from many areas of the country.

Box 25: Hunting For Rape

"I don't consume alcohol but do consume marijuana. When I get sparked on it, it makes me think of sex. We do have sex by force when consuming marijuana in groups. Whenever we come across a lady who walks alone during night times, she is already in our hands by force. We will take her to the coffee garden and force her to consume marijuana. She will take marijuana until she is really out of control, and that is the time we handle her for sex. Those of us who do have condoms do use them, but those who have nothing, just f*** without using it. Anybody will have a turn in f***ing her, even the people of the older ages to the young ages. It is same thing with the ladies—sometimes we get older ladies, sometimes middle-aged ladies, and sometimes very young girls, and that depends on what kind of lady we come across when hunting for rape. We do that during marijuana consumption and other normal times when we stay together in groups and tell some sexual stories, which would make us feel sexy and those are the times we look for sex." (19-year-old male, Eastern Highlands)

In the multisite youth study of 466 females and 358 males, 11% of women and 31% of men reported personal involvement in lineups. Of the men, the majority had been involved on numerous occasions. Nearly all said that they had forced the woman and that she had no choice. Of the women who had been involved, more than half considered it rape; the rest were sex workers who had done it willingly. Almost all the men involved in lineups said they also forced women into sex when alone, particularly when drunk. An additional 9% of young men who reported no involvement in lineups said they forced women into sex acting alone. Thus, 40% of the young men admitted to forcing women when alone. Only 6% of young women admitted to having been "raped." However, nearly 30% described, often in extraordinary detail, the rape experiences of their girlfriends, most of which involved more than one man. Some of these women probably were discussing their own experiences. Another study of youth in Goroka revealed 24% of males and 3% of females admitted to being in lineups. Lineups also serve as an ex-

ample of homoeroticism acted out in a heterosexual context. In PNG, about one quarter of the young men who discussed having sex with other men explained they had done so within the context of a lineup (Jenkins, 1996a).

Most men and women consider the majority of these events rape. However, if the woman has been drinking or smoking marijuana, she is seen as complicit in the act. This, according to this view, obviates her reporting the men to authorities. Personally, the woman still might think she was forced. In the national rural sample, 60% of men of all ages who discussed the issue reported having been involved in group sex at least once in their lives. Only 3% of women reported the experience explicitly in that study, although 65% said they had been forced into sex against their will. More women reported the use of ropes, cloths for gagging, knives, and guns when they were raped than did the men.

A much overlooked high-risk activity, lineups represent nodes of potentially intensive HIV transmission. The magnitude of potential transmission in a single lineup depends on (i) the number of men involved; (ii) the STI and HIV infection status of everyone involved; (iii) the presence or absence of bleeding; and (iv) the number of condoms used, if any. In PNG, men and women publicly state that lineups occur nearly every weekend in urban and rural communities, and usually involve men of all ages. No studies have been conducted to estimate the true frequency of these events.

Sexual violence against women apparently is so common in PNG that it is seen as normative in many communities (Borrey, 2000). Few countries have had studies conducted with sound sampling and adequate interviewing on this topic among sex workers as well as nonsex working women or men. In South Africa, where researchers have documented many aspects of sexual violence through ethnography, quantitative probability sampling, and qualitative studies with men and women, the issue has been gradually brought into the spotlight. As a result, services have been developed, such as post-exposure prophylaxis for HIV among rape survivors (Jewkes and Abrahams, 2002; Wood, 2005). PNG clearly needs a similar campaign of research, advocacy, and sociocultural change. Recourse to the justice system for gender violence must be improved. Even more important, however, is the need to design community-level interventions that accurately identify the sources of gender disempowerment among men and women, and that work to create long-term solutions to gender inequity built on the strengths of traditional and modern perspectives (Knauft, 1997; Lattas, 1990).

PART 4. SOCIOCULTURAL RESPONSES TO HIV AND AIDS

Stigma and Rejection

In 1994, youth were queried on what would happen if (i) someone in their village was known to have HIV, (ii) if that person was one's own brother, and (iii) if the informant acquired HIV. Responses to these questions demonstrated how people viewed the disease and revealed marked gender differences. In response to another villager acquiring HIV, about 60% of young women's responses were highly negative, such as kicking them out of the village, sending them away, and banishing them. Only 34% of young men said they would throw someone with HIV out of the village. When the same question concerned one's own brother, 70% of young men said they would care for him, find out what to do from a doctor, and take him to the hospital; 58% of young women said they would do the same.

Questioning what would happen if the informant acquired HIV revealed even greater gender differences. While 31% of young men thought they would be sent away and another 40% thought they would be criticized, none feared that anyone would kill him and none considered suicide. Among young women, 40% thought they would be sent away from home, 20% were concerned about strong gossip, 9% thought they would be killed, 3% said they would commit suicide, 2% believed they would be reported to the nearest health post, and 2% thought someone would be sorry for them.

Since that time, the number of people who have had direct experience with HIV/AIDS has grown considerably. Efforts to diminish stigma through the mass media have not been successful (National HIV/AIDS Support Project [NHASP], 2006). Stories continue to circulate of shunning, deserting, and even killing people who have HIV. Many babies are abandoned and bodies left unclaimed at hospitals. The stigma associated with the virus has increased in PNG as HIV has spread. Despite the enactment of broad-based legislation to protect the rights of HIV-positive people, only the component concerned with deliberate transmission has received any attention. Where concentrated effort has been made to educate families and villages, the results are often positive, i.e., people do take

care of their relatives, and living with HIV is less of a burden. However, where high levels of shame are associated with sexual transgressions—as they are in general for women as opposed to men—the stigma can be overwhelming. Even though the common discourse involves the innocent wife getting HIV from her husband, the wife in many PNG couples is infected and the husband is not (Mola, 2005)—a finding that is common worldwide.

Although PNG women are often described as being unable take control and protect themselves, several studies indicate they can. In a study examining the acceptability of the female condom, women were very successful in introducing the condom into various types of relationships (Jenkins, 1995a). Traditionally, despite the restrictions they often had to live with, PNG women found some ways to express themselves and seek what they needed (Kyakas and Weisner, 1992). In modern times, they often have pushed the boundaries and become far more assertive, though that sometimes elicits a backlash from threatened males (Counts and Counts, 1994; Knauft, 1997; Nihill, 1994).

Belief Systems and Explaining HIV

Today, PNG villagers are left to cope with the new scourge of HIV/AIDS in their own ways. While most Papua New Guineans seem to recognize this as a new disease, brought in from outside the country, accusations of sorcery are likely to be fairly common. The interaction between ethnomedical or other belief systems and the experience of AIDS has not been researched adequately. What has been recorded is the frequent attitude of payback, i.e., "someone gave it to me so I will now give it deliberately to others." Given the deeply entrenched value of retributive justice in most PNG societies, such a response would not be surprising (Trompf, 1994).

The more noted cultural responses have been in the realm of Christian belief systems. Eves (2003) described an apocalyptic vision of AIDS among a group in West New Britain. In another study, Dundon (2005) showed a fascinating example of spirituality turned against itself, as women possessed by the Holy Spirit attempt to expunge sexual transgressors from their community, but become sexually promiscuous as a result of repeated trancing. Since the rise of charismatic Christianity in PNG, the central concept of the apocalypse, when the world ends and Jesus re-

turns, has been emphasized more than in earlier mainstream Christian religions. As a 43-year-old man in the Islands Region put it: "Maybe the end of the world is nearing, that is the second coming of Jesus Christ." People in many areas of the country have reported increasing incidence of glossolalia, trance, and visitations from the Holy Spirit. Dreaming and shaman-like behaviors are related responses (Kempf, 2002). These cultural expressions were seen in PNG earlier, associated with cargo cults or similar millenarian-type movements (Lattas, 1991; Lindstrom, 1993). Such responses emerge when people are experiencing high levels of cultural stress, and frequently women are affected more than men. Altered states of consciousness, as well as the transformation of messages of the new church into forms that fit with older practices and values, help reduce dissonance (Lattas, 1990). Papua New Guineans have experienced a great deal of dissonance between what they perceive themselves to be and what the new Christian order appears to demand. In many cases, the conversion to various forms of Christianity and the introduction of modern values left people with a strong sense of being inferior to Europeans and hopeless sinners. Moreover, they felt that much of what was authentically theirs was simply no good (Robbins, 2004; Robbins and Wardlow, 2005; Wilde, 2004).

Riley (2000) pointed out that western concepts of sexuality were projected onto Papua New Guineans, particularly in relation to sexual guilt. However, most traditional societies appear to have utilized public shaming as a social control mechanism, a much more effective means where ostracism effectively reduces the chance of survival. While Protestantism has emphasized the inculcation of guilt and the relief of salvation, the extent to which this has entered the psyche of PNG's cultures is not clear. With the advent of AIDS, communities throughout PNG appear to be trying to come to some understanding—not of the virus and what it does to the body, but why the virus has come to them. This is the ultimate question, and the most common one for which traditional medico-religious beliefs provide answers. Western medicine has little to offer on this count, because the question is essentially spiritual, moral, and social. Unfortunately, the most common response by PNG's churches is to suggest that AIDS is God's payback to sinful people.

While the churches are urged to take a more proactive stance on AIDS, the practice of religion (e.g., attending church) has little impact on sexual behaviors. In the Fiji Islands, research has shown that men who at-

tend church have more sexual partners than others, as they have greater access to women when attending church socials and other gatherings (Kaitani, 2003). Recourse to religion alone is not likely to stem the spread of the virus. However, barriers set up by religious leaders, such as refusing to permit condom use, or demanding abstinence and faithful marriage as the only acceptable ways to avoid HIV, can contribute to its transmission.

DISCUSSION

Development and HIV in PNG

In many respects, "development" has failed PNG, despite increasing amounts of foreign assistance. The cost to society of acquiring western values and material objects, without replacing the social mechanisms of the past, has taken a severe toll on PNG. One report, entitled "You can't buy another life at a store", seems to sum it all up (Lawrence, 1995). The churches hoped to replace older cultural forms with new ones. In only a few cases, however, have these been functionally equivalent to what PNG's societies had in the past. Rivalries and competition among the numerous churches that operate in PNG have contributed to greater confusion and disillusionment. Neither the churches nor the Government has been able to integrate their demands for a Christian morality and a modern economy with the values, aspirations, and structures of PNG's societies. Continued impoverishment, especially of women, will contribute to further vulnerability and increased risk of exposure to HIV.

Economists have shown that, throughout the world, the relationship between the amount of funding support and success in economic development is minimal (Rajan and Subramanian, 2005a, 2005b). A number of possible reasons for this situation, beyond corruption or political agendas, have been identified. Critical assessments of funding support effectiveness found that participatory processes utilized in project planning generally are token exercises, leaving the power to make decisions in the hands of high-level officials. This observation is even more pertinent in relation to changing sexual cultures. Development partners work mainly with government bodies, and government bodies work mainly with other government bodies or churches and NGOs. Meanwhile, the multiplicity of ordinary peoples' voices remains unheard and unheeded. HIV/AIDS policies and programs designed in Port Moresby or outside the country for the millions of villagers living highly differentiated lives with different concepts about sex and sexuality cannot be expected to be successful (Jenkins, 2004a; Lepani, 2002). Moralistic, fear-inducing, and other

top-down approaches to behavior change, as well as generic ones such as ABC (abstinence, be faithful, and condoms), are likely to be misunderstood and fail. Further, they risk instilling more shame, self-disdain, and embarrassment about sexuality among PNG's peoples (Jenkins, 1993a).

Which Way Forward?

For people whose livelihood depends on multiple sexual partners, such as professional sex workers, the immediate need is for targeted interventions, utilizing paid peer educators, dedicated STI clinical services, and self-help group organizations. Such interventions repeatedly have shown major positive effects on HIV epidemics, though they must be scaled-up to cover at least 60% of the target group.

For everyone else, prescribing actions that should be taken to bring about a safer set of sexual cultures in PNG is simply impossible. Papua New Guineans must do this themselves. It is possible, however, to be certain that they are provided with appropriate information and services. These services should include education about transmission; STI treatment; voluntary HIV counseling and testing; and HIV care, treatment, and support. And they must be provided by culturally competent persons trained in nonjudgmental communication techniques.

Despite all the cultural traits that place many people at risk of HIV in PNG, other cultural traits can be viewed as sources of strength and utilized that way. For example, in most PNG societies community-wide decisions are made by consensus. Customarily, people, usually mostly men, meet and discuss the community's problems before making a decision for action. Given that HIV is an STD, it would be reasonable for men and women to meet for discussions—perhaps separately at first, and then together. They need to be given the opportunity to understand the facts about HIV, and then assess what their communities need to help people avoid infection. While punitive actions commonly are considered first, a well-trained facilitator could help the participants understand why these are seldom effective for sexual behavior. Stories, drama, and even films could be used to elicit a self-analysis of the local culture and what might need to be changed.

An individual alone often lacks the capacity to overcome the structural constraints to shifting one's behavior toward safer sexual activities. The type of community discussion mentioned above can help people identify these structural constraints. They might include barriers to accessing condoms, health facilities, sex education, or ways for young women to earn cash. Once identified, the next step would be for the facilitators and key community persons to find out how they could access what they need. Links to NGOs, the Government, and funding agencies could help to make these needs known and advocate solutions. Similar processes have been used in the environmental movement in PNG, with considerable success in promoting sustained conservation efforts. These are not quick fixes, but they have a greater likelihood of local adoption and sustainability than programs designed by outsiders. Scaling-up this type of process would require a cadre of trained community development specialists, a paid occupation that many young Papua New Guineans would enjoy.

Few countries on earth have the cultural diversity found in PNG. Designing HIV prevention programs in far more homogeneous societies has not been a trivial enterprise, yet most such programs have been minimally successful. Prevention of HIV in PNG presents a multitude of challenges that the current methods of decision making and investment do not address adequately. Program designs have not tapped the power and strengths found in the multiplicity of PNG's traditions. Development partners, Government agencies, and other stakeholders should take lessons from the few grassroots efforts that have paid off for PNG, such as the environmental movement. Culture matters—and cultural matters cry out for frank discussions and an informed, empowering approach to change.

Youth Vulnerability to HIV in the Pacific

Holly Buchanan-Aruwafu, PhD

Introduction

From 1984 to 2006, the number of young people with HIV infections has been increasing globally and in Pacific Island country and territories (PICT). The aim of this paper is to draw attention to the growing global and Pacific youth HIV epidemics, and to present details and insights into the risks and vulnerabilities of young people to HIV infection in the Pacific. In the process, this paper will highlight the need to address young people's behavioral risks, as well as the contexts of their lives and vulnerabilities, to alter the course of HIV epidemics in the Pacific. These pose both challenges and opportunities for change (Chambers *et al.*, 2006).

In Part 1, a summary of the 2005 global HIV statistics, Pacific surveillance, and other research are presented together to allow comparison of the levels of HIV and sexually transmitted infections (STI) among young people, as well as what is known about exposure, HIV knowledge and reported sexual behaviors, and youth involvement in highly vulnerable groups. The data show the large proportion of new HIV infections in young people, particularly female youth, and the lack of knowledge about HIV. Further, the information demonstrates how youth commonly can become involved in practices—globally and in the Pacific—that put them at high risk of exposure to HIV.

Like their global peers, young people in the Pacific encounter situations that are known to have a great impact on the course of HIV epidemics (United Nations Children's Fund [UNICEF] *et al.*, 2005; UNICEF and Joint United Nations Programme on HIV/AIDS [UNAIDS], 2006). In Part 2, the factors worldwide that heighten youth vulnerability, and

the conditions of young people's lives in the Pacific, underscore how the spread of HIV is not just about individual practices. It is multifaceted and contextual. Similarities and differences in the circumstances of young people's lives are analyzed. These include a poverty of opportunities in education, employment, and decision making, as well as sociocultural change, substance abuse, and gender and age inequalities.

In Part 3, a case study from Auki, Malaita in the Solomon Islands details sexual practices that increase risk of HIV infection for young people, and the contextual nature of their sexualities and vulnerabilities. This research illustrates the effect of rapid change and social conflict in young people's lives, and how globalization, culture, and political economies can influence young people's sexualities and sexual practices, sexual violence, and their ideologies and attitudes about these. The study demonstrates that religious and sociocultural factors can affect young people's access to information, condoms, and STI treatment services, which impact how health systems interact with youth.

The final discussion draws attention to HIV prevention, treatment, and care, as well as the need to tailor responses to young people in local contexts that support youth resilience, advocacy, and change (Dowsett and Aggleton, 1999; Cobram *et al.*, 2006).

PART 1: YOUTH KNOWLEDGE, PRACTICE, AND HIV EPIDEMICS

In the 21st century, the world has the largest youth generation in history, with close to half of the global population under the age of 25 (United Nations Population Fund [UNFPA], 2003). By the end of 2001, an estimated 11.8 million young people 15–24 years old were living with HIV (UNICEF *et al.*, 2002). HIV epidemics have spread worldwide over the past 25 years, with women and young people now being infected disproportionately. By 2002, about half of all infections worldwide were women and young girls (UNAIDS, 2004). In 2005, UNAIDS (2006) estimated that about half of the 4.1 million new HIV infections worldwide were in children and young people under 25 years old, with more female than male youth being infected.

UNAIDS does not report annual country and global estimates of young people (aged 15–24) living with HIV. Reported country estimates of HIV prevalence in young people have been limited. Gaps in country-level data make it difficult to compare statistics over time to gauge regional and global trends in HIV prevalence among young people, or the achievements of countries in their United Nations General Assembly on AIDS (UNGASS) commitments to reduce HIV prevalence by 25% among young people (aged 15–24) by 2005 (UNAIDS, 2004; UNAIDS and World Health Organization [WHO], 2005).[1]

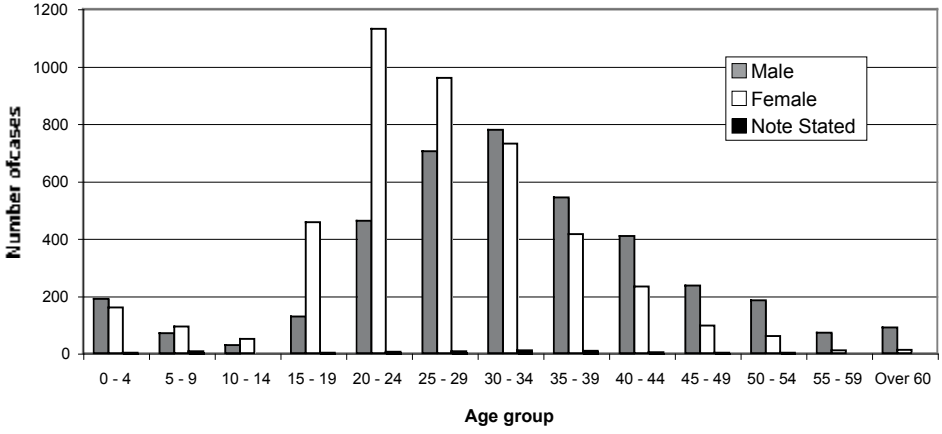
Pacific HIV Epidemiology and Youth

UNAIDS did not report most HIV-related indicators for PICT in 2005 (UNAIDS and WHO, 2005). However, HIV surveillance data is available at the country and regional levels. Pacific Island youth are as affected by HIV

1 In 2001, 189 countries attending the United Nations General Assembly on AIDS (UNGASS) made a "Declaration of Commitment" to reduce HIV prevalence by 25% in male and female youth aged 15–24 by 2005. Of the countries reporting progress indicators to UNAIDS in 2005, 9% (11/126) provided data for 2000 and 2001 and 2004 and 2005 on HIV prevalence in young people. Of these 11 countries, six achieved a 25% or more decline in national youth HIV prevalence between 2001 and 2005, though limited to capital cities in three countries. Declining overall prevalence trends were reported in a number of countries. However, without a breakdown in age (15–24), the degree of change in youth HIV prevalence is not known (UNAIDS and WHO, 2005; UNAIDS, 2006).

infection as their peers around the world. The epidemiological data available where age was recorded shows that the majority of people diagnosed with HIV, and the majority of all new infections in the Pacific region, are young people (15–34).[2]

Figure 1: HIV/AIDS Infection Detected in Papua New Guinea, 1987–2005 (Age Group and Sex)



Source: NACS and DOH (2005b).

For Papua New Guinea (PNG), age is missing in 38% of HIV surveillance data. However, where age was recorded, 64% of those diagnosed with HIV infection between 1987 and 2005 (September) were 15–34 years old. The majority of these young people can be assumed to have been infected some years before their diagnosis (Pacific Regional HIV/AIDS Project [PRHP], 2004). Female youth 15–29 years old predominate, with young wom-

2 The UN and other organizations define youth as 15–24 years old for statistical purposes and ease of comparison. In the Pacific, however, the definitions of "youth" vary, ranging from age 12–13 to mid-30s in some countries. The Pacific region has 22 small island countries and territories that are grouped together as Melanesia, Polynesia, and Micronesia. Generalizations are not easy. Countries and territories cover vast areas of the Pacific Ocean with remote, dispersed islands that offer diverse geography, sociocultural traditions, languages and practices, subsistence and economic systems, traditional leaderships, and political contexts that differ within and between islands. This report refers to all areas, but focuses on the priority areas and issues where documentation is available.

en aged 20–24 most affected (National AIDS Council Secretariat [NACS] and Papua New Guinea Department of Health [PNG–DOH], 2005b).

In the first quarter of 2005, most newly diagnosed HIV infections in PNG were in the 20–24 and 25–29 age groups. In the 15–34 age group, 61% were female and 36% were male. In the third quarter of 2005, the majority of new HIV infections were in the 20–34 age group, again with more female than male young people being infected (NACS and PNG–DOH, 2005a; NACS and PNG–DOH, 2005b).

The concentration of HIV infections in particular age groups in other PICTs is somewhat similar to that in PNG, with higher numbers of people aged 15–34 being diagnosed (Figures 2 and 3). In PICT, 61% of those living with HIV were diagnosed between the ages of 15 and 34. However, the distribution of HIV infections varies between islands and between the three regions of Melanesia, Polynesia, and Micronesia. The majority of HIV infections among these three regions are in Melanesia (44%), with higher concentrations of infections in the 0–14 (48%), 15–24 (52%), and 30–34 (50%) age groups than in Polynesia and Micronesia. Polynesia has a higher concentration of infections in the 25–29 age group (46%) than in Melanesia and Micronesia, as well as a higher concentration of infections than Micronesia in the 0–14 (30%) and 15–24 (27%) age groups. Micronesia has had more people diagnosed with HIV than Polynesia in the 30–34 and over 35 age groups (Table 1).

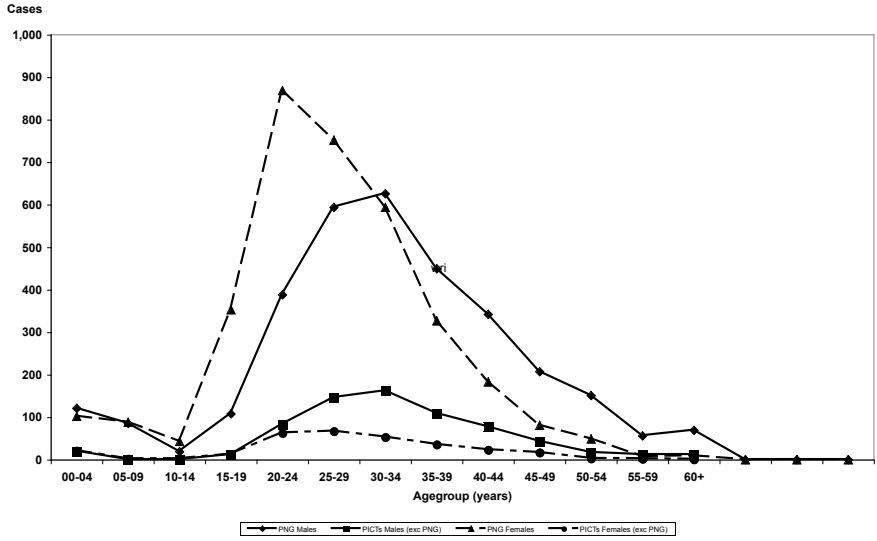
Table 1: Distribution of HIV Infections by Age Groups (to December 2004)

(PICT, Melanesia, Micronesia, and Polynesia)

Age Group	PICT		Melanesia		Micronesia		Polynesia	
	# HIV Infections	% of PICT	# HIV	% of PICT	# HIV	% of PICT	# HIV	% of PICT
0–14	48	4.7	23	48	12	25	13	27
15–24	209	20.5	109	52	37	18	63	30
25–29	172	17	54	31	39	23	79	46
30–34	238	23.4	118	50	76	32	44	19
35+	321	31.5	134	42	104	32	83	26
Unknown	30	2.9	12	40	17	57	1	3
Total	1018	100	450	44	285	28	283	28

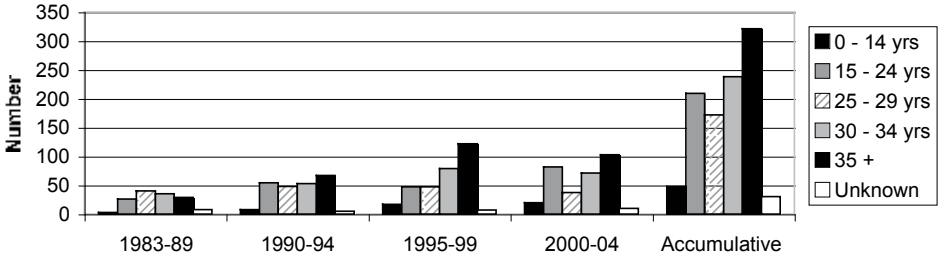
PICT = Pacific Island countries and territories.
Source: Secretariat of the Pacific Community, (2006). HIV STI Section, Public Health Programme.

Figure 2: Cumulative HIV Infections by Age and Sex in Papua New Guinea and Other PICT (to December 2004)



PICT = Pacific Island countries and territories, PNG = Papua New Guinea.
Source: Sladden (2006).

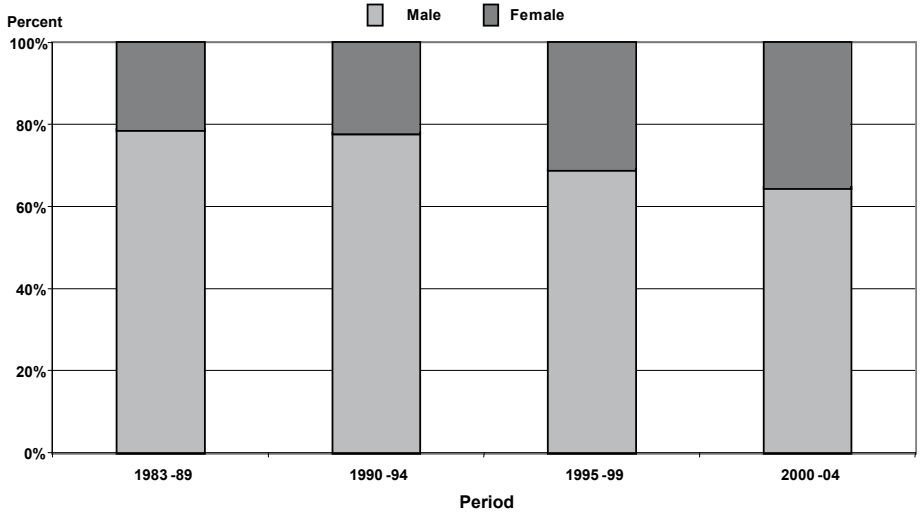
Figure 3: Cumulative HIV Infections by Age and Year (All PICT, Except PNG)



PICT = Pacific Island countries and territories, PNG = Papua New Guinea.
Source: HIV and STI Section, Public Health Programme,
Secretariat of the Pacific Community (2006).

While variations can be found at the country level, and between the three regions, infections overall are increasing in the 0–14 and 15–24 age groups. The numbers of infections in the 30–34 increased until 1999, and then remained steady until the end of 2004; the 25–29 age group has remained at relatively the same levels since 1990, with a slight decrease in 2000–2004. Trends in the gender distribution of people living with HIV (PLWH) indicate ongoing increases in the proportion of female youth and women being infected in the Pacific region (Figure 4). While the gender distribution has shifted over time, with more and more females being diagnosed, the percentage of male youth and adult men infected outside of PNG is still greater than women. In 2004, the ratio of male to female infections was 1.1 to 1 for the entire Pacific Island region, and 2.5 to 1 excluding PNG. While the changes in the ratio of male to female infections over time could be linked to changing modes of transmission outside of PNG (Sladden, 2006), discerning whether this increase in infection over time is primarily among younger than older women is not possible from available data.

Figure 4: Male and Female Distribution of Reported HIV Cases in All PICT, Except PNG (1980s through 2004)



PICT = Pacific Island countries and territories, PNG = Papua New Guinea.
Source: Sladden (2006).

How HIV is being transmitted is less documented in the epidemiological data from PNG than for other PICT. In PNG, 75% of documented HIV infections do not indicate the mode of transmission. Of the remaining 25% that are known, about 85% were infected through heterosexual transmission, with the rest through male-to-male sex (0.4%), perinatal transmission (4.6%), and others (10%), which are not explained (NACS and DOH, 2005b).

Across other PICT, heterosexual transmission accounts for 49.5% and male-to-male sexual transmission accounts for 32.8%. The remainder of exposure is attributed to intravenous drug use (6.7%), perinatal transmission (4.7%), and blood exposure (2.9%), with 3.5% unknown. In the Pacific, HIV transmission through male-to-male sex has been highest in Guam (64.9%), Tonga (58.3%), French Polynesia (38.5%), and New Caledonia (37.1%). Male-to-male sex accounts for 43.6% of known exposure in Micronesia, 37.4% in Polynesia, and 22.8% in Melanesia, excluding PNG (Sladden, 2006). While UNAIDS has planned behavioral or surveillance studies in 2006 focusing on male-to-male sex in the Pacific, none has been done. This represents a gap in much-needed information.

HIV surveillance surveys have been done in some Pacific Island countries. In 2002–2003, for example, 383 seafarers in Kiribati were tested during HIV and STI prevalence surveys, and one tested positive (WHO, 2004). Between 2004 and 2005, 771 people considered to be at higher risk of HIV infection were recruited to participate in HIV prevalence surveys: (i) 100 antenatal mothers in Solomon Islands from areas that border PNG; (ii) 367 people attending STI clinics in Fiji Islands, Samoa, and Vanuatu; and (iii) 304 seafarers in Kiribati. Of those surveyed, 36.8% were under 25 years old. No HIV infections were found in the samples tested. In STI prevalence surveys in Fiji Islands, Kiribati, Samoa, Solomon Islands, Tonga, and Vanuatu, 1,618 antenatal mothers were tested for HIV. Of those surveyed, 42.6% were under 25 years old. No HIV infections were detected in these antenatal samples, though levels of other STIs were high (WHO, 2006).

High levels of HIV prevalence were reported during HIV surveillance in PNG of patients at STI clinics in Port Moresby (8% HIV positive), Goroka (1.59%), and Mt. Hagen (6.33%); and of antenatal mothers in Port Moresby (1.35%) and Lae (2.5%). This illustrates the generalized nature of the PNG epidemic, and the concentrations of infections in those with a history of other STIs. Unfortunately, the data reported was not disaggregated by age (NAC and DOH, 2004).

Pacific STI Epidemiology and Youth

STIs are a sensitive marker of unprotected sexual behaviors that put people at risk of HIV infection and are cofactors that increase the probability of HIV infection. In the Pacific, as it is globally, precise documentation of treatment service coverage and data for STIs is scarce at the country level (UNAIDS, 2006). However, many HIV strategic plans and country situation analyses in the Pacific suggest high or increasing levels of STIs among the youth (Buchanan *et al.*, 1999: Kiribati HIV/AIDS/TB Task Force [KHATBTF], 2005; Government of the Republic of Marshall Islands [RMI] and UNICEF, 2003 and 2004; Ministry of Health [MOH]-Vanuatu, 2004; UNICEF, 2004b; Government of PNG and UNICEF, 1996).

Studies and STI surveillance in PNG involving STI clinic patients, sex workers, and women long have found that STI levels are high for young

people in urban and rural areas (Hudson *et al.*, 1994; Lemeki *et al.*, 1996; Mgone *et al.*, 1999; Mgone *et al.*, 2002; Passey *et al.*, 1998). In a study of rural women in the Highlands of PNG, having an STI was significantly associated with being younger and 45.2% of all young women tested who were less than 25 years old had chlamydia (Passey *et al.*, 1998).

STI surveillance studies conducted in other Pacific Island countries have focused only on antenatal mothers and seafarers, and not specifically youth. Surveillance data on antenatal mothers and seafarers, when disaggregated by age, shows that younger women were more likely to have STIs than older women while younger seafarers had high prevalence of STIs.

Between 1999 and 2000, an STI surveillance survey in Apia, Samoa involving 427 pregnant women aged 15–44 (mean age 26) found high levels of chlamydia (30.9%) and trichomoniasis (20.8%). While 42.7% of women had at least one STI, female youth under 25 years old were three times more likely to have an STI than older women. The number of female youth with STI peaked at the age of 21, while half of the 71 teenage mothers tested had an infection. Youth was associated significantly with increased risk of STI. Nearly all of those who had gonorrhea were less than 25 years old, with 85.7% of these having multiple infections (Sullivan *et al.*, 2004).

In Vanuatu, 547 pregnant women and female youth were tested in an antenatal clinic STI survey between 1999 and 2000. The survey found that 39% had one or more STI, with high rates of chlamydia (22.4%) and trichomoniasis (27.5%). Of those surveyed, 75% were under the age of 30, 54% were 25 years old or younger, and the majority was unmarried. The survey found that younger single women were more likely to have an STI: 54% of females aged 20–24 and 58% of teenage girls had an infection, while more than 22% of teenage girls had more than one infection. Overall, those with STIs were significantly more likely to be unmarried and young, and single teenage mothers were at highest risk of having an STI (MOH Vanuatu and WHO, 2000; Sullivan *et al.*, 2003).

In 2004–2005, STI prevalence surveys of 1,618 antenatal mothers in Fiji Islands, Kiribati, Samoa, Solomon Islands, Tonga, and Vanuatu found 18% had chlamydia. Of those surveyed, 42.6% were under the age of 25, and the mean age was 26.6 years for all women aged 15–44. Younger women were more likely to have chlamydia than older women. While chlamydia

prevalence in female youth under 25 years old ranged from 7.3% in the Solomon Islands to 40.7% in Samoa, younger women from all six countries had higher levels of STIs in these studies.

In an STI prevalence survey of 357 male seafarers in Kiribati in 2003, about a third (34.3%) were younger than 25 and well over half (58.8%) were less than 30. The highest prevalence of chlamydia was found among seafarers aged 25–29 years (14.3%), and the highest prevalence of hepatitis B was found in seafarers 20–29 years old. Close to all seafarers (94.7%) tested positive for the herpes simplex virus, HSV-1 (WHO, 2005).

Available STI prevalence surveillance data clearly show that female youth more often have an STI than older women. Moreover, the prevalence of STIs among seafarers is high, increasing their chances of exposure to HIV considerably.

Youth Knowledge, Practice, and Risk

Young people are being exposed to HIV infection in different ways, and particular behaviors enhance the probability of transmission. Significant risk of infection for young people involves unprotected anal and vaginal sex, which can start at a young age and involve multiple partners (UNAIDS, 2006). Other factors that increase the probability of HIV and other STIs being spread during unprotected sex include sexual violence and forced sex, biological factors that make young women more physiologically susceptible, untreated STIs, and not being circumcised (UNAIDS and WHO, 2000). Further, penile inserts, which are common in some parts of the Pacific, and genital piercing can create tears and abrasions during sex; and inflammation and sores can occur after insertion, creating openings for HIV infection to be transmitted during unprotected sex. Inserts and piercing also create the potential for condom breakage during protected sex (Hull, 2000 and 2001). The reuse of razors, needles, or other sharp objects during scarification, circumcision, and tattooing poses the risk of transmission, while the reuse of needles and syringes during drug injecting creates a high risk for HIV transmission as the virus is introduced directly into the bloodstream (UNAIDS, 2004).

Global—Youth Knowledge, Practice, and Highly Vulnerable Groups

UNGASS progress indicator reports in 2005 highlighted the wide variation in young people's reported sexual behaviors, condom use, and knowledge about HIV at the country level (UNAIDS, 2006).[3] Overall, limited knowledge of HIV, infrequent use of condoms, and multiple sexual partners place male and female youth (15–24 years old) at risk of exposure to HIV infection through unprotected sex within large sexual networks from a young age. The indicator data illustrate that young people's sexual practices and knowledge of HIV can be particularly gendered. While male and female youth were sexually active and could have multiple partners, more male than female youth reported having sex with nonregular partners. Moreover, while condom use was less than 50% across all countries, more male than female youth reported using a condom with their multiple sexual partners. Young people's knowledge of HIV was not comprehensive, with less than 50% of respondents having comprehensive knowledge as measured by progress indicators, and less so in rural areas. Female youth tended to have less knowledge that they are at risk of infection if they have unprotected sex (UNAIDS, 2006; Measure DHS, 2006). While this generation of young people has never lived in a world without HIV, the majority appears to have little knowledge about HIV transmission and their risk of exposure—and take minimal precautions. And gender disparities in practices and knowledge continue.

Youth, as an age-defined category (i.e., 15–24 years old), cuts across groups identified at higher HIV risk and vulnerability, such as (i) men who have sex with men (MSM), (ii) intravenous drug users (IDU), and (iii) sex

3 For example, the percentage of young people (aged 15–24) reporting condom usage at last sex varies widely between countries. While condom use increased in eight countries, overall condom usage was less than 50% across all of the 55 countries that reported this UNGASS indicator (UNAIDS, 2006). A sampling of young people's condom use with nonregular sexual partners: 5.0% of females and 12.0% of males in Madagascar; 75.0% of females and 88.0% of males in Botswana; 31.0% of females and 55.0% of males in the Czech Republic; 33.3% of females and 77.8% of males in Barbados; 65.0% of females and 75.0% of males in the Ukraine; and 19.0% of females and 34.0% of males in Benin.

workers and their clients.[4] Male and female intravenous drug use, sex work, and male-to-male sex occur in a minority of the youth population. However, HIV prevalence can be higher in these groups than in the general population (Ca´ceres *et al.*, 2006; UNAIDS, 2006; Vandepitte *et al.*, 2006). Highly vulnerable groups are not mutually exclusive. Young people can move between different higher risk settings, and sexual and IDU networks, and have unprotected sex with youth and adults from other sexual networks, providing the conditions for HIV to spread more broadly (Aceijas *et al.*, 2006).

Research shows that sex workers can be female, male, or transgender; and young or old. However, they are more often female and young. Youth can begin sex work in their teens and early 20s; research from many regions confirms the youthfulness of sex workers and their clients. In Eastern Europe and Central Asia, for example, 80% of sex workers were under 25 years old. Meanwhile, in South Asia, South Africa, Europe, and Mexico, the trafficking of young girls in sex work was common, with some of these youth under 16 and as young as 10 years old (International Labour Organization/International Programme on the Elimination of Child Labour, 2002; UNAIDS, 2005 and 2006). Research in Sub-Saharan Africa, South and Southeast Asia, and Latin America shows that young men between the ages of 20 and 24 are the most frequent clients of sex workers. Further, paid sex can account for many of male youth's first sexual partners, while condom use is low and inconsistent (Carael *et al.*, 2006). Many youth also experience rape and sexual violence. Young female, male, and transgender sex workers are often the victims of sexual violence, including gang rape, increasing greatly their risk of HIV infection from unprotected forced sex with large numbers of men (Anang and Jenkins, 1998; Buchanan-Aruwafu, 2002a; UNAIDS, 2004; USAID, 2006).

Male-to-male sex and intravenous drug use are not well documented in many countries. Research is scant relative to HIV prevalence in these groups and the efficiency of HIV transmission through unprotected anal sex and the sharing of unclean syringes (Cáceres *et al.*, 2006; UNAIDS, 2006). MSM and IDU are social and behavioral categories, not groups of people who are all similar. These labels tend to create naïve understand-

4 Vulnerable populations also include people living in poverty, children and youth living on the streets, people in conflict and post-conflict situations, refugees and internally displaced persons, prisoners, migrant and mobile laborers, people living with HIV, and indigenous peoples (Fried, 2006; UNAIDS, 2006).

ings of sexual and drug-injecting cultures within epidemiological studies (Jenkins, 2004). While groups of MSM can be socially and self-defined, their identities and the complexity of their sexual cultures show much diversity globally (Dowsett *et al.*, 2006). Young men who have unprotected male-to-male sex also can have unprotected sex with female partners, including wives, girlfriends, and sex workers (Carael *et al.*, 2006). In a study of young men and women (aged 18–29) in Peru, 9% of young men reported that at least one of their last three sexual partners was a man, while condoms were used only with 30% of these partners (UNAIDS, 2004).

Young men and young women inject drugs and, in some places, more male youth are known to be injecting than female youth. Research in 20 countries in Eastern Europe, Central Asia, and South and Southeast Asia identified young men under the age of 29 as the majority of those using intravenous drugs. In 11 of these countries, the largest percentage of IDU were young people 20–29 years old, with a number of countries reporting significant numbers of youth aged 15–19 who were injecting. In Indonesia, young people 18–24 years old represented the largest proportion of IDU. Young men and women who use intravenous drugs also can have unprotected sex with other partners—wives, husbands, boyfriends, and girlfriends, including sex workers. In some Eastern European countries, the sexual transmission of HIV has been linked to IDU and their sexual partners (Aceijas *et al.*, 2006; UNICEF *et al.*, 2002). Young people in groups at higher risk of HIV exposure are marginalized and stigmatized. Their practices are illegal in many countries, making these young people harder to reach, underreporting of their behaviors more probable, and their vulnerabilities and risks more complex.

The global statistics and behavioral data that have been outlined focus on the behavioral dimensions of risk, or the possibility that a young person might become infected with HIV because of certain practices that can create, enhance, and perpetuate risk of HIV transmission (Shaw and Aggleton, 2002). Globally, young people's involvement in highly vulnerable groups, their multiple sexual partners and broad sexual networks, lack of condom use, and use of nonsterile needles would explain increasing HIV prevalence in youth, while suggesting the high probability for further expansion of HIV epidemics among young people.

Pacific—Youth Knowledge and Sexual Practice

In the 1990s, situation analyses and other research in PICT indicated that, like their global peers, young people were (i) sexually active; (ii) had unprotected sex with multiple partners; (iii) lacked information about reproduction, STIs, and HIV transmission and prevention; (iv) started having sex at a young age; (v) could experience sexual violence; and (vi) could become involved in "higher risk" practices and in highly vulnerable groups (UNICEF, 1998; Buchanan *et al.*, 1998; Burslem *et al.*, 1998; Chung, 2000; Hall *et al.*, 1998; Jenkins, 1997a and 1997b; Lemeki *et al.*, 1996; Mitchell, 1998; National Sex and Reproduction Research Team [NSRRT] and Jenkins, 1994; Singh *et al.*, 1995; United Nations, 1996). This makes PICT vulnerable to increasing epidemics in young people, particularly if the HIV virus becomes more present and concentrated in sexual networks. The research results that follow are sampled from young seafarers, young antenatal mothers, in-school and out-of-school youth, and youth who attended an STI clinic. Youth who exchange sex for money or other goods, and youth having male-to-male sex, and using intravenous drugs also are identified from these samples.

UNFPA conducted three surveys of adolescents in Cook Islands, Kiribati, and Samoa between 1998 and 2000, combining knowledge and sexual behavior questions. Data was collected in Samoa in 1998, with 1,077 adolescents (544 male, 533 female) aged 13–19, who were randomly sampled in a household survey. The data show that most young Samoans had little knowledge about the meaning of menstruation (2.1%), fertility cycle (5.8%), and STI and HIV. Overall, about half (51%) of the youth had heard of STIs. However, only one of the 1,077 adolescents had heard of syphilis, and only three had heard of gonorrhea. Knowledge of STI symptoms also was low. In assessing knowledge of prevention, only 20% mentioned that condoms could provide protection against STIs, 46% mentioned having one faithful partner, and 15% said avoiding MSM. None mentioned abstinence (Seniloli, 2003a).

The UNFPA studies in Cook Islands and Kiribati also indicated scant knowledge of HIV prevention, though with differences between the countries in how to increase protection from HIV through avoiding male-to-male sex, using contraception, and not sharing needles. Abstinence was not

mentioned in either country as a preventive measure. The UNFPA study in Cook Islands in 1999 included 237 adolescents (118 male, 119 female) aged 13–19. About half (54%) had heard of STIs, though only 22% could identify a symptom and just 13% was aware that condoms provided protection against STIs. Of the 41.8% who had heard of HIV, about 30% said that having one faithful, uninfected partner, or using condoms would prevent HIV infection, while only 2% knew not to share needles (Seniloli, 2003b). Data collected in Kiribati in 2000, in a survey of 404 adolescents (179 male, 225 female) aged 13–19, also indicated limited knowledge of prevention and transmission. Only 19% of those who had heard of STIs and 10% of those who had heard of HIV identified condom use as a way to avoid these infections. Further, 20% of male youth and 30% of female youth had no knowledge of STIs, and more than 95% had not heard of syphilis or gonorrhea, while 30% had not heard of HIV or AIDS. Nearly a third (31%) thought that using contraception could protect against STIs during sex, but none mentioned abstinence (Seniloli, 2003c).

Behavioral surveillance surveys (BSS) in 2004 and 2005, involving 1,000 unmarried young people aged 15–24 in Samoa (300), Solomon Islands (374), and Vanuatu (326), found low levels of knowledge about HIV transmission and prevention in all samples. Moreover, few had accepting attitudes toward PLWH. Of the young people surveyed, 60% were less than 20 years old. More than half (53.8%) of the youth surveyed knew that using a condom, not having sex, and being faithful were preventive measures. Fewer young people (37.4%) knew that HIV was not transmitted by mosquitoes, or that a healthy-looking person could have an HIV infection. Even fewer (Samoa 12.7%, Solomon Islands 39.3%, and Vanuatu 21.2%) understood both prevention and transmission (WHO, 2006). About a third (32.5%) of the young people surveyed (Samoa 21.7%, Solomon Islands 28.3%, and Vanuatu 47.2%) expressed accepting attitudes toward PLWH, and would share a meal with them or buy food from them, and not want to keep it a secret if a family member was living with HIV. Only 2.7% had ever been tested for HIV and knew the results (WHO, 2006).

As this research shows, young people's knowledge about HIV transmission and prevention is generally weak. Thus, the lack of acceptance of PLWH and the lack of voluntary testing are not surprising. If young people believe that HIV can be transmitted through food and social contact, their

reasons for being fearful are more understandable. In those circumstances, their discrimination is an outcome of their self protection. Since they also believe that mosquitoes can transmit HIV, why would they want to use condoms, which they dislike and are not easily accessible? So few youth have ever been tested for HIV, perhaps increasing their knowledge about their risks and where to be tested, and decreasing community stigma and discrimination toward PLWH, would increase voluntary confidential counseling and testing (VCCT).

The UNFPA surveys of young people between 1998 and 2000 in Samoa, Cook Islands, and Kiribati reported relatively low levels of sexual activity with little condom use. However, the surveys also found high levels of pressure or force involved in first sexual experiences, or having unwanted sex when drunk or high on drugs (Seniloli, 2003a, 2003b, 2003c). UNICEF studies in Pohnpei State in the Federated States of Micronesia (FSM), Tonga, and Vanuatu in 2001, as well as BSS in Kiribati, Samoa, Solomon Islands, and Vanuatu in 2004–2005, found more young people reporting having sex, unprotected sex, more than one partner, and male-to-male sex. Large numbers from these studies also reported being pressured into having sex, or having unwanted sex when drunk or high on drugs (UNICEF, 2001a, 2001b, 2001c; WHO, 2006).

In the UNFPA study in Samoa in 1998, only 5% (58) of the adolescent sample reported having had sex, with a median age of 16 years for first sex for boys and girls. Of the sexually active adolescents, 12% had been forced or been raped for their first sexual experience (Seniloli, 2003a), most of whom were male youth (5 males, 2 females). More young people said that they had had their first sexual experience because they wanted to express love (21 males, 6 females) or be friends (12 male, 2 female), than to experiment and know how it felt (6 males, 1 female). The majority of first sexual experience occurred at home, or at a friend's or relative's house, with less occurring in bushes or at the beach (17.2%) or in cars (5%) (Seniloli, 2003a).

In a similar study in Cook Islands in 1999, 16.5% of the youth (39) reported having had sex, with a median age of 15 years for first sex for boys and girls. Significantly, 23% reported being raped or forced in their first sexual experience (6 males, 3 females), and 6% said that they had been

"cheated"(1 male, 1 female) into having sex. More male youth said that they tried sex to know how it felt (14 males, 1 female), while twice as many males as females wanted to show love. Like in Samoa, most had had sex at their parent's or friend's houses (62%), and some (17.9%) at the beach or in bushes (Seniloli, 2003b). The data collected in Kiribati in 2000 showed that about 10% (39), mostly male youth (29 males, 10 females), said that they had had sex before. In the previous 12 months, about half (49%) of the sexually active youth had had sex with more than one partner, and only a third of the male youth had ever used a condom. The median age at first sex for girls was 15 years, and for boys was 16 years. The majority (61.5%) had had their first sexual experience in the bushes and at the beach. Like in Samoa, significantly 23% of sexually active male and female adolescents reported being forced into their first sexual experiences, while 8% reported being deceived. Close to half (49%), primarily male youth, had their first sex because they wanted to experiment, though 18% wanted to express their love (Seniloli, 2003c).

A UNICEF survey in Pohnpei, FSM, included 1,699 youth who were in and out of school; 183 out-of-school youth were asked questions about sexual behavior. More than three quarters (77%) of out-of-school youth reported having sex in the past (85.8% male, 60.3% female). While both female and male youth reported having more than one partner (57.9% female, 73.7% male); more female than male youth reported having only one partner. More than three times as many male as female youth reported having sex with four or more partners. Only 9.0% of the sexually active out-of-school youth always used a condom, while 6.5% sometimes used a condom. About half of the male youth and a third of the female youth reported having unwanted sex when they were drunk or high on drugs; and 28.2% of out-of-school youth reported that they had been pressured to have sex within their relationships, from strangers, within the family, or from unknown people or groups of people. While detailed data was not given for the sexual behavior of in-school youth, a substantial number of students reportedly were sexually active. Students felt more pressured (45%) than out-of-school youth to have sex with their boyfriends and girlfriends, as well as with others whom they knew. The majority of sexually active students (60% female, 40% male) had never used a condom (UNICEF, 2001c).

The UNICEF study in Vanuatu involving 424 out-of-school youth found that 57.4% of male youth and 43.2% of female youth had had sex. As in Pohnpei, both female (45.3%) and male (74.1%) youth had more than one partner, with male youth particularly having four or more partners. More female than male youth had just one partner. Just over 50% of youth reported using protection against STIs, although "condom use" is not stated clearly in the data. Male (36.1%) and female (22.4%) youth reported having unwanted sex when drunk or high on drugs (UNICEF, 2001a).

The Tonga UNICEF study of 1,008 out-of-school youth found far less sexual activity for female youth (12.9%) than for male youth (47.2%). Of those who reported having sex, multiple partners were high for female (50%) and male (86%) youth, with a high percentage of both having four or more partners (38.6% males, 26.2% females). Nearly three quarters of female youth (73.4%) and two fifths of male youth did not use any measures to protect themselves from STIs. More male than female youth (21.7% male, 4.4% female) reported having unwanted sex when drunk or high on drugs (UNICEF, 2003b).

BSS were conducted on unmarried youth aged 15–24 in Vanuatu (326) and Samoa (300), and on unmarried in-school youth aged 15–24 in the Solomon Islands (374). Almost two thirds (64%) of male and female youth reported having sex, though considerably fewer young people in Samoa reported having sex. Overall, more male than female youth had had sex (72.2% male, 57.9% female), with male youth also reporting more partners. While some male youth (8.9%) reported having paid for sex in the previous year, more male (19.7%) and female youth (25.2%) reported receiving money or other goods in exchange for sex. The survey found that 40 male youth (7.6%) reported ever having male-to-male sex, with most (25) reporting having male-to-male sex in the previous year. Significantly more male-to-male sex was reported in Samoa, though more than a third in the Solomon Islands (37.4%) provided "no response" to this question. More young people in the Solomon Islands and Vanuatu had multiple partners, or had previously exchanged sex for money or goods. One fifth of students in the Solomon Islands and two fifths of out-of-school youth in Vanuatu reported having exchanged sex for money or goods in the previous year. Although the levels varied across the three countries, having sex, exchanging sex, and having multiple partners was very high. At the same time,

young people's condom use was very low, inconsistent, and variable at the country levels (WHO, 2006).

Table 2: Reported Sexual Behaviors From BSS With Young People in Samoa, Solomon Islands, and Vanuatu

Type of Sexual Behaviors Reported	Samoa (%) (n=300)	Solomon Islands (%) (n=374)	Vanuatu (%) (n=326)
Sex before	38.3	78.6	76.1
Male-to-male sex before	21.8 (M)	1.1 (M)	0.6 (M)
Condom use at first sex	24.3	14.6	16.9
More than 2 partners in previous year	12.7	21.9	43.3
Consistent condom use with casual partners in previous 12 months	5.2	7.6	15.7
Exchanged sex for cash or goods in previous year	8.7	20.3	39.9
Male youth paying for sex	8.2 (M)	9.5 (M)	8.9 (M)
Consistent condom use with commercial partners in previous 12 months	0	7.3	18.7

BSS = behavioral surveillance surveys, M = males, n = number of respondents.
Source: WHO (2006).

In HIV prevalence surveillance of male youth and men attending an STI clinic in Fiji Islands, behavioral data indicate higher-risk practices, such as (i) having unprotected sex with sex workers, (ii) exchanging sex without using condoms, (iii) having unprotected male-to-male sex, and (iv) intravenous drug use. The majority of the sample were unmarred, and more than half (59%) of the 157 surveyed were under 25 years old. Nearly everyone interviewed (98.1%) had had sex before and had more than one partner. However, they rarely (4%) used condoms consistently, and a fifth (20.4%) had paid for sex in the previous year. Some (8.9%) who were interviewed reported having had male-to-male sex. In the previous year, some exchanged sex for money or gifts, and only 20% had used a condom the last time they had male-to-male sex (WHO, 2006). The lack of disaggre-

gated data by age makes an assessment of the involvement of male youth from this sample in these higher-risk practices difficult. However, the male youth clearly were at higher risk of HIV infection, as almost the entire sample had had sex, had multiple partners, and rarely used condoms consistently. Since those being interviewed were attending an STI clinic, many might have had an STI or a history of STI, though prevalence data was not reported.

Overall, research and behavioral surveillance illustrate that male and female youth in the Pacific are at risk of HIV infection, because of their lack of knowledge and higher-risk practices. While sexual violence and tattooing practices also are occurring, these areas are less explored.

Higher Vulnerability

Much more is known about sexual violence, group rape, and forced sex in PNG than in other Pacific Island countries. However, these practices are affecting young people in many other PICT (Booth, 1999; Bradley and Kesno, 2000; Buchanan-Aruwafu, 2002a; Buchanan *et al.*, 1999; Jenkins, 1997a; KHATBTF, 2005; Lukere, 2002; NSRRT and Jenkins, 1994; Tennant, 1998). These are important areas to be integrated into HIV-related surveillance and other research with youth, because of their contextual salience and the heightened risk of infections that these situations pose. Sexual violence causes physical trauma and mental health issues, and creates the potential for HIV transmission for youth who experience practices such as gang rape and "forced" sex. Child protection issues and the commercial sexual exploitation of children also require research. Some of the UNFPA and UNICEF research, discussed above, illustrates that young people have an inability to negotiate sex or safe sex when drunk or on drugs, leading to unwanted sex; while other younger adolescents feel pressured into having sex by their peers. The prevalence and experiences of young men and women involved in gender-based violence—and the gender ideologies, situations, and legal and policy issues that might be structuring young people's higher vulnerability to HIV infection through sexual violence—clearly must be better understood.

Behavioral surveillance demonstrates that (i) young people are having male-to-male sex, (ii) school students and out-of-school youth exchange sex for money or goods, (iii) male youth pay sex workers to have sex, and (iv) a smaller number report injecting drugs. More than half of the 22 antenatal mothers surveyed from Kiribati, Samoa, Solomon Islands, Tonga, and Vanuatu, who also reported selling sex in the previous year, were less than 25 years old. Behavioral surveys of police, military, and STI patients in the Fiji Islands, as well as of seafarers in Kiribati, also show that these groups were engaging in intravenous drug use, male-to-male sex, the exchange of sex, and purchase of sex. However, little is known about highly vulnerable groups in the Pacific, such as (i) sex workers and their clients, (ii) children and youth who are being sexually exploited, (iii) seafarers and their partners, (iv) youth who have male-to-male sex, and (v) IDU. The illegal nature of intravenous drug use, sex work, and male-to-male sexual practices in most countries—combined with religious and societal stigma, discrimination, and violence—drives these groups underground. Because they are hidden, underreporting of these practices is more likely.

Exchange of Sex

For more than 15 years, many young people in PNG have been exchanging sex for money or other goods (Hammar, 1992 and 1998; Jenkins, 1995 and 1996; Mgone *et al.*, 2002; NAC, 2005; NSRRT and Jenkins, 1994; Wardlow, 2001b). Male and female youth sell sex, and the patterns of sexual networking and sexual exchange are complex (Decock *et al.*, 1997; Hammar, 1998; Jenkins, 1996; Wardlow, 2001a and 2001b). Further, young people involved in the exchange of sex do not necessarily identify themselves as "sex workers" (Sinclair, 1995). Increasing numbers of adolescent youth aged 13–19—and some as young as 11 years old—are becoming involved in the exchange of sex in areas in PNG with resource development, such as mining, logging, and fishing projects (UNICEF, 2003a; NAC, 2005). For example, Jenkins (1995) reported that girls as young as 12 years old were selling sex to men who had made money during the coffee season. Some studies show that 30% of sex workers in these development areas are in this younger age group (UNICEF, 2003b). The commercial sexual exploitation of children and child sexual abuse also are being reported from other Pacific

Island countries (UNICEF, 2003b; Christian Care Centre of the Church of Melanesia, 2004).

Studies in PNG illustrate that (i) sex workers are young; (ii) male youth participate in sex work, but to a lesser degree than female youth; (iii) sex workers can become the victims of sexual violence and gang rape; and (iv) condom use is inconsistent (Anang and Jenkins, 1998; Jenkins, 1995 and 1996; NAC, 2005; NSRRT and Jenkins, 1994). Male youth and MSM also can be bisexual, and have sex with female youth and women. Male and female sex workers and their clients also have other noncommercial partners. In the research by Mgone *et al.* (2002), the average age of female sex workers in Lae and Port Moresby was about 24–25 years old—though some were as young as 13—and condom use was inconsistent. This study found that sex workers were frequented more often by students than by seafarers. In a multisite study, 50% of young women between the ages of 15 and 24 accepted cash or resources in exchange for sex (Jenkins, 1997b). Meanwhile, a national study showed about two thirds (66%) of young women under 25 years old exchanged sex for cash or other gifts (NSRRT and Jenkins, 1994). Another study of urban unemployed young women found that 48% were partially supporting themselves through sex work (Levantis, 2000). Sex workers reported being forced to have sex and gang raped, and police and security guards were identified as using their positions of power to coerce sex workers into having "free" and group sex (Anang and Jenkins, 1998).

In Kiribati, increases in sex work have been attributed to a lack of employment, education, and training for young women. Sex workers, referred to as *Te Korekorea,* can work from Betio wharf and harbor areas (Secretariat of the Pacific Community [SPC], 2004; UNICEF, 2005a; Vunisea, 2006). They regularly go out with local men or seafarers to bars and nightclubs, and go to foreign fishing vessels and exchange sex for money or other goods. Female and male sex workers go onto foreign vessels for entertainment, alcohol, gifts, and money; and some seafarers have local boyfriends. Te Korekorea sometimes drink excessive amounts of alcohol and become victims of violence (KHATBTF, 2005; Vunisea, 2006). No surveillance, behavioral, or other research has been done with Te Korekorea. Thus, little is known about their lives and practices, and that of their seafarer partners.

Surveillance in Kiribati in 2004 and 2005 indicated that 28.8% of seafarers aged 20–29 had had sex with sex workers in the previous year, as well as other casual female partners. Consistent condom use was low. Younger seafarers in this study reported having more commercial sex than seafarers in the older age categories (WHO, 2006).

In the Fiji Islands, female, male, and transgender youth exchange sex with local Fijian and Indian men, as well as expatriate men. Different kinds of sex work occur in Suva, and the sale of sex is negotiated in nightclubs or from the streets. Female youth under 16 years old also are exchanging sex and can be referred to as *kalavo ni Viti,* or the Fiji rats (Kaitani, 2003).

Male-to-Male Sex

Behavioral surveillance of male youth in Solomon Islands, Vanuatu, and Samoa found male-to-male sex. It also was noted among police and military in Fiji Islands (15, 6.7%), STI clinic patients in Fiji Islands and Samoa (5, 7%), and seafarers in Kiribati in 2002–2003 (19, 5.6%) and 2004–2005 (3, 1%) (Buchanan-Aruwafu, 2002a; Solomon Islands Ministry of Health and Medical Services [SI-MHMS], 2005; WHO, 2006; WHO and Kiribati Ministry of Health, 2004). Little research is available in the Pacific on young men who have male-to-male sex, transgenders, and their partners. As such, knowledge about their sexual practices, sexualities, identities, or their life circumstances is scant. Societal and religious stigma and discrimination, laws that criminalize homosexuality or sodomy, and physical violence and emotional abuse directed at sexual minorities not only violate their human rights, but make young men who have male-to-male sex and women who have sex with women difficult to identify in many Pacific Island countries (Buchanan et al., 1999; Kaitani, 2001; Women's Action Committee for Change Sexual Minorities Project [WAC-SM], 2003).

Sexual Minorities Project conducted research in the Fiji Islands to identify the needs and experiences of sexual minorities. The sample interviewed were 10–19 (11%), 20–29 (74%), and 30–39 years old (15%). They participated in 48 survey interviews (12 female, 36 male) across four sites, focus groups with 26 participants, and four case studies. Those interviewed identified themselves as male, female, and as both male and female; and

as homosexual (75% gay or lesbian); bisexual (14%); transgendered (6%); heterosexual (4%); and others (1%). Most of those interviewed (58%) reported being abused because of their sexuality, including physical (26%), verbal (39%), emotional (14%), and sexual abuse (21%), such as forced sex and rape. In this sample, a wide range of substances were used, with alcohol, kava, and marijuana the most preferred. Awareness about STIs, including HIV, and about safer sex was lacking, and respondents reported having unsafe sex. The respondents also reported that in the Fiji Islands, youth who are attracted to the same sex increasingly are being forced to leave home after disclosing their sexual preference and can become involved in crime, part-time employment, and leave school early (WAC-SM, 2003).

In addition, culturally defined transgendered roles can be found in the Pacific Island countries, such as Fiji Islands, French Polynesia, PNG, Samoa, and Tonga. Transgenders can be referred to as *logohu, fa'afafine, fakaleita, mahu, rae rae,* or *aka vaine* within their different cultural contexts (Schmidt, 2001; WAC-SM, 2003; UN, 1996; Watts, 1992). In Samoan villages, for example, fa'afafine are identified at a young age because of their ability and affinity to do feminine labor. While their sexualities can be objected to, they are valued for their ability to do both male and female work. Shifts from subsistence livelihoods based on the products of labor to a cash economy, and migration to urban centers for employment and education away from the familial context, are decreasing this feminized labor role as a gender marker for fa'afafine identity. Younger urban fa'afafine are creating new identities that are more sexualized. Like in most parts of the Pacific, urbanization has created less constrained environments where youth can escape the watchful eyes of family, whose monitoring plays a role in the social control of sexual behaviors in village settings. In urban areas, fa'afafine pursue sexual relationships that they might deny themselves in their villages, as they would risk their social standing, and attract moral and familial disapproval (Schmidt, 2001). Transgenders can have sex with men who identify as heterosexual, and have sex with women (UN, 1996). Despite traditionally accepted roles, transgenders and other sexual minorities still face discrimination and marginalization in their societies (Moala and Perera, 2006; Schmidt, 2001; WAC-SM, 2003; Watts, 1992).

In PNG, MSM and transgenders are marginalized and vulnerable. They face cultural, social, and legal stigmatization; and the legal system crimi-

nalizes their sexual practices. They face harassment, verbal and physical abuse, discrimination, and rejection by their families. No formal research has been done on MSM. Thus, the sexual networking of these men, and their partners, is not always well understood, nor are the contexts of their lives. Young MSM reported that they can exchange sex with men for money or resources to survive, and alcohol, marijuana, or other drugs can be used. They also have relationships with men who are married, and can have girlfriends or other boyfriends. Some of their clients also have sex with female sex workers, and unsafe sex is reported. Some marry because of family, social, and religious pressures, and bisexuality is common (PNG National Strategic Planning Workshop, 2003).

The Samoa AIDS Foundation and Fiji Island's Equal Ground Pacifik are developing the first MSM Pacific network, which will support the celebration of MSM traditions. It also will increase support, information, and sharing of resources to try to reduce HIV transmission among highly vulnerable groups of MSM (Moala and Perera, 2006).

Intravenous Drug Use

Outside of PNG, 6.7% of all known HIV infections in the Pacific were reported to be transmitted through intravenous drug use. However, little is known about intravenous drug use in Pacific Island countries. Behavioral surveys of youth in Vanuatu and Solomon Islands reported extremely low levels of intravenous drug use (WHO, 2006). A BSS, focusing on students and out-of-school youth in Honiara in the Solomon Islands, found that 0.8% or five youth (3 female, 2 male) who had injected drugs in the previous year (SI-MHMS, 2005). In a BSS in Vanuatu, two youth (0.6%) reported injecting drugs, but not sharing needles (WHO, 2006), while surveillance surveys at an STI clinic in the Fiji Islands found three males (1.9%) who reported injecting drugs in the previous year. In other behavioral surveys—one involving police and military in the Fiji Islands, the other seafarers in Kiribati—two males from each sample (0.9% Fiji Islands, 0.7% Kiribati) reported injecting drugs in the previous year (WHO, 2006). Intravenous drug use was also reported (i) by young people in Honiara in 1999 (Buchanan *et al.*, 1999), (ii) in Tonga during research into substance abuse

by youth (Pacific Action for Health Project [PAHP], 2003), and (iii) in PNG (Aceijas *et al.*, 2004). Overall, intravenous drug use is being reported across six countries in the Pacific, albeit in small numbers. With what is known about global HIV trends and HIV transmission through IDU, alarm bells should be ringing. Too little is known.

Young people's behavioral risks are clear. However, vulnerability to HIV infection in the Pacific is not just about individual practices; young people's vulnerability is also contextual and multifaceted.

PART 2: YOUTH'S MULTIDIMENSIONAL VULNERABILITY TO HIV RISK

Global to Pacific Contexts

A combination of global and local contexts influence and affect young people's lives, their views, options, and well-being. Young people around the world can live in difficult situations, including some where they cannot control the power relations and other factors that put their lives at risk (Schoepf, 2001). These situations include economic instability and poverty, war and armed conflict, migration, disease, gender and age inequalities, marginalization and discrimination, and rapid sociocultural change. Young people are vulnerable to a range of consequences from these situations, including unemployment; drug and alcohol abuse; illiteracy and lack of skills to earn a living; increased involvement in crime; sexual and physical violence, sexual exploitation, and abuse; homelessness; intergenerational conflicts; low self-esteem, mental health issues, and suicide; and increased risk of HIV and other infections (Foster and Sherr, 2006; UN, 2004; UNAIDS, 2006). The situations experienced by youth are not necessarily predictive of certain difficulties. However, the influences that have the greatest impact on youth vulnerability to HIV infection risk rarely occur alone, nor are they one dimensional.

Like their global peers, youth in the Pacific experience situations that are known to have great impact on the course of HIV epidemics (UNICEF, 2003b; UNICEF *et al.*, 2005; UNICEF and Government of PNG, 2006; UNICEF and UNAIDS, 2006). Young people's vulnerabilities to HIV risk are found in the circumstances of their everyday lives, and in the dynamic nature of their practices within their sociocultural, economic, and political contexts (Farmer and Connors, 1996; Brummelhuis and Herdt, 1995).[5]

5 Contextual analysis had been missing in early HIV-related research and analysis. This change, from stressing "risk" behaviors to considering the situations of people's lives, reflected a philosophical refocusing and increased understanding of the importance of the wider contexts that structure people's vulnerability to HIV infection. The use of the term vulnerability by WHO and UNAIDS in the 1990s to emphasize contextual factors rather than a preoccupation with risk behavior in largely individualistic terms and in language that attributed blame to people, particularly highly vulnerable groups (UNAIDS, 1998; Parker, 2000; Schoepf, 2001).

Being Young in the Pacific Islands

SPC, UNAIDS, UNICEF, and WHO define youth as people between 15 and 24 years old. This age cohort is used when collecting data, making analysis, and comparing indicators for young people, as well as for planning, policy, and programmatic processes. The age definitions for children (0–18 years) and adolescents (10–19 years) cut across each other and the age span that defines youth, highlighting the diversity of needs at the different life stages of "young people."

The age definition for young people or youth varies across Pacific Island countries, depending on the context. A wide variety of local definitions across the Pacific can extend definitions of youth to include people as old as 34 and younger teenagers 13 and 14 years old (UNICEF, 1998, 2004a, 2004b; UNICEF *et al.*, 2005; PRHP, 2004; Government of PNG *et al.*, 2005). This report uses the narrower age definition of 15–24, though it also discusses what is known about younger teenagers (13–14) and older youth (under 35), depending on the availability of data, its relevance, and how youth are perceived within the local contexts being discussed.[6]

Transitions from childhood to youth, and from youth to adulthood, are marked not only by age in the Pacific, but also by a variety of initiation rituals or rites of passage. These can include menarche rituals for girls and puberty initiation rites for boys; or life course transitions and social markers, such as finishing school, finding employment, leaving home, marrying, having children, assuming a position of responsibility within the family, or gaining recognition and social status within a community (Government of PNG and UNICEF, 1996; NSRRT and Jenkins, 1994; UN, 2004). In the Solomon Islands, understandings of the categories of children and youth are quite fluid, and can be socially defined by markers highlighting the onset of puberty, marriage, creating a crop garden, finishing school, community and

6 The legal ages for drinking, driving, and voting in the Pacific are 18 or 21, and the minimum legal age when young people can marry (with parental consent) and take legal responsibility for their sexual behavior and crimes varies across countries, but is generally around 15 or 16 years old. In FSM, the age for sex with consent is 13 years old, and to marry without parental consent is 16 for girls and 18 for male youth. In Tonga, the age drops to 11 for criminal responsibility and in Cook Islands is between 10–14 for criminal responsibility, 12–16 years for sexual consent, and 15 for females and 18 for males to marry with parental consent (Buchanan *et al.*, 1999; UNICEF, 1998, 2004a, and 2004b).

religious participation, and social status in the community (Buchanan *et al.*, 1999; Hassal and Associates, 2003; Strocka, 2005).

Pacific Island Population Age Structures

The majority of PICT (64% of the countries) has large youthful populations, with children and young people under the age of 25 accounting for more than half the population. While the 15–24 age group makes up only about one fifth of the total population of PICT, a much larger percentage of the population is younger than 15. In 41% of the countries, more than half of the population is less than 20 years old. In many countries in Melanesia and Micronesia, nearly two thirds (65%) of the population is under the age of 30; more than 70% of the population of RMI is less than 30. Table 3 illustrates the national age structures across PICT.

National age structures create a dynamic element to youth population growth. The present age structures of the populations and high fertility rates will continue to structure youthful populations (UNFPA and PRB 2005). As large numbers of children move into the 15–24 age groups, the numbers of young people will continue to grow, except perhaps in those countries in Micronesia and Polynesia where there is considerable international migration.[7]

The sheer magnitude of the numbers of young people and the growing numbers of children, youth, and young parents will sustain and increase already existing pressures on land and the environment, traditional social structures, and support networks, and increase demand for services and infrastructure, particularly in health and education, and for employment (Haberkom, 2004).

7 Extensive international migration is being seen particularly in FSM and Nauru in Micronesia; and in Tonga, Cook Islands, and Niue in Polynesia. Fiji Islands in Melanesia is experiencing some migration, though to a much smaller degree (Haberkom, 2004).

Table 3: Population Statistics and National Age Structures of PICT

Area and Country	Population at Last Census	Population Estimate 2004	Median Age (years)	0–14 Years (%)	15–24 Years[a] (%)	< 25 Years (%)	< 30 Years (%)
Melanesia							
Fiji Islands	775,077	836,000	21.2	31.2	19.3	50.5	59.2
New Caledonia	196, 836	236,943	25.6	27.9	16.4	44.3	51.8
Papua New Guinea	5,190,786	5,695,301	19.7	39.2	19.9	59.1	69.1
Solomon Islands	409,042	460,104	18.8	40.5	20.3	60.8	69.2
Vanuatu	186,678	215,836	19.6	41.2	19.4	60.6	68.2
Micronesia							
Federated States of Micronesia	107,008	112,700	18.9	37.4	21.4	58.8	66.3
Guam	154,805	116,600	27.4	30.3	15.8	46.1	54.9
Kiribati	84,494	93,098	19.7	38.1	20.2	58.3	65.3
Marshall Islands	50,840	55,366	17.8	40.6	19.9	64.0	71.8
Nauru	10,065	10,100	20.7	38.5	19.8	58.3	66.2
Northern Marianas	69,221	78,034	28.7	26.9	14.3	41.2	53.8
Palau	19,129	20,703	30.8	23.9	14.2	38.1	48.1
Polynesia							
American Samoa	57,291	62,564	21.3	37.7	17.7	55.4	63.3
Cook Islands	18,027	14,000	25.3	34.1	15.6	49.7	56.3
French Polynesia	244,830	250,500	26.0	30.7	18.7	49.4	57.6
Niue	1,788	1,593	29.0	32.6	14.9	47.5	53.5
Pitcairn Islands	52	–	–	–	–	–	–
Samoa	176,710	182,750	19.7	40.6	17.6	58.2	64.5
Tokelau	1,537	1,519	19.9	41.7	14.8	56.5	63.4
Tonga	97,784	98,321	19.9	34.4	20.2	54.6	62.0

Area and Country	Population at Last Census	Population Estimate 2004	Median Age (years)	0–14 Years (%)	15–24 Years[a] (%)	< 25 Years (%)	< 30 Years (%)
Tuvalu	9,561	9,639	23.7	37.2	15.8	53.0	58.5
Wallis and Futuna	14,944	14,868	23.9	34.8	21.6	56.4	62.7

PICT = Pacific Island countries and territories.
[a] Percentages of age groups are based on 2004 population estimates.
Source: Secretariat of the Pacific Communities, Demography Population Section. Pacific Island Populations (2004).

These large populations of young people are characterized by a higher concentration of HIV and other STIs, a dearth of information, and a lack of preference for and access to condoms. These characteristics increase young people's risk of exposure to HIV. Youth also experience difficult economic, educational, and sociopolitical circumstances, which can influence their choices and their well-being.

Circumstances and Youth Issues

The interrelated situations that impact young people across the Pacific, and the difficulties that these youth experience, long have been identified (Buchanan *et al.*, 1999; Government of FSM and UNICEF, 1996; Government of Tuvalu and UNICEF, 1996; Government of PNG and UNICEF, 1996; Marshall, 1982 and 1993; O'Collins, 1986; Jenkins, 1995 and 1997a; UN, 1996; UNICEF, 1998 and 2003b; UNICEF *et al.*, 2005). The situations identified include (i) unemployment; (ii) lack of educational opportunities and gender disparities in education; (iii) mobility, migration, and urbanization; (iv) shift from subsistence to cash economies, and unequal development between rural and urban areas; (v) sociocultural change; (vi) gender and age inequalities; (vii) cultural taboos on open communication about sex and sexuality; and (viii) limited access to condoms and information about HIV.

While living in particular circumstances will not inevitably lead to difficult consequences, a range of highly interrelated issues for young people have been identified as significant across Pacific Island countries. These

include (i) poverty, homelessness, crime, and youth gangs; (ii) illiteracy and lack of skills to earn a living; (iii) exchange of sex for money or resources; (iv) conflict between tradition, religion, and the changing views of youth, and change in family and cultural structures; (v) young people's frustration from a lack of validation and participation; (vi) lack of sex education in schools, and poor knowledge of STI and HIV transmission and prevention; (vii) increasing teenage pregnancy and STIs, including HIV; (viii) drug and alcohol abuse; (ix) physical and sexual violence; (x) gossip, stigma, and discrimination; and (xi) suicide.

Some of these situations are the same as those identified globally that increase HIV vulnerability for youth. While some circumstances over the past 10 years have improved for young people, others have worsened. And new issues have emerged, such as (i) the volatility and involvement of youth in social and political upheavals; (ii) more visible poverty; (iii) increased HIV infections in young people, and human rights infringements against PLWH; (iv) the commercial sexual exploitation of children and youth; and (v) an increased urgency for youth involvement in decision making and political advocacy (Government of RMI and UNICEF, 2003; Kenny, 2005; UNICEF, 2003a and 2003b; UNICEF and Government of PNG, 2005). This paper presents similarities and differences in some young people's circumstances, particularly their economic contexts and educational opportunities and social change. Further, it illustrates the impact these have on young people, and how these link to vulnerability to HIV infection.

Employment and Education—The Impact of a Poverty of Opportunities

Some issues affecting young people in the Pacific are symptomatic of political economies and governance (Vete, 2006). The *Pacific 2020* report identified increased population growth, youth unemployment, and joblessness as pressing issues for Pacific Island countries (Government of Australia, 2006). These issues are leading to increased poverty, and the inability of government services to meet expectations and demand. Increasing frustration, particularly from young people, has created the potential for more social and political instability. During the consultations for the *Pacific 2020*

report, a consensus was reached that poverty was being experienced in the Pacific, particularly in terms of shelter; health care; and other basic needs, services, and infrastructure. In some countries, such as FSM, basic nutrition also is being affected by the lack of household income. In many countries, children and youth do not attend school because they do not have money for school fees. And in the Fiji Islands, an estimated 54% of the working population lives in poverty because of low wages (Narsey, 2006). Some countries, such as Cook Islands, Samoa, and Tuvalu, have experienced sustained economic growth since the 1990s. More recently, Fiji Islands, PNG, Solomon Islands, and Vanuatu have grown economically. However, economic growth has not been rapid enough to make a difference in youth unemployment (Government of Australia, 2006; Government of Solomon Islands and UNICEF, 2004; UNICEF, 2004b and 2005b).

The growth in labor markets in most Pacific countries is attributed to students leaving school, and unemployment is highest for young people 16–24 years old (McMurray, 2001). With the limited development of rural and private sectors and secondary industry, as well as the lack of skills development for young people, the increasing youth labor force is not being absorbed. At the same time, existing labor markets are experiencing shortages in skill levels (UNICEF *et al.*, 2005). In 2000, for example, Fiji Islands had five working aged people for every formal sector job, despite rapid job creation. In the Solomon Islands, which has the slowest pace of job creation, 7.9 people were available for every available job. FSM had 22% unemployment in 2004. While Palau has a lot of opportunities for unskilled labor, unemployment among high school dropouts is high because of their higher expectations and preference for white-collar work (McMurray, 2001; UNICEF, 2004b). In the Cook Islands, although out-migration of young people helps to lower unemployment, cash employment is still restricted and unemployment is rising. For the young people who leave high school, many do not have the skills for the formal work sector (UNICEF, 2004a). In RMI, where people under 30 comprise more than 70% of the population, unemployment has increased radically, with three times more young people unemployed now than a decade ago. Several hundred youth every year are unable to find work or self-employment, raising concerns about social stability on some atolls (Government of RMI and UNICEF, 2003). In South Tarawa in Kiribati, an estimated 70% of young people are underemployed or unemployed (UNICEF, 2005a). In Vanuatu, the economy needs to create

more than 4,000 jobs every year to provide jobs for young people who leave school—a demand that currently is not being met (UNICEF, 2005b).

While the employment needs of young people are not being met, education is not preparing youth adequately to compete for a limited number of jobs, which is limiting their economic and human potential. Most education systems in the Pacific have been geared toward developing skills for "white collar" employment, though the labor market does not match these skills. Curriculum reform, as well as vocational and other skills building, is needed to support more sustainable livelihoods for young people (McMurray, 2001).

Retention rates are low, and many students are being pushed out because of structural factors. Countries have increasingly large numbers of children to educate, not enough places for students in secondary schools, and many youth being pushed out after failing exams. Many who do reach high school perform poorly. RMI has compulsory education for all children aged 6–14, or until primary school is finished (8 years). While school enrollments have increased, retention rates for secondary school are low, and in many countries are less for female youth. The last census in RMI showed that 30.4% of females aged 14–18 and 69.8% aged 19–21 were not enrolled in school (Government of RMI and UNICEF, 2003). In Vanuatu, although compulsory and free education until year 8 is a Government policy, students are refused access if parents cannot pay high school contribution fees. Most youth do not go to secondary school after primary school due to their failure of exams, or because the costs of education are beyond the reach of most parents. The push-out rate after primary school in Vanuatu was about 50% in 1999–2000. Not enough spaces are available for students, and only 40% of students can continue to junior secondary school. In 2001, about 63% were pushed out after junior secondary school (UNICEF, 2005b). Likewise in Nauru, PNG, and Solomon Islands, a high number of students are unable to continue to secondary school because of inadequate space. In Kiribati, primary education is compulsory and free (grades 1–6), and junior secondary education (form 1–3) is compulsory (Kiribati National Advisory Committee on Children [KNACC], 2002). Enrollment rates, as well as the participation of female children and youth, have increased, with a ratio of 93 girls to 100 boys in primary school and 114 girls to 100 boys in secondary school. However, the costs of secondary school lower the retention

rates, with increasing numbers of students pushed out who lack the skills for the labor market (KNACC, 2002; UNICEF, 2005a). In FSM, though school enrollment is high, the quality of education is of concern due to the lack of trained teachers. High school students can perform poorly, and do not have enough skills to meet the demands of the economy (UNICEF, 2004b).

In many countries, student performance suggests low literacy and mathematical skills. Except for marine training schools, vocational training has been unable to reduce unemployment or help youth meet market demands. Fiji Islands, French Polynesia, FSM, Kiribati, PNG, Solomon Islands, Tuvalu, Tonga, Samoa, and Vanuatu have marine training schools for seafarers. The work of seafarers has increased employment and country incomes (Government of Australia, 2006). However, HIV could jeopardize this positive growth and inflict human costs. Seafarers are a highly vulnerable group, and large numbers of HIV infections in young male seafarers could decrease the remittances to countries such as Kiribati and Tuvalu, whose economies and household budgets depend on them. Further, this could create an additional burden on health systems to provide treatment, care, and support.

Youth unemployment and underemployment, as well as a lack of educational opportunities, skills, and literacy, are producing many idle youth. These young people, who are not being absorbed into the formal, informal, or subsistence economies, live in poverty. The inability of young people to meet their livelihood needs, or their social and familial expectations and obligations, is integrally linked to their lack of employment or education to equip them for the changing contexts in which they live. These structural challenges add a dynamic that is beyond young people's immediate control to change. Youth living in difficult economic circumstances in the Pacific are becoming involved in crime, as well as the exchange of sex—often unprotected—for money or things that they desire or need for their survival. As such, they can be more easily exploited. Substance abuse is also increasing. Sociocultural change is contributing to young people's increased vulnerability to HIV (Buchanan-Aruwafu, 2002a; Chevalier, 2000; KHATBTF, 2005; NAC, 2005; UNICEF, 1998; UNICEF *et al.*, 2005; UNICEF Pacific, 2003a; UN, 1996).

The Impact of Sociocultural Change—A Barometer of Vulnerability

Young people in Pacific Island countries experience and interact within political, economic, and sociocultural contexts that are much different than those of their parents' and grandparents' generations. Rapid urbanization, migration for education and work, shifts from subsistence to cash economies, changes in population and familial structures, travel, global influences through communication and media, and HIV epidemics have changed the dynamics of the world that young people live in. Urbanization and migration for employment and education have allowed young people more freedom away from the watchful eyes of their parents and extended family networks. This has changed mechanisms of social control over sexual activities, relationships, and drug and alcohol use. As a result, teenage pregnancies and STI levels have increased among the youth (Buchanan *et al.*, 1999; KHATBTF, 2005; NSRRT and Jenkins, 1994; Schmidt, 2001; UNICEF, 2005a) As illustrated in the case study from the Solomon Islands in the next part of this paper, the risk of HIV infection thrives in the contradictions and dilemmas between sociocultural expectations and ideals on the one hand and young people's changing worlds, identities, and practices, on the other.

In the context of social change in the Pacific, young people juggle a range of influences, which include (i) sociocultural traditions and norms; (ii) religion; (iii) parental authority and expectations; (iv) social mechanisms of control; (v) youth cultures; (vi) personal values and identities; (vii) changing lifestyles; and (viii) frustrations from economic, social, and political marginalization and lack of participation. Culture and cultural identity are important for young people, and they have a strong sense of the importance of familial expectations and their responsibility, and their own social obligations and status. These can cause shame, fear, misunderstandings, intergenerational conflicts, and despair for youth when they cannot meet the expectations of their parents, their social environments, or their own aspirations (Buchanan-Aruwafu, 2002a; UNICEF *et al.*, 2005). The context of socioeconomic and cultural change creates contradictions, confusion, and ambiguity for young people, and subsequent issues such as drug and alcohol abuse and suicide are evident (Lowe, 2003).

Social change and the use of alcohol and drugs are associated with suicide in some countries. Many young people are committing suicide in the Pacific—in Fiji Islands, Guam, Palau, Samoa, Solomon Islands, and RMI. Some Pacific countries report some of the highest prevalence of suicide in the world. Suicide is occurring in the context of social change when (i) young people cannot meet parental and societal expectations, and their own desires; (ii) they do not have the power, communication, or negotiation skills to reconcile differences when intergenerational conflict occurs; and (iii) young people do not have the ability to change the shifting contexts of their lives, and resolve the incongruity between the different identities that they create. While an in-depth discussion is outside the scope of this paper, suicide and attempted suicide are important barometers of the kinds and degree of stress that young people are experiencing in their employment and education, as well as from age, status and gender disparities, in the context of social change. While alcohol and drugs are used by youth to alleviate stress, they can create greater vulnerability to HIV infection (Booth, 1999; Lowe, 2003; Pinhey and Millman, 2004; Rubinstein, 2002; UNICEF *et al.*, 2005).

Alcohol and Drugs

Young people use and abuse a range of drugs and alcohol, which they can associate with being out of school, unemployed, uninvolved or unaccomplished, and stressed. Alcohol and drugs are used to (i) relax and relieve tension; (ii) experiment, have fun, and generate excitement; (iii) bond with peers (and because of peer pressure); and (iv) enhance personal image and confidence, and decrease young people's inhibitions in their pursuit of relationships and sex. The use of alcohol and drugs has been associated with unprotected sex. Binge drinking and excessive marijuana use also have been linked to poor health, accidents and violence, crime, gang rape, unwanted sex, teen pregnancies, STIs, and mental health problems across Pacific Island countries (Buchanan-Aruwafu, 2002a; Koops, 2002; PAHP, 2001a, 2001b, and 2003; UNICEF, 2003b; UNAIDS, 2006; Mielke, 1995). The following selected data illustrate young people's substance use, and how it is related to potential HIV transmission.

Box 1: Bottle Breaks

Do you think it is OK for girls to drink nowadays?

G1: I think that it is OK. Just a small amount for those girls who feel very shy to go in public (during dances). Enough to let them get over their shyness. But it is bad when you take too much. You do not know what you are supposed to be doing. It is too much. And in the end you would be surprised to see a long queue waiting to have their turn on you!

G2: Your bottle breaks (virginity is lost) and there is a long queue! (Female youth, PAHP, 2001a:30).

Box 2: Showing Off

In your observations why do you think the young generation drinks?

They are just showing off. They want to fight. Girls drinks maybe to want to goon a date. Others just want to get drunk to enjoy themselves and forget their worries. Most people when they drink they chase after women (Male youth, PAHP, 2001a:9).

In Kiribati, young people under the age of 21 cannot drink alcohol legally. However, alcohol abuse and drunkenness are common among young people. An increase in female youth drinking is being reported, underage drinkers can be found in bars, teenagers are being charged with drunk and disorderly conduct, and heavy drinking is common for tertiary students (KHATBTF, 2005; PAHP, 2001a; UNICEF, 2005a). A study in South Tarawa

found that youth use a range of substances, including imported beer and spirits, fermented toddy (*kaokioki*), and home brews. Youth also sniff benzene and drink methylated spirits, but marijuana smoking is rare in Kiribati (KHATBTF, 2005; PAHP, 2001a). Unwanted sex, unprotected sex, and pregnancy reported were some of the consequences of drinking alcohol (UNICEF, 2005a).

In Vanuatu, research found that young people use a range of substances, often in combination, including kava, beer, wine, hot stuff (liquor) and homebrews, betel nut, marijuana, bell flower (Datura), and methyl alcohol (PAHP, 2001b). Youth reported using substances frequently and in large quantities, which was linked to a lack of employment and alternate activities for young people. Most youth hid their substance use from their parents. Some others had greater freedom to use substances more frequently and in larger quantities, as their parents were living on outer islands while they were living in Port Vila (PAHP, 2001b). A UNICEF study (2001a) showed that substance use can start at a young age in Vanuatu—as young as 12—with consumption increasing with age as young people moved through their teenage years.

Box 3: No Jobs

I think young people's (lives) are getting low because there are no jobs so that (is) why we must get drugs to satisfy our basic needs. (Male youth, PAHP, 2001b:10).

Box 4: I Can't Stop

What has made me to drink is when I go with most of my friends they start to drink they would give me a glass. I would sit and drink with them and then from then on I start to drink and until now I've became addicted and I can't stop. I feel when I want a drink I have to. I can't hold it because I am use to

it. Also, another thing that causes me to drink is because of the problems I have at home, makes me worry a lot and thinking of it makes it hard for me to sleep. Problems that I have at work and in my studies since now that I am a student, it's hard for me so I have to drink to forget my problems to make me sleep and to stop thinking about them. (Male youth, PAHP, 2001b:26).

In Tonga, research with in-school and out-of-school youth indicates that substance use is common, although higher use and frequency of use was reported with out-of-school youth (PAHP, 2003; UNICEF, 2001b). Youth said unemployment and a lack of alternative activities were the reasons why they abused substances to pass the time. Substance use facilitated a form of peer bonding and social interaction, self-esteem, and self-worth. Substances used included tobacco, alcohol, solvents, marijuana, methylated spirits, cocaine, mushrooms, and *fafangu* (Datura). Familial conflict, violence, and crime were linked to drug and alcohol use. Severe punishment from parents over alcohol and drug use could cause it to become more hidden and more abused (PAHP, 2003.)

Box 5: Cruising

Yes when they were at school they start smoking and drinking alcohol these two things interfere with their studies and lead to a situation where they are expelled from school. If they don't have the opportunity for schooling this will lead them to unemployment so they just cruise around town (Male youth, PAHP, 2003:15).

I use drugs to solve my problem. If I'm angry with someone I can smoke a joint of marijuana and all of a sudden the feeling of anger goes away from me (Male youth, PAHP, 2003:39).

Box 6: Some People End Up Dead

> Some guys when they drink mushroom they will drink alcohol afterwards and it's worse. Because they won't know how much alcohol they are drinking and when the alcohol has had an affect on them. Some people end up dead and that's it (Male youth, PAHP, 2003:50).

A high proportion of female and male youth drink alcohol in Cook Islands, particularly in the urban center of Rarotonga (UNICEF, 2004a). An ethnographic study in Cook Islands (Koops, 2002) found that young people favor drinking beer and spirits, though home brew is also available when funds are short or access to other alcohol is limited. Binge drinking is the general pattern of consumption, with youth drinking over long hours. Youth said they began drinking to experiment and feel cool, fit in with their peers, show off, and be like adults. After becoming familiar with alcohol, drinking gains social salience as a way to initiate and maintain relationships between friends, kin, and strangers. It is used to relax, decrease inhibitions for conversation, inspire one to sing and dance, or find a spouse or sexual partner. Drinking also could cause embarrassment, lead to violence and arguments, and accidents.

Box 7: Alcohol and Sex Drive

> I had been drinking over at my friends', and there was this guy standing in front of me—I was so curious of what he would be like in bed, and that did happen—and yes, I was happy but inside I was scared, oh shit what did I have to do this for—yeah, you know, it was just the alcohol that gave me that drive (Female, 27, drinker) (Koops, 2002:192).

Box 8: Sweet Talk

So we're sitting in a group, having a drink and then, once we go out we're socializing through own and that. When we get to a certain place, and sort of like, when they see girls and that, they go up to them and start talking. Yeah, that's what they normally do (Male, 21, drinker) (Koops, 2002:187).

The men tend to be a bit more, like the guys I know, when they're around other people they tend to be a bit quiet—around other people they don't really know—but then when we all drink together, they'll just out of the blue say something, and they're real sleazy, trying to hit on you. That's what the guys are like over here—all they think about is their things down below [laugh]. And girls, when they're drunk they tend to get sucked in, what I've experienced. Like when I was drunk one time, and you just get sucked in by their sweet talk, blah, blah, blah, and wake up the next morning and realize what you've done, and you can't really go back and change it, too bad (Female, 19, drinker) (Koops, 2002:192).

Many young people in PNG use marijuana (spak brus) and alcohol, including out-of-school youth and young people at school and university (Johnson, 1998). Alcohol use leads to other problems, such as domestic and sexual violence, fighting and disruption in the community, crime, and alcohol-related accidents. Young people use alcohol and drugs for pleasure, and to escape and forget about their problems, such as poverty, domestic violence, sexual abuse, lack of money, and lack of communication with parents and other adults (Decock *et al*., 1997). PNG marijuana is potent, widely used, illegal, easily accessible, and inexpensive (Marshall, 1993). Jenkins and Alpers (1996) found marijuana being used more than alcohol, and youth reported that it decreases their sexual inhibitions.

The degree of substance use by young people, combined with how alcohol and marijuana can decrease sexual inhibitions while reducing condom use, heightens the risk of HIV infection for youth. Drug and alcohol use by young people, the situations they live in, and their vulnerability to HIV cannot be considered or addressed meaningfully in isolation—they are intertwined.

Shhh—Taboo

Issues affecting young people's vulnerability to HIV in the Pacific are also symptomatic of culture and social relations. For example, sex and sexuality are not easily discussed within families in the Pacific because of cultural taboos on discussions about sexual matters between specific kinship relations. There is a widespread belief and an unquestioning acceptance of the status quo—that talking about sex and other sensitive issues goes against Pacific cultures. Consequently, silence and inhibited communication about sex and sexuality in families, churches, educational curricula, and even health systems have contributed to young people's ignorance. This also has limited youth's access to services that reduce risk and vulnerability, including accurate information about reproductive and sexual health, STI and HIV transmission and prevention, STI treatment, and condoms. The impact, as noted above, is clear in young people's lack of knowledge, infrequent condom use, and levels of STI and HIV. In some studies, young people expressed shame and fear to broach these questions with adults.

The three UNFPA studies in Cook Islands, Kiribati, and Samoa indicated that many adolescents were told not to have sex and to value virginity. However, adolescents lacked guidance from parents, schools, and churches on sexuality, reproduction, HIV, and other STIs (Seniloli, 2003a, 2003b, and 2003c). To varying degrees in these three countries, young people reported not seeking information because of shame and embarrassment, fear of parents, religion, or the belief that information about contraception was only for adults. The case study on Auki, which follows, illustrates this dynamic. In the PAHP studies on drug and alcohol use in Tonga, Vanuatu, and Kiribati (PAHP, 2001a, 2001b, and 2003), young people said they hid their substance abuse from their parents because of fear of punishment.

Thus, the opportunities for adults to guide and support young people were reduced. When young people's substance use was discovered, they often were punished severely. This could isolate young people further, which can produce opposite the intended effect by increasing their substance abuse.

Across the Pacific, gender and age inequalities affect women—particularly female youth—and young people's participation in family, social, and political discussions and decision making. "Cultures of silence" and "cultures of violence" have been coined to illustrate many Pacific cultural practices and beliefs which oppress the status of young people, children and women (Carling 2004). Sociocultural norms promote the belief that children and youth should not question their elders, or express their opinions in adult conversations—that, in short, they should be "seen and not heard." These norms are reinforced through socialization, authoritarian parenting approaches, and violence to ensure deference to adults, particularly male elders. Norms affect the ability of young people to (i) talk openly with adults; (ii) ask advice; (iii) question and express their opinions to their parents and other adults; and (iv) be open and honest about their sexual relationships, their youth cultures, or even their HIV status (Buchanan-Aruwafu, 2002a; PRHP, 2004; UNICEF, 2002; UNICEF *et al.*, 2005; UNICEF and Government of PNG, 2006). Age and gender inequalities contribute to discrimination, young people's resistance and intergenerational conflict, physical and sexual violence, and young people hiding and exerting their own agency through their practices (Buchanan-Aruwafu *et al.*, 2003; Bradley and Kesno, 2000; UNICEF, 1998; UNICEF *et al.*, 2005). The following case study from Auki Malaita in the Solomon Islands illustrates how culture and taboos regarding talking about sex, sociocultural change, age and gender inequalities, and social conflict impact young people's knowledge, practices and their experiences. The research data in this case study was collected with youth researchers, and illustrates the value of involving youth in researching issues that affect their lives.

PART 3: AUKI—A CASE STUDY

The Solomon Islands archipelago has an estimated population of 460,000, which is young and growing quickly. In 1999, the island of Malaita had the highest population of the country's nine provinces (122,620), with more than 64% of its people under the age of 25 and a high annual growth rate of 3.3%. Auki, the capital of Malaita, has developed rapidly and consistently over the past 50 years, with an estimated population of 4,421 (Government of Solomon Islands, 2000).

Young people from rural areas are highly mobile and migrate to Auki and other urbanizing centers for many reasons, including (i) employment; (ii) education; (iii) escape from the close surveillance of their families in rural areas; and (iv) curiosity, adventure, excitement, and attraction of urban life (Jourdan, 1995; Burslem and Larson, 1998; Buchanan-Aruwafu, 2002b). Young people experience high levels of unemployment, a lack of educational opportunities, a depressed economy, increased inflation, and political corruption (Chevalier, 2001; Fraenkel, 2004; Government of Solomon Islands and UNICEF, 2004). As has been seen in Fiji Islands and PNG, young people in the Solomon Islands can contribute to social and political instability, as well as become involved in crime, lawlessness, and armed conflict, when their disparities are not addressed. This, in turn, can undermine economic and social stability further (Buchanan-Aruwafu, 2002; Chevalier, 2000; NAC, 2005; UNICEF *et al.*, 2005).

Between 1998 and 2000, more than 20,000 people were displaced back to Malaita due to ethnic tension and armed conflict. An estimated 50% of those displaced were young people under the age of 21. The conflict was based on tensions between the indigenous Guadalcanal population and Malaitan migrants, and centered on land ownership on Guadalcanal, control of resources, and compensation for alleged murders (Kabutaulaka, 2000). In 2000, there was a political coup.

During the research for this study in 2000, male youth from Malaita who became involved in the armed conflict as "militants" were the victims and perpetrators of violence. Sociopolitical instability and armed conflict (i) displaced large numbers of young people to Auki, and interrupted their education and work; (ii) created insecurities, and broke down legal and

societal structures; (iii) disrupted health and other basic services, and increased the burden of disease; and (iv) increased the risk of acquiring STIs, including HIV, for militants and civilians. Sociopolitical instability constrained economic stability and development, increasing unemployment (Amnesty International, 2004; Buchanan-Aruwafu, 2002; Chevalier, 2000; Government of Solomon Islands and UNICEF, 2004).

Violence and inequality between men and women, and an imbalance in power, existed on Malaita before the ethnic conflict. Power imbalances were exacerbated and shifted during the conflict, with arms creating power for young men—they became above the law and *kastom* negotiations. (*Kastom* is broadly defined as cultural traditions and beliefs.) Acute overt ruptures in power relations and social norms occurred during this time between chiefs, community leaders, politicians, police, militants, and young people on Malaita, which undermined the maintenance of social and *kastom* norms for youth (Buchanan-Aruwafu, 2002a; Chevalier, 2001; Fraenkel, 2004). Power also was expressed through sexual activity. Militants were involved in rape, and sex with multiple partners, sex workers, and other transient young women. Physical and sexual violence against women, as well as child sexual abuse, occurred in the Solomon Islands before the ethnic conflict. During the conflict, sexual violence against women and young girls increased (Amnesty International, 2004; Buchanan-Aruwafu, 2002).

Women's status in the Solomon Islands society is low. Malaita is a patriarchal, male-dominated society, with gender and age inequalities, and power relations that do not support women and young people in leadership and political roles (Akin, 1993; Pollard, 1988). From a young age, girls are socialized to respect men, and their submission and obedience is reinforced. Girls are not supposed to be vocal and to question, and they must serve the men in their family and respect their brothers. Boys are taught not to be vocal and to question their male elders and they can use physical violence against their sisters, particularly regarding their obedience, respect, and sexual behavior. Youth are socialized about sexual behavior that stresses female virginity at marriage, while boys are told not to be promiscuous, creating double standards.

In 2000, sexual prohibitions and their consequences, brideprice,[8] compensation, violence, religion, and gossip continued as contemporary forces that limited young people's behaviors. These are used to regulate premarital sex and boyfriend-girlfriend relationships, illustrating the continuity of practices despite changes in the variability and form of *kastom* on Malaita. When the community becomes aware that young people are having sex, the issue is addressed between families, including through violence or paying compensation, or trying to force the young people to marry.

Box 9: Red Money

> When I go with a girl, it is to satisfy my desire. Yes I think of compensation. I think that when we went no one saw us, we were hidden, but to my surprise someone saw us. In *kastom* if you take their girl somewhere, and they see you with her, then only red (shell) money and money will solve the problem. From before until this time it is the same, that is how it works. Even if you hide and any of her brothers see you with her, then you are in trouble, and red money or money will go to them. These are to solve the problem. If you do not give it them 'ma nek aot na ia', they will cut off your head (they will beat you), from before till this time it is the same (Kusa, 2000).

If a young girl gets pregnant, her family will ask for compensation. After these negotiations, the young people may marry, but this does not always happen.

Box 10: Everything Changes

> If it happens that she gets pregnant, then everything changes. They will tell you to marry her and if you don't want to marry her then you must give more. It is more than the time

8 Bride-price is an exchange made between families and is paid by the family of the bridegroom to the family of the bride. Bride-price creates ties between families and is also seen as a reimbursement to the girl's family for the loss of her labor.

they have seen you talking with her and walking around together. If you make her pregnant then the amount that they will ask will be more. If you pay for her and marry, then that is OK, but if you don't want to marry her then it will cost more money. Five red shell money would have to be given to the girl's father, with two or three thousand dollars (Kome, 2000).

Female and male youth fear violence and compensation. However, they resist by refusing to marry and continuing their sexual practices, while feeling guilt and shame for not meeting social and parental expectations.

While *kastom* varies between the ethnic groups on Malaita, the prohibition against premarital sex is linked to the bride-price expectation that a girl is a virgin when she marries, that her reproductive role is confined to marriage, and that she will bear children to continue her husband's kin group. When a girl is young, she is told that her family will not receive a high bride-price if she has had sex or has a bad reputation. Bride-price is embedded in systems of exchange, creating ties between families and social relations between kin groups. It reimburses the family for their daughter's value and the loss of her productive and reproductive labor, and helps to pay for the wives of her brothers. Female youth work hard to protect their reputations through secrecy and not bring shame on their families. Young people said that the shift to a cash economy is changing the significance of bride-price, leading to a commoditization of a girl's body and the further oppression of women. Bride-price was seen as a source of pride and obligation, and as a burden and restriction of freedom by female youth.

Box 11: Only Money

I have seen people paying brideprice and I have seen it change. They say that everyone should pay with money, only money. Before if you had a bag of money and it went to 50 or 100, then that was enough money, but now if you give five red money they will reject it unless there is also money. The way that I think that it has changed is that the amount of money

they sell her for is big, the amount of the bride-price is high. The church have put the limit to five red money when you marry, five red money or how much the boy has he gives, but this time it isn't like that (Ruki, 2000).

Box 12: Yes, I Break the Rules

When I stay with my uncle it is difficult to go out and meet my boyfriend. He stops me from going out so I do not go. I cannot go out with other people. If a person comes by and asks me to go, I cannot go and then I just stay. Once my uncle tells me something, tells me these things, I do them otherwise 'stiki na banga' (I get hit with a stick) … Yes I break the rules… Yes I break them—sapos mi go wiki—(if I get sick of it) I will lie that I was in a different place, but it's not true. I have been with my boyfriend in some empty house, over there (points and laughs), until four o'clock and we have been there since one. We will talk; we will sit down and talk until four. When I go back, my uncle will ask, "Where did you come from? I have been to the market three times and they told me at the market that you were on your way up." Then I will tell him; "Oh, I went to visit with my uncle on the other side of town." My uncle lives there. Then he would say, "OK, it is all right if that is how it was." I feel really bad, (when I am restricted) I feel sad and I don't like to eat. From morning to evening, I cook and then I sleep. I turn on the stereo low and I sleep. When I don't eat during the day, I also don't talk… sit down quietly, just thinking; only thinking of my boyfriend. Thinking of the boy—Tinkim boe (thinking of the boy) (Nix, 2000).

Young people are conflicted over their obligations to their parents and their own desires. The refusal of parents and guardians to allow boyfriend-girlfriend relationships, and for female and male youth to marry whom they choose, causes intergenerational conflict and stress for young people.

Sometimes young people run away, increase their alcohol and marijuana use, and even commit suicide. Nix committed suicide a couple of years after this interview because of conflicts over a relationship.

Social gossip and criticism are used to ridicule young people publicly in attempts to control their relationships and desires. Gossip, particularly by women, and the practice of suspending young people from school or church if it becomes known that they are having a sexual relationship outside of marriage, is used to regulate sexuality through public humiliation. This creates further disadvantages for young people. A young girl and boy, seen together alone at an unusual place or time, also can arouse suspicion, and a clandestine relationship might be assumed. While young people fear compensation and violence, they greatly dislike criticism and the stigma placed on them by the wider community if their relationships are discovered. Stigma and humiliation are a major part of why young people are secretive about their sexual practices and relationships. Young people had a range of strategies to hide their boyfriend-girlfriend relationships.

Box 13: Sneak Out

> I will wait until everyone is asleep, open the door, no one will hear me, open the door and sneak out. Go, sit down, have sex and then come back to the house not long before dawn (Lai-Sex, 2000).

Secrecy and clandestine meetings can make young women particularly vulnerable during negotiations over whether to have sex or have protected sex when they are in isolated areas. Coerced sex and rape, violence, unwanted pregnancies, and STIs could be consequences of their secrecy.

The majority of young people said that neither *kastom* nor religion stopped their sexual practices, though these affected how they felt (i.e., shame and fear) and the degree of secrecy that they used to hide their relationships. At the same time, the majority of young people condemned sex before marriage or sex with multiple partners, which conflicted with their own practice. Contradictions and personal conflicts are created for

youth when their allegiances to *kastom* and religion clash with their pursuit of pleasure.

The BSS surveyed 300 young people, with equal numbers of female and male youth. The majority of those surveyed were 15–24 years old. Young people were quite sexually active: 262 of the respondents had had sex. The median age at first sex was 15 years old; 86% of the young people had had sex by the age of 17. Only 77 (29%) of the sexually active young people had ever used a condom, and only 36 (14%) had used a condom at last sex. When asked why they did not use a condom, young people generally responded that they did not like condoms, or that they did not have or have access to a condom. Of all young people who were sexually active, 21% said that there were times that they had not used a condom even when they might have had one, because they were drunk or stoned. Alcohol and marijuana use is quite high in Malaita, and young people associate alcohol use, sexual desire, and having unprotected sex.

While condom use was low, the number of young people with multiple partners was high. Of those who had had sex, 150 (57%) had more than one regular sexual partner. More than half of these had had 1–4 sexual partners in the previous 12 months, and nearly 10% reported having more than 10 sexual partners. While 84% of the females reported that their last sex was with their regular partner, only 25% of the male youth had their last sex with a regular partner. The cultural double standards plays out in the data—the vast majority of female youth (83%) expect to have sex only with their regular partners, while only 17% of male youth shared this expectation. Only 15% of young men who were involved in relationships believed that having an affair when in a committed relationship was wrong, while 70% of young women who were involved in relationships believed that having an affair when in a committed relationship was wrong.

Of the sexually active young males, 18 (13%) had paid for sex in the previous year, and eight of these had contact with sex workers weekly or monthly. Further, 32 youth (53% females, 47% males) had exchanged sex for money or resources; 24 of these were 15–24 years old. The age when they had first been paid for sex ranged between 15 and 29. Of those who reported exchanging sex for cash or resources in the previous year, only one female youth said that she used condoms with her regular clients.

Young people's sexual practices indicate a high level of risk for HIV and other STIs.

Similar to data from other parts of the Pacific, young people in Auki also experienced sexual violence. Of youth surveyed, 96% had heard of others who had been raped, and 40% (103 male and 17 female) had seen a *long laen* rape (gang or group rape) happening. Sixty-three male youth and two female youth between the ages of 15 and 30 reported that they had been involved in a gang rape. The number of men involved during each gang rape ranged from two to 14. Of the 63 male youth who had been the perpetrators of long laen rape, only 12 reported ever using a condom in their lives. Youth said that alcohol abuse created opportunities for long laen rape to occur and young men took advantage of the situation. Female youth who had refused to have sex or insulted a young man could be later gang raped. Rape also was being used as a way to control female promiscuity so that bride-price payments would not be effected and to teach young girls a lesson so they would protect their reputations. Long laen rape was being used as a strategy to control young women and their sexuality, and is rooted in attitudes towards women. The contradictions that young people face in relation to their sexual practice and the status of women are at the root of sexual violence.

Fifteen male youth who participated in long laen rapes said that they previously had been the victims of sexual coercion by women when they were young. Thirty-nine (28 male, 11 female) youth said that they felt coerced or intimidated to have sex when they did not want to. Male youth said that their relationships to the women who forced them to have sex varied, but they were mostly women that they knew: their friends, their neighbors, house girls, and relatives, or some others they did not know. Female youth said that men they did not know had forced them to have sex, as did their neighbors, relatives, and friends. Shame and stigma affected the ability of both female and male youth to discuss or report when they have felt that they were victims of sexual violence.

Young people attributed the lack of reporting of cases of long laen rape to the shame and stigma a girl would feel if she reported the rape, that she could not protect her reputation if she went to the police, to her feeling that she may have deserved what happened, and the obstacles

faced within the health and legal systems. If a young girl chose to report the rape to her family, she feared reprisal from her family in the form of further violence and shame. If the rape is reported to the family, they might not report it to the police and choose instead to settle the issue through compensation. If a rape is settled through compensation, the young woman does not receive any share of the compensation payment, and the physical and emotional consequences of the sexual violence are not addressed.

Young people had other sexual and tattooing practices that heightened risk of HIV transmission. Young people reported the use of penile inserts (mabol) that can cause abrasion or inflammation, increasing the risk of HIV transmission (Hull and Budiharsana, 2001). Of the 150 males surveyed in Auki, 5% (8) had mabol. Meanwhile, 6% of sexually active female youth reported that they had had sex with a man with mabol. Tattooing practices also indicated risk of HIV and other infections. The survey found that 40% (119) of young people interviewed had been tattooed; and of these, 83 had more than one tattoo. Further, 25% (74) reported that others had had tattoos done before or after them, and 50% had been tattooed in their home villages. Data from Auki indicated that needles are not cleaned nor ink pots changed between tattoos, posing a risk of transmission of HIV and hepatitis. Meanwhile, their ability to gain information about their tattooing and sexual health risks, and condoms to protect themselves, was limited.

In Malaita, as in other places in the Solomon Islands, the knowledge of sexual and reproductive health within the community is poor. Discussions about reproductive and sexual health with young people in the family, educational, and health systems are limited due to cultural and religious barriers regarding discussions about sex. Primary and high schools do not have a formal curriculum for sex education, and continuing training for health workers in the areas of STI, HIV infection, and AIDS has been lacking. In addition, access to free or affordable condoms and youth-friendly sexual health services, particularly in rural areas, has been lacking. Health workers have negative attitudes toward condom distribution to young people and display moralistic negative attitudes when dealing with young people's sexual health issues. Further, access to antibiotics in clinics for STI treatment can be inconsistent (Buchanan *et al.*, 1999; SIG *et al.*, 2005).

While youth are told that they cannot have sex—and this was reinforced through violence, compensation, and gossip—they receive little guidance from their parents about sex. Adults maintain that talking about sex is *tabu* or prohibited. *Kastom* does not promote free conversations about sexuality and sexual health between men and women, including sisters and brothers. Parents identified religion, *kastom,* and a lack of knowledge as barriers in their ability to communicate about sex with their children. This study found that the ease with which young people talked about sex was contingent on the context, their gender and age, and the relationships of the people involved in the conversation. Young people were afraid, ashamed, or concerned that they might be criticized if they raised issues about sex with their parents. Only 10 (7 female, 3 male) of 300 young people surveyed in Auki had ever spoken to their parents about sexual or reproductive health issues. The primary reasons for not talking to parents were fear (51%; 93 female, 55 male), possible criticism (21%; 22 female, 42 male), and shame (14%; 28 female, 20 male). *Kastom* and religion were at the heart of these reasons.

Young people's sources of information about sex were their peers, relatives, and school, but not health workers. Health workers were not always open to discussing sexual health issues, and they identified religion, *kastom,* and a lack of training and educational materials as barriers to talking about sexuality. Young people identified criticism from health workers as a deterrent to seeking services, and felt that confidentiality was lacking. Health workers could exhibit negative attitudes when young unmarried people come to them with STIs. Condoms were not given routinely to unmarried youth when they requested them, even when they had an STI.

This study explored the knowledge about STIs and HIV among the youth. When young people were asked about STI symptoms, 54% said that a man could have an STI without symptoms; 46% said a man could not or were unsure. Most youth were unsure, or said that a woman had no obvious symptoms when she had an STI. While virtually all youth had heard of HIV and AIDS, the beliefs about HIV transmission were significantly different between male and female youth. While 162 young people thought that a healthy-looking person could have HIV (39 female, 123 male), more than two thirds of female youth (70%) believed that a healthy-looking person could not be infected with HIV. Female youth had more misconceptions about HIV transmission through social contact, such as hugging, cough-

ing, and sneezing, while male youth had more misconceptions about HIV transmission through mosquito bites. HIV transmission through mosquito bites, sneezing, and coughing were the most common local misconceptions of HIV transmission. Only 25% knew that a healthy person could be HIV positive and also reject the two most common misconceptions about transmission. That HIV/AIDS could be prevented by avoiding mosquito bites, not touching someone with HIV, or not using a public toilet were the three most common misconceptions about prevention. Only 16% knew a healthy person could be HIV positive and also reject the two most common misconceptions about prevention: avoid being bitten by mosquito bites and avoid touching someone with HIV. While the majority of young people thought that they could do something to protect themselves from HIV transmission, only 55 (18%) identified using condoms, 44 (15%) having one partner, 74 (25%) avoiding multiple partners, and 49 (16%) abstaining from sex.

When young people were asked if they would still be friends with someone with HIV, only 14% said yes, 1% was unsure, and 85% said no. The vast majority of young people (91%) said that a student with HIV should not go to school, and 67% felt that an HIV-infected student posed a risk of transmission to other students. The majority of young people rationalized their potential alienation of PLWH based on (i) a perceived risk that they could be infected through social contact, (ii) a belief that the person has "AIDS", and (iii) fear. The data suggest why PLWH would be reluctant to disclose their status because of the alienation and associated stigma and discrimination they could face. Young people's fear of HIV can contribute to misconceptions about HIV transmission, a lack of accurate information generally, and community attitudes regarding stigma and discrimination heard in the context of gossip and shame (Buchanan-Aruwafu, 2002).

Young people in Malaita live and participate in an environment of rapid sociocultural change, influenced by structural and global forces. Sociocultural traditions, religion, and family allegiances clash with the influences of modernity, young people's subculture, and their desires for pleasure through sexual relationships, generating conflicts (Kwa'ioloa and Burt, 1997; Buchanan-Aruwafu, 2002a and 2002b). Young people resist—and feel conflict over—parental and societal rules. However, youth create new possibilities to express their sexualities, and use strategies

and their own agency to negotiate their desires within restrictive social conventions. Extramarital and premarital unprotected sex occurs in Auki and youth have a rich sexual subculture. Young people talk about and satisfy personal sexual urges and desires regardless of social and sexual norms (Buchanan-Aruwafu *et al.,* 2003). Meanwhile, the silence surrounding accurate information about HIV prevention and transmission, and young people's secrecy, makes them vulnerable to HIV infection.

Conclusion: Vulnerability, Power, Agency, and Resilience

The HIV epidemiological situation in the Pacific is very uncertain. Sentinel surveillance data is insufficient to be sure of the levels of HIV infection, particularly with more vulnerable groups. However, the concentration of STIs and HIV infections with young people is evident. The available research and behavioral surveillance data shows that the risks are elevated for young people through unprotected sex with multiple partners from a young age. Young people also are involved in highly vulnerable groups and can experience sexual violence. Alcohol and drug use increases unprotected sex. While reported intravenous drug use is low, it should be an area of serious concern. Youth lack knowledge and understanding of the risks that they are facing. At the same time, the contexts of their lives, including a poverty of opportunities, gender and age inequities, social change, and the continuity of norms that impede open conversation and participation, enhance young people's vulnerability to HIV infection.

From what is known about young people and their lives, the potential for an increase in the number of young PLWH in the Pacific—in this youth generation—is real. In 1997, Jenkins (1997a) predicted that in PNG "the people most likely to become infected in the next decade are the youth of today." Nearly 10 years later, unfortunately, this prediction has come true. Infections continue to grow in this age group in PNG and across the Pacific. There cannot be a more urgent time to increase the focus on young people, particularly highly vulnerable youth, and their needs and priorities. To prevent an increase in HIV prevalence in the Pacific, the circumstances and structural vulnerabilities that influence young people's lifestyles and risk of HIV infection, including cultural norms, must be addressed. Further, the rights of highly vulnerable minority groups, including young people living with HIV, need to be protected, and real change created in young people's lives through advocacy and action (Vete, 2006). Young people's participation in changing the course of HIV epidemics in the Pacific must not be underestimated.

However, young people's meaningful and sustained participation is limited by the lack of (i) inclusive structures for national consultative, policy, and political processes; (ii) mainstreaming of youth participation in all sectors; (iii) power and resources allocated to support and

implement regional youth policies and plans at the country level; and (iv) strategies to increase youth participation in decision making within communities and in response to HIV. Political leaders and policy makers need to understand the increasing implications that youth disenfranchisement and discontentment have on economic and political stability and national security, and on youth substance abuse, suicide, and HIV infections (Carling, 2004; Rose Maebiru, personal communication, 2006). To decrease young people's cynicism, disillusionment, frustration, and vulnerability, a radical shift in attitude, practice, policy, and resource allocation is needed to create a culture in which adults listen and allow youth decision making and involvement at all levels (Carling 2004).

To decrease the poverty of opportunities that young people live in, and by extension youth vulnerability to HIV infection, faster economic growth is needed to change employment and educational challenges. These underlying factors and their impacts are driving HIV epidemics. Economic reform strategies, improved law and order, and good governance could counteract unemployment and reduce poverty. In turn, this could increase budgets in the public and private sector to improve health, education, and other pressing service issues for youth. Moreover, youth human capital needs to be strengthened through improved livelihoods, health, and education, as well as by changing attitudes and reducing barriers to female youth and women's involvement in the formal work force (Government of Australia, 2006), as well as the creation of policies to increase youth participation and the amendment of legislation to ensure that these policies are implemented (Rose Maebiru, personal communication, 2006). While easier said than done, solutions must come from within as leaders, communities, and young people articulate and nurture governance and the response to HIV in their own Pacific contexts.

Young people's participation in decision making at the community and political levels desperately needs to be nurtured, allowing them opportunities to articulate and create solutions within their own Pacific contexts. Further, this would give them the chance to reduce their economic, social, and political marginalization, as well as the gender and age inequities that they face. This generation's young people are the leaders of today, as well as the human, social, and financial capital for the present and the future. Young people whose reproductive and productive years increas-

ingly are affected by HIV infection can impact the overall development and economic stability of Pacific Island countries through a loss of their labor, skills, and productivity; increased medical services and costs to accommodate their care within health budgets; and increased burden on household budgets, families, and communities to meet their needs (UN, 1996). Young people presently living with HIV also have critical needs. The large numbers of young PLWH draws attention to existing treatment, support and care needs, including antiretroviral drugs, supportive care and treatment, counseling and accepting environments and protection from human rights abuses, stigma, and discrimination.

As outlined in this paper, research and experience from the Pacific and the HIV pandemic have shown that young people's practices and knowledge, their risk of HIV infection, and the impact of living with HIV cannot be separated from the circumstances in which they live. Nor can these be detached from their sexualities, desires, and human rights (UNAIDS, 1998; Aggleton and Dowsett, 1999; Dowsett, 2003; Schoepf, 2001). The impact of sociocultural influences, change, and political economies poses many challenges for young people, parents, leaders, and policy makers in the Pacific. Meanwhile, positive protective factors—such as youth resilience in the face of adversity; young people's ability to create change; the pivotal role of youth and young PLWH in the response to HIV epidemics in the Pacific; and the support that can be provided by families, peers, communities, leaders, and governments—should not be missed (Carling, 2004: Foster and Sherr, 2006; Schoepf, 2001; Shaw and Aggleton, 2002; UNICEF, 2003b).

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