

The Impact of the Global Fund on Equity, Financial Protection and Social Assistance Policy Development on HIV/AIDS Families in China

A Draft Report to the Health Alliance

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Acronyms

Anti-Retroviral = AVR
Behavioral Modification Packages = BMP
CD4
Center for Disease Prevention and Control = CDC
China Integrated Programs for Research on AIDS = CIPRA
China Country Coordination Mechanism for HIV/AIDS Prevention and Control (CCM)
Chinese Ministry of Health = MOH
Global Fund= GF
HIV/AIDS = HIV/AIDS
People Living with HIV/AIDS = PLWHA
International Bank for Reconstruction and Development = IBRD
Intravenous Drug Users = IDU
Methadone Maintenance Treatment Center =MMTC
Médecins Sans Frontières = MSF
Non-Government Organization = NGO
Rural Medical Cooperation System = RMCS
Sexually Transmitted Disease = STD
The Evaluation Report on Progress in HIV/AIDS Incidence Rates, Prevention and Control in China (2005) = ERP
United Nation Children's Fund = UNICEF
United Nations Development Program = UNDP
United Nations Fund for Population Activities = UNFPA
United Nations Program on HIV/AIDS = UNAIDS
Voluntary Testing and Counseling = VTC
World Health Organization = WHO

Chapter 1: The Epidemic of HIV/AIDS in China

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1.1. The History of the Spread of HIV/AIDS in China

In 1981 the first case of HIV/AIDS was reported among the homosexual population in the United States. In June 1985, the first HIV/AIDS death in China was announced. In the same year, three HIV/AIDS-positive cases were found among 311 hemophiliacs. In October 1986, four Chinese hemophiliacs were diagnosed as HIV positive after using blood products imported from the U.S. This was the first official report of an HIV-positive Chinese citizen residing in China. In February 1987, a hemophiliac infected through imported blood products died. In the same year, an HIV infection from imported blood was reported in Fujian province.

These were the cases that characterized the first phase of the spread of HIV/AIDS in China. According to a report by China Youth Daily, in July 1987, Chen Minzhang, the Health Minister, said that HIV/AIDS infection could be controlled because homosexuality and promiscuity, which contribute greatly to HIV/AIDS, were strictly forbidden in China. Between 1985 and 1988 a total of 22 cases of HIV/AIDS were reported, including four hemophiliac children who contracted the disease from contaminated imported clotting factor. The 17 remaining cases involved tourists or Chinese nationals who had traveled overseas.

By the end of the 1990s in China, the main source of new cases had shifted from imported blood to transmission from local sources of the HIV/AIDS infection. This phase began when 146 HIV/AIDS infections were found among drug users in Ruili, a south-west border city in Yunnan province. In October 1990, the Health Ministry confirmed that 466 people had become infected with HIV between 1985 and 1990. Among these, 5 developed AIDS, 378 were Chinese citizens, and 368 lived in Yunnan province. The 368 drug users had all shared needles and syringes. With infections from intravenous drug use expanding from rural to urban areas and new channels of infection appearing, the spread of the HIV/AIDS virus greatly accelerated. Geographically, the spread of the epidemic followed the routes of the drug traffickers, with one line of infection spreading north through Sichuan and Gansu to Xinjiang, and another spreading east, through Guangxi and Guizhou to Guangdong. Between 1995 and 2000, the yearly growth rate of infections stabilized at over 30%; then climbed to 58% in 2001 and 122% in 2003.

1995 was a year of great importance in the spread of HIV/AIDS in China because the number of reported infections was 195. 1% more than that in 1994. This was the result of two main factors:

- 1) Infections through intravenous drug use in Yunnan increased through the entire province and rapidly expanded into Xinjiang, Sichuan and Guangxi provinces. Intravenous drug users in Guangxi province were infected with HIV from two drug trafficking sources: one from the west via Yunnan, and the other from the south via

Vietnam. The disease was then passed on to the sexual partners of these intravenous drug users and their children.

- 2) Several infections were found among people who were paid for blood donations in Central China. Unsafe blood collection practices in central China led to an epidemic among former donors. In rural areas of Henan and the surrounding provinces, selling blood is a way of supplementing income.

The blood collected was pooled and centrifuged. The plasma was removed, and the whole blood components transfused back into the donors, resulting in thousands of new cases of HIV. The commercial blood donation scheme has largely been replaced with volunteer donations, and HIV transmission via this method was attenuated after 1995.¹ In 1998, only 22% of blood products used in clinical settings were derived from volunteer blood donations. Whereas in 2005, 94.5% of blood products come from volunteer donations.²

In 1997, Chen Minzhang, the Minister of Health, announced at a meeting on World Health Day that the HIV/AIDS epidemic had appeared in China. In 1998, the Health Ministry announced that 11,170 people were infected with HIV, 338 people had developed AIDS and 184 people had died from the disease. In 2000, a conference on HIV/AIDS and sexually transmitted disease (STD) prevention and control was held by the State Council, at which the Minister of the Health Ministry declared that 500,000 people were living with HIV/AIDS in 31 provinces, municipalities, and autonomous regions throughout China.

Since 2001, infections from paid blood donations in Central China have gradually drawn the central government's attention. In 2002, Zhang Wenkang, the Minister of the Health Ministry, announced that by the end of June, 2002, it was estimated that one million people in China were living with HIV/AIDS. In this year, he further admitted that 23 provinces, municipalities, and autonomous regions had been infected by illegal blood collection in 1990s. In 2003, at a senior meeting on HIV/AIDS held at the United Nations Assembly in New York, Gao Qiang, the Deputy-minister of the Health Ministry, announced that currently about 840 thousand people were living with HIV in China, and more than 80,000 people were living with AIDS.

In December of 2003, China's top leaders officially greeted people living with HIV/AIDS, showing that the central government was greatly concerned with the issue of HIV/AIDS. Subsequently in 2004, the National Work Meeting on HIV/AIDS Prevention and Control was held, at which Wu Yi, the Vice-premier of the State Council, made explicit statements about the state of comprehensive HIV/AIDS prevention and control. This meeting marked a turning point in which the central government began to focus more strongly on the HIV/AIDS issue. The meeting also provided a platform for relevant departments to formulate specific policies, and thereby to further promote practices of comprehensive HIV/AIDS prevention and control in the whole country.

Currently, official data on the epidemic of HIV/AIDS in China is available in *The Evaluating Report on Progress in HIV/AIDS Prevalence, Prevention and Control in China (2005)*. This report was published jointly by the Health Ministry, the Joint United Nations Program on HIV/AIDS (UNAIDS), and the World Health Organization (WHO) in January 2006. Part 2 of

¹ Li, Bijian. *Zhen'ai shengming, yuanli aizibing – shengming bidu* (Cherish Life, Stay Away From AIDS – Required Reading for Life). Pékin : Zhongguo yiyao keji chubanshe 2003.

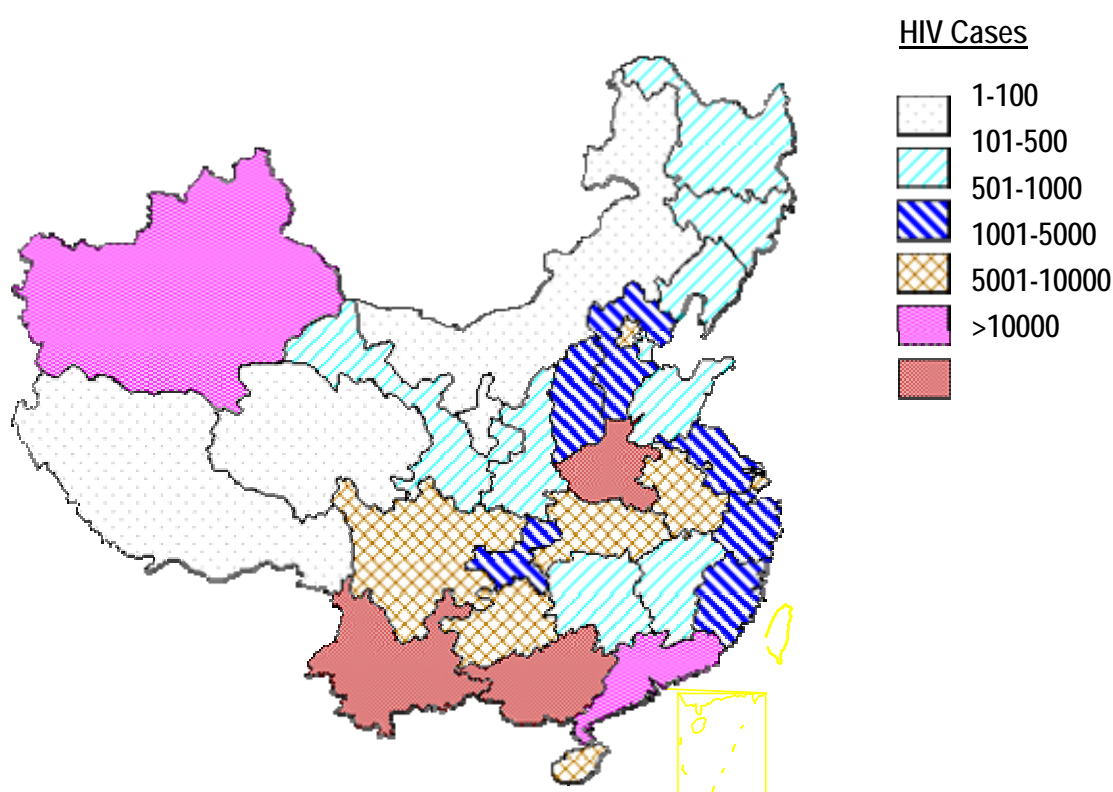
² Ministry of Health, PRC; Joint United Nations Programme on HIV/AIDS; World Health Organization 2005 Update on the HIV/AIDS Epidemic and Response in China January 24th, 2006

the report, *The Current Situation and Characteristics of HIV/AIDS Prevalence in China*, gives a detailed account of the current situation and characteristics of epidemics of HIV/AIDS in China.

1.2 The Geographical Categories of the Epidemic of HIV/AIDS

Since the year 2000, the epidemic has been divided into three main geographical regions that roughly correspond to different paths of infection. The epidemic is generally driven by intravenous drug users in the south and southeastern regions, and former commercial blood plasma donors in the central regions. Transmission from intravenous drug use, as well as from unsafe sexual practices, including those among commercial sex workers and sex with men (MSM), is the dominant sources of infection in the large cities and coastal regions. Figure 1 shows the cumulative number of reported cases of HIV/AIDS in China, by province, since the start of the HIV/AIDS epidemic in China.

Figure 1.1 - Geographic Distribution of Cumulative Reported HIV Infections in China (1985-2004.9)



Henan and Yunnan provinces show the highest rates of HIV/AIDS infection, having reported 35,232 and 48,951 cases respectively, by the end of 2006., Guangxi, Xinjiang, and Guangdong provinces reported more than 10,000 cases each, by the end of November 2005. Ningxia, Qinghai, and Tibet, however, reported fewer than 100 cases each (for the same period).³ Of the 203,527 currently reported cases of HIV/AIDS in China, 27.8% are female, an increase from 19.4% of reported cases in 2000. New infections are found twice as often

³ Ministry of Health, PRC; Joint United Nations Program on HIV/AIDS; World Health Organization 2005 Update on the HIV/AIDS Epidemic and Response in China January 24th, 2006

among males, than among females. But this is a sharp decline from the 1990s when new cases were detected among men five times more often than among women.⁴

An updated estimate of 650,000 HIV/AIDS cases in China was released in 2005.⁵ UNAIDS reports that 89.5% of China's 282,000 estimated infected intravenous drug users reside in Yunnan, Xinjiang, Guangxi, Guangdong, Guizhou, Sichuan, and Hunan provinces. It is estimated that each of these provinces has more than 10,000 intravenous drug users living with HIV/AIDS. 80.4% of the estimated 69,000 infected former blood plasma donors reside in Henan, Hubei, Anhui, Hebei, and Shanxi provinces.⁶

Largely due to the China CARES project, many more people are receiving anti-retroviral therapy. At the end of December 2004, 8,500 people were receiving treatment; by the end of 2005, this number had increased to 19,000. By the end of December 2006, 31,000 people were receiving antiretroviral therapy, including 600 children.⁷

1.3 The Current situation and characteristics of the spread of HIV/AIDS in China⁸

Since the first infection was reported in the United States in 1981, total global infections have reached 69 million, with 27 million deaths. In China since the first case was reported 1985, the spread of HIV/AIDS has gone through four phases: 1) Importing HIV/AIDS; 2) Local spread of HIV/AIDS; 3) Rapid Growth; and 4) Focused outbreak period.

Table 1.1: Present HIV/AIDS Infections and Structure, 2005

Channels of Infection	Percentage	Number (nearest thousand)	Provinces with high rates of infection
Intravenous drug use	44.3%	288	Yunnan, Xinjiang, Guangxi, Guangdong, Guizhou, Sichuan, Hunan ⁹
Illicit sex workers and their clients	19.6%	127	
Spouse or related people of the infected person	16.7%	109	
Blood transfusions, blood donations, or use of blood products	10.7%	69	Henan, Hubei, Anhui, Hebei, Shanxi ¹⁰
Homosexual male sex	7.3%	47	
Mother-to-child transmission	1.4%	9	

⁴ Xinhua News Agency. *More Women Suffer from HIV/AIDS in China*. June 4th, 2007

⁵ Ministry of Health, PRC; Joint United Nations Program on HIV/AIDS; World Health Organization 2005 Update on the HIV/AIDS Epidemic and Response in China January 24th, 2006

⁶ Ministry of Health, PRC; Joint United Nations Program on HIV/AIDS; World Health Organization 2005 Update on the HIV/AIDS Epidemic and Response in China January 24th, 2006

⁷ International Treatment Preparedness Coalition. *Missing the Target # 4: Time is Running Out to End AIDS – Treatment and Prevention for All*. July 18th, 2007.

⁸ the Health Ministry of China, UNAIDS and WHO, the Evaluating Report on Progress in HIV/AIDS Prevalence, Prevention and Control in China (2005), Jan of 2006

⁹ People living with HIV/AIDS in these seven provinces who were infected through intravenous drug use account for 89.5% of the estimated total number of these types of infections in China.

¹⁰ The amount of infections of this group in the five provinces account for 80.4% of the estimated amount of the whole country.

Source: the Chinese Ministry of Health, UNAIDS and WHO, *The Evaluating Report on Progress in HIV/AIDS Prevalence, Prevention and Control in China (2005)*, published in 2006

According to the *Evaluating Report on Progress in HIV/AIDS Prevalence, Prevention and Control in China (2005)* (ERP), at year's end 2005, about 650,000 (540,000 to 760,000) people were living with HIV/AIDS, about 75,000 (65 to 85 thousand) people were AIDS patients. Of these, 22 thousand people, or about 29.3%, were infected through blood transfusions, or paid blood donations, and 53 thousand people, or about 70.7%, were infected through intravenous drug use, sexual transmission, or mother-to-child transmission. The average infection rate was about 0.05% (0.04% to 0.06%). New infections reported in 2005 were about 70 thousand (60 to 80 thousand), mainly among the sexual partners of infected people and high-risk populations such as drug users, illicit sex workers and their clients, and men who have sex with men (MSM). About 25 thousand (20 to 30 thousand) people have died of AIDS. Of these, about 10 thousand had participated in a paid blood donation.

Among the 75 thousand (65 to 85 thousand) AIDS patients mentioned above, young adults are the majority and mostly live in rural areas. This results in a concentrated outbreak and a very high death rate in some areas. The total number of infections in China ranks second in Asia and 14th on the globe. We are facing a great challenge as HIV/AIDS continues to spread.

The ERP estimates that the number of people living with HIV/AIDS in 2005 is less than in 2003. But the reduction does not mean that Chinese government and society can afford to relax about HIV/AIDS prevention and control. The latest statistics in 2005 showed that HIV/AIDS in China was continuing to spread, that new infections were occurring mainly through intravenous drug use, that the risk of death and an epidemic was still serious, that infections were spreading from high-risk populations to the general population, and that a risk existed for HIV/AIDS infections to spread even further. The above statistics also highlighted five characteristics of the spread of HIV/AIDS in China.

The first characteristic was that the rates of infection vary greatly and regional differences are large. By the end of November 2005, two provinces, Henan and Yunnan, reported a total of over 30 thousand infections; three provinces, Guangxi, Guangdong and Xinjiang, reported over 10 thousand cases each; and three provinces, Ningxia, Qinghai and Tibet, reported less than 100 cases each. The infection rate among intravenous drug users, illicit sex workers and their clients in different regions also varies greatly. In Xinjiang, Yunnan and Sichuan, the rate among intravenous drug users was less than 5%, whereas, in Yunnan, Chongqing, Hunan, Guangdong, Guangxi, Sichuan, the rate among illicit sex workers was over 1%.

The second characteristic was that there are three currently coexisting streams of infection and most new infections are the result of intravenous drug use and illicit sex. These are now the major pathways of transmission. Although infections resulting from paid blood donations are still a large part of the total, most of these infections happened before 1996. The statistics about the spread of HIV/AIDS indicate that among people currently living with HIV/AIDS, 44.3% were infected through intravenous drug use, 43.6% through sexual transmission, 10.7% through blood transfusions, blood donations, or using blood products, and 1.4% through mother-to-child transmission. In 2005, 49.8% of new infections were through sexual transmission, 48.6% through intravenous drug use, and 1.6% through mother-to-child transmission.

The third characteristic was that the threat of death posed by AIDS is very serious. The main clinical symptoms of AIDS in patients are; lung infections, infectious diarrhea, herpes zoster, and oral fungal infections. In reality, about one third of patients do not receive treatment until AIDS is very advanced, or a serious opportunistic infection has taken hold.¹¹ This last minute approach largely undermines the effectiveness of treatment. From 2004 to 2005, Many people who had been living HIV reached the stage of their illness where it became full-blown AIDS. As a result the number of reported AIDS patients and AIDS related deaths skyrocketed. Deaths reported during this period for the entire country were 63.3% of the total cases of AIDS related deaths reported since the first infection was identified.

The fourth characteristic was the spread of HIV/AIDS from high-risk populations to the general population. HIV/AIDS infections are increasing in the general population. It has now moved beyond an epidemic targeting only populations with high-risk behaviors, such as drug users, illicit sex workers and their clients. In some areas of Yunnan, Henan, Xinjiang, the HIV infection rates among midwives, marriage checkup workers, and clinicians have reached or exceeded 1%, the high-prevalence standard line set by UNAIDS.

The fifth characteristic was that the risk of a further increase in rates of HIV/AIDS infections exists. The public is poorly informed about HIV/AIDS and many people do not know how to protect themselves against infection. The national data on rates of HIV/AIDS infection indicates that 45.5% of intravenous drug users share needles and syringes and 11% participate in risky sexual behaviors. Among drug users and illicit sex workers and their clients, the spread of HIV/AIDS is accelerating. Another important factor contributing to the spread of HIV/AIDS is HIV/AIDS infected people moving around the country. In addition, vast numbers of people are on the move throughout China and sexual activity and STD outbreaks have increased in urban areas contributing to the spread of HIV/AIDS infections.

The ERP shows the people diagnosed with HIV number 1,410,000, more than the former estimate of 650,000. These results indicate that relevant government departments should take steps to further inform the public about HIV testing, and enlarge coverage of testing services to include as many people as possible. That is the foundation of further prevention and control measures.

¹¹ Opportunistic infection refers to illnesses caused by a microorganism that usually does not cause disease in people with healthy immune systems, but which may cause serious illness in people with HIV/AIDS who have poor immune function.

Chapter 2: Policies to Address HIV/AIDS in China

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2.1 The Stages of HIV/AIDS Infection in China and Related Changes in Policy

In China, there has been an ongoing debate to decide which departments should manage the HIV/AIDS issue and how to respond most effectively to the crisis. In the early stages, the HIV/AIDS file was handled exclusively by the Ministry of Health in China (MOH). As the infection continued to spread, senior Chinese officials became more involved in the fight against HIV/AIDS.

The increase in the rate of HIV/AIDS infection has led to several important policy changes over the past twenty years. HIV/AIDS was initially dismissed as the “evil fruit” of capitalism, and the idea floated of “building a new Great Wall to keep HIV/AIDS out.” There was talk of banning drug use and prostitution when HIV infections were found among sex workers and intravenous drug users. Later, the Blood Donor Law and related regulations were passed when infections were found among people who had been paid for their blood. Most recently, the State Council has promised to create a publicly financed system of services for people living with HIV/AIDS.

The policy environment and the spread of HIV/AIDS are closely linked. A favorable policy environment can support the fight against HIV/AIDS, whereas an unfavorable policy climate can undermine efforts. The following is an explication of HIV/AIDS related policies that have been adopted at different stages of the spread of the infection in China. They give an overview of the evolution of HIV/AIDS policy in China.

Since 1985, when the first Chinese case of HIV/AIDS was reported, China has gone through four phases of spread. They are: 1) Phase of importation (1985 to 1988); 2) Phase of moderate spread (1989 to 1994); 3) Phase of rapid spread (1995 to 2000) and; 4) Phase of localized outbreaks (2001 to present). Not surprisingly, the Chinese government has adopted more favorable policy measures during each phase, reflecting the increased urgency of the threat of infection as well as better information getting through to China’s top leaders. Over time, these trends have made a marked improvement in the effectiveness of Chinese prevention and control efforts.

2.1.1 Phase of Importation (1985 to 1988) — “Keep HIV/AIDS out of China”

Because HIV/AIDS first appeared among high-risk groups in western countries, the government and the public first associated it with the so-called capitalistic life style, specifically prostitution, homosexuality and drug abuse. With the opening of China after reform, international travel became inevitable. The travel has also brought with it an important channel for HIV/AIDS to enter the country. In addition, sex workers and homosexuality provided favorable conditions for spreading the disease.

The anti-western prejudice mentioned above resulted in the Chinese policy of fighting HIV/AIDS by: compulsory testing of people entering or leaving the country; isolating infected people, and; imposing moral sanction and legal punishment for high-risk behaviors.

In 1985, a foreign tourist died from AIDS in Beijing and a few imported infections were later found in Zhejiang and Guangdong. In response, the MOH called an emergency meeting to discuss countermeasures and circulated a series of regulations and decrees to the provinces. Administrative regulations concerned: imported and exported blood products; compulsory testing of people entering or leaving the country, and; strict health checks for foreigners living in China. In 1986, the MOH began monitoring HIV/AIDS rates of infection and organized working groups to fight the spread of HIV/AIDS. In 1988, MOH issued *Some Provisions Concerning the Administration of HIV/AIDS Testing*. The overall focus of this phase was to prevent infection from foreign sources, reflecting a desire to keep HIV/AIDS a foreign problem.

2.1.2 The Phase of Moderate Spread (1989 to 1994) — to Fight Passively and Prevent in Local Regions

By the end of the 1980s, the spread of HIV/AIDS in China had developed new characteristics. The few isolated cases of imported infections had developed into regional epidemics. High-risk groups gradually spread the infection from coastal cities to nearby regions. Sexual transmission was common in some cities, and clusters of infections had appeared among intravenous drug users (IDU) scattered around Yunnan province and neighboring areas. In response, the Chinese government responded in three ways: it revised its HIV/AIDS policies; it developed regulations to slow the spread of the infection in local areas; it improved its HIV/AIDS related administration, and; it instituted more severe punishment for intravenous drug use and for sex workers and their clients.

The Chinese government became more concerned about HIV/AIDS because of the increasing spread of infections. In 1989, AIDS was designated in statute as a must-report infectious disease. In 1990, the Chinese Expert Committee for HIV/AIDS Prevention and Control was founded. In 1995, the document Options for Strengthening HIV/AIDS Prevention and Control was issued. Also, in the same year, MOH and the Center for HIV/AIDS Prevention and Control, supported by WHO, established 42 national monitoring centers in 23 monitoring centers in the provinces (municipalities and autonomous regions).

2.1.3 The Phase of Rapid Spread (1995 to 2000) — to Intervene Positively

By the mid-1990s, the pattern of growth of HIV/AIDS had changed again in China. The disease was now spreading rapidly from high-risk groups to the general population. Infections reported by the monitoring centers increased every year. In 1995 there were 195.1% more cases reported than in 1994. Two factors led to this increase: 1) In Yunnan, infections were spread by intravenous drug users to the entire province and also invaded Xinjiang, Guangxi and Sichuan provinces. 2) In some regions of central China, many people were infected while selling blood. Over the same period, the number of sexually transmitted infections between sex workers and their clients gradually increased.

In response to the situation, the Chinese government created the State Council Coordination Conference Mechanism for HIV/AIDS Prevention and Control in 1996. In 1997 China's Medium-and Long-Term Programs for the Prevention and Control of AIDS were developed.

In addition, a series of policies and regulations were passed, including Options for Serving People Living with HIV/AIDS, the Law of Infectious Disease Prevention and Control, the Blood Donation law, and supporting increased Public Awareness and Educational Guidance about STDs, as well as HIV/AIDS Prevention and Control.

2.1.4 The Phase of Localized Outbreaks (2001 to Present) — Comprehensive Prevention and Control

In 2001, some new patterns emerged in the spread of HIV/AIDS in China. The HIV/AIDS data revealed that, in some provinces of Central China, deaths and outbreaks among people who, in the past, sold blood for money had a bell-shaped distribution curve. This finding alerted authorities to the potential threat of the spread of HIV/AIDS infections to the general population in some regions.

Facing an increasingly serious HIV/AIDS crisis in China, the Chinese government improved its containment strategies. The original policy of quarantining those with HIV/AIDS has been integrated with other prevention and control measures in a more comprehensive way. In May 2005, the General Office of the State Council issued the Action Plan for HIV/AIDS Prevention and Control in China (2001 to 2005), which required the creation of a community-based network of services for the prevention and treatment of HIV/AIDS, including the provision of medical care to those already infected. This change in policy revealed that the Chinese government had adopted a hands-on approach to the HIV/AIDS crisis.

In 2003, MOH selected a few regions around the country with higher rates of HIV/AIDS infection and established 51 Model Districts for Comprehensive HIV/AIDS Prevention and Control. These were areas where more comprehensive prevention and control measures were adopted. ARV therapy (largely using domestically produced pharmaceuticals) was available. Health care for the infected, HIV/AIDS education prevention, interventions in the community, medications to block mother-to-child transmission, and Voluntary Consulting and Testing were all offered as part of the program. A year later, the number of pilot areas was increased to 127.

In September 2003, Gaoqiang, the deputy-minister of MOH, committed China to “Four Exemptions and One Care” program at the United Nations special meeting on HIV/AIDS. This proved to be a breakthrough in the pharmaceutical approach to HIV/AIDS treatment in China. In February 2004, the State Council set up the Commission for HIV/AIDS Prevention and Control. The deputy premier of the State Council, Wu Yi, became its director further strengthening the leadership and coordination of HIV/AIDS prevention and control work in China (Joint Evaluation Report on HIV/AIDS Prevention in China, 2004 and 2003).

In May 2004, as part of the implementation of Practical Methods for Strengthening HIV/AIDS Prevention and Control in China distributed by the State Council (Guo Fa No. 7, 2004) and on the heels of vice premier’s Wu Yi’s speech to the National Conference on HIV/AIDS Prevention and Control, and to provide practical assistance to people living with HIV/AIDS and their families.

In 2004, the Chinese Ministry of Civil Affairs (CMCA), which administers the government’s anti-HIV/AIDS efforts in China, issued the circular, Helping People Living with HIV/AIDS, Their Families and Orphaned Children. This publication marked a change in the

government's approach which now is providing support for living and medical assistance to people living with HIV/AIDS and their family became a priority.

As outlined above, the evolution of China's HIV/AIDS policy reveals that the Chinese government's views on intervention in the HIV/AIDS crisis have evolved considerably over the years: From an initial focus on isolating and monitoring HIV/AIDS cases to the current comprehensive prevention and control strategy which integrates monitoring, prevention, control, care and assistance. Implemented in 2003, the policy of "Four Exemptions and One Care" marked the adoption of a more hands-on approach to HIV/AIDS prevention and control by Chinese government. Since then, counter measures have been improved each year.

2.2 The Chinese Government's Strategic Choice and Actions

2.2.1 The Chinese Government's Focus and Political Commitment

The spread of the HIV/AIDS infection in China has become a major concern for the Chinese government and its top leaders. China has made a commitment to the world community to fight HIV/AIDS, new policies have been implemented and funding for projects has been provided. With this added attention, the fight against the spread of HIV/AIDS in China has become much more effective.

2.2.1.1 China's Government Has Made a Commitment to the World

In 1994, a Chinese delegation attended the Global Summit Meeting on HIV/AIDS in Paris and signed the Paris Declaration on China's behalf. In 2001, a Chinese delegation participated in the UN special session of the General Assembly on HIV/AIDS and signed on to the Declaration of Commitment on HIV/AIDS "Global Crisis — Global Action." In signing on to these declarations, China made a commitment to the world to implement a comprehensive action plan to fight HIV/AIDS at home and around the world. In order to meet this commitment, the Chinese government included key performance indicators selected from these declarations and monitored these indicators for its work in HIV/AIDS prevention and control in China. China's signature indicated the fight against HIV/AIDS had become a high priority for China's top leaders and that China was willing to do its part in the worldwide fight against the spread of HIV/AIDS.

In September 2003, a Chinese delegate made a speech at a high-level meeting on HIV/AIDS at the UN Assembly in New York, in which he stated that the Chinese government was committed to implementing five measures aimed at increasing the effectiveness of HIV/AIDS prevention and control. He further stated the Chinese government's willingness to participate in the worldwide effort and accept its responsibility in the fight against HIV/AIDS. China agreed to implement the following five measures:

- 1) to make the fight against HIV/AIDS a high government priority by clarifying objectives, and strengthening supervision and implementation;
- 2) to build more medical centers dedicated to HIV/AIDS and to provide free ARV treatment for people living with HIV/AIDS;
- 3) to pass new legislation, aimed at strengthening community intervention and awareness about high-risk behaviors;
- 4) to protect the rights of those living with HIV/AIDS by implementing comprehensive care and anti-discrimination legislation;
- 5) to increase cooperation and communication with the world community about

HIV/AIDS prevention and control

2.2.1.2 To Stipulate and Issue a Series of Policies

The Health Ministry in 1995 issued the Opinions on Strengthening HIV/AIDS Prevention and Control, setting the guidance and principle that is to give priority to prevention, publicizing and education of HIV/AIDS, to find solutions to both external manifestation and internal causes, and to adopt comprehensive prevention and control. The State Council also issued China's Medium-and Long-Term Program for the Prevention and Control of AIDS (1998-2010) in 1998 and the Action Plan for HIV/AIDS Prevention and Control in China (2001 to 2005) in 2001, setting the goal of HIV/AIDS prevention and control work in 2002, 2005 and 2010 respectively. Governments at the province level worked out the long-term plan and action plan for the province and relevant ministries and departments stipulated the strategic plan and action plan for their own system.

To push forward the legislation for HIV/AIDS prevention and control is another point. In order to provide the lawful basis for HIV/AIDS prevention and control, the Health Ministry worked out the Ordinance for HIV/AIDS Prevention and Control (draft) and issued the Ordinance in January of 2006, after special research and consideration of opinions of relevant international organizations, relevant ministries, relevant governments at province level, and all parts of the society including the people living with HIV/AIDS.

2.2.1.3 To Increase Fund Input

Funds for HIV/AIDS prevention and control have three types: central government finance, local government finance, and social contributions.

The central special fund¹² for HIV/AIDS prevention and control is increased every year. The Chinese government first established it in 1997, and had provided 15 to 17 million Yuan per year by 2000. In 2001, the central finance increased to 100 million, and invested 1,250 million Yuan in a national bond (with 100 Yuan matching funds from local governments in the central and west areas of China) for infrastructure construction of blood stations and equipment: 459 blood stations and blood centers were newly built or rebuilt. One hundred million Yuan was arranged in 2002 and 390 million Yuan in 2003. In 2005, 801 million Yuan was added, of which 701 million was the central government's transfer payment to local governments.

The local fund¹³ for HIV/AIDS prevention and control funded by local governments has also increased their input for HIV/AIDS prevention and control to some extent. More than half of the provinces set up special funds. The amount of funding from local governments has been roughly equal to that from the central government. In 2001 and 2002, Henan province's input was the largest among the local funds at 14 million Yuan per year. Since 2002, Guangdong province has arranged 10 million Yuan every year for the special fund. In 2001, there were five provinces whose provincial special fund for HIV/AIDS prevention and control exceeded 5 million Yuan. In 2003, the total amount of the local fund reached 179 million Yuan, while the fund from province finances averaged 3.357 million Yuan and the fund from county finances increased 53% over the previous year. In 2004, Yunnan province arranged 15 million

¹² The fund is the special fund appropriated by central government finance for HIV/AIDS prevention and control.

¹³ It mainly refers to the special fund or matching fund arranged by government at province or lower levels for HIV/AIDS prevention and control.

Yuan. According to incomplete statistics, the provincial finances input 190 million Yuan in 2004 and 210 million Yuan in 2005.

Social contributions¹⁴ fund has multiple resources and donors. The amount of respective donation is not much. There are no national statistics on this part now (Research Report on Management of the Fund for HIV/AIDS Prevention and Control, 2004). According to the best statistics, funds from the above resources, added to that from the international society for HIV/AIDS prevention and control in China, totaled 2 billion Yuan in 2005.

2.2.2 The Government-lead and Multi-department-cooperate Mechanism for HIV/AIDS Prevention and Control has initially Formed

In 1996, the central government established the State Council Coordination Meeting System for HIV/AIDS Prevention and Control. The meeting has members including leaders at the vice minister level from 34 ministries and relevant departments and is held every year to coordinate on major issues in HIV/AIDS prevention and control. In 2002, the China Country Coordination Mechanism for HIV/AIDS Prevention and Control (CCM) was founded in order to meet the requirement for applying the Global Fund's project. The CCM has 53 members, including government departments, international and non-government organizations, representatives of people living with HIV/AIDS, academic institutes and pharmaceutical companies. Since it formed, the CCM has held a series of meetings to strengthen coordination among relevant departments and to a large extent to call for social forces to participate in HIV/AIDS prevention and control. In 2004 in order to practically strengthen the leadership of HIV/AIDS prevention and control and further mobilize all social forces, the State Council Commission for HIV/AIDS Prevention and Control, whose members includes the major leaders of 23 central government departments and 7 provinces and autonomous regions, was established on the basis of CCM. Wu Yi, a member of the CPC Central Committee Political Bureau and the Vice-premier, was inaugurated as the director.

In the first half year of 2004, the State Council issued Circulars on Practically Strengthening HIV/AIDS Prevention and Control and called a national meeting on HIV/AIDS prevention and control. The Vice-premier Wu Yi proposed explicit requirements for the government and relevant departments, making an overall deployment on national work of HIV/AIDS prevention and control. Immediately, the government and relevant departments at different levels, under the guidance of opinion launched at the meeting, strengthened the responsibility for leadership, cooperated harmoniously with each other and practically implemented the measures for HIV/AIDS prevention and control. By now, 31 province governments and 88% city governments have founded leading institutes for HIV/AIDS prevention and control. The government-lead and multi-department-cooperate mechanism has initially formed.

During the period of World AIDS Day in 2004, the General Secretary Hu Jintao, the Premier Wen Jiabao and the Vice-premier Wu Yi all made important instruction on HIV/AIDS prevention and control, visited AIDS patients, and inquired after medical workers and volunteers. In the period of Spring Festival of 2005, the Premier Wen Jiabao made a special visit to Shangcai County in Henan province to investigate local work on HIV/AIDS prevention and control, and spent Spring Festival's Eve with people widowed or orphaned by AIDS. It has impressed the domestic and international society strongly that the nation's top leader paid so great attention to the work of HIV/AIDS prevention and control.

¹⁴It mainly refers to the fund contributed by individual, enterprises and non-profit organizations in China.

Besides the health department that is principally responsible for HIV/AIDS, other government departments also have taken actions and performed relevant measures. In 1999, the Ministry of Public Security founded a coordination group for HIV/AIDS prevention and control to guide and coordinate HIV/AIDS prevention and control with the public security sector, including training of policemen in key areas, education among drug users in compulsory rehabilitation centers, and among sex workers and their clients in educational detention centers (Joint Evaluation Report on HIV/AIDS Prevention and Control in China, 2003). In 2002, the National Family-planning Committee worked out the Comprehensive Intervention Plan for Preventing Reproductive Tract Infections, STD and AIDS, putting AIDS prevention and control into work on education and intervention on reproductive health. In 2004, the Committee conducted assessment research on HIV/AIDS prevention knowledge publication and education among people of childbearing age, held an international workshop on HIV/AIDS social behavior and anti-discrimination, conducted wide publication and education on HIV/AIDS prevention and control through the family-planning network, newspaper and website, and promoted condom use among high-risk populations. In 2004, the Education Ministry issued a special decree to implement Circulars on Strengthening HIV/AIDS Prevention and Control by the State Council, established provincial training bases in seven provinces and trained teachers for the centers, and compiled educational materials on HIV/AIDS for middle schools and conducted special supervising and education action to push and check the implementation. The Ministry of Science and Technology launched special projects for HIV/AIDS prevention and control and cooperated with local governments and relevant departments to establish two HIV/AIDS research platforms in Henan and Yunnan provinces, focusing on clinical treatments, pharmaceuticals, diagnostic reagents, and epidemiology. And now, some new pharmaceuticals for HIV/AIDS are in the stage of clinical testing.

The Commerce Ministry made great efforts to attain multilateral and bilateral assistance gratis, contributed in the negotiation on public health issues with WTO, and led supervision on the special rectifying action on illicit blood collection, donation and plasma collection in twelve provinces and autonomous regions. The Labor and Social Security Ministry worked out the National Pharmaceutical Catalogues for Basic Medical Insurance and Insurance for Injury at Work, designating six kinds of anti-toxic drugs in the category A and adding five kinds of anti-toxic drugs in the category B, which allowed more choices for the insured people in clinical treatments. The Agriculture Ministry, the State Administration of Radio, Film and Television, the State Administration for Quality Supervision, Inspection and Quarantine, and the State Food and Drug Supervision Bureau also launched relevant policies and took actions on HIV/AIDS prevention and control. The railway, transportation, and civil aviation departments took various publicizing and education activities in the waiting halls of airport, railway stations and seaports. The Central Propaganda Department of CPC distributed anti-HIV/AIDS videodisks to its subordinate departments and demanded that county television stations broadcast the programs (Joint Evaluation Report on HIV/AIDS Prevention and control in China, 2004).

Besides government departments' actions, the participation of non-government organizations and all social forces has also been promoted. Since 1993, the Chinese Association of STD and AIDS Prevention, the Chinese Foundation for Prevention of STD and AIDS, and many other grass-root organizations on AIDS prevention and control have been founded, which have played a model role in intervention in high-risk populations, publicizing and education among the general population, care and nursing of people living with HIV/AIDS, and

promoting all social attentions on HIV/AIDS prevention and control. In recent years with the growth of non-government organizations and social associations, intervention has been also improved from training, publicizing and education activities at the early stages to profoundly mobilizing community participation, intervention in the high-risk populations, and care and nursing of people living with HIV/AIDS. The implementation of international projects and the international organizations in China will be specially illustrated in part 4, International Cooperation on HIV/AIDS in China.

2.2.3 Increasing Public Awareness and HIV/AIDS Education

In 2004, 12 departments including MOH, the Central Public Information Department, the Ministry of Science and Technology, and the Education Ministry jointly launched the HIV/AIDS Prevention Poster Campaign targeting villages and schools. Posters summarizing relevant HIV/AIDS information and HIV/AIDS policies were distributed to 740,000 villages, 50,000 residential committees, 2,100 universities and colleges, and 90,000 middle schools. In addition, MOH, the All-China Women's Federation, and the Central Committee of the Communist Youth League conducted two campaigns: 1) peer education (person to person consciousness raising/classroom and informal communications?) on HIV/AIDS Prevention and; 2) the Youth Red-ribbon Campaign targeting women and youth in model districts.

Other anti-HIV/AIDS initiatives by the government of China included:

- launching a Red-ribbon Campaign among All-China Workers as a joint project by the Labor and Social Security Ministry and the All-China Federation of Trade Unions;
- adding HIV/AIDS materials to the curriculum of the Central Communist Party School and orders to subsidiary schools to do the same in the autumn of 2005;
- placing HIV/AIDS public service announcements in subways, airports and railway stations of large and medium cities by the Ministries of Railways, Transportation, and Civil Aviation;
- implementing the All-China Peasants Health Promotion Campaign by MOH, the Agriculture Ministry and seven other ministries;
- organizing a contest to demonstrate knowledge about preventing HIV/AIDS by the Ministry of Justice. (Participants included 50,000 policemen and 240,000 others who had received compulsory HIV/AIDS education);

In addition, many Community Service Organizations and NGOs took initiatives on their own to increase public awareness about HIV/AIDS prevention and control. According to statistics available, a total of 120 million pieces of printed material have been distributed and 34.9 million people have received training about HIV/AIDS prevention both in the classroom and more informally from peers.

2.2.4 HIV/AIDS Interventions with High-risk Groups

In 2001, the State Council issued *China's Action Plan for Reducing and Preventing the Spread of HIV/AIDS (2001-2005)*. The action plan included three complementary HIV/AIDS harm reduction project. The first project promoted condom use among high-risk populations by ensuring that information about using condoms to prevent HIV/AIDS and STDs was available through the family-planning system. In addition, condom vending machines were placed in public areas. The second project reduced infection rates among IV drug users by promoting the use of sterile needles and syringes. The third project established methadone

treatment pilot sites for IV drug users in community health centers. Health departments and public security departments used these programs to explore the effectiveness of harm reduction approaches in raising HIV/AIDS awareness and conducting outreach to high-risk groups.

2.2.4.1 Pilot Project to Increase Condom Use by Sex Workers

In 2001, two cities, Wuhan in Hubei province and Jingjiang in Jiangsu province, were chosen for a pilot project in disease prevention in conjunction with WHO. The purpose of this project was to test whether 100% condom use could be achieved in places of entertainment. The project resulted in a sharp increase in the rate of condom use among sex workers, followed by a gradual reduction in STD infections. As a result of these early successes, the project was expanded to other cities and provinces. The objective of the China Action Plan for Preventing the Spread of HIV/AIDS was to increase condom use to more than 50% of the members of high-risk groups by the end of 2005.

In October 2004, MOH and the State Population and Family-planning Committee along with four other departments issued *Options for Promoting Condom Use to Prevent HIV/AIDS*. They then conducted an extensive information campaign in the media. This paper specified strategies, methods and departmental responsibilities that must be assumed in order to promote condom use in high-risk places. In 2005, the State Council issued the circular *Improving HIV/AIDS Prevention and Control*, promoting condom use. By the end of 2005, the Center for Disease Prevention and Control (CDC) had established 2,686 outreach groups for those at high-risk. 19,936 workers were offering services to those who were at risk of infection through sexual transmission. In provinces with the highest rates of HIV/AIDS infection, like Hubei, Hunan and Yunnan, the effort to encourage 100% condom use has been intense.

2.2.4.2 Pilot Needle and Syringe Exchange Programs and Methadone Maintenance Treatment for IV Drug Users

In 1999, China launched its first needle and syringe exchange programs. In 2002, a pilot project, which sold inexpensive needles and syringes, was launched in Guangxi and Guangdong provinces. In test areas, MOH officials monitored used needle and syringe collection, while IV drug users bought new sterile needles and syringes in designated pharmacies at discounted prices. At the same time, MOH conducted an HIV/AIDS outreach campaign to warn IV drug users against sharing needles. By the end of 2006, 92 needle exchange projects had been launched in 18 provinces.

In 2002, MOH, the Ministry of Public Security and the State Food and Drug Administration jointly announced pilot projects to provide methadone treatment to IV drug users. In 2003, 8 cities in 5 provinces, including Yunnan and Sichuan provinces, launched methadone treatment pilot projects for IV drug users. MOH and the Ministry of Public Security also established 35 methadone clinics and 50 needle exchange sites. In April of 2004, the national conference on HIV/AIDS was held, at which controversial intervention plans, such as methadone clinics were discussed and debated before being put on the Chinese government's working agenda.

In 2005, the Chinese government established several methadone clinics across the country. By the end of August 2005, 4,410 IV drug users had taken methadone treatment. By the end

of 2005, 128 methadone clinics had been established in 21 provinces, municipalities and autonomous regions. It was reported that by the end of 2006 China had established 320 clinics of this type and that on average one clinic could provide methadone treatments for 200 IV drug users per day. He further stated the goal was to establish 1,500 clinics by 2008¹⁵.

2.2.4.3 HIV/AIDS Education and Awareness Campaigns for the Homosexual Community

The first HIV/AIDS program for homosexual men in China was launched in Beijing in 1991 by Chen Bingzhong and Wan Yanhai, specialists from the Chinese Health Education Institute. These campaigns ended in 1993. In 1998, Dr. Zhang Beichuan, an expert in STDs, along with experts from many other fields and several members the homosexual community, re-launched the program for homosexual men, and expanded it into a multi-dimensional education and promotion project called “Friends.”

In 2002 and 2003, the “Friends” project group hosted two workshops in Beijing championing the concept of “common understanding and suggestion.” These workshops promoted the belief that China should be guided by the scientific understanding that homosexuality is not “deviant or sick” and that homosexuals can play an active role in promoting HIV/AIDS prevention and control.

Since 2000, the Chinese CDC, the Chinese Association of STD and AIDS Prevention, the Chinese Foundation for Prevention of STDs and AIDS, the family-planning department and relevant local departments have conducted many campaigns using three main approaches: 1) In the first approach, experts took the lead and homosexual volunteers were team members; 2) In the second approach, the homosexual volunteers took the lead while the experts provided advice and technical support; 3) In the third approach, the homosexual volunteers operated independently. In Beijing, in 1997, the first ever group of homosexuals was established and officially registered. In 2002, a small health education institute received funding from the China Association of STD and AIDS Prevention, the China CDC, and some international NGOs for HIV/AIDS awareness campaigns targeting homosexuals.

Many of China’s large cities have launched their own HIV/AIDS prevention campaigns to serve their homosexual populations. The first cities to launch the programs were Chongqing and Chengdu. The effectiveness of these campaigns was greatly enhanced by the support of Community Service Organizations. Today, Nanjing, Xi’an and Shanghai are three of the more than 10 cities that are running similar programs.

2.2.4.4 Pilot Project to Block HIV/AIDS Mother-to-Child Transmission

In 2002, MOH, the Center for STD and AIDS Prevention and Control of the China CDC, and the United Nations Children’s Fund (UNICEF) launched a pilot project to prevent mother-to-child transmission. In this project, MOH offered VTC for HIV/AIDS prevention. The results of this approach were used to monitor the rate of growth of HIV/AIDS infections. In 2003, the project served 8 counties in 5 provinces. But based on its success, it was expanded to 271 counties in 31 provinces, municipalities and autonomous regions by the July 2006.

¹⁵Bates Gill, Susan Okie, China and AIDS — the Window of Opportunity, <http://www.ngocn.org/Article/ShowArticle.asp?ArticleID=3887>

2.2.5 HIV/AIDS Intervention, Prevention and Control for Migrant Workers

Providing HIV/AIDS prevention services to migrant workers is an important part of providing HIV/AIDS prevention and control in China. These people are poorly informed about the threat of HIV/AIDS, so they are more likely to engage in high-risk activities and therefore face a higher risk of becoming infected. Migrant workers face unique challenges that set them apart from the general population. With this in mind, a program was designed to meet their needs. Because of the highly transient nature of their work, migrant workers are a contributing to the accelerating spread of HIV/AIDS¹⁶.

In an attempt to improve the effectiveness of prevention work done with migrant workers, the departments of railways, transportation and family-planning sponsored internal HIV/AIDS awareness campaigns, promoted condom use, and provided counseling to migrant workers (Joint Evaluation Report on HIV/AIDS Prevention and Control in China, 2004). In 2001, the Family Planning Association of China, with the assistance of the International Planned Parenthood Federation (IPPF), launched a pilot project to prevent HIV/AIDS infections in the migrant worker population. This project benefited about 400 peasant workers. It should be noted that even though HIV/AIDS interventions and prevention programs for migrant workers are now in place, available resources still lag far behind the real requirements owing to the special nature of this group and the limited resources presently available.

2.2.6 Pilot Project for Anti-Retroviral (ARV) Treatment and Comprehensive Care for Those Living with HIV/AIDS

In 2002, the MOH selected a few counties scattered across the nation with higher rates of infection and established 51 Model Districts for Comprehensive HIV/AIDS Prevention and Control. This project uses mostly domestically-produced pharmaceuticals and focuses on health education, outreach, preventing mother-to-child transmissions and VTC. In 2003, MOH established model districts in another 127 counties of 28 provinces, municipalities and autonomous regions. These were areas with higher rates of infection, where HIV/AIDS was originally introduced through illegal and unhygienic blood collection practices as well as IV drug use. Since their establishment, model districts have offered health education and outreach with high-risk groups. Their campaigns are designed to fit local HIV/AIDS demographics. In the process of achieving some of their goals they have gained valuable experience.

Launched in 2003, the MOH's policy of "Four Exemptions and One Care" has produced promising results. "Four Exemptions" means that those whose lives are affected by HIV/AIDS can receive the following services in locally designated hospitals or clinics free of charge taking medicine and HIV/AIDS treatment; voluntary testing and counseling about HIV/AIDS prevention; pregnancy services, midwife services, treatment to prevent mother-to-child transmission. Psychological counseling and free compulsory education are provided to orphans. "One care" means the government is willing to provide social assistance to those living with AIDS and their families if they encounter economic hardship. At the same time, those who can are encouraged to continue working at income generating activities for as long as possible.

By the end of 2005, ARV treatments were available in 605 counties in 28 provinces,

¹⁶ Ronald Skeldon. Population Mobility and HIV Vulnerability in South East Asia: An Assessment and Analysis. Thailand, February 2000:1.

municipalities and autonomous regions and 20,453 people living with AIDS had received treatment. Simultaneously, treatment with traditional Chinese medicines has also been on the rise. The pilot project for preventing mother-to-child transmission was extended to 135 counties and cities in 28 provinces, municipalities and autonomous regions. VTC services have been expanded from 15 provinces in 2003 to all of China by the end of 2005. 2,850 VTC clinics have been established. A total of 467,287 people have been tested and 6,868 people diagnosed as HIV positive.

The policy of providing free schooling and living assistance to HIV/AIDS orphans has been implemented gradually. According to statistics from the office of the State Council Committee for HIV/AIDS Prevention and Control, China has 8,644 children orphaned by HIV/AIDS. Among these, 4,730 children are school age and 4,387 are receiving free schooling. Their school attendance rate is 92.71%, close to the overall Chinese average of 98.93%.

In August of 2004, the Ministry of Civil Affairs published the circular *Increasing Assistance to People Living with HIV/AIDS, Their Family and Children Orphaned by HIV/AIDS Who Have Living Difficulties* and set aside money to subsidize families caring for HIV/AIDS orphans. Governments, at all levels, also provided assistance to HIV/AIDS orphans in other ways, including fostering, sponsoring, assistance with school fees and new orphanage construction.

As can be seen, the above State Council documents provide only working guidelines. At the national level, detailed policies were later developed by the Ministry of Civil Affairs, which had been given the mandate by the State Council HIV/AIDS Prevention and Treatment Committee to come up with social assistance policies for HIV/AIDS families and orphans¹⁷. In May 2004, the Ministry of Civil Affairs issued the *Announcement about the Provision of Social Assistance to Those Living with HIV/AIDS, Their Families, Orphans and Elderly Dependents*. This document included substantial policy guidelines and is still the major document guiding current social assistance policy and services available to those living with HIV/AIDS in China.

The solution of the Ministry of Civil Affairs was to include all those who are financially unable to provide for themselves as a result of HIV/AIDS into the current social assistance schemes. Those who receive coverage include; the infected, as well their orphans and elderly dependents left financially vulnerable as a result of the death of family breadwinners. Over the years, government officials responsible for rural China have developed several social assistance schemes, including cash transfer and services, targeted at poor rural households. However, the benefit levels are generally low and coverage very limited.

More specifically, the Ministry of Civil Affairs's 2004 Announcement included four measures to assist those affected by HIV/AIDS:

- 1) Those infected with HIV/AIDS and their families, including orphans and childless elderly dependents with no other children should be prioritized for receiving regular social assistance.

- 2) Assistance should be provided in accordance with the current social assistance policy framework. In areas where the Minimum Income Guarantee Scheme (Dibao) has been established, families that fall into poverty (based on locally defined poverty thresholds) as a result of HIV/AIDS infection should receive coverage from the scheme. In places where Dibao has not yet been launched, those infected with HIV/AIDS and their families should be eligible for regular assistance from the Assistance for the Extremely Poor Households Plan (Tekun). Finally, the Medical Financial Assistance scheme (MFA) should also be made available to those who need medical services other than the four free services.
- 3) The government of China encourages relatives, or villagers, to provide foster care to orphans. Relatives make the best foster parents for HIV/AIDS orphans. The second best option is family foster care. Under this arrangement, local government officials are required to adhere to guidelines laid down in the Temporary Methods for Administering Family Foster Care, which was issued by the Ministry (of Civil Affairs?) in 2001. This document contains detailed procedures and requirements for selecting, monitoring and providing subsidies to foster families. In the third option, local government officials are required to establish (care facilities/orphanages?) within local communities to look after orphans when the above two options are not possible. Orphanages should have a homelike atmosphere and are required to provide both the necessities of daily life and opportunities for education. Local governments are allowed to integrate care of orphans into homes for seniors, thereby reducing costs by providing care collectively. This arrangement is also subject to the Regulations on the Rural Five Guarantees passed in 2006. Priority is given to elderly persons who are facing hardship because of the death of a family breadwinner and who have no other children to care for them.
- 4) Finally, local government officials are encouraged to seek international donors (governments and NGOs) to help care for orphans.

2.2.7 Creating a Monitoring System for HIV/AIDS

In 1995 with help from WHO, MOH and CDC established 42 national monitoring centers in 23 provinces. In 2002, the number of centers was increased to 158, then to 194 in 2003 and 247 in 2004. By the end of 2005, 329 national monitoring centers and 400 provincial monitoring centers had been established, providing coverage to most of the key population areas. In addition, 57 diagnostic and 3,756 screening test laboratories had been set up to conduct epidemiological screening tests in key population areas. Finally, VTC services for HIV/AIDS have been expanded to 31 provinces, municipalities and autonomous regions and 2,850 clinics have been established.

China created the Direct Network Reporting System for HIV/AIDS in order to improve the quality and the timeliness of HIV/AIDS incidence rate reporting. It is based on the Chinese CDC's information system. The system covers 31 provinces, municipalities and autonomous regions and the Xinjiang Product and Construction Corps by the year 2005.

2.2.8 Promoting HIV/AIDS Prevention and Control through Laboratory Research

A great deal of basic and applied research into HIV/AIDS is being conducted in both regional and national government laboratories across China, including: nationwide epidemiological,

research towards developing a vaccine for HIV/AIDS, and reexamining traditional Chinese medicines in the search for non-toxic drugs.

In addition, laboratory monitoring networks have been developed with a view towards establishing a multilayered network across China. The Chinese government has funded major scientific research projects on HIV/AIDS prevention in areas with high infection rates, while establishing research centers in Henan and Yunnan provinces to conduct research into HIV/AIDS treatment methods, new pharmaceuticals, vaccines, epidemiology, testing reagents, as well as conducting clinical studies for new pharmaceuticals. The above measures have largely driven the story of HIV/AIDS prevention in China.

2. 3 Challenges Facing HIV/AIDS Prevention and Control in China

The Chinese government and the Chinese people themselves have worked very hard at HIV/AIDS prevention in recent years. They have made obvious progress, but unfortunately the HIV/AIDS rate of infection is still accelerating and the capacity to prevent or even limit the spread of HIV/AIDS remains weak. There are still a series of challenges that are slowing the fulfillment of key objectives in China's Medium-and Long-Term Programs for the Prevention and Control of AIDS (1998-2010) and the Action Plan for HIV/AIDS Prevention and Control in China (2001 to 2005). If a solution is not found, an HIV/AIDS pandemic in China is inevitable.

2.3.1 Lack of Government Leadership and Coordination

Although governments at different levels have paid lip service to the concept of unified leadership and coordination in the fight against HIV/AIDS, the government's response needs to become much more effective because of the increasing urgency of the problem. A major lack of coordination and cooperative action amongst different levels of government still exists and needs to be addressed.

A powerful political commitment by governments at all levels is necessary if the spread of HIV/AIDS is to be prevented. Unfortunately, some government leaders have been more concerned about economic development in recent years. They have not recognized the extent of the harm being caused by HIV/AIDS. Some leaders, in China's central government, do not understand the importance of HIV/AIDS prevention and control. As a result, the multi-department approach to HIV/AIDS prevention has not been sufficiently implemented. This is especially true at the city and county levels. In addition, some government departments do not have effective internal communication and cooperation.

Though the Chinese government's commission on HIV/AIDS prevention and control has been established, the next necessary step has not yet been taken. China's top leaders must establish a powerful mechanism of multi-department planning and coordination. The absence of such a mechanism means that the battle against the spread of HIV/AIDS is not as effective as it could be. Because local and county governments have not yet recognized the seriousness of HIV/AIDS, their approach is departmentally and regionally fragmented. Many government departments still believe that responsibility for HIV/AIDS belongs to MOH. Attitudes like these severely hamper multi-department cooperation.

2.3.2 Lack of a System to Educate the Public about HIV/AIDS

Unfortunately, there is a huge gap between what MOH as well as professionals and volunteers directly involved in the fight against HIV/AIDS are seeing and what is actually happening in too many sectors of Chinese society, in too many regions of the country. The Chinese people are, for the most part, poorly informed about preventing the spread of HIV/AIDS and discrimination is still widespread in certain parts of China. Only certain parts of the country are receiving adequate and accessible information about preventing HIV/AIDS.

Most efforts at increasing public awareness about HIV/AIDS are concentrated in the larger and medium urban centers, once a year, on World AIDS Day. This may be a small step towards sensitizing city dwellers to the risk posed by HIV/AIDS, but little is being done in the vast rural areas of China. The few public awareness campaigns that exist lack content, style and focus (such as promoting condom use and not sharing needles). They are largely targeted at the educated Han, while ignoring the different cultural context of ethnic minorities. At the moment, there are no practical, effective methods for increasing awareness about HIV/AIDS among ethnic minorities or in poor outlying areas. Since public awareness campaigns do not recognize the special needs or capacities of these groups, with their higher rates of HIV/AIDS infection than the general population, infection rates continue to climb year after year. Although offering health education through the school system has succeeded in a few pilot areas, coverage is far from nationwide. The program of HIV/AIDS prevention in entertainment venues has shown little success and efforts to increase awareness about HIV/AIDS among the huge population of migrant workers have barely begun.

2.3.3 Monitoring of HIV/AIDS Should be Promoted

Although real progress has been made in establishing a Chinese monitoring system for HIV/AIDS, its coverage and effectiveness still needed to be improved, as the majority of people living with HIV have yet to be identified. According to the *Evaluation Report on Progress in HIV/AIDS Incidence Rates, Prevention and Control in China* published in 2006, 141,000 people were tested HIV positive in 2005, a figure that was 510,000 less than the estimated 650,000 infections. It is what the people of China do not know that is killing them. This gap indicates the pressing need to educate the public about the importance of getting tested. Furthermore, such campaigns need to involve more people in more sectors of society. Taking such practical, methodical steps is the only way to be successful in preventing the current HIV/AIDS epidemic from becoming a pandemic.

2.3.4 The Scale of Interventions to Change High-risk Behaviors must be Increased

After successful pilots, some HIV/AIDS awareness campaigns in key population centers have been expanded to serve the wider community, but coverage is limited. Future campaigns need to be better financed if they are to continue. In some areas, awareness campaigns involving high-risk groups are still in the trial stage and involve only a limited number of people. A national policy and support structure for these campaigns is still sorely lacking. While the responsible departments continue to argue over who should be doing what, Chinese citizens continue to get sick and die.

2.3.5 Implementing and Supervising HIV/AIDS Policies and Plans

Some national departments and local governments demonstrate little awareness about HIV/AIDS and its impact on society. They have not fully understood and implemented the

policies and directives issued by the State Council, resulting in more and more people becoming sick and suffering without government support. At the same time, because of a lack of appropriate supervision and evaluation (where supervision is provided, it often has no teeth), a number of provincial and municipal governments and state departments have only partly implemented the mandated HIV/AIDS prevention and care policies and services.

The 2006 Progress Report on HIV/AIDS Incidence Rates, Prevention and Control in China issued reveals that the policy of “Four Exemption and One Care” is implemented unevenly around the country. Coverage is more complete in areas with higher rates of infection and poor in some secondary areas, where people living with HIV/AIDS do not receive timely ARV treatments and HIV/AIDS orphans are not receiving living assistance or school fee exemptions. The majority of those infected through IV drug use are not getting methadone treatments.

2.3.6 Improving HIV/AIDS Related Policies, Regulations and Laws

Since 1985, different levels of government and relevant departments have issued a series of policies, regulations and laws. However, with the implementation of best practices to fight HIV/AIDS and growing public awareness about the disease, some departments that played major roles in the past, no longer support best practices and a few have even adopted practices that run counter to the current HIV/AIDS prevention strategy. To complicate matters, some local policies undermine those of the central government. Out of date and contradictory policies, regulations and laws that impede the implementation of best practices are proving very harmful to efforts to prevent the spread HIV/AIDS and care for those who are already infected.

2.3.7 Challenges Facing Comprehensive Care and Treatment for HIV/AIDS

Though the state has established Model Districts for Comprehensive HIV/AIDS Prevention and Control, there are still vast rural areas of China where poverty is still prevalent. These are areas where services offered by first tier medical institutes are weak, medical resources are limited, and primitive, outdated medical systems have largely blocked progress in HIV/AIDS care and treatment. Though ARV pharmaceuticals are increasingly available, often the appropriate drugs are not available, or not available in adequate quantities. Frequently, the treatment programs to administer them do not exist. Far too many people are infected without receiving effective treatment.

There are not nearly enough professional health workers involved in the campaign to prevent the spread of HIV/AIDS and not all health workers involved in the campaign have the necessary skills. In many areas, they are not allowed to offer VTC services, so many infected people are not being identified early enough to receive appropriate medical services. In addition, the high cost of medical treatment also prevents some infected people from seeking assistance. The result is that these people continue to infect others and suffer without support.

In what is supposed to be comprehensive system of care and treatment for HIV/AIDS, a lack of integration of policy and initiatives is too often the norm among health service institutes, as well as among MOH and the departments of family-planning, education and poverty relief at national and local levels.

It is also extremely challenging to implement anti-HIV/AIDS measures among China’s 120

million migrant workers. These people are generally poorly informed about HIV/AIDS prevention and control. In addition, under current policies, a residence card is usually required to qualify for access to medical benefits and services. As a result, China's migrant workers are totally excluded from the system and do not receive critical information about how to avoid contracting HIV/AIDS, or caring for those who have already become infected. Policy and service disconnects such as these only accelerate the speed at which HIV/AIDS is spreading (MOH, the Evaluation Report on Progress in HIV/AIDS Incidence Rates, Its Prevention and Control in China, 2006).

2.3.8 Serious Discrimination against Those Living with HIV/AIDS is still Widespread

Today, discrimination against those living with HIV/AIDS is widespread and very serious. Many of the infected receive no social support. Even some medical workers discriminate against those infected with HIV/AIDS. Cases have been reported where medical clinics refused care and support to people suffering from HIV/AIDS.

2.3.9 Increasing Investment of Resources and Improving Fund Management

At the present time, available resources lag far behind what are required. Although the Chinese government and international donors have greatly increased their funding commitments to the fight against HIV/AIDS in China, the chasm that still exists between the resources required and the resources actually needed is gaping. Not only does China have a huge population, but in spite of the many initiatives to slow the spread of HIV/AIDS, the number of people infected continues to accelerate every year. In 2004, experts estimated that the minimum investment required to be effective in the fight against HIV/AIDS was 3.1 billion Yuan. The total funding provided by the Chinese government and international donors was only 1.26 billion Yuan, far short of this amount.

Finally, fund management must be improved to make funding distribution more equitable. Some areas receive many resources from multiple sources, but lack a capacity for comprehensive planning, spending, or managing. This means that even areas with adequate resources are not experiencing the results they should. At the same time, those areas which currently have lower incidence rates are not receiving the funds necessary to implement the monitoring services urgently needed if they are to prevent the spread of HIV/AIDS. Currently, there are no effective mechanisms to guarantee financial resources for local governments, yet they are the primary service providers.

Chapter 3: International Efforts to Prevent and Control HIV/AIDS

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3.1 Profile of international cooperation on HIV/AIDS

China has actively cooperated with international organizations and supportive countries on HIV/AIDS prevention and control, receiving a great deal of funding and technical support from the latter. Currently, international cooperative projects on HIV/AIDS prevention and control have served 31 provinces (municipalities and autonomous regions.) Among these, Yunnan, Guangxi, Xinjiang, Sichuan and Shanxi are the key provinces. These international cooperative projects usually give priority to group development, policy making, strategic planning and multi-department cooperation at the central level. They also stress capacity-building, comprehensive HIV/AIDS prevention and control, monitoring and testing, while offering care and support at the local level. Various international organizations sponsor projects that have a variety of different focuses.

There are two main types of organizations that work with China on HIV/AIDS projects: Multilateral organizations (the United Nations (UN), the World Bank (WB), the World Health Organization (WHO), and the World Red Cross are examples) and bilateral organizations (including the Australian Government's overseas aid program (AusAID) and UK Department for International Development (DFID).) These organizations have worked with the Chinese government on comprehensive HIV/AIDS prevention and control projects and conducted several relevant projects since the mid-1990s. International non-government organizations have also played an important role in international cooperation on HIV/AIDS.

3.1.1 Cooperation with Multilateral Organizations

The Chinese government has effective long-term cooperation with many multilateral organizations concerning HIV/AIDS prevention and control. The multilateral organizations of the United Nations are the major partner, these include; the United Nations Development Program (UNDP), the World Bank (WB), the World Health Organization (WHO), the United Nation Children's Fund (UNICEF), the United Nation Fund for Population Activities (UNFPA) and the Joint United Nations Program on HIV/AIDS (UNAIDS). All of these organizations have worked with relevant departments of Chinese government on behavior intervention, law and policy making and reducing mother-to-child transmissions.

The following sections outline projects launched in China by some major multilateral organizations. These are in chronological order according to their launch dates.

3.1.1.1 The World Bank (WB)

It was in 1999 that the World Bank adopted HIV/AIDS prevention and control as a major health initiative when it launched the ninth project in conjunction with the Health Ministry of China (Health IX). The purpose of this initiative was to find effective models for STD/HIV

prevention and control in China. A five prong approach was adopted, which included policy development, institution building, intervention and surveillance of STD/AIDS, as well as administration of blood products and projects nationwide. Health IX provided practical funding for HIV/AIDS prevention and control in Fujian, Guangxi, Xinjiang and Shanxi provinces. At the state level, Health IX funded the Center for HIV/AIDS Prevention and Control, including support for the National AIDS Reference Laboratory. It also provided funding to promote policy development, capacity building, blood safety as well as preventing and controlling HIV/AIDS among high-risk populations and vulnerable groups in China. With grants from the Australian and Japanese governments, the Health IX also established a foundation to encourage participation of non-governmental organizations in response to HIV/AIDS. In the first phase, the project subsidized 20 sub-projects launched by non-governmental organizations. Project missions included interventions to change high-risk behavior of vulnerable population's (sex workers, drug users and the migrants, as well as providing care and support to people living with HIV/AIDS. The specific projects involving World Bank will be described in a later part of this report (refer to 3.1).

3.1.1.2 The United Nations Development Program (UNDP)

The UNDP has focused on establishing a multilateral system of cooperation in China to respond to the spread of HIV/AIDS. The primary objective of this system is to construct a favorable policy and legal environment to protect the rights of people living with HIV/AIDS. The UNDP began its cooperative effort with the Chinese government in 1993, when the UNDP, along with seven ministries and the State Economic and Trade Commission, jointly launched projects to prevent and control HIV/AIDS in Fujian, Guangdong and Hainan provinces. Activities mainly focused on training staff of relevant departments at the central and provincial government levels, guiding policy making and establishing a Training Center for STD and AIDS in Shanghai. The UNDP called for the active participation of China's top leaders and launched a series of workshops on HIV/AIDS policies and laws. In addition, UNDP has reduced the negative impact of HIV/AIDS on economic development and integrated anti-AIDS initiatives with poverty relief activities in communities and villages by launching care, prevention and poverty relief projects at the community level. Through training and publications, the UNDP, has increased awareness of HIV/AIDS and helped the permanent and migrant worker population to take effective scientific steps to respond to AIDS. The UNDP has also made great efforts to promote the Greater Involvement of People Living with HIV/AIDS program (GIPA).

3.1.1.3 The World Health Organization (WHO)

The World Health Organization's primary objective in relation to HIV/AIDS is to strengthen the Chinese Department of Health's capacity for prevention and control, by increasing the effectiveness of measures aimed at reducing its spread. WHO began cooperating with the Chinese government in 1994, mainly by providing surveillance of HIV/AIDS in the community, as well as treatment and care after infection. In order to provide better information for policy makers and improved surveillance of HIV/AIDS, WHO assisted health departments of different levels of government to establish monitoring stations.

Starting with the "3 by 5" Initiative¹⁸, WHO made a series of offers of assistance to China

¹⁸ The "3 by 5" initiative, launched by UNAIDS and WHO in 2003, was a global TARGET to provide three million people living with HIV/AIDS in low- and middle-income countries with life-prolonging antiretroviral treatment (ART) by the end of 2005. It was a step towards the GOAL of making universal access of HIV/AIDS prevention and treatment accessible for

aimed at providing improved care and treatment for people living with HIV/AIDS. In 2001, WHO launched the *100% Condom Usage Project* (CUP) targeted at sex workers and their clients. This project was undertaken jointly with the Chinese Health Ministry, who provided funding and technological support. (The project has been rolled out nationally since then).

When the Chinese government adopted “harm reduction” as an effective measure against HIV/AIDS, WHO assisted in the development of the national plan of harm reduction, including a needle and syringe exchange program (NSP) and Methadone Maintenance Treatment (MMT) for drug users. In recent years, WHO’s mission in China has included advocating, supporting and implementing projects to prevent the spread of HIV/AIDS among homosexual men and provide them with services. WHO has prioritized the introduction of effective practices of prevention from outside China, improving STD services nationally and providing sexual education and care infection to young people.

3.1.1.4 The Joint United Nations Program on HIV/AIDS (UNAIDS)

As the major advocate and leader of HIV/AIDS prevention and control worldwide, UNAIDS established its office in China in 1996. UNAIDS focuses mainly on coordinating, providing support, advocating, exploiting resources and providing funding for HIV/AIDS prevention and control in China. Since 2000, UNAIDS has worked with many relevant government departments to improve the Chinese government’s response to HIV/AIDS and promote measures to reduce HIV/AIDS discrimination.

3.1.1.5 The United Nation Children’s Fund (UNICEF)

UNICEF, whose mission is to protect and promote the rights of the child, was the first international organization authorized by the Chinese government to manage the collections of funds. In 1996, UNICEF began working with the Chinese government on policies and health education aimed at HIV/AIDS prevention and control. These projects focused mainly on preventing mother-to-child transmission, reducing the social and economic impact of HIV/AIDS on orphans, vulnerable children and their families, educating school and pre-school children, and increasing public awareness about HIV/AIDS prevention. In 2001, UNICEF worked with the Chinese Ministry of Health to launch the first trial projects aimed at preventing mother-to-child transmission in Shangcai county of Henan province. By July 2006, the pilot areas for these projects had grown to include 271 counties and cities in 31 provinces (municipalities and autonomous regions). Successful prevention of mother-to-child transmission can effectively reduce the rate of mother-to-child infection, leading to a greatly improved quality of life for both mother and child.

3.1.1.6 The United Nations Fund for Population Activities (UNFPA)

The primary area where UNFPA cooperates with the Chinese government is in preventing HIV/AIDS through the Chinese family-planning service network. UNFPA provides guidance for high-level policy setting as well as supporting increased awareness and the dissemination of information about HIV/AIDS to community workers and the general population. In 2001, the Ministry of Railways invited UNFPA to provide technical support for an HIV prevention project. In 2003, UNFPA worked with the Chinese Ministry of Health to launch *The Comprehensive HIV/AIDS Prevention and Control Project* in a trial district. The goal of this

project was to increase the skills of policy makers, project managers and project participants. In the same year, UNFPA assisted the Medical Device Development Center of the State Family-planning Commission with condom quality control, lab testing and finding new sources of funding.

3.1.1.7 The Global Fund to Fight AIDS, Tuberculosis (TB) and Malaria (the Global Fund)

The Global Fund was established in 2002 to increase the capacity of aid-recipient countries to respond, through effective resources collection and allocation, to three global diseases, AIDS, tuberculosis and malaria. Special priorities included funding, technology and area of coverage. Progress to date includes: the third phase of the project *China CARES (China Comprehensive AIDS Response) – A Community-Based HIV Treatment, Care and Prevention Program in Central China (2004 – 2009)*, the fourth phase of the project *Reducing HIV Transmission Among Vulnerable Groups and Reducing the Impact of HIV in Seven Chinese Provinces (2005 – 2010)*, and the fifth phase of the project *Preventing a New Wave of HIV Infections in China (2006 – 2011)*. These projects have been launched in 21 provinces (municipalities and autonomous regions). Each phase has a different focus and areas of coverage and recognized the different regional rates of HIV/AIDS infection in China. These three-phase projects have played an important role in providing care and treatment to people living with HIV/AIDS in high-risk areas, as well as preventing further spread of the disease. The specific description of the three phases of the project will be discussed later in this report (Refer to 3.2).

3.1.2 Cooperation with International Bilateral Organizations

In addition to the ventures mentioned above, the Chinese government is also involved in several successful bilateral technical projects with the European Commission, Australia, the United Kingdom, the United States, Germany, Japan and Luxemburg.

- The European Commission, along with the Ministry of Health and the Ministry of Foreign Trade and Economic Cooperation, began cooperating on HIV/AIDS prevention and control in 1995, and launched an HIV/AIDS training project in 1999.
- The China/UK Urban Health and Poverty Project (UHPP) was launched in 2000. The British government provided 15.3 million pounds over five years to focus on STD and AIDS prevention, control and monitoring in Yunnan and Sichuan provinces. The purpose of this project was to prevent the spread of HIV/AIDS and increase response effectiveness. This project is China's largest bilateral project between governments on HIV/AIDS.
- In 2002, *The Asia Regional HIV/AIDS Project (China/Australia)* was launched in Yunnan and Guangxi provinces. In the same year, *The China Integrated Programs for Research on AIDS (CIPRA)* was given a five-year grant by the National Institutes of Health (USA) began operations in Yunnan and Shanxi provinces.
- In June 2002, China and the United States signed a memorandum of understanding on HIV/AIDS cooperation. The agreement covered the development of new prevention approaches and measures, AIDS vaccine research, diagnostic methods and curative drugs, and monitoring of HIV/AIDS epidemic, thus to iatrogenic HIV/AIDS spread.

- In 2002, *The China/USA Integrated Programs for Research on HIV/AIDS (CIPRA)* was officially launched. This is the largest HIV/AIDS related cooperative project between China and the United States. Over the five-year term of the project, the United States has agreed to provide 150 million dollars for epidemiological monitoring, curative drug research and the development of an HIV/AIDS vaccine.

3.1.3 Cooperation with International Non-government Organizations

In addition to multilateral and bilateral organizations, several international non-governmental organizations, including; the Ford Foundation, Doctors without Border/Médecins Sans Frontières (MSF), Save the Children (UK), The Salvation Army, The Australian Red Cross, and The Amity Foundation have launched many programs in China. Projects have a variety of objectives including: increasing the capacity of government departments and local governments to provide education, preventing and controlling HIV/AIDS; offering living skills training and partner education to youth; providing poverty relief and HIV/AIDS care; involving people living with HIV/AIDS in taking action against discrimination; assisting with strategic planning, developing national strategies to encourage condom use and related prevention work among high-risk populations; involve the mass media in educating the public about HIV/AIDS; monitoring of STD and AIDS rates of infection. In addition, some institutes and organizations have launched community development projects targeting people living with HIV/AIDS in areas with high rates of infection. Initiatives were made in the areas of poverty relief, support of education, nutrition, living and health (*Joint Evaluation Report on HIV/AIDS Prevention and Control in China, 2003 and 2004*).

At the global and Asia-Pacific conferences on HIV/AIDS, the Chinese government championed many its policy improvements for tackling HIV/AIDS prevention and control in China hoping to win international understanding and support. Currently, international cooperative projects focusing on HIV/AIDS prevention and control are serving 31 provinces (municipalities and autonomous regions).

3.2 Details of Some International Co-operations on HIV/AIDS

3.2.1 World Bank

3.2.1.1 Past Projects

World Bank funding for the China Health Projects (Five, Six, and Seven,) with each project devoting some resources to HIV/AIDS prevention and control, has long ended. However, the impact of these efforts remains. The goals and the final outcomes of the China Health Projects are profiled below.

3.2.1.1.1 China Health Project Five – Infectious and Endemic Disease Control Project

Spanning the period from December 1991 to June 2002, China Health Project Five aimed largely at reducing the occurrence of tuberculosis and schistosomiasis. The World Bank allocated \$2.7 million in funding for research into improved surveillance and control of HIV and other sexually transmitted diseases (STD). The total project cost, including finances provided by the World Bank and other sources, was \$271 million. The project led to the

creation of 42 sentinel surveillance sites in 23 provinces, which conducted HIV/AIDS population surveys twice annually. These surveys were critical in gaining a more accurate estimate of HIV/AIDS rates of infection and led to the development of HIV/AIDS subprograms in China Health Project Seven. Of the funding provided for surveillance, \$2 million came from the International Development Association (IDA), and \$700,000 from the Chinese government.¹⁹ \$520,000 of the funding allocated for surveillance was used for material procurement, while \$960,000 was used for consultants, studies and overseas training for staff.²⁰ \$480,000 of the total was used specifically for STD treatment and operational research, surveillance, evaluation and monitoring²¹.

3.2.1.1.2 China Health Project Six – Comprehensive Maternal and Child Health

The China Health Project Six was implemented between January 26th, 1995 and June 30th, 2002. The total project cost amounted to \$139 million, with \$90 million provided by the World Bank²². \$400,000 of this was specifically allocated for STD treatment and staff training in STD treatment during pregnancy²³.

3.2.1.1.3 China Health Project Seven – Disease Prevention

The China Health Project Seven ran between December 1995 and June 2004. Including finances provided by the World Bank and other sources, the total project cost amounted to \$162.6 million. The funding distribution to the four main sectors of the project was divided as follows: \$2.12 million for institutional development and policy reform; \$1.51 million for human resources development; \$5.60 million for surveillance, and \$13.21 million for interventions.

One of the project's two major goals was health promotion. In particular, the project aimed to improve the capacity of health-related professions to create effective programs for prevention and control of STDs, HIV, and other infectious diseases. The cost to achieve this goal was originally estimated to be \$22.43 million, with the IDA expected to contribute \$10.88 million and the Chinese government expected to provide the remaining \$11.55 million. The health promotion component of the project received \$22.25 million in funding²⁴. The IDA provided \$9.60 million, and the Chinese government contributed the remaining \$12.65 million. \$480,000 of the total budget was targeted for HIV/AIDS-related health promotion work. These funds were primarily used for promoting the use of condoms, STD treatment, targeted and mass-media information, education, and communication (IEC), and operational research, surveillance, evaluation and monitoring.²⁵

The STD/HIV component of this project to promote health was launched in Beijing, Chengdu, Liuzhou, Luoyang, Shanghai, Tianjin, Weihai, and Yunnan Province. At the conclusion of the project in 2002, the Behavior Risk Factor Surveillance Survey (BRFSS) was widely adopted,

¹⁹ World Bank. *Implementation Completion Report on Credit in the Amount of SDR 95.9 million to the People's Republic of China for an Infectious and Endemic Disease Control Project*. December 27th, 2002. pp. 13-14

²⁰ World Bank. *Infectious and Endemic Disease Control Project Between the People's Republic of China and International Development Association*. December 23rd, 1991.

²¹ Julia Dayton. *World Bank HIV/AIDS Interventions, Ex-ante and Ex-post Evaluation*. June, 1998.

²² World Bank. *Implementation Completion Report on a Credit in the Amount of SDR 61.9 million to the People's Republic of China for a Comprehensive Maternal and Child Health Project (Health VI)*. February 14th, 2003.

²³ Julia Dayton. *World Bank HIV/AIDS Interventions, Ex-ante and Ex-post Evaluation*. June, 1998.

²⁴ World Bank. *Staff Appraisal Report: China Disease Prevention Project*. November 8th, 1995.

²⁵ Julia Dayton. *World Bank HIV/AIDS Interventions, Ex-ante and Ex-post Evaluation*. June, 1998.

with data in some regions being used to fine-tune future programs, or provided to the media. Reforms for reporting cause-of-death were also instituted. Methods and materials for promoting health were developed and personnel were trained in disease prevention and management. This project also helped increase awareness of the importance of health promotion within the government and among policy-makers. This project marked the first time that international policies and theories were applied within the Chinese context for promoting health. Staff training and the development of training materials will help to ensure project sustainability.

This project has major effects on public education. While personnel trainings were successful and standard treatment protocols were adopted, other areas experienced less success. Challenges to the STD/HIV project included the limited impact of the public education component. The final report cited difficulties in accessing high-risk population groups for prevention. Public knowledge of the real methods of transmission was high, but situations with no risk, such as shaking hands, were also widely believed to be vectors for transmission. The project did help to reduce these misunderstandings, and increase awareness of the value of condom use in risk reduction. It is hoped that the education provided in this component will lay the foundation for future prevention work.²⁶

3.2.1.2 Current Project

Lessons learned from the STD/HIV components of China Health Projects Five and Seven helped in the development of China Health Project Nine, which is still ongoing. The goals and achievements of China Health Project Nine to date are summarized here.

3.2.1.2.1 Profile of China Health Project Nine

Originally expected to last from August 1999 to June 2006, this project has been extended until June 2008. The World Bank is providing a \$10 million loan through the International Bank for Reconstruction and Development (IBRD), and an equivalent credit of \$50 million through the IDA to finance the project. The total cost is expected to amount to \$100 million. The Chinese government will contribute the remaining \$40 million. To date, the IBRD has disbursed \$4,210,448 and \$40,176,136 has been disbursed by the IDA. One of the project's three primary objectives is to improve prevention and control of HIV/AIDS/STDs. The total cost of this component of the project is expected to be \$27.17 million.

This sub-project has been implemented in four provinces: Fujian, Guangxi, Xinjiang, and Shanxi. It targets the populations most at risk for contracting HIV/STDs, including; sex workers, intravenous drug users, donors of commercial blood products and the migrant population. 1-2% of the population in these provinces is considered to be at high risk for contracting HIV. Effective prevention methods and strategies developed in these provinces will help the government to establish a more effective nationwide approach to HIV prevention in future.

3.2.1.2.2 Goals of China Health Project Nine

The project targets four specific areas:

²⁶ World Bank. *Implementation Completion Report on a Credit in the Amount of US \$100 million to the People's Republic of China for a Disease Prevention Project*. June 27th, 2005.

- \$7.37 million will be allocated to improve the safety of blood handling services. Changes include: moving to a better-resourced blood donor program using volunteers; implementing measures to assure the quality of blood products; establishing blood transfusion guidelines for clinics; and money for training for blood services staff.
- \$5.35 million will be used to: improve surveillance of the epidemic and monitor trends in high risk behaviors; collect data to provide project direction and influence policy; assess the effectiveness of interventions using data on the rate of occurrence of HIV in blood samples and monitor the projects impact on high-risk behaviors using surveys.
- \$11 million has been earmarked to improve the effectiveness of interventions to reduce high-risk behaviors interventions and a program of public education. Measures include; condom promotion, patient care and support, and improved STD treatment.
- \$3.49 million has been allocated to improve the policy environment, increase public receptivity and facilitate prevention work by raising awareness; integrate STD treatment with existing health services; support syndrome management policy; and strengthen collaborations among NGOs and the public and private sectors.

For these goals to be achieved, a number of policy reforms must be instituted. The confidentiality of HIV/STD patients must be maintained (Because of concerns about confidentiality many people prefer to receive testing from private rather than government clinics.) However, the government must seek to prevent STD treatment by untrained, unqualified individuals. Outreach to commercial sex workers (CSW) and their clients must be undertaken. Harm reduction programs for intravenous drug users (IDU) need to be instituted. Sex and health education programs must be implemented in schools. These policy changes will ensure that messages of prevention reach the populations most at-risk, and that anyone can access testing and treatment services without fear of social consequences. All of these measures are integral to the success of the project.²⁷

3.2.1.2.3 Achievement of China Health Project Nine

Improvements to the blood collection and transfusion program will benefit everyone who receives or donates blood. Testing blood will eliminate this vector for the disease. This is particularly significant for Shanxi province where most HIV infections result from contaminated blood. The government is also attempting to reduce the number of unnecessary blood transfusions, a goal that will be supported by this project.

The capacity of provincial and national institutions to develop and implement prevention programs will be strengthened as a result of participation in this project. The national HIV/AIDS laboratory will develop techniques to improve testing accuracy, and train laboratories around the country in these practices.

The June 2006 progress report on the status of projects already underway stated that the policy environment in China has changed. It is now more open to HIV/STD prevention work.

²⁷ World Bank. *Project Appraisal Document on a Proposed Loan of US\$10 million and a proposed credit of SDR 36.8 million to the People's Republic of China for a Health Nine Project*. April 14th, 1999

100% condom use programs have been instituted, needle exchange sites and methadone clinics have been established, STD treatment has been standardized, and messages aimed at reducing stigma and discrimination have been circulated. The program has received support from upper-levels of government, enabling its continued success.²⁸

3.2.2 The Current Global Fund Program to Fight AIDS, Tuberculosis and Malaria

3.2.2.1 Global Fund (Round 3) – China CARES

The Global Fund provided financial support to China Comprehensive AIDS Response (China CARES) through the third round of its projects worldwide. The project, scheduled to run from 2004-2009, aims to raise HIV/AIDS awareness among the population and politicians, offer information and prevention services, and provide anti-retroviral therapy to HIV/AIDS patients in 56 counties in 7 provinces: Anhui, Hebei, Henan, Hubei, Shaanxi, Shandong, and Shanxi. Most HIV cases in these provinces originated from infection during commercial blood donation. As the infections occurred prior to 1996, those infected are now in urgent need of treatment as HIV has progressed to AIDS. The funding for this project focused on 8 main objectives, plus funds for monitoring and evaluation. All eight objectives, funds promised and what was actually provided, along with results reported are described below.

3.2.2.1.1 Funding

\$97,888,170 in funding was approved for this project to be disbursed over two phases. The first phase, lasting from September 2004 to August 2006, was expected to receive \$32,122,550 in funding.²⁹ \$35,885,778 was actually provided. The difference was due to additional funding allocated early to help launch the second phase³⁰. An additional \$65,765,620 has been promised for Phase 2, projected to last from September 2006 to August 2009.³¹ Figure 3 shows expected and actual disbursements from September 2004 to August 2006 and expected disbursements from September 2006 to August 2009. Co-financing from the central government, provincial governments and other organizations, such as UNAIDS, is expected to cover half to two-thirds of total project costs³². Total contributions requested *per annum* from the Global Fund, and pledged contributions from other sources for the project, have been summarized in Table 3.1.

Table 3.1 – Financing and Co-financing of the Global (Round 3) Project in China, in US\$ Thousands

Funding Sources	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Global Fund	11,427	20,696	21,818	24,794	19,154	97,888
Other Sources	17,477	22,277	27,100	35,500	44,400	146,754
Total	28,904	42,973	48,918	60,294	63,554	247,642

²⁸ World Bank Operations Policy and Country Services. *Status of Projects in Execution (SOPE) FY06. Region: East Asia and Pacific. Country: China.* September 19th, 2006. pp.19

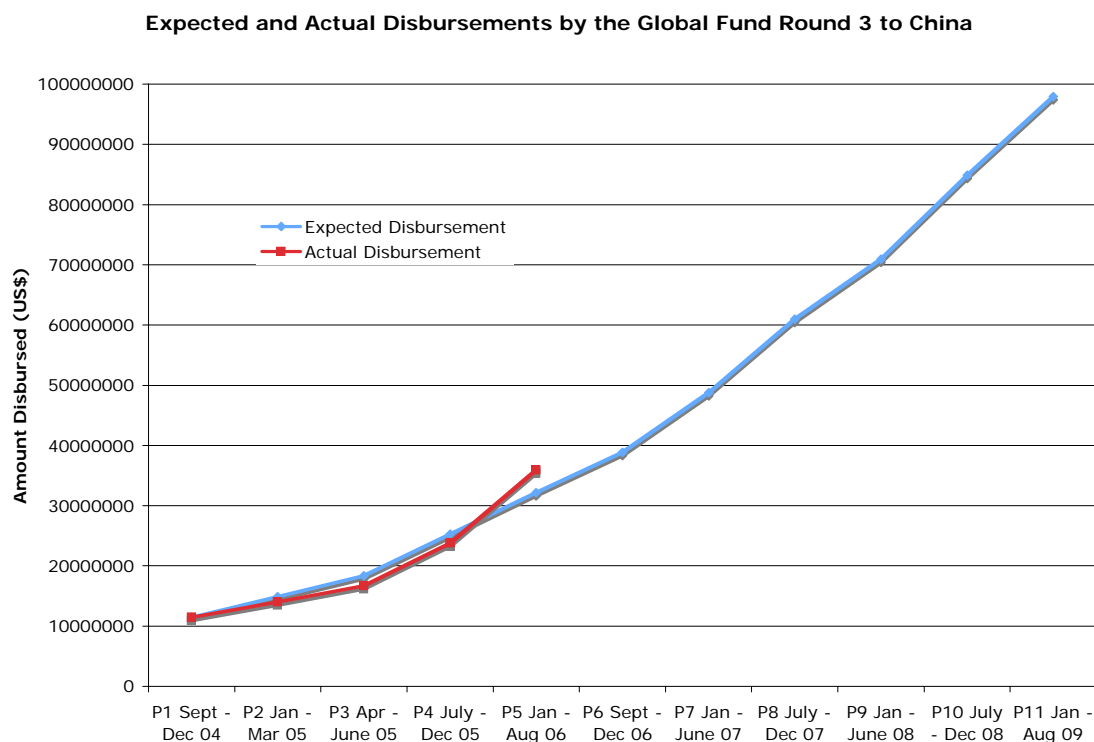
²⁹ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund.* June 23rd, 2003.

³⁰ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Grant Performance Report.* October 24th 2006

³¹ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Amended and Restated Program Grant Agreement.* Sept. 5th, 2006.

³² The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund.* June 23rd, 2003.

Figure 3.1– Expected and Actual Disbursements for Phase 1, and Expected Disbursements for Phase 2 of the Global Fund’s (Round 3) Project in China.³³



3.2.2.1.2 Objectives for this Project

Objective 1: Implement an Effective Project Based on Lessons Learned:

With the funds provided for this goal, a multi-sectoral project steering group was created, as well as national, provincial and county-level program offices. These administrative groups were responsible for coordinating project management and strategic planning. Each county participating in the project will be responsible for conducting two project reviews annually, including resource audits, baseline data, and situational analysis, and submitting the data to the administrative committees. The committees will then use the information to fine tune the project over time.³⁴

In 2005, a total of \$2,531,693 was spent on objective 1, of which \$2,146,722 was spent at the provincial level and \$384,971 was disbursed nationwide.^{35,36,37} Table 2 shows the expected distribution of fund disbursements for this sector.

Table 3.2- Expected Funding for Objective 1, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	2,069,870

³³ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Grant Performance Report*. October 24th 2006

³⁴ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003.

³⁵ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th, 2005

³⁶ China CDC. *On-going Progress Update and Disbursement Request 4*. August 26th, 2005

³⁷ China CDC. *On-going Progress Update and Disbursement Request 5*. March 9th, 2006

Year 2	6,554,750
Year 3	2,342,270
Year 4	1,830,830
Year 5	1,357,100
Total	14,154,820

Objective 2: Establish a Network of Facilities to Deliver Quality Care and Treatment of AIDS

Objective 2 seeks to strengthen the healthcare system at all levels by identifying and filling gaps in human resources and technical resources. To help ensure affordability of medical care at the township level, healthcare workers' salaries will be subsidized so they are no longer forced to prescribe more than necessary drugs or more expensive drugs to the patients to supplement their incomes. Each township health care center will have an HIV/AIDS unit to provide the first line of care to people living with the disease, including monitoring treatment and providing referrals to centers offering more treatment options for complex cases. Village healthcare workers will offer home visits to those receiving drug therapy to ensure that medications are taken correctly and consistently. The county hospital will have a HIV/AIDS training and technical support centre and an in-patient HIV/AIDS unit. The county CDC will lead efforts at prevention and provide voluntary testing and counseling and CD4 monitoring. The county maternal and child health centre will focus on providing services to prevent mother-to-child transmission.³⁸

The most recent progress report for this sector reveals that as of August 31st 2006, 13,577 individuals had received training in either: project and financial management, voluntary testing and counseling, intervention and outreach care, support and treatment. The project's goal of training 7,000 people by this date was exceeded. In addition, there are already 42 service centers providing treatment, testing and CD4 counts existed. All service centers met the requirements for effective management and required technical equipment. This fell short of the projected target of establishing 58 such centers by the end of August 2006.³⁹

Total funding of \$911,921 was provided to achieve this objective in 2005, excluding procurement, totaled, of this, \$19,492 was spent at the national level and \$892,429 by the provinces.^{40,41,42} Funds anticipated for this goal, through each of the project's five years, are presented in table 3.3.

Table 3.3 – Expected Funding for Objective 2, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	2,334,130
Year 2	2,297,180
Year 3	2,536,240
Year 4	2,246,090
Year 5	1,267,700
Total	10,681,340

³⁸ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003.

³⁹ China CDC. *On-going Progress Update and Disbursement Report 7*. December 8th, 2006

⁴⁰ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th, 2005

⁴¹ China CDC. *On-going Progress Update and Disbursement Request 4*. August 26th, 2005

⁴² China CDC. *On-going Progress Update and Disbursement Request 5*. March 9th, 2006

Objective 3: Establish Community-based Counseling Linked to Voluntary Testing and Counseling (VTC) Services for HIV

Projects that are a part of this objective encourage the use of VTC services by offering them as part of pre-marital check-ups and providing incentives such as free tuition to the children of those diagnosed with HIV. VTC will have a counseling component delivered in the community, and will be linked to relevant medical follow-up, including HIV prevention and counseling services, as well as testing, provided at the township and county level. The confidentiality of those who use VTC services will be assured. Interventions to prevent mother-to-child transmission will be provided, along with follow-up to ensure mothers receive Anti-Retroviral Therapy (ARV) when necessary. Support will be given to HIV-positive individuals.⁴³

As of August 2006, all 58 project counties had at least one center with trained staff providing specialized HIV/AIDS counseling services. From the project's launch in August 2004 until the end of December 2006, 137,076 people in project counties used VTC services, exceeding the target of 123,000 people.⁴⁴ In 2005, a total of \$525,753 was spent on projects related to this objective. Not including procurement costs, \$442,326 was spent at the provincial level and \$83,427 was spent at the national level.^{45,46,47} Table 3.4 details the expected funding for objective 3.

Table 3.4 – Expected Funding for Objective 3, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	726,970
Year 2	1,525,810
Year 3	2,442,410
Year 4	2,537,960
Year 5	1,800,730
Total	9,033,880

Objective 4: Provide Basic Medical Care for those suffering from HIV/AIDS, including Treatment of Opportunistic Infections and Palliative Care for the Terminally Ill

This project aims to improve access to basic medical care for individuals infected with HIV, especially treatment for opportunistic infections and palliative care. Improved diagnostics and prophylactic treatments will be offered, as well as providing treatment for tuberculosis-HIV co-infections. As tuberculosis (TB) treatment is already provided free-of-charge in project provinces, personnel in VTC centers are instructed to make the necessary referrals to TB treatment centers.⁴⁸

As of December 2006, 20,502 persons infected with HIV had received treatment or prophylaxis for opportunistic infections, just short of the 20,800 person goal.⁴⁹ In 2005,

⁴³ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003.

⁴⁴ China CDC. *On-going Progress Update and Disbursement Request 8*. Not Dated.

⁴⁵ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th, 2005

⁴⁶ China CDC. *On-going Progress Update and Disbursement Request 4*. August 26th, 2005

⁴⁷ China CDC. *On-going Progress Update and Disbursement Request 5*. March 9th, 2006

⁴⁸ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003.

⁴⁹ China CDC. *On-going Progress Update and Disbursement Request 8*. Not Dated.

\$171,910 was spent on projects related to this objective, not including procurement costs. \$31,579 was spent at the nationwide and \$140,331 was spent at the provincial level.^{50,51,52} Expected disbursements for objective 5 are summarized in table 3.5.

Table 3.5 – Expected Disbursements for Objective 4, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	300,000
Year 2	1,525,810
Year 3	2,442,410
Year 4	2,537,960
Year 5	1,800,730
Total	9,033,880

Goal 5: Initiate and Maintain a Quality Antiretroviral Therapy Program (ARV)

Awareness campaigns and referrals from VTC centers will help to increase public knowledge about the availability of treatment in project counties. Treatment will be offered to those who have previously endured a significant opportunistic infection or who have sufficiently low CD4 counts. Eligible family members of those requiring treatment will also receive treatment to avoid drug sharing. A first-line regimen consisting of generic drugs produced in China will be provided. These drugs are: zidovudine (AZT), didanosine (ddI), stavudine (d4T), and nevirapine. A second line of imported drugs will consist of lamivudine (3TC), indinavir and efavirenz. These drugs will be provided to patients at home by village health workers or volunteers.⁵³

In December 2003, 4,000 people in project counties were receiving ARV. By December 2006, that number had increased to 23,060.⁵⁴ In 2005, \$282,577 was spent on ARV, not including procurement costs. \$41,891 of this amount was spent nationwide and \$240,686 was spent at the provincial level. In the same year, \$313,268 was spent to import efavirenz, and a total of \$18,874 was billed for ARV procurement administration fees, for a grand total of \$332,142. In 2005, the total spent on the objective 5 was \$614,719.^{55,56,57} Table 3.6 shows expected funding for this goal over the five years of the project.

Table 3.6- Funding Expected for Objective 5, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	2,122,590
Year 2	4,025,920
Year 3	6,276,330
Year 4	9,970,860
Year 5	7,583,000
Total	29,978,700

⁵⁰ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th, 2005

⁵¹ China CDC. *On-going Progress Update and Disbursement Request 4*. August 26th, 2005

⁵² China CDC. *On-going Progress Update and Disbursement Request 5*. March 9th, 2006

⁵³ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003

⁵⁴ China CDC. *On-going Progress Update and Disbursement Request 8*. Not Dated.

⁵⁵ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th, 2005

⁵⁶ China CDC. *On-going Progress Update and Disbursement Request 4*. August 26th, 2005

⁵⁷ China CDC. *On-going Progress Update and Disbursement Request 5*. March 9th, 2006

Goal 6: Comprehensive Care and Support for People Living with HIV/AIDS and their Families

This project aims to provide support to AIDS-affected families in project counties using a variety of interventions. HIV-positive individuals are recruited to start self-help groups, improve adherence and attitudes about Anti-Retroviral Therapy (ARV), and provide information about healthcare resources in the community and transmission prevention. Social welfare and education for children of affected families is provided, including back-to-school and stay-in-school programs. Home-based care and support teams visit affected families to provide psychosocial and nutritional support, help with manual labor and childcare, and identify and treat any opportunistic infections that may be present. They also provide referrals to the appropriate healthcare resources.⁵⁸

As of December 2006, 25,805 HIV-positive individuals and their families were receiving care, support and social assistance from this project, just above the target of 23,600 families. By the end of August 2006, 20,413 (PLWHA) were receiving free information and education about HIV/AIDS prevention, above the target of 18,050.⁵⁹ In 2005, \$497,103 was spent to fund this initiative, with \$136,767 spent at the national level and \$360,336 at the provincial level.^{60,61,62} Table 3.7 shows expected disbursements for each of the project's five years.

Table 3.7 – Expected Disbursements for Objective 6, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	825,000
Year 2	1,650,000
Year 3	2,364,000
Year 4	3,480,000
Year 5	3,480,000
Total	11,799,000

Objective 7: Promote Awareness, Acceptance, Commitment and Involvement in HIV/AIDS Related Issues among the Public in Affected Communities and among Policy Makers at all Levels of Government

In order to ensure a favorable policy environment and the continuation of funding for HIV/AIDS projects, targeted advocacy is used to cultivate the government's commitment to HIV/AIDS. Government officials are informed about the harmful social and economic effects of HIV/AIDS on communities and are made aware of policies and best practices. Networking among officials from affected counties enhances communication between them and helps to disseminate best practices.

The public is targeted through the media and campaigns of public education aimed at increasing knowledge and awareness about HIV/AIDS and reducing the fear-based social stigma. People living with HIV/AIDS are provided with information and educated about healthcare and support services available in their communities.⁶³

⁵⁸ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003

⁵⁹ China CDC. *On-going Progress Update and Disbursement Report 8*. Not Dated.

⁶⁰ China CDC. *On-going Progress Update and Disbursement Report 3*. May 30th, 2005

⁶¹ China CDC. *On-going Progress Update and Disbursement Report 4*. August 26th, 2005

⁶² China CDC. *On-going Progress Update and Disbursement Report 5*. March 9th, 2006

⁶³ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June

As of December 2006, there were 3,078 project activities that included government organizations, departments and/or NGOs as active participants. This is well above the target of 2,300.⁶⁴ In 2005, \$1,695,396 was spent on this initiative, not including procurement costs. \$842,811 was spent at the national level, and \$852,585 was spent at the provincial level.^{65,66,67} Expected expenditures for this objective, for each of the program's five years, are presented in table 3.8.

Table 3.8 - Anticipated Expenditures for Objective 6, by Year of Project Implementation

Year	Expected Funding (US\$)
Year 1	578,250
Year 2	1,128,800
Year 3	1,837,600
Year 4	1,096,000
Year 5	0
Total	4,640,650

Objective 8: Delivery of Adequate Preventive Services

In the fight against HIV/AIDS, prevention is the key to future success. This project uses targeted information, education and campaigns to change high-risk behaviors. It provides information and skills to high-risk groups, including migrant workers, sex workers, intravenous drug users and youth. Barriers to condom use are addressed, safe behaviors are outlined and safer methods for injecting illicit drugs are taught. Voluntary testing and counseling, as well as services to prevent mother-to-child transmissions are promoted. Free condoms are distributed. System-wide preventive measures are taught to health care workers and implemented by health care services to ensure the safety of medical procedures. This project is being studied and lessons learned will provide a basis for a nationwide campaign of prevention and stigma reduction.⁶⁸

As of December 2006, 1,886 middle school teachers had been trained in life-skills education, and had taught it to their classes. 1,118,296 students participated in an experiential life-skills class.⁶⁹ In 2005, \$1,234,515 was spent for projects related to this objective, not including procurement costs. \$328,970 was spent at the national level and \$905,545 at the provincial level.^{70,71,72} Table 3.9 shows expected annual expenditures for this objective.⁷³

²³rd, 2003

⁶⁴ China CDC. *On-going Progress Update and Disbursement Report 8*. Not Dated.

⁶⁵ China CDC. *On-going Progress Update and Disbursement Report 3*. May 30th, 2005

⁶⁶ China CDC. *On-going Progress Update and Disbursement Report 4*. August 26th, 2005

⁶⁷ China CDC. *On-going Progress Update and Disbursement Report 5*. March 9th, 2006

⁶⁸ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003

⁶⁹ China CDC. *On-going Progress Update and Disbursement Report 8*. Not Dated.

⁷⁰ China CDC. *On-going Progress Update and Disbursement Report 3*. May 30th, 2005

⁷¹ China CDC. *On-going Progress Update and Disbursement Report 4*. August 26th, 2005

⁷² China CDC. *On-going Progress Update and Disbursement Report 5*. March 9th, 2006

⁷³ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 3 HIV Proposal from China to the Global Fund*. June 23rd, 2003

Table 9 - Anticipated expenditures for Objective 8, by Year of Project Implementation

Year	Expected funding (US\$)
Year 1	931,000
Year 2	1,240,900
Year 3	1,043,000
Year 4	670,000
Year 5	490,000
Total	4,375,000

Table 3.10: Expenditures in US\$ for the Global Fund (Round 3) Project broken down by Level of Government and Objective for Each Disbursement Period in 2005

Objective	Level	January-March	April-June	July-December	Total
1	National	64,162	118,066	202,743	384,971
	Provincial	497,459	426,879	1,222,384	2,146,722
	Total	561,621	544,945	1,425,127	2,531,693
2	National	837	246	18,409	19,492
	Provincial	236,400	142,389	513,640	892,429
	Total	237,237	142,635	532,049	911,921
3	National	20,127	0	63,300	83,427
	Provincial	109,595	61,196	271,535	442,326
	Total	129,722	61,196	334,835	525,753
4	National	0	3,629	27,950	31,579
	Provincial	61,746	36,042	112,543	210,334
	Total	61,746	39,671	140,493	241,910
5	National	124	0	41,767	41,891
	Provincial	57,411	31,541	151,734	240,686
	Total	57,535	31,541	193,501	282,577
6	National	81,055	0	55,712	136,767
	Provincial	101,199	78,845	180,292	360,336
	Total	182,254	78,845	236,004	497,103
7	National	155,050	479,029	208,732	842,811
	Provincial	104,728	115,222	632,635	852,585
	Total	259,778	594,251	841,367	1,695,396
8	National	74,353	35,476	219,141	328,970
	Provincial	147,258	145,248	613,039	905,545
	Total	221,611	180,724	832,180	1,234,515
Total	National	1,315,795	1,037,363	3,697,802	6,050,960
	Provincial	395,708	636,447	837,755	1,869,910
	Total	1,711,503	1,673,810	4,535,557	7,920,870
Procurement		705,165	3,795,255	1,261,530	5,761,950
Grand Total		2,416,688	5,469,065	5,797,087	13,682,840

In addition to the funding used directly to accomplish the objectives, additional funds were used for procurement. Spending by objective, procurement, and total spending, is tabulated in Table 3.10 above.

3.2.2.2 Global Fund (Round 4) – HIV/AIDS Prevention and Treatment among High-Risk Populations

Funds from the Global Fund (Round 4) were solicited by the Chinese government to help implement an HIV/AIDS prevention and treatment program. The program is aimed, in particular, at the high-risk sex worker and intravenous drug user populations in 37 counties across Xinjiang, Yunnan, Guangxi, Sichuan, Guizhou, Hunan and Jiangxi provinces. Launched in July 2005, this project is expected to continue through 2010. The goal of this project is to improve cooperation among government, NGOs, and social partners to create an environment favorable to the development of similar projects. The project also aims to improve HIV/AIDS awareness using information, education, and projects to change high-risk behavior, as well as decrease rates of transmission among intravenous drug users and sex workers. Voluntary testing and counseling services are being established and publicized. HIV/AIDS treatment and care services such as methadone clinics, needle exchange sites and ARV clinics are being set-up. Youth education, risk-reduction programs for sex workers, and mass media campaigns are also being implemented⁷⁴. In the sections that follow, the many different goals of this project have been divided into six main objectives.

3.2.2.2.1 Funding and Financial Information

A total of \$63,742,277 in funding was approved for this project, to be distributed over two phases. The first phase, lasting from July 2005 to September 2006, had \$23,936,918 in funding initially approved, but actually disbursed only \$21,422,769, with the difference due to delays in procurement. The remaining \$39,805,359 will be disbursed in phase two, expected to last from January 2007 to 2010⁷⁵. Co-funding provided by the central Chinese government will account for 20% of the project funding in the first year, eventually increasing to 50% of the annual budget by the fifth and final year.

Total expected funding for the entire five years of the project is summarized in Table 3.11.

Table 3.11 – Expected Sources of Funding for the Global Fund (Round 4) HIV/AIDS China Project

Funding	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Central Government Contributions (US\$)	2,745,977	4,317,671	6,065,333	8,895,570	12,309,561	34,334,112
Requested Funds from GFATM (US\$)	10,983,090	12,953,009	14,152,443	13,343,355	12,309,561	63,741,458
Total (US\$)	13,729,067	17,270,680	20,217,776	22,238,925	24,619,122	98,075,570
Government Contributions	20%	25%	30%	40%	50%	35%

3.2.2.2.2 Objectives for this Project

Objective 1: Create a favorable policy environment and lobby leadership to develop and implement a coordinated, multi-sectoral, rights-based, risk-reduction policy at all levels of government

To ensure a favorable policy environment, information will be disseminated to federal bureaucrats through the Central Party School (CPS), and passed on to lower level government officials using a top-down approach. This objective includes supports better co-ordination of

⁷⁴ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

⁷⁵ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Grant Performance Report CHN-405-G05-H*. February 2nd, 2007.

activities and communication between various departments and levels of government, as well as relevant government-organized non-governmental organizations (GONGO) and NGOs. Non-governmental and community service organizations will be encouraged to participate. It seems likely that community service groups and those run by people living with HIV/AIDS may be better placed to reach out to the high-risk populations targeted in this program.⁷⁶

As of December 31st 2006, 71 of 74 project sites (two per county) had established local HIV/AIDS projects, linked to the local government's economic development plan. This is the only progress indicator provided for this objective.⁷⁷ Table 3.12 shows funds disbursed to achieve this objective from October 2005 to September 2006.^{78,79,80,81}

Table 3.12 – Expenditures in US\$ for Objective 1, broken down by Level of Government for Each Disbursement Period (October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	117,014	9,894.10	36,669.33	76,176.51	239,753.94
Provincial	152,040	51,963.98	52,806.62	149,414.61	406,225.21
Total	269,054	61,858.08	89,475.95	225,611.12	645,999.15

Objective 2: Increase Public Awareness and Knowledge of HIV/AIDS through Coordinated Development of Strategic IEC and BCC Materials Aimed at IDUs, CSWs and Youth

Mass media outlets, including television, radio, newspapers and the internet were used to provide the general public with information about HIV prevention. Prevention material was targeted at secondary school and college students through formal school programs. These programs built on the existing 'Straight Talk' life skills programs, and train teachers and peer educators to provide information about safe sex before students become sexually active. Youth at high-risk for intravenous drug use or sex work were targeted by a life skills program aimed at providing young people with resources they need to not have to become involved in these dangerous activities. Information, education, and behavioral modification publications will be created and distributed from one central distribution center to avoid duplication of efforts. Useful feedback will be incorporated into the materials on an ongoing basis over the course of the project.⁸²

As of December 31st 2006, 215,353 members of high-risk populations (intravenous drug users, sex workers, STD patients, etc.) had received information, education and behavioral modification packages. 1,472,405 youth had received community or school-based training about HIV/AIDS prevention.⁸³ Table 3.13 shows funds disbursed for this objective from October 2005 to September 2006.^{84,85,86,87}

⁷⁶ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

⁷⁷ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

⁷⁸ China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

⁷⁹ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006

⁸⁰ China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

⁸¹ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

⁸² The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

⁸³ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

⁸⁴ China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

⁸⁵ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006.

⁸⁶ China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

⁸⁷ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

Table 3.13 – Expenditures in US\$ for Objective 2, broken down by Level of Government
Level for Each Disbursement Period
(October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	114,805	46,817.39	71,337.95	146,965.00	379,925.34
Provincial	227,576	39,047.14	140,111.01	186,206.08	592,940.23
Total	342,381	85,864.53	211,448.96	333,171.08	972,865.57

Objective 3: Use a Harm Reduction Approach to Decrease the Rate of HIV Transmission Among Intravenous Drug Users and the Risk of Partner Infection

To achieve the goals laid out in this objective, free methadone clinics and needle exchange sites were established. Condoms were promoted at these venues and links between these services and voluntary testing and counseling sites were established. According to Chinese policy, only those registered intravenous drug users referred from detention or detoxification centers can participate in the free methadone maintenance parts of this program.⁸⁸

As of December 31st 2006, 68 methadone clinics had been established in project counties and 5,583 people were receiving methadone maintenance. 112 needle exchange sites had been established. 49,665 intravenous drug users were receiving prevention assistance via needle exchange and/or peer education/outreach education.⁸⁹ Table 3.14 shows funds disbursed on this objective from October 2005 to September 2006.^{90,91,92,93}

Table 3.14 – Expenditures in US\$ for Objective 3, Broken Down by Level of Government for
Each Disbursement Period
(October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	90,169	31,937.39	50,950.90	126,248.14	299,305.43
Provincial	755,824	248,787.09	371,437.08	1,100,097.39	2,476,145.56
Total	845,993	279,724.48	422,387.98	1,226,345.53	2,775,450.99

Objective 4: Reduce HIV Transmission to and from CSWs and their Partners/Clients

Outreach services will be provided through community-based health centers. These centers provide better information, educational materials aimed at changing behaviors and services to both sex workers and their clients. Peer education helps to identify and support sex workers and encourages them to seek testing. Voluntary testing and counseling services are linked to these centers, which will also integrate women's health, reproductive health and STD services.⁹⁴

As of December 31st 2006, 66,712 sex workers had received outreach and peer education services including behavioral modification packages and promotional condoms.⁹⁵ Table 3.15

⁸⁸ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

⁸⁹ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

⁹⁰ China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

⁹¹ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006.

⁹² China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

⁹³ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

⁹⁴ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

⁹⁵ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

shows funds disbursed for this objective from October 2005 to September 2006.^{96,97,98,99}

Table 3.15 – Expenditures in US\$ for Objective 4, Broken Down by Level of Government for Each Disbursement Period
(October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	114,418	13,179.56	2.20	144,500.00	272,099.76
Provincial	443,647	124,144.36	203,312.63	657,156.78	1,428,260.77
Total	558,065	137,321.92	203,314.83	801,656.78	1,700,360.53

Objective 5: Promote and Provide Accessible and Affordable Voluntary Testing and Counseling Services at the District and County Levels

HIV testing centers existed prior to the launch of this program, but this project will seek to increase the number of testing centers and add counseling services. The voluntary nature of the testing will also be emphasized and supervised to ensure no coercive testing takes place and that confidentiality is maintained. Testing centers will act as a gateways and referral services to treatment and care. These centers will also play an important role in sentinel surveillance.¹⁰⁰

As of December 31st 2006, 149 voluntary testing and counseling centers had been created, all staffed by trained counselors providing specialized HIV/AIDS services. 247,610 individuals had benefited from these services, including counseling, testing and collection of results.¹⁰¹

Table 3.16 shows funds disbursed for this objective between October 2005 and September 2006.^{102,103,104,105}

Table 3.16 – Expenditures in US\$ for Objective 5, Broken down by Level of Government for Each Disbursement Period
(October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	45,594	637.66	7.59	24,286.49	70,525.74
Provincial	610,289	196,935.53	213,916.85	686,344.05	1,707,485.43
Total	655,883	197,573.19	213,204.44	710,630.54	1,778,011.17

Objective 6: Establish a Network of Service Delivery Facilities Assuring Treatment, Care and Support to People Living with HIV/AIDS, including the Prevention of Mother-to-Child Transmission

Following diagnosis, people living with HIV/AIDS will be referred to a hospital for a needs assessment and for anti-retroviral (ARV) therapy, the prevention and treatment of opportunistic infections, and referrals to support groups. Support groups will initially be

⁹⁶ China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

⁹⁷ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006.

⁹⁸ China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

⁹⁹ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

¹⁰⁰ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

¹⁰¹ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

¹⁰² China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

¹⁰³ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006.

¹⁰⁴ China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

¹⁰⁵ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

established at treatment centers, and gradually expanded to other centers throughout the community. Health care workers will be trained in ARV therapy and the treatment of opportunistic infections and bonuses will be paid to those willing to engage in AIDS-related work. ARV therapy will be provided free of charge by the Ministry of Health, and administered by directly observed therapy. ARV therapy will be integrated with opportunistic infection treatment/prophylaxis or methadone maintenance where necessary. The CDC will participate in this aspect of the project by supervising drug resistance. The Ministry of Health is committed to providing a lamivudine-based first-line regimen, and a second line. At Maternal and Child Health Centers, ARV therapy regimens will be tailored to the needs of HIV-infected expecting mothers to prevent mother-to-child transmission. Treatment will be based on the stage of infection, gestational age of the fetus and prior drug-dependency. Family planning and counseling about breastfeeding will be offered, and elective caesarean section will be offered as a delivery option.¹⁰⁶

As of December 31st 2006, 8,879 HIV-positive individuals were receiving basic care and support and 4,130 were receiving ARV therapy. 9,191 opportunistic infections were treated.¹⁰⁷ Table 3.17 shows funds disbursed for this objective from October 2005 to September 2006.^{108,109,110,111}

Table 3.17 – Expenditures in US\$ for Objective 6, broken down by Government Level for Each Disbursement Period (October 2005- September 2006)

	Oct-Dec 2005	Jan-Mar 2006	Apr-Jun 2006	Jul – Sept 2006	Total
National	174,220	87.60	781.40	101,628.11	276,717.11
Provincial	224,927	308,822.16	238,975.08	626,856.84	1,399,581.08
Total	398,747	308,909.76	239,756.48	728,484.95	1,676,298.19

In addition to the funding applied directly to accomplishing these objectives, additional funds were used for human resources, monitoring and evaluation, public relations, and procurement. Spending in these areas, by objective, and total spending, are tabulated in Table 3.18.

¹⁰⁶ The Global Fund to Fight AIDS, Tuberculosis and Malaria. *Round 4 HIV Proposal from China to the Global Fund*.

¹⁰⁷ China CDC. *On-going Progress Update and Disbursement Request 6*. March 26th, 2007

¹⁰⁸ China CDC. *On-going Progress Update and Disbursement Request 2*. February 14th, 2006

¹⁰⁹ China CDC. *On-going Progress Update and Disbursement Request 3*. May 30th 2006.

¹¹⁰ China CDC. *On-going Progress Update and Disbursement Request 4*. Not Dated

¹¹¹ China CDC. *On-going Progress Update and Disbursement Request 5*. November 24th, 2006

Table 3.18: Expenditures in US\$ by Level of Government and Objective for Each Disbursement Period for the Global Fund (Round 4) Project (October 2005 – September 2006)

Objective	Oct – Dec 2005	Jan – Mar 2006	Apr – Jun 2006	Jul - Sept 2006	Total
1 National	117,014	9,894.10	36,669.33	76,176.51	239,753.94
Provincial	152,040	51,963.98	52,806.62	149,414.61	406,225.21
Total	269,054	61,858.08	89,475.95	225,611.12	645,999.15
2 National	114,805	46,817.39	71,337.95	146,965.00	379,925.34
Provincial	227,576	39,047.14	140,111.01	186,206.08	592,940.23
Total	342,381	85,864.53	211,448.96	333,171.08	972,865.57
3 National	90,169	31,937.39	50,950.90	126,248.14	299,305.43
Provincial	755,824	248,787.09	371,437.08	1,100,097.39	2,476,145.56
Total	845,993	279,724.48	422,387.98	1,226,345.53	2,775,450.99
4 National	114,418	13,179.56	2.20	144,500.00	272,099.76
Provincial	443,647	124,144.36	203,312.63	657,156.78	1,428,260.77
Total	558,065	137,321.92	203,314.83	801,656.78	1,700,360.53
5 National	45,594	637.66	7.59	24,286.49	70,525.74
Provincial	610,289	196,935.53	213,916.85	686,344.05	1,707,485.43
Total	655,883	197,573.19	213,204.44	710,630.54	1,778,011.17
6 National	174,220	87.60	781.40	101,628.11	276,717.11
Provincial	224,927	308,822.16	238,975.08	626,856.84	1,399,581.08
Total	398,747	308,909.76	239,756.48	728,484.95	1,676,298.19
Total National	656,220	1,025,537.70	159,749.37	619,804.25	1,538,327.32
Provincial	2,414,303	969,700.26	1,220,559.27	3,406,075.75	8,010,638.28
Total	3,070,523	1,995,237.96	1,380,308.64	4,025,880.00	9,548,965.60
HR National	24,313	19,415.55	53,726.14	29,173.89	126,628.58
Provincial	253,368	133,799.43	236,567.45	239,236.31	862,971.19
Total	277,681	153,214.98	290,293.59	268,410.20	989,599.77
M&E National	22,604	15,987.04	49,301.77	71,805.66	159,698.47
Provincial	154,623	66,558.14	77,811.81	114,335.24	413,328.19
Total	177,227	82,545.18	127,112.58	186,140.20	573,026.66
PR	26,276	3,078.68	0.00	188.61	29,543.29
Procurement	0	1,412,710.80	36,630.00	0.00	1,449,340.80
Grand Total	3,551,707	3,646,787.60	1,834,344.81	4,480,619.01	12,590,476.12

3.2.2.3 Global Fund (Round 5) – Preventing a New Wave of HIV Infections

The fifth round of Global Fund support for HIV prevention in China will fund a project scheduled to run from July 2006 to 2011. This program targets those at high-risk of infection, including; homosexual men, sex workers, and the migrant workers in 18 selected cities in Gansu, Heilongjiang, Inner Mongolia, Jilin, Liaoning, and Ningxia provinces, and the municipality of Chongqing. These target populations were chosen because of their high potential to spread HIV to the general population. The project aims to reduce the social stigma associated with HIV and raise awareness about treatment, particularly among homosexual men and sex workers, through community outreach and prevention services. Services that will be expanded over the course of the project, include; voluntary testing and counseling, distribution of HIV related information, education and behavioral modification packages, promoting the use of condoms and lubricants, and launch a program aimed at

achieving 100% Condom Use Program in target cities. This project aims to coordinate efforts between the government and relevant NGOs in the fight against HIV/AIDS. NGOs run by homosexual men and people living with HIV/AIDS are being particularly targeted in this effort. STD treatment and surveillance efforts will also be improved for target populations with the introduction of more stringent rules for reporting infections and easier access to STD treatment

This project has five main objectives. Each objective, along with its approved funding, is detailed below.

3.2.2.3.1 Funding

The Global Fund has approved \$28,902,074 in funding for this project. It will be distributed in two phases over the five years of the project. The first phase will receive \$12,544,128 in funding. As of December 2006, \$7,833,568 of this amount had already been disbursed. The Chinese government will provide matching funding. Its contributions along with those of the Global Fund, are summarized in Table 3.19.

Table 3.19 - Expected Sources of Financing for the Global Fund (Round 5) HIV/AIDS China Project

Sources	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Central Government Contributions (US\$)	2,065,533	2,720,370	4,101,092	5,046,218	5,160,090	19,093,303
GFATM Contributions (US\$)	6,196,598	6,347,529	6,151,638	5,046,218	5,160,090	28,902,073
Total (US\$)	8,262,131	9,067,899	10,252,730	10,092,436	10,320,180	47,995,376
Central Government Contributions (%)	25%	30%	40%	50%	50%	40%

2.2.3.2 Objectives for Project Round 5

Objective 1: Create an Enabling Social Environment and Strengthen Policy Implementation

Activity 1.1: Media and Community-Based Campaigns to Reduce Stigma

A mass-media campaign aimed at stigma reduction is being run. The campaign will make use of posters, television and radio infomercials featuring AIDS ambassadors. Groups of HIV-positive individuals are organizing campaigns at the grassroots level. Anti-stigma and prevention campaigns are also being run at high schools and universities.

Activity 1.2: Advocacy Initiatives to Improve Implementation of Existing HIV/AIDS Policies

Government officials are being educated about HIV/AIDS, relevant government policies that already exist and how to work effectively with NGOs. In an effort to reduce discrimination against those with HIV/AIDS, media outlets and healthcare workers are distributing information about HIV/AIDS and AIDS policies to the public. Citizen HIV advocates encourage clubs and hotels to implement the *100% Condom Use Program*. Other initiatives include: encouraging rapid HIV testing as advocated in the national guidelines, the integration of voluntary testing and counseling into existing STD clinics.¹¹²

In the project's first six months, 176 anti-discrimination campaigns were run in various

¹¹² The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

media.¹¹³ Table 3.20 shows projected funding for this objective for all five years of the project.

Table 3.20 – Anticipated Funding in US\$ for Objective 1 by Year of Project Implementation and Activity

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
1.1	501,924.44	799,788.65	652,073.63	560,130.20	552,129.63	3,034,717.67
1.2	501,924.44	482,412.20	301,430.26	161,478.98	144,482.52	1,589,614.02
Total	1,003,848.88	1,282,200.86	953,503.89	721,609.17	696,612.12	4,625,331.68

Objective 2: Comprehensive Approaches to Reducing High-Risk Behavior and HIV Transmission among Male Homosexuals, Migrants, Sex Workers and their Partners

Activity 2.1: Behavioral Modification Packages (BMP) Outreach and Condom Promotion Activities Targeting Sex Workers

Sex worker-specific behavioral change packages are being improved. The link between STD infections and HIV transmission explained. Education training and activities will be organized for sex workers by other sex workers who are also trained in condom use, negotiation skills and self-protection. Condoms and lubricant are being distributed, and behavioral change information packages and promoting the use of condoms.

Activity 2.2: Changing High-risk Behaviors through Outreach and Promoting Condom Use by Homosexual Men

Behavioral change packages targeted at male homosexuals are being improved and the link between STD infections and contracting HIV explained. Hotlines and support networks will be provided for homosexual men and peer education will be organized by members of the homosexual community. The project cooperates/liases with homosexual websites to distribute information aimed at reducing high-risk behaviors. These packages are also available in bars, saunas, clubs, hotels and parks. Free condoms and lubricant is also being distributed.

Activity 2.3: BCIP Outreach and Condom Promotion Targeting Migrant Workers

Behavioral Modification Packages targeted at migrants involved in high-risk behaviors are being improved and the link between STD infections and contracting HIV explained. Peer education is being offered at factories, construction sites and service industries that employ migrant workers. Workshops are being held to involve local governments, NGOs, employers and migrant workers in activities to promote condom use and spreading the message about the importance of changing behaviors. Condoms and lubricant are provided to migrants through labor organizations and clinics.

Activity 2.4: Voluntary Testing and Counseling Services for Sex Workers, Homosexual Men and Migrants

Health workers, professional counselors, NGOs, volunteers, target group members and people living with HIV/AIDS are being educated about voluntary testing and counseling

¹¹³ China CDC. *On-going Progress Update and Disbursement Request 3*. February 1st, 2007.

services. A network is being established to refer people from testing sites to risk-reduction, treatment and care services. Community groups are being used to encourage voluntary testing and counseling services by sex workers, homosexual men and migrants. Voluntary testing and counseling centers will be established inside detention centers and drug rehabilitation facilities.¹¹⁴

In the project's first six months, 124,000 people were reached with prevention information, 40,507 people received HIV testing and counseling and 997,911 condoms were distributed.¹¹⁵ Table 3.21 shows projected funding for this objective for all five years of the project's duration.

Table 3.21 – Expected Funding in US\$ for Objective 1 by Year of Project Implementation and Activity

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
2.1	483,334.64	647,447.96	775,106.39	625,731.03	629,530.98	3,150,325.96
2.2	644,446.19	564,930.08	688,983.46	560,130.20	562,449.81	3,034,717.67
2.3	477,138.05	628,405.37	559,799.06	600,499.94	598,570.44	2,861,305.23
2.4	1,010,045.47	1,110,817.58	1,322,602.17	1,105,121.74	1,099,099.17	5,635,904.24
Total	2,614,964.35	3,078,551.57	3,346,491.07	2,891,482.91	2,889,650.40	14,682,253.08

Goal 3: Strengthen STD Services and Links with Activities to Prevent HIV Infections

Activity 3.1 Improved STD Services Targeted at Sex Workers, MSM and Migrants

National STD procedures will be revised to include new guidelines for notifying partners, reporting infections and tracing contacts. Special training on treating homosexual men, sex workers and migrants will be provided to STD clinic staff. Hospitals and clinics will be trained in the treatment of AIDS syndrome, laboratory skills, counseling skills, as well as the diagnosis and treatment of common STDs. STD clinics will also receive technical assistance from the project. Designated STD clinics will be targeted at specific high-risk population groups, with offers of discounted testing and treatment services.

Activity 3.2 Coordinate STD, Voluntary Testing and Counseling, and Behavioral Modification Outreach

Where possible, voluntary testing and counseling services will be implemented in STD clinics. In the remaining clinics, a referral and tracking system will be established to voluntary testing and counseling services. Information, education and Behavioral Modification Packages also are provided at STD clinics.¹¹⁶

In the first six months of the project's implementation, 180 health care professionals received STD training and 10,494 people received STD treatment and counseling.¹¹⁷ Table 3.22 shows expected funding for this objective for all five years of the project's duration.

¹¹⁴ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

¹¹⁵ China CDC. *On-going Progress Update and Disbursement Request 3*. February 1st, 2007.

¹¹⁶ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

¹¹⁷ China CDC. *On-going Progress Update and Disbursement Request 3*. February 1st, 2007.

Table 3.22 – Expected Funding in US\$ for Objective 1 by Year of Project Implementation and Activity

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
3.1	601,070.01	596,667.73	461,372.85	368,373.91	376,686.57	2,398,872.06
3.2	49,572.78	76,170.35	55,364.74	40,369.74	41,280.72	260,118.68
Total	650,642.79	672,838.07	516,737.59	408,743.65	417,967.29	2,658,990.72

Objective 4: Strengthen the Ability of Community Service Groups to Organize HIV Prevention Activities

Activity 4.1 Help Build Capacity of Community Service Organizations and NGOs

The project aims to provide management support and technical assistance to small NGOs and community organizations working with target groups, as well as twinning opportunities with larger NGOs. Financial support is provided to community-based organizations working on HIV/AIDS.

Activity 4.2 Help Build Capacity for People Living with HIV/AIDS and their Support Groups

Advocates and support groups for people living with HIV/AIDS will be provided with funding, help with management, fundraising and logistics, as well as technical assistance. Training and internships will be provided for HIV-positive persons in NGOs, government and community service groups.¹¹⁸

In the first six months, 122 NGO staff received training.¹¹⁹ Table 3.23 shows Expected funding for this objective over all five years of the project's duration.

Table 3.23 – Expected Funding in US\$ for Objective 1 by Year of Project Implementation and Activity

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
4.1	254,060.52	247,553.63	184,549.14	191,756.28	196,083.42	1,069,376.70
4.2	198,291.14	190,4425.87	159,942.59	131,201.67	134,162.34	809,258.04
Total	452,351.65	437,979.50	344,491.73	322,957.95	330,245.76	1,878,634.75

Objective 5: Strengthen the Capacity of Local Communities to Conduct HIV Situational Analysis, Including Improved Surveillance, Monitoring, and Evaluation

Behavioral data concerning target populations will be collected, using surveys, sentinel surveillance, and data collected at routine testing centers. The number of sentinel sites will be increased. Local officials will be trained in using monitoring, evaluation, and surveillance data to plan HIV/AIDS related (activities/services). An HIV 'early warning' system is being established, targeting vulnerable populations, and surveillance will be linked to prevention services.¹²⁰

Following six months of project implementation, no data was available on progress in this

¹¹⁸ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

¹¹⁹ China CDC. *On-going Progress Update and Disbursement Request 3*. February 1st, 2007.

¹²⁰ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

area. A baseline presence of 27 sentinel surveillance sites was recorded.¹²¹ Table 3.24 shows projected funding for this objective for all five years of the project's duration.¹²²

Table 24 – Expected funding in US\$ for Objective 1 by Year of Project Implementation

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
5	291,240.11	190,425.87	258,368.80	211,941.16	216,723.78	1,098,278.77

Total expected funding information is tabulated in Table 3.25.

Table 3.25: Projected Expenditures in US\$, Broken down by Objective for Each Year of the Global Fund (Round 5) Project in China

Objective		Year 1	Year 2	Year 3	Year 4	Year 5	Total
1	1.1	501,924.44	799,788.65	652,073.63	560,130.20	552,129.63	3,034,717.67
	1.2	501,924.44	482,412.20	301,430.26	161,478.98	144,482.52	1,589,614.02
	Total	1,003,848.88	1,282,200.86	953,503.89	721,609.17	696,612.12	4,625,331.68
2	2.1	483,334.64	647,447.96	775,106.39	625,731.03	629,530.98	3,150,325.96
	2.2	644,446.19	564,930.08	688,983.46	560,130.20	562,449.81	3,034,717.67
	2.3	477,138.05	628,405.37	559,799.06	600,499.94	598,570.44	2,861,305.23
3	2.4	1,010,045.47	1,110,817.58	1,322,602.17	1,105,121.74	1,099,099.17	5,635,904.24
	Total	2,614,964.35	3,078,551.57	3,346,491.07	2,891,482.91	2,889,650.40	14,682,253.08
	3.1	601,070.01	596,667.73	461,372.85	368,373.91	376,686.57	2,398,872.06
4	3.2	49,572.78	76,170.35	55,364.74	40,369.74	41,280.72	260,118.68
	Total	650,642.79	672,838.07	516,737.59	408,743.65	417,967.29	2,658,990.72
	4.1	254,060.52	247,553.63	184,549.14	191,756.28	196,083.42	1,069,376.70
5	4.2	198,291.14	190,4425.87	159,942.59	131,201.67	134,162.34	809,258.04
	Total	452,351.65	437,979.50	344,491.73	322,957.95	330,245.76	1,878,634.75
	Total	291,240.11	190,425.87	258,368.80	211,941.16	216,723.78	1,098,278.77
Total Service		5,013,047.78	5,528,697.76	5,419,593.08	4,450,764.28	4,551,199.38	25,000,293.15
Total Management		1,183,550.22	818,831.24	732,044.92	595,453.72	608,890.62	3,901,779.86
Grand Total		6,196,598	6,347,529	6,151,638	5,046,218	5,160,090	28,902,073

3.2.2.4 Global Fund (Round 6) Mobilizing the Public to Increase Efforts to Control HIV/AIDS

Although a grant agreement has yet to be signed, some preliminary information is available about China's project in the Global Fund (Round 6). It is being launched in 15 provinces, primarily by NGOs and community-based organizations, with government assistance. The project aims to empower these types of groups to fill the gaps in government programs, improve the environment for government partnership with NGOs and reduce the social stigma surrounding HIV/AIDS to facilitate prevention work.

This initiative is being targeted at groups that have been underserved by previous prevention efforts, including; intravenous drug users, homosexual men, school dropouts and sex workers. Outreach will be mainly in the form of peer education, with information about AIDS prevention condoms and lubricant provided. To help improve adherence to a difficult treatment regimen and decrease the opportunities for treatment resistant strains to emerge, HIV/AIDS affected individuals will lead psychological and counseling support groups for people on ARV therapy. This project also aims to provide care for orphans and vulnerable children. There are three main objectives for this project. The details of each objecting and its

¹²¹ China CDC. *On-going Progress Update and Disbursement Request 3*. February 1st, 2007.

¹²² The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Round 5 HIV Proposal from China to the Global Fund*. June 13th, 2005.

associated funding are explored below.

3.2.2.4.1 Funding

\$14,395,715 in funding has been requested for this project, to be distributed over 5 years. Table 3.26 gives a summary of the funds requested and the funding actually committed by the government actually committed over the five years of the project.

Table 3.26 - Expected Sources of Funding for the Global Fund (Round 6) HIV/AIDS China Project

Sources	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Central Government Contributions (US\$)	354,663	655,226	774,060	881,247	947,619	2,819,692
GFATM Requested Funds (US\$)	3,191,972	2,620,903	3,096,241	2,643,742	2,842,857	14,395,715
Total (US\$)	3,546,635	3,276,129	3,870,301	3,524,989	3,790,476	17,215,407
Central Government Contributions (%)	10%	20%	20%	25%	25%	16%

3.2.2.4.2 Objective for China's project in the Global Fund (Round 6)

Objective 1: Create a Supportive Environment for NGOs and Build their Capacity to Participate in HIV/AIDS Projects, Including the Fight to Reduce Social Stigma and Discrimination

Activity 1: Strengthen and Support NGOs Responding to HIV/AIDS

The institutional, managerial and financial capacities of NGOs is being improved. This will be accomplished in part through networking between NGOs and government organizations, as well as the establishment of an on-line information portal for these and other community service groups.

Activity 2: Reduce the Social Stigma suffered by People Living with HIV/AIDS and Vulnerable Populations

Anti-stigma and advocacy workshops are being held, with NGOs and the private sector as participants. Books and magazines with anti-stigmatization messages are being distributed and a youth ambassador campaign established.

Activity 3: Advocate for Rights of People Living with HIV/AIDS and Vulnerable Populations

Central Government policies are not always fully implemented at the local level. Advocacy will help to ensure the implementation of policies such as free schooling and financial support for AIDS orphans across the country.

Table 3.27 – Expected Funding for Objective 1, in US\$, by Year of Project Implementation

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
1.1	174,815	167,605	196,415	191,605	194,015	924,455
1.2	97,075	117,075	97,075	117,075	97,075	525,375
1.3	11,000	1,500	33,500	1,500	11,000	58,500
Total	282,890	286,180	326,990	310,180	302,090	1,508,330

Objective 2: Increase the Scale and Impact of HIV Prevention Services offered to Hard-to-Reach Populations, Including: Vulnerable Sex Workers and their Clients, Intravenous Drug Users, Homosexual Men and School Drop Outs

Activity 1: Interventions Target Gaps in Current Prevention Efforts for Vulnerable Sex Workers and their Clients

Drop-in centers for female sex workers will be established by NGOs, who will also support peer education, behavioral modification communication, and condom promotion. Lubricant and condoms will be distributed. Community-based organizations and NGOs will collaborate with the CDC to offer voluntary testing and counseling services to sex workers. NGOs providing these services will be supported by the project.

Activity 2: Behavioral Modification Communication, Outreach, and Condom Distribution Activities Targeting MSM

The project will support Behavioral Modification Packages, community outreach, peer education, counseling services, and telephone hotlines. The development of more such projects will be encouraged. Outreach will be provided to MSM and male sex workers, including risk-behaviour education, and condom and lubricant distribution. Collaborations with government health agencies will be formed to provide STD education and referrals to diagnostic services and treatment. Support will be provided to NGOs working with MSM.

Activity 3: Increase the scale and effectiveness of the Current HIV Prevention System for Intravenous Drug Users

HIV education, Behavioral Modification Packages, free condoms and lubricant are being distributed among intravenous drug users, through peer education. Support is also being provided to intravenous drug users and their families and Voluntary Testing and Counseling Services are being offered. The local community is being encouraged to provide services to intravenous drug users and community advocates are working to decrease social stigma. Methadone maintenance and detoxification clinics are encouraged to provide counseling and promote risk reduction strategies at their facilities. Needle exchange sites are being established and NGOs working with intravenous drug users are being supported.

Activity 4: Interventions Targeting Gaps in Current Prevention Efforts for Out-of-School Youth

Sexual Health Education will be provided to school dropouts, aged 15 to 18, at local youth centres. This will include AIDS education, health referrals, and the distribution of free condoms. NGOs working with school dropouts will be supported.

Table 3.28 - Expected Funding for Objective 2 in US\$, by Year of Project Implementation

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
2.1	718,385	704,785	705,550	708,185	701,250	3,538,155
2.2	368,826	373,101	382,951	363,438	362,376	1,850,737
2.3	340,593	374,840	403,088	388,653	380,218	1,860,392
2.4	312,183	301,818	329,053	292,818	284,383	1,520,255
Total	1,739,987	1,754,544	1,820,642	1,753,094	1,728,227	8,769,539

Objective 3: Increase the Scale and Effectiveness of Treatment and Support Services for People Living with HIV/AIDS and Offer Care and Support to Children/Orphans Affected by HIV/AIDS

Activity 1: Provide Psychological Assistance, Treatment, and Vocational Training Support for Orphans/Children Affected by HIV/AIDS

Families of children on ARV therapy receive psychological counseling and education. All children affected by HIV/AIDS receive child-friendly psychological support. The children will also receive vocational training. Support will be provided to NGOs working with children affected by HIV/AIDS.

Activity 2: Fill Gaps in and Improve the Effectiveness of The National Free Anti-Retroviral (ARV) Treatment Program by Providing Comprehensive Education about Treatment, as well as Support and Counseling for People Living with HIV/AIDS

Psychological counseling and education about treatment will be provided to people living with HIV/AIDS, including support for particularly vulnerable individuals. Workshops will be held to ensure the coordination of NGO activities and government health services. NGOs working with HIV/AIDS affected persons are being supported.

Table 3.29 - Expected Funding for Objective 3 in US\$, by Year of Project was Implemented

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
3.1	139,800	143,800	254,520	258,520	260,920	1,057,560
3.2	408,500	343,100	506,500	488,500	491,700	2,238,300
Total	548,300	486,900	761,020	747,020	772,620	3,295,860

The total funding breakdown is tabulated in Table 30.¹²³

¹²³ The Global Fund to Fight AIDS, Tuberculosis, and Malaria. *Global Fund Round 6 Application – People's Republic of China. July 30th, 2006*

Table 3.30: Funding Requested in US\$, by Objective, for Each Year of the Global Fund
(Round 6) Project in China

Objective	Year 1	Year 2	Year 3	Year 4	Year 5	Total
1.1	174,815	167,605	196,415	191,605	194,015	924,455
1.2	97,075	117,075	97,075	117,075	97,075	525,375
1.3	11,000	1,500	33,500	1,500	11,000	58,500
Total	282,890	286,180	326,990	310,180	302,090	1,508,330
2.1	718,385	704,785	705,550	708,185	701,250	3,538,155
2.2	368,826	373,101	382,951	363,438	362,376	1,850,737
2.3	340,593	374,840	403,088	388,653	380,218	1,860,392
2.4	312,183	301,818	329,053	292,818	284,383	1,520,255
Total	1,739,987	1,754,544	1,820,642	1,753,094	1,728,227	8,769,539
3.1	139,800	143,800	254,520	258,520	260,920	1,057,560
3.2	408,500	343,100	506,500	488,500	491,700	2,238,300
Total	548,300	486,900	761,020	747,020	772,620	3,295,860
Total Objective	2,571,177	2,527,624	2,908,652	2,810,294	2,782,937	13,600,684
Total Management	620,795	93,279	187,589		59,920	795,031
Grand Total	3,191,972	2,620,903	3,096,241	2,643,742	2,842,857	14,395,715

Note: Data provided by the Global Fund for year 4 was in error. Data presented here is from as the original project proposal.

3.2.3 USAID

USAID has no direct presence in China, but provides financial support to Chinese NGOs and American-led university partnerships. For its role in fighting HIV/AIDS in China, USAID is supporting two NGOs in Yunnan and Guangxi provinces¹²⁴. In the financial year 2006, \$990 000 in funding was provided. A detailed breakdown of funds shown in table 27¹²⁵. For the financial year 2008, \$7,800,000 has been requested for China by USAID from the Child Survival and Health Fund, with the funds to be directed largely toward HIV/AIDS programs¹²⁶.

Table 3.31 – USAID Provided to China for Financial Years 2004 – 2007, by Sector

Program Budget by Sector and Account	FY 2004 (\$000)	FY 2005 (\$000)	FY 2006 (\$000)	FY 2007 (\$000)	Percent Change FY 04-07
Basic Education	0	0	1,980	0	N/A
Agriculture and Environment	0	0	2,475	4,000	N/A
Higher Education and Training	0	0	0	267	N/A
Economic Growth	0	0	990	0	N/A
Democracy and Governance	0	0	2,475	733	N/A
Conflict Management/ Humanitarian Assistance	0	4,216	0	0	N/A
Other Infectious Diseases	0	0	990	0	N/A
Others	3,976	0	0	0	N/A
Total	3,976	4,216	8,910	5,000	25.8%

¹²⁴ USAID. *CBJ2006 Budget, Asia and Near East, China*. <http://www.usaid.gov/policy/budget/cbj2006/ane/cn.html> Updated June 15th, 2005. Accessed June 23rd, 2007.

¹²⁵ USAID CBJ 2007 Budget, *Asia and Near East, China*. <http://www.usaid.gov/policy/budget/cbj2007/ane/cn.html> Updated June 2nd, 2006. Accessed June 23rd, 2007.

¹²⁶ Lum, T. *US-Funded Assistance Programs in China*. *CRS Issue Brief for Congress* May 18th, 2007

3.3 International cooperation stimulates anti-HIV/AIDS progress in China

3.3.1 Fund and Technology Support

The world community is offering increasing financial support to HIV/AIDS prevention and control efforts in China, with most of the funding provided by the Global Fund, international bilateral organizations and United Nations' institutes. According to incomplete statistics, the world community's contribution to HIV/AIDS prevention and control in China increased from 256 million Yuan in 2003 to 421 million Yuan in 2004. By the end of 2005, the international community had provided \$229 million in funding, allowing for the implementation of HIV/AIDS related projects in 27 provinces (municipalities and autonomous regions). China has already received about \$134 million from the Global Fund, which has further guaranteed at least 14 million dollars per year over the next five years to support the initiatives of community groups that come into contact with high-risk populations. China has also received aid on HIV/AIDS prevention and control from a variety of other international partners. Significant financial contributions from the international community have assured that important efforts to prevent and control the spread of HIV/AIDS in China can continue.

In addition to financial support, the Chinese government has received much needed guidance about HIV/AIDS prevention and control as well as technical support from the world community. In order to provide more accurate information to policy makers and project participants and improved monitoring of HIV/AIDS infection rates, the Health Ministry and the Center for HIV/AIDS Prevention and Control, in conjunction with WHO, established the first national monitoring centers and the Strategic Information Framework (SIF) in 1995. In the next phase, a national and provincial system of monitoring was established. This has been gradually strengthened in order to provide information to policy makers based on accurate scientific data about infection rates. Since 2001 when the Chinese government first established as an effective measure for HIV/AIDS prevention and control to reduce the harm of HIV/AIDS to the society, a program of "harm reduction," has mainly focused on promoting condom use, needles and syringe exchange and methadone maintenance treatment. This has been the major project component of several international organizations and institutes. Because the intervention approach to "harm reduction" is totally new to HIV/AIDS prevention and control in China and runs counter to Chinese traditional values and the current policy framework, technical support to promote the project must be provided is necessary, especially in the form of needle and syringe exchanges and methadone maintenance treatment.

3.3.2 Introducing Advanced Concepts on HIV/AIDS Prevention and Control and Pro-active Models and Methods of Intervention

Condom distribution, needles and syringes exchange, Methadone maintenance treatments, and intervention on homosexual population, which are now regarded as acceptable and effective measures by professional workers and part of the public, were not implemented smoothly and easily, but experienced a process of being negatively rejected, trial work, being accepted by government, and disputations existing. The process of the intervention model and method being accepted is actually the process of the concepts behind it, through increasing

introduction, being gradually accepted especially by workers in the HIV/AIDS field and the relevant government departments. Without the international cooperation and support on HIV/AIDS, the advanced concepts introduction, the intervention model and method probing, and the initial trial work could not succeed.

The trail work of condom distribution, as one measure for “harm reduction”, started in 2001 with WHO’s support. After it succeeded in pilot areas, the measure was promoted to the whole nation as a major method adopted by the Health Ministry for intervention in the high-risk population. The needles and syringes exchange program and Methadone maintenance treatment, as major intervention measures for “harm reduction”, were also implemented from trial work to promotion in wider communities gradually. Though education and research on homosexual population was firstly launched in the early 1990s by Chinese Health Institute, through its director Chen Bingzhong and his assistant Wan Yanhai, the probing and implementation work of intervention on homosexual behavior was also with supports from relevant international organizations and institutes. In 2001, the office of China-UK HIV/AIDS Prevention and Care Project provided funds to launch four sub-projects targeting homosexual men in Yunnan, Sichuan, Beijing and Qingdao. Those advanced concepts and intervention models that came from technology and funding support from international organizations and institutes and that internationally proved effective played an important role in probing effective intervention measures for preventing and blocking HIV/AIDS spread in China.

3.3.3 Creating a Mechanism for Coordinating Many Government Departments and Encouraging Community Involvement

Participation of so many international organizations, institutes and NGOs in HIV/AIDS prevention and control in China has to some extent forced relevant departments to become more involved in the fight against HIV/AIDS. Using a variety of activities and media outlets, information about HIV/AIDS has been well publicized and social awareness about HIV/AIDS has been greatly increased.

International cooperation on HIV/AIDS has further encouraged the creation of a mechanism for coordinating relevant government departments, in 2002, the China Countrywide Coordination Mechanism (CCCM), was created for the express purpose of implementing Global Fund projects. CCCM consists of 53 members including representatives from; government departments, some international institutes, NGOs, peer advocates for those living with HIV/AIDS, academic institutes and pharmaceutical companies. The launch of CCCM and the workshops it has since sponsored have further encouraged dialogue and coordination of activities among relevant government departments; improved cooperation among relevant institutes and organizations; and helped to maximize community participation in HIV/AIDS prevention and control in China.

3.3.4 Foundation and Development of NGOs in HIV/AIDS Field

In 2001, the United Nations launched the Declaration of Commitment on HIV/AIDS “Global Crisis—Global Action,” in which special emphasis was put on community involvement in preventing and controlling the spread of HIV/AIDS. International experience also shows that

grassroots organizations are more easily accepted and can gain the trust and influence of high-risk groups. These are groups that the government and the general public hardly ever contact. In addition, these NGOs have flexible working models, lower operating costs and are more effective. Clearly, NGOs have a significant role to play in the fight against HIV/AIDS.

To some extent, the growth of international cooperation on HIV/AIDS prevention and control in China has been mirrored by the establishment and development of grassroots organizations dedicated to the fight against HIV/AIDS. In 2005, research by the Community Service Institute at Tsinghua University revealed that among the 157 organizations focusing on HIV/AIDS prevention and control in 24 provinces (municipalities and autonomous regions), fourteen were registered with the Chinese Office of International Organizations, and 47 or 30% of the total received foreign funding. These included; UNAIDS, UNICEF, HAPAC, the Ford Foundation, The International HIV/AIDS Alliance and others.

Some NGOs as well as unregistered community organizations currently fighting HIV/AIDS all received direct or indirect support during their establishing stage, or the process of taking over projects from international organizations and institutes, or HIV/AIDS projects. This support has been critical in keeping grassroots organizations in operation and continuously active in fighting HIV/AIDS.

3.3.5 The Public Supports HIV/AIDS Prevention and Control

Since the first case of infection was reported in 1985, the Chinese public has become increasingly supportive of HIV/AIDS prevention and control. Discrimination against people living with HIV/AIDS still exists, but the social climate has continued to improve in practice over the past 20 years. To some extent, a favorable social climate for HIV/AIDS prevention and control now exists in China

This favorable change in climate towards HIV/AIDS prevention and control is a result of efforts made by healthcare workers and government officials, as well as increased awareness of HIV/AIDS by the media and among the general public. HIV/AIDS publications targets the public, while healthcare professionals, government department heads and the media receive HIV/AIDS related training. All actions taken to create a favorable policy and legal climate are important components of the international effort to fight HIV/AIDS. Public awareness campaigns, training and HIV/AIDS related activities launched by international cooperation projects have laid the groundwork for increasing the level of awareness about HIV/AIDS among government leaders at different levels, the media, the general public and those living with HIV/AIDS. They have also been instrumental in creating a favorable social climate.

3.4 Improving Space in International Cooperation in the Future

3.4.1 Adopting Advanced Models of Intervention in China, already Proved Effective in Practice in International Cooperation

International cooperation has undoubtedly played an important role in HIV/AIDS prevention and control in China. However, problems have arisen when models of intervention that have proved effective in an international context conflict with traditional Chinese values and already existing institutions. For example, the HIV/AIDS prevention and control procedures that have been approved by the Chinese government to reduce high-risk behaviors are still

not accepted by government officials, workers in relevant departments, experts and scholars, the media and the public in general. Making international models work effectively when conflicts arise with Chinese policies, social values and previously existing institutions is a huge challenge to international cooperation.

In 1994, the economist Yang Xiaokai proposed that newly-developing countries should focus on importing technological know how from developed countries. As a result, importing western technology was stressed over western-style institutional reform. In addition, institutions cost more to change and change is threatening to vested interests. At a certain point, technological progress has been hampered by the slow pace of institutional reform. The focus on importing western technology over institutional reform paid big dividends at the beginning, but over time the cost of this approach has been very high.

In 2004, Li Dun, an expert on HIV/AIDS and a professor at Tsinghua University, made the point that in China the process of implementing internationally accepted procedures to combat HIV/AIDS has been plagued by too much importation of technology and too little institutional reform. He further asserted that transplanting foreign models with no consideration for the Chinese context, as well as the widespread reluctance to reform Chinese institutions are undermining efforts to prevent the spread of HIV/AIDS in China.

3.4.2 Project Coordination and Resources Integration in International Cooperation Need to be Improved

Each year the world community has increased support and funding for HIV/AIDS prevention and control in China. However, because projects sponsored by international organizations are operated separately, communication and coordination is poor. This is especially true in provinces or cities with multiple projects, and between international projects and national or local campaigns to prevent the spread of HIV/AIDS. To some extent, these communication problems have hampered efforts to combat the spread of HIV/AIDS in China. Coordination among projects must be more effective in the next phase.

In addition, more attention should be focused on integrating resources with project implementation. China and its foreign partners, the central government and local governments are all facing problems with the integration of project planning, implementation and evaluation. There is still much room for government departments, local governments and institutes to become more integrated in their use of funds.

Chapter 4: Social Assistance for HIV/AIDS Affected People in Rural China

Yuebin Xu
Xiulan Zhang

With the rapid spread of HIV/AIDS in the past decade in China, an increasing number of rural families were left into destitution due to the death or the acquisition of the disease of family labor force and many children and the elderly lost family caregivers. Therefore, along with continued enforcement of prevention and treatment measures, the central government has recently issued a number of policy documents requiring local governments to provide social assistance for the HIV/AIDS affected families, orphans, and old people, with the purpose of ensuring a basic living for them. At a time when China is in the midst of rebuilding its rural social protection system, social assistance for AIDS affected people falls naturally part of the current schemes. Apart from the actual difficulties they are generally faced with, what singles out this group of people as a special case for social assistance are the socially and politically disturbing effects associated with the phenomenon. Therefore, this chapter will first provide a brief account of China's rural social assistance programs and its current reform measures, followed by a description of the new policies that emphasized specifically the inclusion of the AIDS affected group into the current rural social protection schemes. Finally, we will review the actual performance of the social assistance policies in several mostly affected localities.

4.1 China's Current Rural Social Protection Schemes

China's rural social protection policies have been extremely limited. For most of the time since the rural economic reforms that started in the early 1980s, the "Five Guarantees" program has been the single most important social protection scheme in the countryside. Entering the 21st century, increased attention of the government was given to the setting up of various social assistance programs for the rural population. Apart from the "Five Guarantees" scheme, the major ones now include the Minimum Income Guarantee Scheme (Dibao), Assistance for Extremely Poor Households (Tekun), and Medical Financial Assistance (MFA).

4.1.1 The "Five Guarantees" Scheme

Established in the early 1950s as a collective safety-net for the rural elderly, disabled persons, and orphans without family caregivers and sources of income, the "Five Guarantees" program provides the rural destitute particularly the childless elderly with a minimal level of food, clothing, shelter, medicine and funeral expenses, which is how this program got its name of "Five Guarantees", and takes care of them either separately in their villages with both cash and in-kind benefits or collectively in the "Homes for the Aged"¹²⁷. Throughout the reform years, the content and methods of the provision has remained basically the same, except that its financing methods have undergone several major changes in response to changes in the rural economic and institutional contexts. In brief, during the collectivization

¹²⁷ MCA: *A Compilation of Civil Affairs Documents*, Ministry of Civil Affairs, 1982.

period (1956-1979), the production teams provided for the “Five Guarantees” targets out of the collective incomes. With the dismantling of the collective economy, the financing responsibility was first shifted to the village committee and township government which collected fees from individual households and then used them to cover the benefits for the intended targets¹²⁸. Throughout the 1980s and 1990s, the major efforts of government were to ensure continued provision for the “Five Guarantees” targets under this new arrangement, including the issue by State Council of “Regulations on the Work of Rural Five Guarantees” in 1994, which redefined in legal terms the basic principles with regard to eligibility, financing, types and levels of benefits, and methods of provision.

The most recent change with regard to the program was the passing of the revised Regulations on the Rural Five Guarantees” in 2006, which turned the scheme from a collective to state-run program. This was done mainly in response to the financing difficulties arising from the implementation of the “Fee-to-Taxation” reform policies in 1998, by which the previous practice of collecting fees from individual villagers was removed and replaced by levying an agricultural tax on the farmers¹²⁹. As township government and village committees were no longer able to rely on “unified collections” for sources of funding, the financing of the Five Guarantees program became a problem. As a result, the financing responsibility was taken over by the government in the form of a block grant by the central government for township and village administration, which includes money for financing benefits for the elderly people cared separately in the villages. Meanwhile, county government was held to be responsible for the funding and management of the “Homes for the Aged”. Thus, the Five Guarantees scheme was divided into two separate programs with the central and local government sharing the financing responsibility.

4.1.2 The Minimum Income Guarantee Scheme (Dibao)

The Dibao scheme is a recently implemented means-testing benefit. The general practice was that a poverty line or standards of benefits would be first determined by the local government, and households with per capita income falling below the poverty line would be eligible for the benefits, and receive the difference between the total benefits eligible (the local poverty line times the number of persons in the household) and the total household income.

Local implementation of the Dibao scheme was experimented as early as in the mid-1990s in response to the generally alleged inefficiency of the ongoing poverty alleviation program, named the Development Approach to Poverty Alleviation¹³⁰, in tackling current rural poverty. While it is widely acknowledged that the program played an important role in bringing the magnitude of rural poverty from 250 million in 1981 to 23.65 million in 2005, based on the official poverty line of annual per capita net income of 683 Yuan in 2005¹³¹, changes in both

¹²⁸ These collections were named “township unified collections and village retainings”, which means that the township government collects fees and village committee was allowed to use part of the funds for village collective purpose including welfare expenses.

¹²⁹ Further in 2003, agricultural taxation was thoroughly abolished.

¹³⁰ The Development Approach to Poverty Alleviation program started in the mid 1980s as a major tool to address rural poverty. The program relied on geographical targeting methods, with poor counties determined by either the national or local governments as targets for poverty reduction. Its main approach was to create income-generating sources and improve the living conditions for rural people, such as improving rural infrastructure, providing employment opportunities through public works or enterprises funded by state poverty alleviation funds, and organized migration of poor people to well-off places.

¹³¹ China State Statistics Bureau: China’s Rural Poverty Report – 2006.

the incidence and nature of rural poverty in the past decade rendered the approach to be increasingly inefficient. In brief, in the early decades of the reforms, rural poverty was mainly a development related phenomenon, and the poor population was composed of mostly people with working ability but lacking the necessary means or opportunities to engage in income-earning activities. With more than twenty years of input of resources from the various poverty alleviation projects, most of the individuals and households with the ability of working were gradually raised out of poverty. Since the second half of the 1990s, however, poverty reduction slowed down due to the fact that the remaining rural poor population has become geographically more scattered, and most of them became poor because of lack of labor or family members being disabled by major illness. As such, they can hardly benefit from the development approach to poverty alleviation, which relied on the ability of households to work in income-generating activities.

In the early years of the rural Minimum Income Guarantee schemes, financing was defined exclusively as the responsibility of local governments and rural communities. The operation of the program was extremely decentralized and varied considerably across the country. The financing responsibility was usually shared between different levels of government (including provincial, municipal, county and township governments) and village collectives, and the proportion each party should share was also to be decided based on the local context. However, due to the absence of financial input from the central government, only the economically fast developing regions were able to afford the provision. Most schemes particularly in the less developed areas failed to deliver the promised support for the poor. Recognizing the financial difficulties, in 2003 State Council and the Ministry of Civil Affairs issued new policy guidelines, cautioning local governments not to hurry into the scheme and encouraged only those places where local economic conditions allow to explore the program, whereas for those economically constrained localities the advice of the central government was to provide regular relief to those impoverished households due to major illness or loss of family labor, which is called Assistance for Extremely Poor Households (discussed below). By 2006, over 80 percent of the rural counties reported to have set up the schemes. Further in early 2007, the central government appropriated 3,000 million yuan to subsidize local governments for the scheme, which is expected to increase in the years to come.

4.1.3. Assistance for the Extremely Poor Households (Tekun)

As mentioned above, this program was implemented in economically less developed regions as an alternative to the Minimum Income Guarantee scheme to provide social assistance to rural poor households living in destitution. Its support may be either in cash and/or in-kind. A major difference was that the provision of Minimum Income Guarantee benefits was based on a locally defined poverty line, whereas that of the Tekun program relies on the discretion of local cadres, and its levels of benefits often depend on availability of funds in relation to the number of poor households in need of support. The program is also managed by civil affairs. Different from the former categorical and temporary social relief schemes which were uncertain in both sources of funds and the number of recipients, the new scheme is meant to be a regular and more formalized arrangement for dealing with the rural poor. By the end of 2004, most provinces and counties where the Minimum Income Guarantee scheme was deemed to be an unaffordable choice had implemented the scheme. With accelerated spreading of the rural Minimum Income Guarantee scheme, it is expected that this scheme would be gradually merged into it.

4.1.4 Medical Financial Assistance (MFA)

This program is jointly financed by the central and local governments, and provides medical financial assistance to poor households covered under the above three social assistance schemes. Its objective was broadly defined as protecting poor rural households against the impoverishing impact of major illness, which is increasingly recognized as a major source of rural poverty.

The program started in late 2003, and the major policy documents governing this scheme include “Decision of the Central Government on Strengthening Rural Health Work” by the central government in 2002 and “Decision on the implementation of Rural Medical Financial Assistance” jointly by Ministry of Civil Affairs, Ministry of Finance, and Ministry of Health in 2003, which laid down the basic principles for the program. Between 2003 and 2005, the central government allocated 300 million each year for the policy, and the rest was matched by local governments. In 2004, 22 provinces received funds from the central government. Apart from the current beneficiaries of social assistance, local government has considerable discretion over other types of targets for assistance.

The provision of benefits includes two methods. One is to support poor households to participate in the new rural Cooperative Medical Schemes (CMS) where the scheme is available; and another is to provide direct financial assistance to poor households receiving hospital care due to major illness or households whose basic living is threatened due to high medical expenditures. Local government decides over the types of illness and medical services to be covered by the scheme. The levels of benefits and payment methods also varied considerably across localities. In most provinces and counties, reimbursement was used by which the scheme would cover part of the medical costs in varying percentages of the total expenditure. Beneficiaries also include the supported participants of CMS, who are eligible for additional support from the program if CMS is insufficient to meet their needs.

4.2 Social Assistance Policies for HIV/AIDS Affected Families and Orphans

As mentioned in the beginning of the chapter, social assistance for HIV/AIDS affected people in rural China was not created as separate schemes. However, due to the socially threatening effects of the phenomenon and widely recognized hardships among the affected and victimized people, in the past few years several documents have been issued by the central and local government to emphasize the provision of social assistance for the victims of the disease as a major task of local government departments responsible for administering the social assistance schemes.

For most of the time since the spread of the epidemic in China in the early 1980s, the major efforts of the government have been to contain the disease through vigorous prevention and treatment measures. Since 2003, emphases for social assistance for the HIV/AIDS affected patients and their families have been a recurring message in the policy documents of the central government along with continued prevention and treatment measures. Social assistance policies were first stated in 2003 by the central government as part of what was termed as “Four free services and one care” (*si mian yi guan huai*). Specifically, “Four free services” means that HIV/AIDS affected people can receive the following services in the locally designated hospitals or clinics free of charge: taking medicine and receiving treatment; testing and consulting; childbearing counseling, birth-giving service, and mother-to-child

transmission prevention; and psychological rehabilitation and free compulsory education for orphans. And “one care” is that government provides social assistance for AIDS infected patients and their family members if they have economic difficulties, and give the able-bodied patients support to encourage them to be engaged in income-generating activities where this is deemed possible. Further in March 2004, the State Council issued “Announcement on Strengthening the Work on AIDS Prevention and Controlling”, requiring that local governments include the HIV/AIDS affected families with financial difficulties into the targets of government funded social assistance programs. More recently, in the Regulations on AIDS Prevention and Control enacted since March 2006, a special clause (Article 45) was contained specifically for the provision of free preschool and compulsory education for orphans of AIDS patients and HIV/AIDS infected children, including waiver of tuition and textbook fees. However, one condition attached to the assistance was that these people should demonstrate financial difficulties.

As can be seen, the above State Council documents provided only some general guidelines. At the central level, detailed policies were subsequently made by the Ministry of Civil Affairs, which was given the mandate by the State Council HIV/AIDS Prevention and Treatment Committee to design social assistance policies to HIV/AIDS families and orphans¹³². In May 2004, the Ministry of Civil Affairs issued “Announcement on the provision of social assistance for HIV/AIDS infected patients, their family members, orphans and the elderly”. The document was also in the form of policy guidelines, and has been the major policy document governing current social assistance and services for the HIV/AIDS affected people in China.

The solution of the Civil Affairs was to include the HIV/AIDS affected people, including infected patients, orphans and elders due to the death of family caregivers into the current social assistance schemes, if they demonstrate financial difficulties for an adequate living. Indeed, as described previously, China’s countryside has over the years developed a number of social assistance schemes including both cash transfer and services targeted to the general rural poor households, although the benefit levels are generally low and coverage very limited.

More specifically, the Ministry of Civil Affairs’s 2004 Announcement provided four measures for the assistance to HIV/AIDS affected people:

- 1) HIV/AIDS affected people and households including orphans and childless elders living in poverty should be prioritized for receiving regular social assistance.
- 2) Assistance should be provided in accordance with the current social assistance policy frameworks. In places where the Minimum Income Guarantee Scheme (Dibao) has been established, households fall into poverty (based on the locally defined poverty or social assistance thresholds) due to the infection of AIDS should be covered by the scheme; in places where the Dibao scheme was not set up yet, these people or households should be made eligible for regular assistance from the Assistance for the Extremely Poor Households (Tekun); and in addition, the Medical

¹³² The Committee was established in April 2004 by the State Council, which is the highest level policy making body in HIV/AIDS prevention and control. It is headed by Vice-premier Wu Yi and composed of members from more than 20 related line Ministers as well as governors from the HIV/AIDS concentrated provinces. The member ministers include those from Health, Public Security, Finance, Civil Affairs, Education, etc, and the governors include those from Henan, Hubei, Guangdong, Guangxi, Sichuan, Yunnan and Xinjiang. State Council Policy Document [2004] No. 5, February 12, 2004.

Financial Assistance scheme (MFA) should also be made available for them when they need medical services other than those contained in the four free services.;

- 3) Family foster care for orphans by relatives or villagers was encouraged. Four options were recommended for the care of orphans: First is adoption by families. Families are encouraged to adopt the HIV/AIDS orphans, which is regarded as the most appropriate and desired way to meet their needs. The second option is family foster care. For this arrangement, local civil affairs are required to adhere to the Temporary Methods for Administering Family Foster Care, which was issued by the Ministry in 2001 and contained detailed procedures and requirements for the selection and monitoring of the foster families as well as subsidies for them. Thirdly, for those orphans for whom the above two options are not possible, local civil affairs are required to set up care facilities in the local communities and take care of them collectively. The facilities should be operated in the manner of a family setting, and were required to have functions for both daily living and education. Finally, local government can also integrate the care of the orphans into the Homes for the Aged, and take care of them collectively the Homes. This arrangement should also follow the Regulations on the Rural Five Guarantees passed in 2006, and the homes should be made particularly available for elders due to the death of family caregivers. 4) Finally, local civil affairs are encouraged to do fund raising work from international governments and organizations.

Along with the Announcement, the Ministry of Civil Affairs allocated 20 million \$RMB from its lottery incomes specifically for the assistance of HIV/AIDS affected people and orphans. The funds were used for three purposes: 1) direct cash assistance for orphans; 2) support for nine most affected provinces for building care facilities; 3) support for experiment spots on social assistance centers or stations for orphans in Henan and Yunnan provinces.

4.3 The Implementation of Social Assistance Policies

Following the Announcement of the Ministry of Civil Affairs in 2004, most provinces particularly those most affected by the AIDS epidemic, designed and issued local social assistance policies based on the Announcement. The implementation of the policies, however, varied considerably across localities in both sources of funding and policy design. In general, in provinces such as Henan, Shanxi, Hubei and Anhui where infection of AIDS were mainly due to blood selling and patients were relatively more concentrated, most of the AIDS affected households can usually receive regular and higher levels of benefits, whereas in other provinces such as Hunan, Guizhou and Xinjiang where AIDS infection was caused mainly by drug taking, affected people and patients are more scattered. They tend to be separated from their families and live alone in the urban bordering areas, consequently fewer people received the support simply because the civil affairs cannot locate them.

In terms of financing, a few provinces such as Henan, Hubei and Hunan were able to use multi-channel funds, including government revenues, social donations, civil affairs lottery incomes, and donations from international organizations. For instance, in Henan province in 2004 the total expenditure spent on assistance and care for AIDS victims amounted to 19.35 million \$RMB (including 9.85 million from government revenues, 9.05 million from lottery incomes, 0.29 million of social donations, and 0.16 million of donations by international organizations). Of the funds, 2.59 million was used for direct cash assistance, 16.60 million

for the construction of care facilities, and the rest for other purposes. In 2005, the total amount decreased to 10.83 million, which included 9.96 million from government revenues, 0.5 million of lottery incomes, 0.29 million of social donations, and 0.08 million donations by international organizations). Of this, 8.06 million was used for direct cash assistance, and 0.77 million for the building of care facilities for orphans and elders.

In some localities, provincial government arranged special funds in addition to the existing social assistance funding, and other sources of funding are very limited. For instance, in Hubei province in 2005 the provincial government allocated 8 million \$RMB (including 5 million from government revenues and 3 million from lottery incomes), all of which were used for direct cash assistance for the AIDS affected poor families and orphans. Still in some other provinces there were no additional financial input from the government, and there is little difference between social assistance for AIDS affected households and other ordinary poor households. However, local civil affairs may give special consideration for the group in administering the current social assistance schemes. For instance, in Guizhou and Jiangxi provincial government made no special allocations, and social assistance for AIDS affected poor households was managed in the same as other poor households.

Policy design followed basically the same methods as those in the existing social assistance schemes. However, most provinces made some adjustments on the levels of benefits which usually differ between orphans, patients and the elderly, and take into account family structure and the number of patients in a household. In most localities, orphans were usually given a higher level of benefits than others, while benefit levels for HIV/AIDS affected households can be much higher than that for ordinary poor households receiving social assistance from Dibao. Table 4.1 below compares the benefit levels for AIDS targets and that of the Minimum Income Guarantee scheme (Dibao) for ordinary poor households in seven counties of three provinces in 2004:

Table 4.1: Comparison of benefits between Dibao and AIDS social assistance

Provinces	Counties	Benefits for AIDS patients and their family members (\$RMB/per year/per person)	Benefits for AIDS orphans (\$RMB/per year/per person)	Benefits of Dibao for rural poor (\$RMB/per year/per person)
Henan	Dengzhou	144	1920	144
	Xinxiang	860	860	860
Anhui	Funan	827	960	-
	Lixing	730	805	130
	Dazhi	578	154	120
Hubei	Huangmei	140	140	140
	Tuanfeng	120	800	120

Sources: the Ministry of Civil Affairs.

Another adjustment was often made with regard to the procedures for application and approval. For the ordinary poor households applying for social assistance from the Dibao program, a widely used targeting method was to publicize their personal and family information on the community bulletin board or other public sites for the purpose of ensuring democratic overseeing by the villagers. This procedure was removed in all the localities for AIDS affected poor households. In fact, in most provinces AIDS affected poor households do not need to apply for the support. Local civil affairs usually identify them through the list of AIDS patients kept by the Health department and then provide assistance directly to them.

There were also counties such as in several counties in Henan province where AIDS affected poor households need to go through the application procedures, with their names publicized for public overseeing. This was mainly because of the fact that most infected patients in the locality were caused by blood selling, and there is no stigma associated with the infected person. On the contrary, due to general poverty in the villages and the priority given to AIDS affected households for social assistance, there were reports that non-infected people applied for the assistance by reporting that they had acquired the disease.

The most complicated and well-developed schemes for assistance for HIV/AIDS affected households and orphans are found in the Shangcai County in Henan province. Being a nationally designated poor county, the infected patients acquired the disease mainly because of blood selling. In 2004, a total number of 6,831 villagers in the county were identified as HIV/AIDS infected patients, which resulted in 676 orphans and 115 lone elders. By early 2007, the number of orphans increased to 2104. Among them, 802 orphans lost both parents and 1302 lost one parent.

As early as in 2002, the Shangcai county government issued “Social Assistance for AIDS Affected Households, Orphans and Lone Elders”, which divided the targets for social assistance into five categories based on the characteristics of the affected individuals and severity of poverty. For poor households due to AIDS infection, three degrees were differentiated as relatively poor, poor and extremely poor, usually based on the number of patients in the family. Another two categories are orphans and lone elders. Benefit levels and care arrangements were also designed accordingly in respect to the five categories.

The design of the social assistance scheme includes an identification procedure for AIDS infected patients. That is, individuals identified to be HIV/AIDS infected by the AIDS Infection Verification Team, which is specially established for screening the patients, first apply to the village committee for social assistance with the infection verification document issued by the team, then their personal and family information would be publicized for villagers’ overseeing. If no objection was raised by villagers, the village committee would report to the township government for approval for the benefit.

For orphans, either infected or non-infected, two criteria have to be met for them to receive the assistance: One is that they have lost both parents, and the other is an age limit of 18 years old. However, if an orphan has grandparents or adult siblings who have the ability to take care of him, he is not eligible for the assistance. Another disqualifying factor is that when the orphan reaches 16 years old and has the ability to work, the benefit would be ceased. One exception is that if the orphan is still in the compulsory education stage, he would continue to receive the assistance. In practice, the rules for orphans tend to be very flexible and relaxed. Children under the age of 18 are generally assisted as long as one of their parents is verified as AIDS infected, and still live with them. And for young people who are in the college, they can continue to receive the support even they passed the age limit. Similarly, support for lone elders was defined primarily as a family obligation. Social assistance for elders not only takes into account the availability of their own children, but also their close relatives such as niece and nephews.

In 2007, the amount of benefit an infected household receives is determined according to the number of patients in the family. a monthly 30 Yuan for a household with one infected member, 80 Yuan for two infected members, and 150 Yuan for three or more infected members. For orphans, those cared in foster families are provided with 160 Yuan per month

and the money would be directly given to the caring families. For those under collective care in the facilities, the amount of assistance was 180 Yuan per month, which is managed by the civil affairs for collective use. Children living with one parent receive 50 Yuan per month. For elders, a monthly 79 Yuan is provided for those living in the village either independently or with other families, and 100 Yuan for those cared collectively in the Homes of the Aged.

The Shangcai County presented an extreme case in social assistance for AIDS affected poor households and related people in both coverage and benefit levels. For other localities, the Ministry of Civil Affairs is currently pushing them to improve the policies and try to cover as many as possible the identified households and individuals. In general, apart from Henan province where almost all infected poor households have received the support, in other localities only a small section of the households and individuals are covered by the benefit.

Chapter 5: Methodology and Evaluation Process

Xiulan Zhang

Yurong Zhang

5.1 Evaluation Framework

5.1.1 The Objectives

Striving to make evidence-based policy evaluation and recommendations, the overall purpose of this study is to assess whether and to what extent the Global Fund and the government social and health protection policy has met the needs of the HIV/AIDS families and to explore how it can engage central, local, community and kinship networks for these families to develop a coping strategy. The study will focus on finding “facts” from the receiving end and then would assess and recommend policies on the basis of these facts.

Objective 1: “Facts” Finding

- A description on the register cases will focus on the social demographic characteristics of the HIV positive, AIDS, and the family members. The variables include age, gender, employment, family size and family life cycle, educational attainment, marital status, family income and expenses, etc.
- An assessment of whether the government programs and the Global Fund are appropriate along various dimensions, including: (i) complementary and/or duplication or coverage gaps across programs in target beneficiaries and interventions; (ii) balance between cash, in-kind and exemption entitlements in light of the needs of different sub-groups of families; (iii) balance and sustainability of social and health protection programs, Global Fund and informal support.
- An assessment of financing levels and structure with respect to the Global Fund and the government relief programs, and appropriateness in terms of reducing the poverty of the HIV/AIDS families, increasing the access to social and health services, the degree to which this relief enables families to buy sufficient food, educate their children and obtain medical care. What do they regard as their needs and vulnerabilities and in what ways do they prefer to be supported?
- An assessment of the support and services provided by NGOs, charities and other non-public organizations to these families, including program description, coverage, spending where available, and institutional interface between the non-public and public programs.
- Understanding on self-perceived social stigma and how to cope with this discrimination. Documentation of their negative experiences from the community and from other sources.

Objective 2: Testing Key Hypotheses

- The intensive support by government and/or the Global Fund project would lead to greater understanding of the problem and a decreased willingness to stigmatize HIV/AIDS people.
- HIV/AIDS people that receive relief payments consume more food and have more access to education and medical care than HIV/AIDS families in provinces that do not pay relief.
- Global Fund projects are additional to other government funding and households in localities with Global Fund support have greater access to health care than in localities without Global Fund support.
- Government leaders in localities that have had special attention from government and/or Global Fund are more likely to have positive attitudes towards the support of HIV/AIDS families.

Objective Aim 3: Evidence-Based Recommendations on Policy Development in Reducing Inequality and Increase Financial Protection

5.1.2 The Methodology

Three methods were used in the survey: household questionnaire interviews, case interviews and in-depth interviews.

5.1.2.1 household Surveys

The household questionnaire contains basic information on the household members, the situation of the family members living with HIV/AIDS (number, infection mode, time under treatment, treatment expense and economic and social status), economic and social status of other family members, income and expenditure of the household, current situation of the household regarding demand for and access to social assistance, impact of HIV/AIDS infection on the household, and social support network for people living with HIV/AIDS. In order to guarantee the survey's quality and collect valid information on the households investigated, the first subject was defined as an adult living with HIV/AIDS. If the household has more than one HIV-positive member, the first subject is the infected household head. If the household head is unavailable for interview due to being busy with farming or being out for work, his or her spouse and other adult members who know the family well are treated as interviewed object.

5.1.2.2 Case Interviews

The survey group adopts a semi-structured interview, which aims, in addition to the content of questionnaire for households, to investigate the impact of HIV/AIDS infection on the household from a social and gender perspective, including possession and allocation of the household internal resources, changes in the household internal decision-making power, changes in work division and in the roles of male and female family members, and the

situation of HIV-positive people taking part in non-government organizations and self-help associations. The people living with HIV/AIDS are the subjects of the case interview. Case interviews were conducted during the course of the household questionnaire interviews.

5.1.2.3 In-depth Interviews

The object of the in-depth interview is the officers who are in charge of HIV/AIDS assistance in the Ministry of Civil Affairs of the target provinces, the officers who are in charge of social assistance in Civil Affairs of the target counties or cities, and the officers who are in charge of HIV/AIDS affairs in CDC and the health department of the target counties or cities. Its content covers the basic situation of HIV/AIDS prevalence in the target county or city, problems existing in HIV/AIDS assistance, the division of responsibility and cooperation between government departments in HIV/AIDS control and prevention, the allocation and disbursement of the funds for HIV/AIDS assistance, control and prevention, policies and programs launched by relevant government departments for HIV/AIDS assistance, control and prevention, and difficulties existing in HIV/AIDS assistance, control and prevention and relevant suggestions for resolution.

5.2 Evaluation Process

The survey started at the end of Oct, 2006. In the first target site, Yunnan province, the survey group confronted great challenges in finding the survey subjects because local households with PLWHA are scattered, and not concentrated in one area, local traffic conditions are poor and the self-protective behavior of people infected through intravenous drug use is very strong. Therefore it took 8 interviewers 60 days to finish the survey of 342 households of PLWHA in Yunnan province. When it ended in mid Jan, 2007, four interviewers moved to Henan province and Anhui province in central China, where the main route of infection was paid blood donation. In these two provinces, the survey group found the subjects more easily because local households with PLWHA are more concentrated, the relevant assistance programs launched by the government are more effective and the social environment for people living with HIV/AIDS is fairly favorable. Therefore the survey in these two provinces took about three weeks to complete and covered 679 households with PLWHA, including 368 in Henan province and 311 in Anhui province.

After Henan province and Anhui province, the survey in Guizhou province, the last target site, did not start before April 2007 due to Spring Festival vacation, winter holiday, selection of target province and coordination among government departments. After it was launched, 4 interviewers spent two weeks completing the investigation of 99 households with PLWHA in the province.

Because the supervision of people living with HIV/AIDS from local government departments, mainly Civil Affairs and the health department, is so weak, there is often no information on the PLWHA at the local government level. Thus these people are beyond control, and the survey group could not find many households desiring to be interviewed in the province. In addition, it should be noted that relevant government departments have even weaker supervision of rural population than of urban population. At present, only 10 households with PLWHA contaminated through paid blood donation in the township of Tongren city, Yunnan province, are under the supervision and control of relevant government departments. Due to the above reason, the survey group, considering the cost of finding more targets among rural

people, interviewed 89 urban households with PLWHA after finishing the above 10 rural households.

5.2.1 The Target Site of Field Survey

5.2.1.1 The Selection of Target Provinces

Currently, the HIV/AIDS issue is very sensitive in China and local governments are very cautious about it. Considering this, the survey group first obtained official support from the Dibao department of the Ministry of Civil Affairs to keep the survey away from difficulties. In the first phase, the Dibao department selected four target provinces (Yunnan province, Henan province, Anhui province and Guizhou province) on the basis of systematic consideration of influencing factors and communication with Civil Affairs of the provinces with concentrated infections. The factors concerned included the extent of the local province's Civil Affairs supervision and control of people living with HIV/AIDS, the effectiveness of relevant assistance programs in the province, the seriousness of local HIV/AIDS prevalence, the distribution of people living with HIV/AIDS and their families, the implementation of the Global Fund projects, traffic conditions and the understanding of local dialects.

Specifically, selection of the above four provinces were based on the following considerations:

- 1) *HIV/AIDS prevalence in the four provinces compared to national prevalence:* Yunnan province and Henan province are representative of those provinces with concentrated HIV/AIDS infections in China. As early as 2004, The Ministry of Health selected Zhumadian city in Henan province and Dehong autonomous prefecture in Yunnan province as key communication stations. Since then the Ministry has largely increased relevant funds and technical support to the two stations and special funding to the stations amounted to 11 million Yuan a year. Anhui province, as a neighbor of Henan province, is representative of Central China where the main mode of transmission has been paid blood donations. An important reason to select Anhui province is that the local government has an understanding attitude toward HIV/AIDS infections and that local social forces interact harmoniously in HIV/AIDS comprehensive control and prevention. Guizhou province, adjoining with Yunnan province, is an important province among those where HIV/AIDS was mainly transmitted through intravenous drug use. Though HIV/AIDS prevalence is not so high, the province plays a crucial in the spreading of HIV/AIDS as it is a key drug transfer station in Southwest China.
- 2) *The different HIV/AIDS infection routes:* Henan and Anhui are two representative provinces of Central China where the main mode of transmission has been paid blood donation, which is a unique characteristic of HIV/AIDS epidemic in China compared to the other countries. Yunnan province and Guizhou province, as drug bases in China and the key drug transfer stations in Southwest China, are representative of provinces where infections are mainly occurring though intravenous drug use. Therefore, the selection of these four provinces with different infection routes can, to some extent, reflect the overall situation of HIV/AIDS prevalence in China.
- 3) *The implementation of Global Fund financed projects:* Henan and Anhui are two of

the seven provinces involved in the third phase of the Global Fund project, “China CARES (China Comprehensive Aids Response) —A Community-Based HIV Treatment, Care and Prevention Program in Central China”. Meanwhile, Yunnan and Guizhou are two of the seven provinces involved in the forth phase Global Fund project, “Reducing HIV Transmission among Vulnerable Groups and Alleviating Its Impact in Seven Provinces in China”. Therefore, the survey on counties and cities of the above four provinces can somehow reflect implementation of the Global Fund project in China.

5.2.1.2 The Sites of Field Survey

The survey aims to understand the situation of people living with HIV/AIDS in rural areas and relevant assistance received, and thus should be conducted in townships and villages with concentrated infections. However, the case of Guizhou province should be noted: besides 14 rural PLWHA from 10 households that are under the supervision and control of the local health department, the interviews of the rest of the subjects were conducted in the MMT Center in the county town. The distribution of field survey sites is shown in Table 6.1 below:

Table 6.1: Field Survey Sites

Province	County/ City / district	Township/ superior township
Dehong autonomous prefecture, Yunnan Province	Longchuan county	Superior townships of Chengzi, Longba, Jianghan, and township of Husa
	Ruili city of county level	Superior townships of Nongdao, Kanmao, and township of Kanxiu
	Yingjiang county	Superior township of Taiping
	Shangcai county	Townships of Shaodian, Lugang, and Wulong
Zhumadian city, Henan province		
Fuyang city, Anhui province	Economy and Technology Development Zone	Jingjiu Sub-district Office
	Yingzhou district	Township of Wangdian
	Funan county	Superior township of Wanghua, Yuji, Longwang
	Linquan county	Superior township of Tianqiao, the Development Zone
Guizhou province	Zhijin county, Bijie region.	MMT Center of CDC, Zhijin county
	Tongren city of county level, Tongren region	Daping township, and MMT Center of CDC, Tongren city
	Duyun city, Qiannan autonomous prefecture	MMT Center of CDC, Duyun city
	Guiyang	Nanming District

Totally, the survey included 4 provinces, 12 counties (cities and districts), 19 townships and superior townships, 63 administrative villages and 4 MMT Centers (1 in Ruili city in Yunnan province and 3 in three counties and cities of Guizhou province).

5.2.2 Selection of the Subjects

Selection of the first group: The first group of subjects is composed of directors and workers

in relevant government departments, including mainly directors of Civil Affairs and health department in target county, directors and workers of local CDC and primary-level workers of Civil Affairs and health department.

Selection of the second group: Due to the specific characteristics of these subjects, mainly households with PLWHA, it is very hard for the survey group to determine the target people through sampling methods. So a general survey was introduced to determine the subjects: are defined as subjects people living with HIV/AIDS under the supervision and control of local government departments and who are willing to accept an interview.

Though the general survey is adopted in the practice, there are still a few people living with HIV/AIDS that are hard to find, even if they are registered in relevant government departments, especially in Yunnan province and Guizhou province where the main mode of transmission is intravenous drug use. Households with PLWHA are scattered, people living with HIV/AIDS are often out for work, and the relevant assistance programs launched by government are weak. Compared with the above case, it is much easier to find the target people in Henan province and Anhui province where the main mode of transmission is former paid blood donations, households with infections are more concentrated, people living with HIV/AIDS rarely work, and the relevant assistance programs launched by government are more effective.

5.2.3 Procedure of the Survey

Considering the sensibility of the HIV/AIDS issue, especially local governments' cautiousness regarding this problem, and in order to successfully carry the survey out, the survey group received considerable support from the Dibao department of the Ministry of Civil Affairs, which is the national department responsible for social assistance. This support is materialized through the Ministry of Civil Affairs officially making the survey admitted by local governments. Concretely, the Dibao department selects the target provinces on the basis of considering comprehensively all influencing factors, and contacts the relevant government departments of those provinces to notify relevant officials, thus ensuring the survey could be conducted successfully.

The survey's procedure is as follows: Before the field survey, the Dibao department estimates all influencing factors (the seriousness of HIV/AIDS prevalence, the extent to which the local government supervises and controls infections, and the effectiveness of assistance programs launched by relevant government departments) to determine the target provinces, and then contacts the target provinces' Civil Affairs on relevant affairs. Next, the survey group gets the phone numbers of officers in the target province's Civil Affairs office from the Dibao department and further communicates with them on preparing affairs. Then according to the requirements of the survey group and the Ministry of Civil Affairs, the province's Civil Affairs estimates local influencing factors (distribution of people living with HIV/AIDS in the province, concentration of household with infections, and local traffic conditions), determines the target counties and cities and contacts the relevant departments of Civil Affairs. Then, the survey group gets phone numbers of officers of Civil Affairs in the target county or city from the province's Civil Affairs and communicates further with them on concrete arrangements for the survey. In the ensuing step, the survey group arrives in the target county or city to communicate with local officers on target township selection. Finally, the survey group, guided by local preliminary level workers of relevant government

departments, enters villages to interview the subjects face to face.

The general procedure is as follow:

- 1) Dibao department of the Ministry of Civil Affairs selects provinces, municipalities, or autonomous regions that are representative, with concentrated infections, then contacts the local Civil Affairs at the province level.
- 2) The local Civil Affairs of province level selects counties and cities that are representative and with concentrated infections, then contacts the local Civil Affairs at the county level.
- 3) The survey group contacts Civil Affairs in the Target County or City to communicate further on concrete affairs.
- 4) Civil Affairs of the target county or city selects townships or superior townships that are representative and with concentrated infections, then contacts directors and preliminary level workers in charge of Civil Affair in the target townships.
- 5) The survey group interviews survey subjects face to face, guided by the preliminary workers in target counties.

The above shows the general procedure. Among the four provinces, the surveys in Yunnan, Henan and Anhui provinces conformed to it. However the procedure in Guizhou province was different. In the province level, Guizhou Civil Affairs is still responsible for coordination. But during the field survey, the province's Center of Disease Control and Prevention (CDC), a branch of the province's health department, is in charge of coordination. The reason that the CDC took responsibility instead of Civil Affairs is that the local Civil Affairs has scarce information on people living with HIV/AIDS because its assistance programs are weak, the subject population is small and is scattered over a large area. In order to ensure the survey's success, the province's Civil Affairs contacted the province's health department, which is responsible for HIV/AIDS affairs, and the latter, mainly through the CDC of target counties and cities, provided coordination for the survey. Because of this participation by the health department and CDC, the procedure in Guizhou province was different from that in other three provinces, and the procedure is shown as follow:

- 1) Dibao department selects Guizhou province as the survey site and contacts the province's Civil Affairs.
- 2) The province's Civil Affairs contacts the Province's CDC for coordination and informs the latter of relevant information on the survey.
- 3) The province's CDC selects target counties and cities and informs the latter of relevant information on the survey.
- 4) The survey group contacts the CDC's director in the target counties and cities and communicates on detailed affairs of the survey.
- 5) The survey group interviews target people face to face, with the coordination of local CDC.

5.2.4 The Model for Seeking Survey Subjects

The above procedures describe from a macro perspective the course that the survey group takes to find the subjects, following the existent government levels. The course depends more on administrative decisions and coordination from superior government departments. In practice, the greatest challenge lies in the last step, namely step 5 in charts 1 and 2, that is how the survey group can find the subjects and then interview them face to face with their

consent after arriving in the target township.

Because of the seriousness of HIV/AIDS prevalence, the concentration of infection, the distribution of households with PLWHA, the infection route, and the various effectiveness of assistance programs launched by governments in the four provinces, the way the survey group seeks the subjects in preliminary levels has varied. According to the different cases in the four provinces, the following models are adopted to look for the subjects.

5.2.4.1 Concentrated Interviews

This model is mainly adopted in Henan and Anhui province where HIV/AIDS prevalence is more serious, households with PLWHA are more concentrated, social discrimination against HIV/AIDS infections is reduced (for two reasons: the main mode of transmission is paid blood donation, which causes less moral judgments than other routes, and people living with HIV/AIDS are more concentrated), and assistance programs launched by government are more effective. Additionally, this model is also adopted in the survey of 14 rural people living with HIV/AIDS in 10 households in a township of Guizhou province. Generally, the interviewing site is the village committee office. If it is unavailable, the township's health center is the substitute.

It should be noted that the survey group respects the subject's will when conducting the interview, though less discrimination is placed on people living with HIV/AIDS in the above provinces, which is the main reason to use concentrated interviews. If a person does not want to be interviewed, no forced measures are adopted. If he/she can not accept to be "exposed" in the interview, the survey group will communicate with him/her to find an alternative acceptable method.

5.2.4.2 Household Interviews

In this model, the interview by the survey group must be guided by local preliminary workers, generally Civil Affairs assistants and village doctors. This model is mainly adopted in Yunnan province, where HIV/AIDS prevalence is more serious, household distribution is more scattered, and government assistance programs are weak. In counties of Anhui province, it is also adopted. This model can ensure an excellent interview result with the help of local preliminary workers, especially those who are often in contact with people living with HIV/AIDS, and are in charge of treatment for HIV/AIDS infection and distribution of antiretroviral drugs, and thus are trusted by the people living with HIV/AIDS.

5.2.4.3 Methadone Maintenance Treatment Center (MMTC) Interviews

This model is adopted in Yunnan and Guizhou provinces where the main route of infection is intravenous drug use, and where Methadone Maintenance Treatment (MMT) is broadly established. It was first introduced in Yunnan province. Because local households are very scattered, people living with HIV/AIDS are not concentrated, the self-protective defensiveness of people infected through intravenous drug use is very strong, and local traffic conditions are poor, the survey group confronts great challenges in finding subjects. Therefore, the survey is in a deadlock before a village doctor suggests that some attempts should be taken in the local MMT Center, where people infected through intravenous drug use come to take Methadone treatment every day. The survey group contacted the local health departments and local MMT Centers. After approval by the local health departments and consent by Methadone users, the survey group conducts face to face interviews, in private

rooms in the MMT Center, with people living with HIV/AIDS who are taking Methadone regularly.

The model is adequate for the survey in Yunnan province and Guizhou province where the main infection mode is intravenous drug use. With the introduction of the concept of HIV/AIDS comprehensive control and prevention, the MMT that was hardly accepted before is now well developed in the two provinces. While this model of interview was adopted in both Yunnan and Guizhou province, the practice is different. In Yunnan province, the household interview is attempted according to the earlier models, and this model is only introduced in the later stage when the survey comes to a deadlock. In Guizhou province, this model is adopted to find the subjects in all three counties. Additionally, the situation of people who are taking Methadone in the two provinces are different. In Guizhou, most of the people living with HIV/AIDS are living in urban areas, and few live in the countryside. However, the situation is the exact opposite in Yunnan province where most PLWHA are living in rural areas.

5.2.4.4 Find the Subjects through the Assistance of Self-help and Mutual-aid Associations

In Yunnan province, the survey group makes acquaintance with a director of a local self-help association and attains his trust. Thus the director helps the survey group voluntarily to find subjects. Also in Anhui province, a local mutual-aid association provides great help to the survey group in finding the subjects.

5.2.4.5 Other Models

In Guizhou province, the relapse rate among people infected through intravenous drug use is very high. Considering this case, the survey group interviews some PLWHA in compulsory rehabilitation, in coordination with the local health department. Besides, in Yunnan province some people living with HIV/AIDS voluntarily contact their infected friends and inform them of the survey after they are interviewed. On a voluntary basis, some of these people were also interviewed.

Chapter 6: Health Service Provision for Rural People Living with

HIV/AIDS

Xiying Wang
Yurong Zhang

The purpose of this article is to delineate the health care network for rural people living with HIV/AIDS (PLWHA) in China. Starting with a story of a female village doctor in Yunnan, this article firstly pays attention to the grassroots private clinics, the basic unit of health care that closely related to PLWHA' health and lives day to day, and then extends the focus to the all tiers of health units, especially the three-level network of county-township-village that rural PLWHA use most. This article also classifies the health units into two systems according to their different functions: Centre for Disease Prevention and Control (CDC) as testing and preventive institutions, and hospitals including health stations and private clinics as curative and treatment institutions. Through discussing and exposing the existing difficulties and problems of rural public health units combating HIV/AIDS, this article proposes recommendations for public policy and further studies.

6.1 Female Village Doctor Luo Lu

“The issue of HIV/AIDS is filled with my mind, sometimes even in the dreams,” said Luo Lu, a female village doctor in Guangsong Village, Jingnan Town, Long Chuan County, Dehong City, Yunnan Province. The day we met Luo Lu was December, still warm and sunny. Her private clinic is one small house located at the roadside of the village, crude and clean. “Preventing HIV/AIDS (yufang aizhibing)”, the five Chinese characters slogan has been brushed in white against the grey front wall of the clinic, in not very good handwriting (picture 1). Though it was the first time we met her, Luo Lu acted like an old friend, nice, candid, and always with a smile. She was very helpful as a gatekeeper for us to identify informants during household surveys and individual interviews with PLWHA in her area.

After graduating from the nursing school, Luo Lu “went to the sea” to do business for a few years. When the local government began to pay attention to the prevention and control of the HIV/AIDS epidemic, Luo Lu joined the army of fighting with HIV/AIDS epidemic and to be a first line doctor: village doctor. As a village doctor, Luo Lu was in charge of 26 PLWHA' HIV/AIDS knowledge education, behavioral intervention and surveillance, home visit, physical examination, and medicine distribution. Among the 26 PLWHA, 5 of them migrated to the cities to be working laborers, and the left 21 were staying at home. Most of them were Jingpo nationality, living sparsely on the mountains.

According to the requirement from the local CDC, Luo Lu had to home visit every PLWHA once per month (Picture 2). Luo Lu were used to riding motorcycle to visit, however, 3 of her patients lived more than 20 Kilometers from her clinic. In order to visit them, she had to ride motorcycle first and then climb the mountain to their houses. When she brought us to the PLWHA' house to do the household survey, we found that she walked very fast on the mountain and in the field of sugarcane, and we had to try our best to keep up with her. If it

rained, she had to give up the motorcycle and visit everyone by foot. Usually it took her 10 days per month to do one round home visit, which also caused her economic loss since the clinic had to close down one third of the time. She also called the five migrant PLWHA every month and paid the long-distance phone fee from her own pocket. Moreover, she has the responsibility to bring the PLWHA from the village to the county hospital for examination regularly. For all these she has done for the PLWHA, she only receive month stipend of 120 RMB plus 10 RMB per visit oil fee stipend from the local government.



Picture1: A grassroots private clinic in Yunnan



Picture 2: a PLWHA's home

From the short time we spent with Luo Lu, we could tell that she had very good relationships with those PLWHA that she took care of. She was familiar with, not only these PLWHA, but their families, situations, difficulties, and problems as well. One informant told us, “doctor Luo is very nice and sometimes we can get medicine (for other purpose rather than HIV/AIDS) first and pay later if we have no money indeed.” Some informants mentioned that they even borrowed money from her, and most of them agreed that when they were in bad mood, talking with her was always a way of relief.

Luo Lu told us, “here the working condition is poor, and I have to deal with all kinds of obstacles by myself,” later, she joked, “sometimes I really want to quit.” The most troublesome issue for her is the misunderstanding from PLWHA. “There is one pair of couple, no matter how I explain, they insist on not wearing condoms during sex. I figure it out. If they do not listen, I will not give up, 20 times, 30 times, 200 times, 300 times, until they accept.” Once when the governor of Yunnan Province came to Guangsong Village to inspect the HIV/AIDS epidemic, Luo Lu asked him in person whether the province could donate a van to the village since the local public transportation was very inconvenient and PLWHA needed travel to the county hospital for examination quite often. Therefore, the local people call her, “the first village doctor who dare to ask a van from the governor.”

6.2 From Barefoot Doctors to the Grassroots Private Clinics

Like Luo Lu, there are hundreds and thousands village doctors in Yunnan actively working in the frontier of fighting against HIV/AIDS epidemic, which contributes as the basic unit of health service network of preventing, controlling, and curing HIV/AIDS. There is no statistics show the exact figures of village doctors who are involved in the HIV/AIDS work. As we know, in the Guang Song village that Luo Lu lived, there are three village doctors (two female and one male) and three private clinics. In the Jingnan town, the reported PLWHA are around 500. Suppose each village doctor, like Luo Lu, was asked to be in charge of around 25 PLWHA' following up visit and examination, the whole Jingnan town would at least has around 20 village doctors and private clinics. Extending from one town to the whole Yunnan province, the amount of village doctors and private clinics is considerable.

The village doctor stemmed from the barefoot doctor (*chijiao yisheng*), which received much publicity in the West for their supposed effectiveness in meeting the needs of rural populations and was praised by WHO as one of the “three magic weapons”¹³³ of rural health service in China in the Maoist Era. Barefoot doctor was a term emerged in mid-1960s referring to a paramedical worker with basic medical training working in a rural district in China. They have the following three characteristics: first, they had not received formal medical training; second, they were rural household register; third, they are semi farmer semi doctor. The development of barefoot doctors relied on the establishment of the Rural Cooperative Medical System.

China was the first large nation in the world to develop a nationwide rural health insurance system in the 1970s. The Rural Cooperative Medical System (RCMS , *hezuo yiliao*), was a community-based rural health financing and provision system functioning as collective medical insurance in villages. Although schemes varied, families were usually asked to contribute about 2 per cent of their annual income, which was matched with money from the village's welfare fund(Liu, 2004b; Zhang & Chen, 1996). Under the RCMS, Barefoot doctors provided both Western and traditional Chinese medical care and many public health services (Blumenthal & Hsiao, 2005), and they were subsidized by governments. By 1980, about 90% of the production brigades (comparable to the present day administrative villages) were implementing RCMS, forming part of a three-tiered (county, township, and village) health services network that combined prevention, treatment, and health maintenance. In addition to 510,000 regular doctors, the network included 1.46 million barefoot doctors, who continued their regular work in the production brigades, 2.36 million production team health workers, and 630,000 village midwives.¹⁸ This health revolution in the Chinese countryside basically realized the goal of “treating minor diseases in the village, and major diseases in the township.” The WHO and the World Bank praised the “Chinese model,” which allowed “the greatest health benefits for the smallest inputs.”(Hillier & Shen, 1996; Liu, 2004a; Wang, 2004).

However, when China transformed its system of collective agricultural production to private production in the late 1970s, the RCMS collapsed immediately, vaunted barefoot doctors became unemployed and stopped providing public health services for which they were not compensated, and 900 million rural peasants, mostly poor citizens became, in effect, uninsured overnight. In 1985, an article titled as “No longer using the name of barefoot doctor, consolidate and develop rural doctor troop” was published in *People's Daily*, and therefore

¹³³ “Three magic weapons” are township public health center, rural cooperative medical system, and barefoot doctor.

barefoot doctor gradually faded off the historical stage. The government once innocently believed that the country's rapid economic growth would automatically improve the general public healthcare system, unfortunately, the facts proved that it was wrong.

Under this situation, some of the barefoot doctors have turning into private health care practitioners with license, named formally as rural doctor, or called as village doctor like Luo Lu. Drug prescribing is their main sources of income and fee-for-service is their practice since they are no compensated. The function of barefoot doctors as shock troops of public health in rural areas in the Maoist era has enormously weakened in the reform era. The issue of rural public health has been neglected, for example, in some poor rural areas infant mortality has increased recently, although it has continued to fall in urban centers, and there has been a resurgence of some infectious diseases, such as schistosomiasis, which was nearly controlled in the past (Blumenthal & Hsiao, 2005). Facing the growing epidemic of HIV/AIDS and associated outbreaks of multidrug-resistant tuberculosis, the China's rural public health infrastructure inevitably encounters big challenges.

6.3 Yunnan New Model: The Role of Village Doctors in Combating HIV/AIDS

In Yunnan, the marriage of drug abuse and HIV/AIDS has led to a serious public health problem. Prevention and controlling the widespread of HIV/AIDS is becoming an urgent task for constructing rural public health safety network. Some characteristics of local Yunnan makes the task especially difficult, such as, the injecting drug use as a hidden route of transmission, the sparse living structure, and the inconvenient transportation. With reference to the function of barefoot doctors in the RCMS, local department of health recruits rural doctors and their private clinics into the network of HIV/AIDS prevention and cure through paying stipend to them. Therefore, the rural private clinics become the basic unit of health care system of fighting HIV/AIDS. In general, the role of the community private doctors in grassroots HIV/AIDS prevention and treatment can be summarized as follow:

First, provide information on people living with HIV/AIDS to the health care departments for better surveillance, prevention and treatment policies. Like Luo Lu is in charge of 26 PLWHA, each rural doctor is in charge of some PLWHA in certain areas. The local department of health pays each rural doctor a stipend ranged from 80 to 200 RMB. Therefore, the rural doctor and their clinics becomes the smallest unit of local public healthcare system in the village level. Their main responsibility is to grasp the situation of PLWHA and update their information. Considering the sensitivity of the issue of HIV/AIDS, the other duty of the rural doctor is to report the HIV/AIDS-related activities to the local government in time. When we did our fieldwork in one village in Yunnan, the staff of the township department of civil service brought us into the village, however, the staff did not know the name list of PLWHA in the village and asked the village doctor for help. After hearing our research purposes and intentions, the first reaction of the rural doctor is to report to the local health department and ask for permission. After the permission was proved, the rural doctor finally introduced us to the PLWHA in that village.

Second, provide medicine distribution, minor anti-opportunistic infections treatment and home visit. As a health care worker, village doctors need to obtain anti-viral medicines from the township and then distribute them to then PLWHA, offer simple anti-opportunistic therapy when PLWHA in need, and home visit regularly. During each home visit, weight measurement, physical examination, HIV/AIDS related knowledge dissemination, and

inquiring the consequence of medicine taking are indispensable parts of their job.

Third, provide psychological consulting and help to PLWHA. Almost every PLWHA is bearing huge pressure since the AIDS as incurable disease and the HIV/AIDS-related stigma and discrimination. As a health care worker working with PLWHA day-to-day and face-to-face, village doctors have the responsibility to keep confidentiality of their illness and share the secret with them. Moreover, most village doctors and PLWHA are living in the same village. Therefore, village doctors usually have a close relationship with PLWHA, like Luo Lu, not only offering medical and emotional help to her patients living with HIV/AIDS, but sometimes giving financial help when they are in need. Many informants told us, when they have problems, the first person they seek for help would be the village doctor. Therefore, these village doctors become an important person in their social support network.

The above discussion indicates that as the grassroots health care providers, the community private doctors can play an important role in preventing the spread of HIV/AIDS in the families and the communities with infected individuals. They can also help improving the quality of life of those infected by providing consultations, treatment, and social support.

6.4 National Health Care Network

In order to better understand the location and significance of grassroots village clinics in the network of HIV/AIDS prevention and treatment, we should have a national wide outline of health units in mind. As figure 1 shows, the Ministry of Health is at the apex of the pyramid and is accountable to the State Council. The Ministry holds a central budget and directly controls and finances medical schools, some hospitals and specialized research institutions. Each tier, down to county level, has a Department of Health.

The establishment of the national Centre for Disease Prevention and Control (China CDC) was approved by the State Council in 2003 (shortly before the SARS epidemic), and much of the infrastructure for a nationally integrated public health surveillance and response system has yet to be established. China's public health system comprises Epidemic Prevention Stations (EPSs) at different administrative levels: province, city, and county. As well as conducting health surveillance at its own level, including collecting information on infectious diseases from hospitals in the same level of government, each low-level EPS is also supposed to report to and receive technical guidance from the corresponding upper-level EPS. In reality, however, a system known as 'dual control' exists - horizontal control by the government unit and line management by the professional health unit (Hillier & Shen, 1996), therefore the influence and control of the upper-level EPSs are very weak. All EPSs primarily report to the government health bureau at the same administrative level rather than to the upper-level EPS, which in turn reports to the Ministry of Health. Shortly after SARS incident in 2003, EPSs all over China renamed as Centre for Disease Prevention and Control (CDC) sooner or later, however their capacity, staff, facilities, and functions, etc., almost have no difference from the former EPSs.

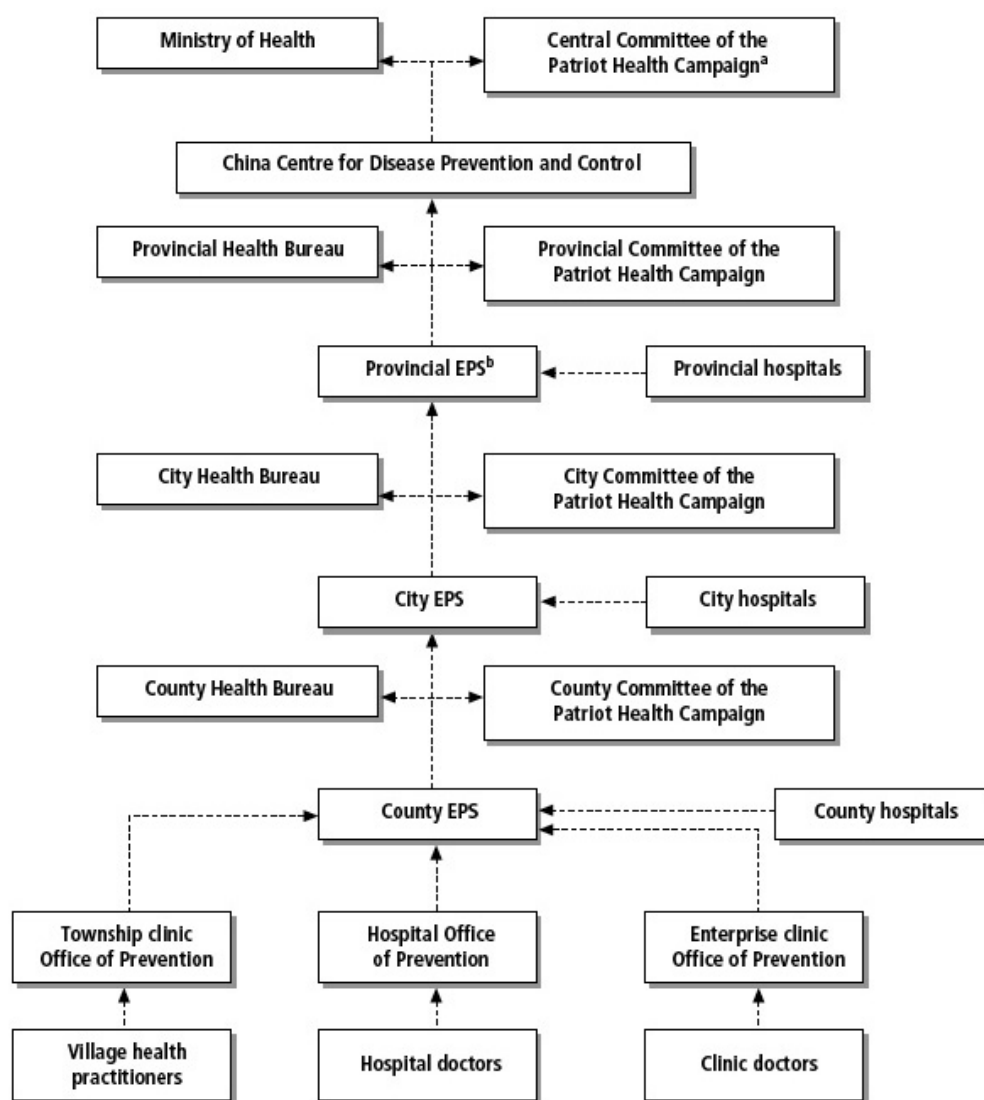


Figure 1: Lines of reporting and supervision in China's public health system(Wang, 2004)

- a. The Patriot Health Campaign is a government programme aimed at organizing health education campaigns to respond to important public health problems.
- b. EPS= Epidemic prevention stations.

Similar to CDCs, the whole nations have already established comprehensive hospital networks, from province down to county. While all EPSs are run by local governments, clinics, and hospitals are owned and operated by a diverse set of institutions, including state-owned enterprises, military establishments, private investors, and local cooperatives (Liu, 2004a). In 1985, a State Council document set out regulations, which allowed for 'diversity of provision' in health care, licensed private practice and promoted a multiplicity of types of ownership and methods of payment for health care. It produced 'rulings in principle' for provision and payment in both urban and rural areas and set an official seal on market operations in health care (Hillier & Shen, 1996). As the financing and operation of hospitals in China has become increasing privatized and marketized, inequalities in health care and health status have increased between rural and city, and different regions as well. Moreover, health care providers have become less interested in public health work than medical treatment because there is little or no remuneration for preventive service, and there is increasing pressure for providers to generate revenue (Liu, 2004a). For rural PLWHA, CDCs, hospitals, and clinics at and below county level are most related to their health and lives. The following part will

focus on how the three-level network of county-township-village health unit play a role on testing, prevention, treatment, and health maintenance of rural PLWHA.

6.5 Three-level Network: County-Township-Village Health Units

This article will divide health units into testing institutions and treatment institutions according to their function and job division and compare the different practices in four different provinces: Henan, Anhui, Guizhou and Yunnan (figure 2). The reason we did not put Guizhou in the figure is that more than 90% informants of Guizhou are city citizens, and they get testing and treatment all from the local CDC at the county level. However, in the other three provinces, our informants are all rural PLWHA, the division and cooperation of county-township-village health units is more apparent.

6.5.1 Testing Institutions

As figure 2 shows that, the institutions perform HIV/AIDS testing for rural people are county's CDC in all the project locations, which is deeply related to the requirement of HIV/AIDS testing related technology and facilities. County's CDC is the lowest health care institution furnished with the capacity and technology of HIV/AIDS testing. The concrete task of CDC is to prevent communicable disease, chronic non-communicable disease, and all kinds of harm. AIDS is listed as the most serious communicable disease with the highest deadly rate, and therefore CDCs has becoming the most important institutions of HIV/AIDS prevention and treatment. Besides offering HIV/AIDS testing, CDCs are also in charge of health surveillance, information collecting and reporting, offering guidance on disease prevention for health units for hospitals and clinics in the same level or lower.

During the fieldwork, we have encountered 5 of 110 informants from Yunnan, Anhui and Guizhou reported that they did not receive their HIV testing result in time, and some delays several years. Among the 5 cases, 3 are from Guizhou where we only interviewed 26 informants.

I was a drug user in the past. In 2004 the health department gave me a physical examination but did not tell me the results, so I did not know I had been infected. I was married in 2006, the second year, and my daughter was born. Till then the village doctor told me I was HIV positive. My wife and daughter have not taken the examination yet, and I am so panic that they may get infected. If I knew I was infected with HIV, I would not have been married (Y40¹³⁴, M, 25).

Both my husband and I are AIDS sufferers. We were first examined in 1996 when the workers of national and provincial CDC came to the village. At that time we were diagnosed with hepatitis C, although we had some AIDS-related symptoms. We were diagnosed with AIDS in 1998 (A19, F, 52).

I remembered clearly that I was formally diagnosed with AIDS in December 2006 when the staff in the City CDC told me. Actually, I had already taken the screening test in

¹³⁴ In order to protect the participants' privacy, all names remain anonymous and have been replaced by figures such as Y40. For Y40, "Y" means Yunnan, "40" means this was the 40th person in Yunnan to be interviewed. Therefore, "G" means Guizhou, "H" means Henan, and "A" means Anhui.

Dec 2004. However, the health department recorded my name mistakenly and I had not received the results. I might have been infected with AIDS in 2004, because at that time I already did not feel well (G17, M, 43).

I sold blood in Henan in 1995. When I came back home, he took a test but nobody told me the results. In 1997, I went to CDC again to take the blood test. Still, I was not told the results. Not until the staff from Guiyang CDC took me to have the test was I told that I was infected with HIV. At the same time, his wife was also diagnosed with HIV. He married his wife in 1998. At that time, I was already suspicious that I might have become infected. Since the test results were withheld twice, I still married my wife and transmitted the disease to her (G22, M, 38).

My husband and I are both infected. My husband was examined at the drug rehabilitation center in 2001, but he was not notified by the county's CDC until November 2003. The interviewee was examined at the county's CDC in 2002 but found out she was infected in 2004 (G7, F, 39).

Since interviewing G7 in the methadone clinic, so we asked the staff there, “Why was there such a long time between examination and notification?” According to the staff, what G7 said was impossible because after the preliminary screening at the county's CDC, the blood is sent to the provincial CDC for diagnosis, which takes at most six months. For drug addicts who take medicine at the methadone clinic, the staff will tell them the same day. For drug addicts who are not taking methadone, the staff will ask them to leave their contact information so that can be informed within a short time. The worker said G7 was lying.

We have no intention to be enmeshed with the issue and argue with who is telling the truth and who is the “liar”. “At most six months” is a terribly long time for notification and further spread of the infectious disease. 5 cases reported all kinds of delayed notification definitely mean that there is something wrong with the institutions. Right now, the survive and development of county's CDC facing all kinds of obstacles influenced by the philosophy of marketization and privatization of the health care systems.

The CDCs do not get sufficient government allocations, and are thus unable to get new equipment and enough staff for disease surveillance. From 1949 to the mid 1980s, the government's emphasis in its health work was on the prevention and eradication of infectious diseases and similar basic public health services (Wang, 2004). The slogan then was “Prevention First,” and local CDCs' work was highly emphasized. However, in the wake of the government's move towards a market-driven economy, the role of the government in financing, organizing, and delivering public services has been weakened, leading to an underfunded and fragmented public health care system (Liu, 2004a). In central and western China, many CDCs at the county level have not upgraded their laboratory instruments in many years; some are barely able to pay salaries to their workers. Under these circumstances, they can hardly be expected to control infectious diseases and epidemics.

Project location		Testing Institution	Treatment Institutions		Duty
Henan	Shang Cai County, Zhumadian City	County CDC	County	Hospital, Chinese Medicine Hospital	Serious anti- opportunistic infections treatment, free by referred from township public health center and AVR Clinics, otherwise, fee for service
			Town	Public health center	HIV/AIDS prevention, control, treatment
			Village	AVR Clinics	Antiretroviral treatment (free) Minor and Serious anti- opportunistic infections treatment physical examination and consulting.
				Private clinics	Minor anti- opportunistic infections treatment (fee for service)
				drug distributor (also PLWHA)	In charge of distributing antiretroviral drugs and surveillance of the medicine-taking for 10 persons
Anhui	Jingji jishu Kaifaqu Yinzhou Distric ¹³⁵	City CDC ¹³⁶	District	District CDC	Antiretroviral drug distribution and HIV/AIDS consulting
				District Public health center	Surveillance, physical examination 、 Antiretroviral treatment (free), anti- opportunistic infections treatment (outpatient reimburse 70% and inpatient reimburse 80%)
			Town	Public health center	HIV/AIDS prevention, control, minor anti- opportunistic infections treatment
			Village	Private clinics	minor anti- opportunistic infections treatment (fee for service)
	Funan County	County CDC	County	Hospital	Serious anti- opportunistic infections treatment (fee for service)
			Town	Public health center	HIV/AIDS prevention, control, minor anti- opportunistic infections treatment (free)
			Village	AVR Clinics	Antiretroviral drug distribution, minor anti- opportunistic infections treatment (free)
				Private clinics	Fee for service
	Linquan County	County CDC	County	Hospital	Serious anti- opportunistic infections treatment (free)
			Town	Public health center	HIV/AIDS prevention, control, Antiretroviral treatment (free) minor anti- opportunistic infections treatment (fee for service)
			Village	AVR Clinics	Has set up but not put into use yet during our fieldwork.
				Private clinics	minor anti- opportunistic infections treatment (fee for service) 。
Yunnan	Long chuan County	County CDC	County	Hospital	Serious anti- opportunistic infections treatment (fee for service)
			Town	Public health center	HIV/AIDS prevention, control, minor anti- opportunistic infections treatment (fee for

¹³⁵ The village we visit in Yinzhou district is merged with Jingji jishu kaifaqu, so we put the two places together in this form.

¹³⁶ Both places belong to Fuyang city, and therefore, CDC in the fuyang city perform the HIV/AIDS testing.

					service)
			Village	Private clinics	Antiretroviral treatment (free), minor anti- opportunistic infections treatment (Exempting 50 RMB per PLWHA per month), home visit.
	Ruili City ¹³⁷	City CDC	City	<i>Minzhu</i> Hospital	Serious anti- opportunistic infections treatment (fee for service)
			Town	Public health center	HIV/AIDS prevention, control, minor anti- opportunistic infections treatment (fee for service)
			Village	Private clinics	Antiretroviral treatment (free), minor anti- opportunistic infections treatment (fee for service), home visit.
	Yingjiang County	County CDC	County	Hospital	Serious anti- opportunistic infections treatment (fee for service)
			Town	Public health center	HIV/AIDS prevention, control, minor anti- opportunistic infections treatment (fee for service)
			Village	Private clinics	Antiretroviral treatment (free), minor anti- opportunistic infections treatment (fee for service), home visit.

Figure 2: Health Care Provision Systems in the three provinces

¹³⁷ Though Ruili is named as a city, but this city belongs to a county at the administrative level.

At present, government allocations to county level preventive health services cover only approximately one-third of their expenses; the rest of their funding derives from the income from professional services. The ministry of Health's annual statistical report indicates that there are provinces and cities from which no data were reported. For example, Tong Chuan City, Guizhou Province is a national modeling district of HIV/AIDS prevention and control, and the situation is supposed to be better than other places. An officer from the city CDC said,

In 2006, it received fiscal allocation 540,000 RMB, local fund 50,000RMB, and GAP grant 75,000RMB, according to the assessment of an expert, the whole city at least need 1,000,000 RMB for HIV/AIDS prevention and treatment, and there still lack of more than 300,000RMB in total (April, 2007, individual interview).

The fundamental cause of this situation is the transformation of the health system into a for-profit enterprise. In order to maximize profits, every level of health institution is focused narrowly on gathering every possible crumb of profit, totally neglecting the effect of this on the "big picture" (Liu, 2004a). On the one hand, during the fieldwork, we find that many informants report their experience of rejecting from the ordinary hospitals just because HIV-related stigma and discrimination, therefore the CDC is the only resource that they get anti-opportunistic infection treatment. In Yunnan and Guizhou, injecting drug use is the prominent transmission route, CDCs involve in the antiretroviral and anti-opportunistic infections treatment also because the drug addicts living with HIV/AIDS at the same time receive interventions of methadone therapy and needle exchange programmes, which are not belong to working scope of general health professionals. In three project locations of Guizhou and Ruili city, Yunnan, this situation is distinguished, county's CDC is the one institution for all issues related to HIV/AIDS including testing, surveillance, antiretroviral treatment, anti-opportunistic infections treatment. However, compared to county's hospital, especially hospital for communicable disease, CDCs lack of the advance technology and facility and enough professionals to let PLWHA get proper treatment.

On the other hand, due to the lack of funds, many CDCs, in order to ensure their survival, are forced to expand profitable services. They are thus forced to concentrate their efforts on opening outpatient clinics, filling hospital beds, and other profit-generating services. CDCs, as the epidemic prevention stations, in the name of "health inspection," assess a variety of fines in order to survive (Liu, 2004a). This survival strategy has deeply changed their working emphasis, drastically lowered the ability to prevent and control large-scale epidemics such as HIV/AIDS, and been a signal of China's preventive health safety net has already disintegrated.

As we pointed out above, there is a 'dual control' exists in the health care system, local CDC is controlled horizontally by the local government unit and vertically managed by upper level CDC. Therefore, the local government's attitude to the issue of HIV/AIDS is closely related to whether they support local CDC's work on HIV prevention or not. During the fieldwork, we have heard some saying like this from the "civil servants" of the local government.

If they are not in lower quality (sushi di), they won't get infected by this disease (January 2007, personal conversation).

When people like this staffing the local government, they incline to regard HIV/AIDS as politically sensitive issues. Their thinking priority is not those PLWHA' welfare, but to cover up the sensitive health statistics that may have a impact on foreign investment or tourism or

reduce a local official's prospects for promotion. Therefore, local government would choose to ignore rather than face the issue directly and take actively action to support CDCs' working of disease detecting and controlling.

6.5.2 Treatment Institutions

Before the economic system was reformed, the rural three-tier system, from village health station, township health center, and county hospital was an integrated system with formal bottom-up referral process for patients, and regular technical supervision was provided to the lower-level health units (Liu, 2004a). From figure 2, we can tell that three level network of county-township-village health care system still exists, however, the division and hierarchy has been blurred and their functions on fighting with HIV/AIDS are different.

Clinics in the village level play prominent role in HIV/AIDS prevention and treatment, in the above, we introduced the significances and functions of village doctors in constructing health safety network in Yunnan. While in Henan and Anhui, the situation is different, and rural doctors and their clinics have much less significance in the network of HIV/AIDS prevention and treatment since village level HIV/AIDS medical assistance clinics and community-based HIV/AIDS health service stations (AVR Clinic) have already set up by the local government. AVR Clinics only serve PLWHA, and some times family members also can get some prescribing medicines through using PLWHA' medical certificate. The health care workers of the AVR Clinic are assigned and paid by the local government. The AVR Clinics not only distribute antiviral drugs free of charge, but also provide some amount of free medicine to cure the opportunistic infection. And the specific medical assistance standard for anti-opportunistic infection treatment varies from different provinces and even different villages. For example, according to a health care worker from an AVR Clinic in one Village of Shangcai County, Henan Province, the practice is like this:

Our clinic's standard is: if the CD4 is below 200, each patient can get free medication worth 1,200 RMB per year; if it is higher than 200, each patient gets 800 RMB per year. If someone has used up the free amount, he could then draw on the free amount available for next year. One person can transfer the amount without limit, and the health department would honor it. I did not know the specific way to go about this, however, because this situation has not come up since the policy came into effect. Similarly, if someone took very little of the free medication he would be reimbursed (January 2007, individual interview).

The existing policies sounds good, but in practice it also meet some problems, as H9, a patient from the AVR Clinic, said at the interview.

I think that the existing policies are good, but two problems remained. First, the types of drugs in AVR Clinics were limited --- lacked many drugs. When I and many other villagers got sick and AVR Clinics could not meet our needs, we had to go to other medical units, like private clinics, at our own expense; second, the reimbursement policies from village hospital were unclear, and it seems that the AVR Clinic never told us clearly how much we spent. (H9, F, 33)

As H9 stated, when AVR Clinic could not offer necessary medication, PLWHA may seek treatment from the private clinics on the condition of money allowed. Moreover, in Henan, the AVR Clinics encourage some PLWHA in charge of medicine distribution and guided by

the rural doctors and they get some stipend for their work. The other practice is too important to be ignored: rural PLWHA only can seek medical service in the particular AVR Clinics, usually in the location of their household certificate, otherwise they would lose their medical assistance, which controls the spread of HIV/AIDS epidemic through limiting the PLWHA's mobility.

Compared to clinics at the village level, the functions of township public health centers are limited since they lack of staff and facilities. For minor anti-opportunistic treatment, the clinics can take care of, and as for serious anti-opportunistic treatment, is also tough job for township public health centers. According to Wang (2004), no township feels it is complete without a public health center, of whatever quality, and precious funds go toward building one. Sixty per cent of township hospitals are still locally financed, but cannot compete with private doctors or county hospitals. In terms of care provided, township hospitals may also offer little more than the village clinics. According to the Minister of Health, one-third of rural health centers are very good, one-third are just getting by, and the remaining third have basically fallen apart. The very good rural health centers are concentrated in the eastern coastal provinces, while the rural hospitals in western China are in unbearably sad condition (Wang, 2004).

County's hospitals are usually the best health care institution with a county with the most advanced medical facilities and professional health care workers including hospitals offering western and Chinese medication and serving minorities (in Yunnan). Rural PLWHA seek help for county's hospital often because of serious opportunistic infections that cannot be cured in lower level public health centers and clinics. From the figure 2, one phenomenon is too obvious to be ignored. Rural PLWHA receive different medical assistance in different provinces, even in different districts within the same provinces. For anti-opportunistic infection treatment, most health care units in Henan and Anhui has policies of free-of-charge, or at least offering certain amount of exempting and reimbursement (sometime on the condition that the patient is referred from certain lower level public health center and clinics), while in Yunnan, most anti-opportunistic infection treatments, either serious or minor, are asked to pay by rural PLWHA themselves.

This phenomenon is related to a trend of decentralization of the health system in the era of economic reform. For health units, investment and spending decisions, have been decentralized to both provinces and individually owned enterprise. Within provinces, social spending, including health spending, is largely decentralized to county and township governments (Liu, 2004a). Therefore, almost every province, county, township, and even village has different policies of medical assistance and sometimes the policy does not make sense at all. For example, within Fuyang City, Anhui provinces, Yinzhou county and Funan county has set up AVR Clinics but Linqun county not yet. For rural PLWHA, in Yinzhou and Linqun county, minor anti-opportunistic infections treatment charges for fees and Serious anti- opportunistic infections treatment gets reimbursed mostly or free-of-charge; while in Funan county, minor anti- opportunistic infections treatments are free of charge and serious anti- opportunistic infections treatment needs pay. No one can explain clearly base on what the policies are created.

Together with the decentralization of the health care units, the allocation from central government remains low and individual contribution is obviously high. In the year 2000, when total health spending in China was 5.3% of GDP or slightly higher than the WHO's recommended lower limit of 5%, individual citizens paid 60.6% of this amount. By contrast,

citizens in the developed countries paid only 27% (Wang, 2004). In 2001, total government spending on health was 54.6 billion RMB, of which only 3.543 billion RMB (6.5%) came from the central government. The remaining 51 billion RMB came from local governments within the provinces. This pattern determines that the level of per capita health spending in each province is the result of its financial strength (Wang, 2004). When the source of health spending is primarily the local government, not the central government and the cost of health costs are mainly borne by individuals, the inequality of economic growth must bring out health inequality, between different provinces, and between city and rural areas, and between the rich and the poor.

This project does not focus on comparison of city-rural PLWHA' health provision system, however, the city-rural inequality issues still emerge from the fieldwork. Three methadone maintenance therapy clinics we visited in Guizhou are only serve city citizens rather than rural residents. The most distinguished example of regional inequality is that rural PLWHA in Yunnan almost get no medical assistance on anti-opportunistic treatment and the local new country cooperative medical treatment system has not been implemented, the fee-for-service is basically the responsibility of families and therefore their huge burden. In the village that Y2 lived, there are no basic pensions and subsistence allowances in the local area, or other standard social assistance programs, and subsidies are only given to those living are under terrible conditions. Y2 carries a low level of virus at this time and his immunity is not completely destroyed, so he has not received any assistance.

I do not fall ill, but the fees for my medication are still big numbers. In 2006, my wife and I spend around 2,000 RMB in seeing doctors, basically related to common ailments such as headache and cold. (Y2, M, 48)

Impoverishment due to medical expenses has becoming a serious problem in the rural area (Jin, Tang, Zhao, & Lu, 2004; Li & Tang, 2005), and lacking adequate income to purchase basic health care when needed is a common complaint among the informants. For rural PLWHA, "not seeking care" often is their choice when they are sick but have no money to pay because of economic difficulties. Even within the situation of getting sort of medical assistance, the situation is still serious. H2 and G3 narrated,

The biggest worry I face now is how to pay my medical fees. I try not to go for treatment for minor problems. (H2, F, 52)

I usually do not go to see a doctor when I am sick. My greatest need is for medical relief. The family has no major difficulties day-to-day, but when someone falls ill we cannot afford treatment. (G3, M, 41)

According to WHO, China was ranked 188th for fairness in financial contribution to the health care system, the fourth country from the bottom, only slightly better than Brazil, Burma, and Sierra Leone. India, which China has long regarded as a country with extremely large gaps between rich and poor, was ranked 43rd and Iraq, which had been subjected to almost ten years of economic sanctions, stood at 56th. All other countries with large populations, such as Pakistan, Indonesia, Egypt, and Mexico, ranked above China. For a self-styled "socialist" country, this truly was a great humiliation (Wang, 2004). It seems that the three-level network of county-township-village health units exist as a structure and foundation for HIV/AIDS prevention and control in rural China, however, the structure splits and foundation is not reliable anymore.

6.6 Conclusions

Before 1980, China's economic base was weak and the material standard of living was very low; nonetheless, in the field of public health, China was a model for the entire developing world. However in the era of economic rapid growth, China's performance in the field of public health has been disappointing¹³⁸. Focusing on the health provision for rural PLWHA, this article describes the situation and difficulties that three-level network of county-township-village health unit available for them, and exposes the philosophy of "marketization/privatization" and "decentralization" of China's health policy is the root of the disability of the rural public health system combating HIV/AIDS.

The issue of HIV/AIDS is not only about controlling one contagious disease, but is related to establish a sustainable and effective public health system to copy with all kinds of epidemics and diseases and protect people's welfare. In order to achieve this goal and make all rural PLWHA get necessary medical help, we have the following recommendations for improving the existing public health policy.

The government has to pay seriously attention to the work of disease prevention, and put "prevention first" as the priority of Chinese public health system. Because epidemic and infectious diseases threaten more than the immediate victims, disease prevention is the responsibility of governments. Only by guaranteeing that the disease prevention system can "eat the emperor's grain" (i.e., have reliable government funding) can it focus effectively on its mission. Encourage central government's allocation and local government's support for establishing adequately functioning public health system in China's vast rural areas, especially the prominent preventive units – CDC at the county level, therefore strengthening its functions of supervision and coordination among rural health-care providers.

The government should take responsibility to provide generally similar basic public services, including health, for all of its citizens, regardless of where within the country they live. On the one hand, promote health equality between urban and rural areas. We do not have systematic statistics for the urban-rural distribution of government health spending, but the figures for the single year 1998 can perhaps illustrate the problem. In that year, total health spending nationwide was 377.65 billion RMB, of which the government's input was 58.72 billion RMB. The amount spent for rural health, 9.25 billion, was only 15.9% of the government's input. 20 Using 2001 as an example, the per capita health spending of rural residents was 96.61 RMB, versus 343.3 RMB for urban residents, a 3.55-fold difference, even as urban incomes were 2.9 times greater than rural net income (Wang, 2004). On the other hand, promote health fairness between east coastal and central and western areas through tax-sharing and public funding. For rural PLWHA, at least we should achieve a goal that PLWHA in Yunnan can get the same treatment as in Henan and Anhui. Moreover, the health equality is related to establishing a nationwide health safety network to make sure everyone in the society get necessary health care when in need, not only AIDS patients.

The prevention work should not only focus on the issue of HIV/AIDS, but extending the

¹³⁸ In 2000, the World Health Organization (WHO) ranked its 191 member nations on the overall performance of their health systems. China was ranked 144, worse than Egypt (63), Indonesia (92), Iraq (103), India (112), Pakistan (122), Sudan (134), and Haiti (138); Why is it that, despite a stronger economic base, a higher scientific and technical level, and greater expenditures, many indicators of the nation's health document no improvement or even decline.

emphasis to other diseases and health issues including sexually transmitted diseases such as gonorrhea and syphilis, women's reproductive health, and drug abuse etc. Furthermore, China need invest a lot in public education regarding HIV/AIDS knowledge, safe sex practice, personal hygiene, and other public health practices that might nip future epidemics in the bud.

This study mentioned the RCMS in the Maoist era with a little sad because the current contrast of the economic rapid development and disability of rural public health system is astounding. Meanwhile, in Guizhou, there is a new trend could not be ignored.

In Guizhou, Since the reported rural PLWHA are only 14 persons within 10 families who were infected by selling blood in Henan in the 1990s, local government in Guizhou sponsor them for joining New Rural Cooperative Medical System (NRCMS) is an alternative way to solve their difficulties of seeing the doctor. Both G14 and his wife are HIV-positive, and he said,

The local Department of Civil Service supported us joining the new rural cooperative medical treatment program, which allows us to claim 800 RMB in medical expenses last year. I think that the new cooperative medical treatment was playing an important role in reducing the financial burden of my medical treatment (G14, M, 61).

On 29 October 2002, the China National Rural Health Conference was held in Beijing. Altogether, nine major national policies to support and strengthen the rural health care financing and delivery systems were announced at the meeting. These policies ranged from establishing new forms of the RCMS to upgrading rural and township health centre facilities. However, rural residents have not showed much interest since the existing NRCMS reimburse more expenditure of inpatient fee than outpatient treatment, which is not practical to deal with the minor illness of people and general public health issue. However, exploring how to combine the NRCMS into the health safety network of combating HIV/AIDS definitely is an issue needs to be further studied.

CHAPTER 7: The Implementation of Global Fund Programs in China:

The Case of Duyun and the Global Fund Fourth Round

Yurong Zhang
Pierre Mieke

7.1 The Profile of the City of Duyun

Duyun is a city situated in the southern part of Guizhou, a southeastern province of China with Guiyang as its capital. Guizhou covers an area of more than 176,100 square kilometers, and has 39.31 million inhabitants, including around 10 million urban residents. Twelve national minorities, including Miao and Buyi, make up 37.4% of the total population.

The province consists of: three regions - Tongren, Bijie, and Anshun; three prefecture-level cities - Guiyang, Zunyi, and Liupanshui; three autonomous prefectures:

- Southwest – comprising Guizhou, Buyi and Miao
- Southeast – comprising Guizhou Miao, and
- Southern – comprising Guizhou Buyi and Miao; fifty-five counties; eleven autonomous counties, and; ten county-level cities.

In 2005, the provincial Gross Domestic Product (GDP) reached 197.9 billion yuan (US\$ 26 billion), while the GDP per capita was 5,052 Yuan (US\$ 655). The annual per capita disposable income reached 8,147 Yuan (US\$1,072) for urban residents, and 1,877 Yuan (\$247) for rural residents.¹³⁹

Duyun is one of Guizhou's important political and cultural centers, and is also an industrial city. It is the capital of the Southern Autonomous Prefecture. The city has an area of 2,274 square kilometers, and its total population is 486,000, (269,000 rural, and 190,000 urban). Thirty-one nationalities, including Buyi, Miao, Shui, Han, Zhuang, Yi, Tu, etc., live in Duyun City. Minorities account for 65% of its total population.

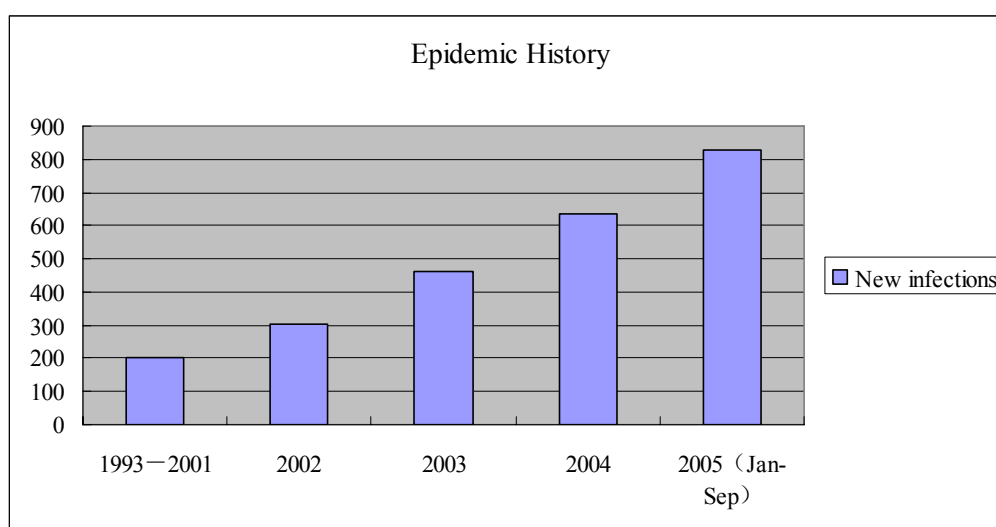
Duyun City is one of the twenty economic power cities, and is an "Excellent Travel City of China." In 2005, the city's GDP was 3,36 billion yuan, of which only 454 million yuan came from the industry and agriculture sector. The GDP per capita reached 6,847 yuan that year.

HIV/AIDS situation in Duyun

Duyun is typical of the HIV epidemiological trend in Guizhou. The first contaminations in this province probably date back to 1986, with the first reported HIV case appearing in 1993. By the end of 2005, HIV infection had spread to seventy counties in nine cities of Guizhou, including the autonomous prefectures and prefecture-level cities. In some areas, the incidence rate of HIV infection is quite high.

¹³⁹ All the statistics concerning Guizhou and Duyun are coming from: Guizhou Statistical Yearbook, 2006, China Statistical Press.

By September 2006, 3,447 cases of HIV infection had been registered in the province, of which 77 were AIDS patients. HIV/AIDS was transmitted through all three contamination modes [external sources, blood transfusions and intravenous drug users](IDUs), but more than 70% of all infections were caused by the sharing of needles among IDUs. Slightly more than 83% of the people living with HIV/AIDS in Guizhou are aged twenty-one to forty, and the male/female ratio is approximately 3:1. The number of reported cases is increasing relatively quickly, indicating that the real incidence rate is probably high (see graph below). Faced with growing rates of incidence, provincial health officials worry that the epidemic is passing beyond the high-risk communities, and spreading to the general population mainly through the sex trade.



Source: Experience of exchange meeting of comprehensive HIV/AIDS intervention in Guizhou province

The HIV/AIDS epidemic in Guizhou Province has the following main characteristics: In some areas the incidence rate in high-risk communities seems to be growing quickly. Until the second half of the 1990s, the main mode of transmission was the selling of plasma: the blood of eight to ten “blood sellers” was mixed and centrifuged in a special machine to extract the plasma, the rest being re-transfused to the “sellers”, leading to high rates of contamination. Since 1997, with the end of this activity and the closing of the blood selling stations, the sharing of needles between IDUs has become the main source of contamination.

New infections are mainly taking place among young and middle-aged males with low levels of education. Furthermore, contaminations are mostly concentrated now in the zones situated at the junction between cities and the countryside, and along main roads.

The first case of HIV infection in Duyun was reported in 1997. Between 1997 and June 2006, a total of 188 people (including 160 residents of Duyun) tested positive within the public health system. These were mainly males aged twenty to forty. This said, it must be noted that due to insufficient testing, even among high-risk groups, reported cases reflect only a small fraction of the epidemic.

In April 2007, the cumulative number of cases reported by the Duyun CDC had increased to

252. This sharp growth of incidence in less than a month is largely due to the increase of testing following the new programs of the Global Fund's Fourth Round. Of the 252 people identified, 184 were male and 68 female; the number of AIDS patients was fourteen, (13 male and 1 female). The primary transmission path remained the sharing of needles by IDUs, but sexual transmission was increasing.

Before looking at the programs developed in Duyun, it is important to recall the objectives of Round Four of the Global Fund, and the resources it committed to their achievement .

7.2 The Global Fund's Round Four in China: HIV/AIDS Prevention and Treatment among High-Risk Populations

Funds from the Global Fund's Fourth round were solicited by the Chinese government to help in the battle against HIV/AIDS, in 37 counties in Xinjiang, Yunnan, Guangxi, Sichuan, Guizhou, Hunan and Jiangxi provinces; these HIV/AIDS prevention and treatment programs were to be aimed particularly at the high-risk populations of commercial sex workers (CSWs) and IDUs.

The Fourth Round projects in China have been designed to achieve six objectives. It is important to note that the first objective concerns the reinforcement of cooperation among the different levels of government, NGOs, and the broader society to create an environment favorable to the development and implementation of coordinated, multi-sectoral, rights-based and risk-reduction policies at all levels. As we will see with what is happening in Duyun, this first objective of the Fourth Round in China should not be overlooked, as it has played a crucial role in substantially improving the public health policies at the local level.

The other five objectives concern activities related to prevention campaigns with high-risk populations, especially among IDUs and CSWs, and to the support and care of those infected and their families:

- Increased HIV/AIDS awareness through information, education, and behavior change communication projects dedicated to IDUs, CSWs and youth.
- The use of harm reduction approaches to decrease HIV transmission among IDUs and reduce the vulnerability of their partners to HIV
- Voluntary testing and counseling services (VTCs) to be established and promoted.
- Treatment and care services, such as methadone maintenance clinics, needle exchange sites and anti-retroviral (ARV) therapy clinics, to be set-up.
- Youth education, risk-reduction programs for CSWs, and mass media campaigns to be organized.

The Fourth Round started in July 2005 and will continue through 2010.

7.3 Funding and Financial Information

A total of US \$ 63,742,277 in funding was approved for these projects all over the country, to be distributed over two phases. The first phase, which lasted from July 2005 to September 2006, had US\$ 23,936,918 in funding approved, of which US\$ 21,422,769 was disbursed, with the difference being due to delays in procurement. The remaining US\$39,805,359 is

being disbursed in phase two, which extends from January 2007 to 2010.¹⁴⁰

Co-financing will be provided by the central Chinese government, and will account for 20% of the project's financing in the first year. This will increase to 50% of the project's annual budget by the fifth and final year. Total estimated finances for all five years of the project are summarized in Table 7.1.

Table 7.1 – Expected Sources of Financing for the Global Fund Round 4 HIV/AIDS China Project

Sources	Year 1	Year 2	Year 3	Year 4	Year 5	Total
Central Government Contributions (US\$)	2,745,977	4,317,671	6,065,333	8,895,570	12,309,561	34,334,112
Requested Funds from GFATM (US\$)	10,983,090	12,953,009	14,152,443	13,343,355	12,309,561	63,741,458
Total (US\$)	13,729,067	17,270,680	20,217,776	22,238,925	24,619,122	98,075,570
Government Contributions	20%	25%	30%	40%	50%	35%

7.4 Description of six objectives of the Global Fund's Fourth Round in China

Objective 1: Create an enabling environment and strengthen leadership to develop and implement coordinated, multi-sectoral, rights-based, risk-reduction policies at all levels

To ensure a favorable policy environment, information will be disseminated to national-level officials through the Central Party School, and communicated using a top-down approach to officials at lower levels of government.

This goal includes support to promote better coordination of activities and communication between various government levels and departments, as well as relevant government-organized non-governmental organizations (GONGOs) and NGOs.

The participation of these non-governmental and civil organizations will be encouraged. It is recognized that civil society groups and those run by people living with HIV/AIDS may have an advantage in reaching out to the high-risk populations targeted in this program.

As of December 31st 2006, 71 of 74 project sites (two per county) had established local HIV/AIDS projects, tied to the local government's economic development plan. This is the only progress indicator provided for this objective.

Objective 2: Increase awareness and knowledge of HIV/AIDS through the coordinated development of strategic information and communication materials aimed at IDUs, CSWs and Youth

Mass media, including television, radio, newspapers and the internet, will be used to provide the general public with HIV prevention information. Targeted prevention information will be provided to secondary schools and college students through formal programs in schools. These programs aim to build on the existing "Straight Talk" life skills programs, and to train teachers and peer educators to provide safe sex information before the beginning of sexual

¹⁴⁰ The financial data and national statistics concerning the Global Fund Fourth Round's implement in China have been gathered by the China CDC and the Global Fund to Fight AIDS, Tuberculosis and Malaria; they are listed in the bibliography at the end of the chapter.

activity.

Young people at high-risk for injection drug use or prostitution will be targeted by a life skills educational program, which is aimed at providing these young people with the capacity to avoid engaging in these activities. Information, education, and behavior change communication materials will be designed and distributed from one clearinghouse to avoid duplication of efforts. Feedback will be gathered and used to improve the materials over the course of the project.

As of December 31st 2006, 215,353 members of high-risk populations (IDUs, CSWs, STI patients, etc.) had received information, education and behavior change communication packages, while 1,472,405 youth had received community or school based prevention education.

Objective 3: Use harm reduction approaches to decrease HIV transmission among IDUs and reduce the vulnerability of their partners to HIV

In order to achieve the goals laid out in this objective, free methadone maintenance clinics and needle exchange sites are to be established. Condom use will be promoted at these venues, and links between these services and VTC sites will be established. According to Chinese policy, only registered IDUs referred from detention or detox centers will be permitted to access the methadone maintenance aspects of this program.

As of December 31st 2006, 68 methadone clinics had been established in project counties, and 5,583 people were receiving methadone maintenance. 112 needle exchange sites had been established, and 49,665 IDUs were receiving prevention assistance via needle exchange and/or peer education/outreach education.

Objective 4: Reduce HIV transmission amongst CSWs and their partners and clients

Outreach services are to be provided through community-based centers and health centers. Better information, educational and behavior change communication materials and services for both CSWs and their clients will be provided at these centers. Peer education will be used to help to identify and to support CSWs, and to encourage them to seek testing. VTCs will be linked to these centers, in which integrated women's health, reproductive health and STI services will also be provided.

As of December 31st 2006, 66,712 CSWs had received outreach and peer education services including behavior change and the promotion of condom use.

Objective 5: Provide more sites for accessible and affordable VTC services through both district and county levels of government

HIV testing centers existed prior to the start of this program, but this project will seek to increase the number of sites, and to add counseling services. The voluntary nature of the testing services will also be ensured through supervision so that no coercive testing occurs and confidentiality is maintained. The testing services will act as a gateway and referral centre to treatment and care. These centers will also play an important role in monitoring and reporting.

As of December 31st 2006, 149 VTC sites existed, all with trained counselors providing specialized HIV/AIDS services. 247,610 individuals took advantage of these services - were counseled and tested; the results of these tests were collected for reporting purposes.

Objective 6: Establish a network of service delivery facilities assuring treatment, care and support for the people living with HIV/AIDS (PLWHA), including the prevention of mother-to-child transmission

Following diagnosis, people living with HIV/AIDS will be referred to a hospital for a needs assessment for ARV therapy, opportunistic infection prophylaxis and treatment, in addition to referral to support groups. These support groups will be established initially at treatment centers, and gradually expand to centers throughout the community. Health care workers will be trained in ARV therapy and opportunistic infection treatment, and bonuses will be provided for those willing to engage in AIDS-related work. ARV treatments will be provided free by the Ministry of Health, and given directly by staff or authorized volunteers; they will be integrated with opportunistic infection treatment, prophylaxis, or methadone maintenance where necessary.

The CDC will participate in this aspect of the project by supervising the analysis of drug resistance. The Ministry of Health is committed to providing both a lamivudine-based first-line regimen, and a second line regimen. At Maternal and Child Health Centers, ARV regimens based on infection stage, gestational age of the fetus and prior drug-dependency will be tailored to the needs of HIV-positive expecting mothers, to prevent mother-to-child transmission.. Family planning and breastfeeding counseling will be offered, and elective caesarean section will be presented as an option for delivery.

As of December 31st 2006, 8,879 HIV-positive individuals were receiving basic care and support, and 4,130 were receiving ARV treatment. 9,191 opportunistic infections were treated.

7.5 Implementation of Fourth Round Programs in Duyun

In 2005, the Fourth Round of the Global Fund was launched in Duyun, in addition to nine other cities and counties in Guizhou. Special attention was given to the first objective of this round, that is - to improve the management of HIV/AIDS policy and increase collaboration and information sharing and consistency between the various administrative organizations involved. Under the leadership of the Duyun CDC, a comprehensive HIV/AIDS prevention and treatment project was set up, with five “platforms”: a woman’s health center dedicated to CSWs; a needle exchange program for IDUs; a methadone clinic; a VCT center, and; the distribution of ARV treatment.

The success of the Fourth Round projects in Duyun has been facilitated by the experience developed by the local institutions, as the city was also chosen as an experimental city in Guizhou for a number of HIV/AIDS policies and programs: Duyun was selected as a state-level “monitoring spot”, as the GAP (China and US Cooperation in AIDS Prevention and Treatment) project city to implement the strategy of “Control the Source Group (the Drug Users)”, and as a project city for the “Central government funded promotion of 100% condom use” project. As a result of these additional HIV/AIDS campaign involvements, local institutions were able to accept, and move forward strongly with, these harm reduction

measures.

The Fourth Round was launched in June 2005 in 10 cities and counties of Guizhou, under the guidance and monitoring of the Guizhou provincial government, with the slogan “Comprehensive Measures to Significantly Reduce the Transmission of HIV/AIDS Among Vulnerable Groups” A kick-off conference was convened by the provincial CDC, with representatives of the ten CDCs of the other Fourth Round sponsored counties and cities, to explain to them how to prepare their projects so that they could begin implementation on July 1st 2005.

7.6 Experience Gained and Lessons Learned From the Duyun

7.6.1 Sufficient Funding Support has provided a Strong Foundation for the Implementation of Comprehensive AIDS Prevention and Treatment Programs

By April 2007, Duyun had received 980,000 yuan from the Global Fund project funds, supplemented by 60,000 yuan of matching funds from the local city government; the central government also remitted 520,000 yuan to help establish the methadone clinic.

Even though the budget of Duyun’s local government allowed only a limited matching of the Global Fund’s funding, the Fourth Round caused the central government to almost double their normal support, allowing the creation of the methadone substitution treatment clinic.

As will be discussed in more detail below, the total budget enabled a city that previously had few projects and organizations dedicated to prevention and treatment of HIV/AIDS to establish a whole comprehensive program in fulfillment of the Fourth Round six objectives. It also allowed a strengthening of cooperation and information sharing among the different administrative departments, the organization of meetings and workshops to share their experience with other CDCs: the sharing of Duyun’s lessons learned. In addition, the Duyun CDC established the “Red Ribbon Assistance Fund” to improve the lives of the people living with HIV/AIDS.

Table 7.6 Funds in HIV/AIDS Prevention and Control in Duyun County, Guizhou Province
(2004—2007) in RMB

Source of Funds	Amount
Central government transfer payment ¹⁴¹	520,000
Program Outlay from Global Fund	980,000
Local Government’s Contribution	60,000
Total	1,560,000

7.6.2 Positive Impact of the Fourth Round on the Reorganization of Leadership under the Local CDC and Improved Collaborative Work between Them and the Other Administrative Departments involved in Duyun

The Global Fund emphasizes, as the first objective of the Fourth Round, the development of supportive environments by each level of government, and the establishment of cooperative partnerships among administrative departments. In order to realize this objective, in Duyun, the leadership over all the projects and policies concerning HIV/AIDS prevention, treatment and care has been granted to the city CDC.

¹⁴¹ Mostly used for the creation of a methadone clinic

At every level of government in the Chinese administrative system, the different activities and policies relevant to HIV/AIDS epidemic are distributed among different administrations. At the local level, the two main departments concerned are the department of health, in charge of prevention and treatment of HIV/AIDS, and the department of civil affairs, responsible for the economic support and the distribution of allowances to the people living with HIV/AIDS. Other departments also have a role to play, namely: the department of education, which organizes education and information programs in schools, and; the department of public security, which is in contact with vulnerable populations such as IDUs and CSWs.

In Duyun, the local CDC, but not the department of health, was designated as the project executive unit under the supervision of the Global Fund project office. The Duyun CDC was given direct access to and control of the project funds, and there was no need for any authorization from the Health Bureau. Furthermore, the Duyun CDC was responsible for all the activities linked to the Fourth Round, from the early information and coordination meetings, to the design and implementation of the projects. It is obvious that this arrangement yielded better efficiency, more motivation and more enthusiasm, when compared with assigning the funds to the health bureau at the provincial level.

The Duyun CDC, as the executive unit for HIV/AIDS local policies and projects, has carried out important activities such as: holding regular coordination meetings with all the stakeholder departments, training sessions and work groups, and visiting the newly developed centers and the various administrative departments.

Thanks to the coordination and cooperation activities carried out under the leadership of the CDC, all administrative departments have left behind their previous habit of doing isolated and divided work; thus, a culture of active participation and good cooperation has developed, laying a strong foundation for the fight against HIV/AIDS. Prof. Wu, director of the Duyun CDC commented in an interview:

One of the reasons the project succeeded was the fact that the heads of related departments, instead of seeing HIV/AIDS prevention and treatment as only the duty of the health department, rather decided to take seriously the battle against HIV/AIDS and therefore ensured their department's co-operation and participated fully in the inter-departmental co-ordination effort.

7.6.3 Through Improved Collaboration and Early Awareness Raising, Local Stakeholders have gained New Concepts Regarding the Prevention and Control of HIV/AIDS

One of the benefits of the comprehensive program involvement at every stage by the multiple stakeholder departments was that essential new information was disseminated, and the lessons learned along the way were shared by all stakeholders. The implementation of Global Fund programs has thus made possible the acquisition both of advanced AIDS prevention and treatment concepts, as well as of project management concepts and experience for all the participating departments. The discussions, in working groups, of new problems that were encountered and of their possible solutions led to an accumulation of knowledge and experience, and thus a solid foundation for stronger future HIV/AIDS project performance.

The CDC, as the coordination unit of the whole Fourth Round program, was advised by the Global Fund to organize meetings with all the leaders of the stakeholder departments a few months before actually starting the design of the different projects. These early meetings

helped fight misconceptions about HIV/AIDS and PLWHA among the leaders of the stakeholder departments. This first step in the fight against such misconceptions and biases led to the design of a more comprehensive and efficient prevention program; in addition, the ideas shared in these early meetings were later disseminated to the general population through education and information campaigns. As Prof. Wu, director of the Duyun CDC pointed out:

We did not quite understand this arrangement at the beginning, but we later came to realize that the coordination and cooperation between stakeholder departments is very important. It is essential to successfully and efficiently carrying out comprehensive AIDS campaigns. We have found that this approach is effective and it is undoubtedly the best.

7.6.4 The Development of New and Innovative Institutions Dedicated to the High-risk and Vulnerable Groups of Duyun, especially CSWs, IDUs and Youth

In Duyun, and under the leadership of the local CDC, the following projects were designed and implemented in accordance with objectives 2 to 6 of the Fourth Round

A Woman's Health Center, employing ten persons, was established in December 2005. It provides condoms, STD diagnosis, counseling services and voluntary HIV testing service to CSWs. By June 2006, 234 women had used the services of this health center.

In October 2005, a Needle Exchange Center, with ten workers and six "tutors" was established. In the following months, three more needle exchange centers were established. By June 2006, 1,996 needles had been provided to IDUs while 1,745 needles had been collected from them.

In April 2006, the methadone clinic formally opened its doors. By June 2006, a cumulative total of eighty-five heroin-addicted people had received treatment.

A VCT center, employing ten professionals and six volunteers, was established in December 2005, and the staff were trained in the techniques of confidential counseling and HIV testing. By June 2006, a total of 750 persons from vulnerable groups (especially IDUs and CSWs) had received VCT services, of which 609 had received HIV testing. The center also distributed more than 25,000 condoms and 40,000 copies of educational material.

In March 2006, the CDC started to provide ARV treatment to two HIV carriers.

7.6.5 The Strong Teamwork amongst Stakeholders Made Possible by the Strong Leadership of the Duyun CDC Led to the Improvement of Other Policies not originally Included in the Fourth Round Program, especially An Effort to Improve the Economic Support to PLWHA

During project implementation, the Duyun CDC gave special attention to the question of the lives of PLWHA and their families, who were often very poor. In China, the departments of civil affairs at the different administrative levels are in charge of reporting to higher levels the households hit by HIV/AIDS and their suffering from economic and social hardships. However very often, because of a lack of coordination between the departments of health, who know who has HIV/AIDS and what family members they have, and the departments of civil affairs, who are responsible for welfare programs, some PLWHA households were not

receiving the support of the different welfare programs designed for them.

Collaborative work between the different administrations in Duyun led to a better sharing of information, and thus the department of health shared a list of needy families of PLWHA with Civil Affairs. In October 2006, the Duyun Department of Civil Affairs issued “Regulations” reaffirming the right of PLWHA to apply for subsidies and minimum income programs. Thanks to improved communication between the different stakeholders, needy Duyun families have been able to benefit from various welfare programs.

7.7 Factors that May Affect Successful Project Development

7.7.1 Support from Local Government Departments is very Important for Good Project Implementation

The experience of Duyun illustrates the crucial importance of full support for municipal governments by provincial government departments, in this case, in three important ways: First, only the provincial government could have agreed to give project control to the Duyun CDC, instead of to its own health bureau; second, different provincial level administrative departments gave advice, counseling and help to Duyun, providing them with experience and lessons learned not only from other cities and counties in Guizhou, but also from other provinces. Finally, in many cases, the provincial government has the capability of contributing to the funding of stable, long term projects. As Prof. Wu, Director of Duyun CDC, repeatedly expressed:

The enormous support from the provincial government, as well as the attention from the vice-mayor in charge of HIV/AIDS prevention and intervention, have been key to the successful management of the project. Even though the matching funds were less than the amount required [by Global Fund], we are already very satisfied, as in other provinces the local governments have not benefited from any help from higher levels.

The implementation of Fourth Round projects in Duyun illustrates how necessary strong support is from the provincial levels of government, as they are key both to providing adequate financial support to these projects and to enabling the development of well-organized, and effectively coordinated multi-department programs under the clear and strong leadership of one institution.

7.7.2 Project Management Training is Required so that Staff Understand that Work Plans both Need to be rigorously Observed and yet Flexibly Modified Depending on What Gives the Best Project Results: both Diligence and Creativity are Required

In a climate in which people are used to ensuring responsibilities have been discharged, the fact that Global Fund projects must follow work plans and budgets decided with the Fourth Round office of the Global Fund, means that people treat work plans like orders, rather than negotiable guidelines to action. While such projects always have a learning component to the experience, and thus require a certain flexibility and creativity in the implementation, there is a need to better explain to workers that work plans are both a way to measure progress and an estimate of what time is actually required and appropriate. So, while quarterly work plans are an important way of keeping projects on track, project leaders and project managers must understand that the excellence of the work is the highest priority, not the work plan itself. If these work plans are followed too rigorously, it becomes very difficult for local organizations

to make any necessary adjustments. As the director of Duyun CDC explained: “people do whatever was in the plan, and therefore it is difficult to inspire the workers’ incentive and enthusiasm when they are simply ‘working to the plan.’”

7.7.3 Lack of Communication between the Different Local Governments Participating in Global Fund Programs Limits the Necessary Sharing of Lessons Learned and Best Practices

Interviews conducted in different counties and cities show that, while there have been efforts to increase communication and exchange of lessons learned between local governments from the same province and involved in the same Round of the Global Fund, at the same time, there has been a lack of information sharing and collaboration among provinces and among different projects, i.e., the different Rounds.

The leaders of the coordinating units, mostly CDC Directors, all point out the need for the Global Fund to help improve communication and information sharing between counties and cities from different provinces and participating in different Rounds. In particular, the counties selected in 2005 and 2006 said they wanted to benefit from the experience of the counties that participated in the 2004 Third Round, as they possessed valuable experience in the prevention and treatment of HIV/AIDS that could be shared with the other local governments now starting up similar projects. Furthermore, the fact that these Global Fund projects require project management skills means that learning from CDC leaders who have already gone through such a learning and management process would guarantee more efficient work in the counties and cities that are now starting Global Fund projects.

Finally, Global Fund programs represent a transfer of knowledge and best practices from these international organizations to the local administrative departments. All the cities and counties of the country should be able to benefit from this knowledge sharing, so that best practices and efficient working patterns are adopted everywhere. The very limited sharing of these experiences outside the circle of counties and cities selected for the Global Fund programs represent a serious weakness that needs to be addressed.

In future, Global Fund should ensure the sharing of knowledge among different provinces, and they should organize the sharing of the lessons learned from previous Rounds as part of the structure of future Rounds, thus avoiding repetition of mistakes, while strengthening the comprehensiveness of new HIV/AIDS prevention and care programs all over the country.

CHAPTER 8: Gender, Poverty, and the Epidemic: Case Studies on Rural

People Living with HIV/AIDS

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8.1 Introduction

Through in-depth interviews with 110 people living with HIV/AIDS (98 PLWHA and 12 uninfected people with infected family members), this qualitative study has been conducted with three purposes in mind: first, to illustrate the socio-cultural script of everyday lives of rural PLWHA, their families, and their communities; second, to describe the state of feminization of the HIV/AIDS epidemic and feminization of poverty within HIV/AIDS families; third, to explore how gender intersects with traditional customs and ethics, economic and political policy, and the medical system to impact PLWHA and their families' lives. Further, the study aims to make embedded gender inequality and patriarchal values transparent. The purposes of this study were determined based on the following three considerations: the national HIV/AIDS epidemic and feminization of HIV/AIDS has become a trend; the entanglement of HIV/AIDS and poverty has become a phenomenon that could not be neglected; the change in focus from a biomedical to a gender perspective offers a new way of understanding the disease and people living with it.

Although the epidemic started later in China compared to Africa, and the prevalence among the general population is still relatively low in China, high prevalence rates have been reported in selected locations and/or populations. For example, in provinces along the drug-trafficking route, the HIV prevalence rate exceeds 20-30% among intravenous drug users (IDUs) (Global Fund, 2007). In central China, where former commercial blood/plasma donation was prevalent, the rate among blood/plasma donors has reached an average of 10-20%, with rates as high as 60% in some communities (UNAIDS, 2003). HIV/AIDS continues to have a large impact in China and places a heavy burden on the state, economy, families and social networks.

The feminization of HIV/AIDS has become a trend of the HIV epidemic around the world. From a global perspective, the experience in most countries is that women, especially those who are marginalized, have been pushed from the edge into the center of the AIDS crisis (Hu, 2006). From 1985 to 2005, the percentage of women infected HIV/AIDS has ascended rapidly, from 35% to 46%, to as high as 60% among young women aged from 15 to 24. As of the end of 2005, women older than 15 years of age represent more than 17.30 million of the 38.60 million people living with HIV/AIDS (UNAIDS & WHO, 2006).

In China as well, unfortunately, the feminization of HIV/AIDS is an ongoing characteristic of the progression of the HIV epidemic. The problem of growing numbers of women living with

HIV/AIDS has grown more evident and more serious. Since China documented the first case of AIDS in 1985, the number of women infected HIV/AIDS has increased rapidly. According to the 2004 Report on China HIV/AIDS Prevention and Control Assessment by the State Council AIDS Working Committee Office and UNAIDS, the percentage of women infected HIV/AIDS has increased from 15.3% in 1998 to 39% in 2004 (State Council AIDS Working Committee Office & UNAIDS, 2004).

Table 8.1 : The Percentage of Women Infected with HIV/AIDS (1998 – 2004)

Year	1998	1999	2000	2001	2002	2003	2004 (Jan-Sept.)
Percentage	15.3	14.3	19.4	22.7	25.4	35.6	39

As of the end of October 2007, the number of people in China reported to be living with HIV/AIDS totaled 223,501, of which 62,838 were AIDS patients and 22,205 were deceased. Among the reported HIV-infected people, 71.3% were men and 28.7% were women; among the reported AIDS patients, 60.6% were men and 39.4% were women (State Council AIDS Working Committee Office & UNAIDS, 2007).

The entanglement of HIV/AIDS with poverty is another important feature of China's HIV epidemic. The relationship between HIV/AIDS and poverty is one of mutual causality: the facts support the premise that poverty causes many of the high-risk behaviors associated with HIV/AIDS, for example, selling blood, sex work, and abusing injection drugs. On the other hand, infectious disease draws many families into the abyss of poverty (Jin, et. al., 2004). The strong association between the HIV epidemic and poverty can be mainly illustrated by the following two points: 1) In terms of geographical distribution, China's HIV epidemic is concentrated in poor rural areas; 2) The majority of HIV-infected and AIDS patients are among peasants and floating populations, and their common characteristic is relative poverty (Li & Tang, 2005). Moreover, areas with high HIV/AIDS infection rates are primarily the same areas that have high rates of poverty and a vastly poor population.

The social sciences research field in China has recently begun regarding HIV/AIDS as social problem. For a long time, the biomedical approach has dominated the study of HIV/AIDS, which adopts efficiency-driven perspectives and quantitative tools to measure cost-effectiveness between variables related to HIV/AIDS. The identification of the biomedical perspective is deeply related to the two issues: on the one hand, the state has long defined HIV/AIDS as a contagious disease with high death rate rather than a social problem; on the other hand, the state initially ignored the existence of the epidemic and characterized HIV/AIDS as a foreign disease associated with a westernized lifestyle. Recently, this attitude has started to change to a more practical and realistic stance.

Replacing the biomedical approach to one of gender perspective means that we not only regard HIV/AIDS as a serious contagious disease, but we also pay attention to those people and families living under the shadow of HIV/AIDS. We should not regard them as passive recipients of social and medical assistance, but as active participants in their own lives with autonomy and agency. As well, we should not only distinguish the differences between men and women living with HIV/AIDS, but also examine how gender intersects with traditional customs and ethics, economic and political policies, and the medical system to create multiple oppressive systems that significantly impact rural women living with HIV/AIDS.

This study incorporates six of the eight Millennium Development Goals (MDGs), including reducing poverty and hunger; combating diseases such as HIV/AIDS and malaria; achieving

universal primary education; decreasing child and maternal mortality; combating environmental degradation; and eliminating discrimination against women. Combining theoretical interrogation, social practice, and policy advocacy, this study has implications for translating theory into practice.

8.2 Methodology

Data collection was carried out between December 2006 and April 2007. The research group interviewed 110 informants from four different provinces, including 6 cities, 11 counties, and 23 towns and Methadone Maintenance Treatment Clinics. The detailed locations are listed below:

Table 8.2: The Project Locations

Province	City	County	Town+ Methadone Maintenance Treatment Clinic (MMTC)
Yunnan	Dehong	Longchuan	Chengzi Town, Longba Town, Jinghan, Town , Husha Town
		Ruili	Nongdao Town, Mengmao Town, Mengxiu Town Ruili MMTC
		Yingjiang	Taiping Town
Henan	Zhumadiar	Shangcai	Shaodian Town, Lugang Town, Wulong Town
		Jingji jishu Kaifaqu	Jingjiu Office
Anhui	Fuyang	Yinzhou Funan	Wangdian Town Wanghua Town, Yuji Town, Longwang Town
		Linquan	Tianqiao Town, Kaifaqu
Guizhou	Bijie	Zhijin	Zhijin MMTC
	Tongren	Tongren	Daping Town, Tongren MMTC
		Qiannan	Duyun MMTC
	Guiyang	Nanming	Nanming MMTC

There were two reasons for selecting Yunnan, Henan, Anhui, and Guizhou. On the one hand, the four provinces have high rates of infection. As the end of Oct. 2007, six provinces, namely Yunnan, Henan, Guangxi, Xinjiang, Guangdong, and Sichuan, were reported as having 80.5% of the PLWHA in the nation, while Henan, Yunnan, Guangxi, Anhui, Guangdong, and Hubei were reported as having 83.0% of the AIDS patients in China (Office & UNAIDS, 2007). On the other hand, the four provinces that were chosen as project locations represented different routes of transmission. In Yunnan and Guizhou, intravenous drug use (IDU) is the predominant route, while in Henan and Anhui, commercial blood/plasma donation (CBD) is the main source of transmission. The other issue that should be mentioned is that the project mostly focused on rural areas since peasants are among the majority of HIV- infected and AIDS patients.

In-depth semi-structured interviewing was used as the main method of data collection, which emphasized the exploration of the informants' personal histories and subjective

experience associated with the illness from a gender perspective. Generally, an interview was one to two hours in duration and conversations were related to all aspects of family life affected by the illness, including the possession and distribution of family resources, family planning, sexual relations, women's reproductive health, practices and prevention of mother-child transmission, family roles and gender roles, and the informant's social support network.

Among 110 informants (ages ranging from 16 to 79; 50 male and 60 female), there were 12 uninfected interviewees (3 male and 9 female) who had a family member or members living with HIV/AIDS. Among the 98 PLWHA, there were 47 men and 51 women, and the distribution is as below:

Table 8.3: Gender Distribution

Province	Male	Female
Yunnan	20	12
Henan	9	13
Anhui	4	14
Guizhou	14	12
Total	47	51

The 98 PLWHA reported that they were infected through different channels, including intravenous drug users, commercial blood/plasma donation, heterosexual intercourse, and commercial sex. Only one of 47 male interviewees was infected through buying sex, and none of them had been infected by homosexual intercourse. Many children living with HIV/AIDS are mentioned in the interviewees' stories, mostly the interviewees' children and grandchildren; however, none of them were interviewed because of their age. After each interview, the researcher recorded the dialogues, observations, and self-reflections in a timely manner, as part of the compilation of data for analysis. In order to protect the participants' privacy, all names remain anonymous and have been replaced by figures such as Y2 or A13. For Y2, "Y" means Yunnan, "2" means this was the second person in Yunnan to be interviewed; for A13, "A" means Anhui, "13" means this was the 13th person in Anhui to be interviewed. Therefore, "H" means Henan, and "G" means Guizhou.

8.3 Findings

HIV/AIDS is closely related to physical suffering and pain, stress, anxiety, stigma, discrimination, and family conflict and change. Ordinary people cannot imagine what AIDS patients have to suffer. For example, during one interview, Y19 kept scratching a sore on his head, which had festered. He narrated in an easy tone:

When the head is too itchy, I will ask my wife to scrape the head with a knife or splash some Panaplate on it. Although it hurts a lot, the itch stops (Y19, M, 30).

The HIV/AIDS-related stigma that prevails in their lives comes from a powerful combination of fear and shame. A11's story demonstrates vividly how her family life is influenced by HIV/AIDS-related stigma and discrimination:

A11 (F, 45) and her husband were both infected through blood selling. They have one daughter and two sons who are all not infected. The family once lived in A Village;

however, the villagers fear the disease and they discriminate against them greatly since the family was the only one with AIDS sufferers. Therefore, the family had to move to B Village to live in a rented house. The rent is not a small expenditure for the family and the loneliness of living in a new environment is also a source of stress. All's husband was hospitalized at the end of 2006 and in rather poor condition. The children have dropped out of school, as they fear being laughed at. Without farmland, they cannot earn money by farming. In general, their income cannot meet their expenditures. Their life is rather hard.

All encounters many of the difficulties and obstacles experienced by other informants. Six informants reported that their child(ren) have had to drop out of school; five participants reported that it is difficult for infected people, and in fact anyone from a high infection area, to find jobs. Seven infected parent(s) reported that their illness influenced their uninfected adult children's chances of getting married since no one wanted to be closely involved in their family. Almost all informants believed that their social network had become very narrow. Seven of them reported that it was hard for them to provide for their families by working for themselves because they could not get any help either from the bank or from other people.

The stigma and discrimination associated with HIV/AIDS are so strong that 7 out of 98 PLWHA preferred to bear the stress and anxiety all alone and keep the fact that they were infected a secret, even from spouses or parents. For example, G5 (M, 30), single, did not tell his parents about the illness. He said,

As long as I did not tell them, it could not affect my family relationship, daily lives, and social relations.

Poverty is usually central to the lives of PLWHA. For example, in the age of electricity becoming a basic need of people's everyday lives, A17 (M, 36) use kerosene lamp instead of electric lamp at night in order to save money; as he said, *"Anyway, I do not have any electronic machines."* The link between poverty and ill health has long been a recurrent theme throughout the history of public health discourse. In the late 19th century, Friedrich Engels looked at the social origins of illness and analyzed the link between the spread of infectious diseases and poor housing conditions, bad sanitation and overcrowding (Patna & Rifkin, 2007). In this study, we find that HIV/AIDS often acts as the most common trigger for a downward spiral that not only leads to impoverishment but also becomes an obstacle to breaking out of the poverty cycle.

The following three cases have been selected from the total of 110 to illustrate in detail how the combination of gender inequality, poverty and mobility impact everyday lives of PLWHA and their families. They explore the subjective experience of PLWHA, the dilemmas and challenges they face in their daily lives and their coping strategies, therefore revealing the residue of patriarchy and the root of gender inequality embedded in their individual experiences. These three cases have been chosen to illustrate the socio-cultural script of PLWHA's everyday lives associated with HIV/AIDS, such as power struggles between couples infected by HIV/AIDS, including transmission routes, disclosure of the illness, condom negotiation, etc.; family change; the feminization of HIV/AIDS; and the feminization of poverty within families living with HIV/AIDS.

Case One: My wife does not know that I am HIV positive

Y2, male, age 48, with a primary school education. He has a long history of injection drug use and was examined as HIV-positive by local CDC in 1996. His ex-wife was infected through marital sex and died of AIDS few years ago and his current wife does not know about the interviewee's HIV status. When asked about his sexual relationship with his current wife, the interviewee said ambiguously that he used condoms given by the epidemic station. His wife has never been tested for HIV and it is not known whether she is infected or not. The village cadre knows his situation but keeping his secret quite well all the same, told us "his wife would not marry him if she knew about his illness."

8.4 Transmission Routes

In his study of Thailand's history of AIDS control, Erni (2006) lists six waves of HIV/AIDS transmission, from gay men (first wave) to intravenous drug users (second wave), women in the sex industry (third wave), heterosexual men in rural Thailand (fourth wave), their female sexual partners (fifth wave), and, most recently in 2000s, urban (gay and straight) Thai youth (sixth wave). As a reference, this study demonstrates the process from the fourth wave to the fifth wave in China.

From this case, we find that routes of infection differ between men and women, and Table 8.4 demonstrates the transmission routes in four provinces.

Table 8.4: Transmission Routes

Province	Male			Female		
	IDU	CBD	Sex	IDU	CBD	Sex
Yunnan	17	NA	3	NA	NA	12
Henan	NA	9	NA	NA	11	2
Anhui	NA	4	NA	NA	11	3
Guizhou	13	1	NA	8	2	2

In Yunnan, 17 of 20 men were infected by active behavior related to IDU, while all women were infected by participation in heterosexual sex within marriage and courtship. In this situation, the safest sex, which is regarded as that within the context of a monogamous marriage, immediately turns into a stem of illness, and women become its passive, innocent victims. In the reported PLWHA from January to October 2007, heterosexual sex (37.9%) becomes the most common route of transmission, more frequently than the second most serious route, injection drug use (29.4%) (State Council AIDS Working Committee Office & UNAIDS, 2007). This is a signal that the Chinese HIV epidemic has entered a new era of "feminization of HIV/AIDS."

Of the three men infected by sex in Yunnan, one was infected through extra-marital sex and the other two were infected through heterosexual intercourse in remarriages, i.e., their current wives did not know they had become infected by their ex-husbands. From table 4, we can tell that men are infected through sexual contact much less frequently than women. Compared to men, women are disproportionately affected by HIV/AIDS because women are biologically more susceptible to HIV/AIDS than men and HIV/AIDS has more severe health consequences for women than men, as many studies proved (Harvey et al., 2006). Besides,

women who contracted HIV through sexual contact were most likely infected by their husbands, whereas men who contracted HIV through sexual contact were likely infected through extramarital sex, including commercial sex.

In Henan and Anhui, the situation is different from Yunnan: all men were infected through the sale of their blood, while 22 of 27 women were infected from selling blood and the other 5 of 27 were infected through sexual contact. One point to note is that in Henan and Anhui, when the infected women had the experience of selling blood, they preferred to identify CBD as the transmission route, at the same time neglecting the overlap of CBD and sex. Only when they had no experience of selling blood was sex identified as the route of infection.

8.5 Disclosure of the Illness

HIV serostatus disclosure provides potential benefits to infected persons, their partners and communities. However, the rates of serostatus disclosure are not optimistic. Among women in developing countries, rates of sharing HIV test results with their sexual partner ranged widely from 16.7% to 86%, depending on time frame for disclosure and population of interest (Yang et al., 2006).

Just as Y2 did not tell his wife about his HIV status, this phenomenon was not exceptional in our research:

G10 (F, 33)'s husband was diagnosed with HIV in 2001, but did not tell G10 about the diagnosis and did not take any action of safe sex. Till 2004, the staff at CDC told the G10 to have the HIV test done and G10 found that she has already infected.

This study validates the finding of Li Li et al. (2007), that women are more inclined to disclose their illness to their spouse than men. On the basis of self reports, it took an average of only one day for both female IDU and female non-IDU participants to disclose their status to others, whereas it took 30 days for male IDU participants and six months for male non-IDU participants to disclose.

In the United States, HIV confidentiality guidelines recommend that health professionals should not divulge personal information to others in ways inconsistent with the client's original consent (United States Centers for Disease Control, 1999). In China, confidentiality has not been made clearly into policy. The local practice procedures are: local CDC informs the PLWHA and lets them decide whether or not to inform their spouse/lovers or not and who will disclose the information. The Li Li et al. (2007) study shows that women chose to disclose to a husband or boyfriend out of a sense of responsibility. In Henan and Anhui, where the infection is transmitted through the selling of blood and the infected groups and communities are highly concentrated, disclosure to the spouse encounters less resistance. In Yunnan and Guizhou, however, where there is more than one source of infection and injection drug use bears stigma and shame, disclosure becomes more difficult.

The intersection of the medical practice of confidentiality and the patriarchal system protects the privacy needs of men living with HIV/AIDS, while at the same time disrupting women's rights to autonomy and health. In order to reduce this phenomenon, the civil service system needs to establish a compulsory disclosure policy between marital couples and couples before marriage registration when one of the partners has become infected with HIV/AIDS. In the

long term, the policy will serve to prevent the spread of the epidemic to women and children.

8.6 Condom Negotiation

In this case, Y2 said ambiguously that he used condoms given by the epidemic station when having sex with his wife. From this statement, we can tell that Y2 knows clearly that condom usage will reduce the risk to his wife of becoming infected. Meanwhile, it is unclear whether he actually does this in their daily lives. The report on HIV/AIDS Knowledge, Attitude, and Behavior among Chinese Citizens (2004) by the Ministry of Health pointed out that, in the rural areas, “often using condom” is 5.4%, and “seldom using condom” is 71.5%. The results of this study are similar to the 2004 report. When one partner becomes infected, especially when men are the infectors, condom usage is still very limited. This is the direct cause of women becoming infected in the “safest” monogamous marriages and courtships. G1(M, 35) tested HIV-positive in 2002, yet he stated clearly in the interview he did not take any action regarding safe sex because he wanted his own kids so much:

I am very dissatisfied with the local CDC. I want to have my kids very much especially after I was confirmed as HIV-positive. I know that somebody in my situation also gives birth to a son. When I counseled with the local CDC, the staff said abruptly that I could not.

It seems that he did not understand clearly that his behavior – associated with the old patriarchal thinking of “continuing family line by producing a male heir”¹⁴² – is putting his wife’s health and life at risk. During the field work, we noticed that local CDC usually are in charge of condom distribution, generally condoms are just left in a corner of the CDCs or MMTCs offices, where PLWHA can take them by themselves. In some CDCs and MMTCs, the staff would ask PLWHA to register if they take some condoms. Local medical professionals also told us that condom usage is not as ideal as expected even though they are provided free of charge.

Because the use of condoms involves interaction with another person and requires the participation, or at least cooperation, of both members of a sexually active couple, interpersonal power and relationship factors are prominent in understanding the negotiation of condom usage. Sometimes “love and commitment” is used to justify the decision not to use condoms. For example, G3 (F, 38) got married even though she knew that her husband was HIV-positive. As she told us:

At that time, I was in deep love, I was crazy, love him, and did not consider anything else. It was an urge to have sex, though I knew that sex is the route of transmission. Besides, he did not offer to take any protection actively.

Studies have shown that correct and consistent condom use provides a high degree of protection against HIV (Scott-Sheldon, et. al., 2006). However, according to Harvey et al. (2006), women who were more committed to their partners reported less positive attitudes toward condom use and lower perceived vulnerability to HIV/AIDS. Lower perceptions of susceptibility to HIV/AIDS were in turn associated with less favorable attitudes toward using condoms. Moreover, women who had been with their sexual partners for a longer period of time held less favorable attitudes toward condoms and lower perceived partner norms for

¹⁴² In Chinese “chuanzongjiedai, 传宗接代”.

using condoms. It is urgent to educate and entitle women, especially those with husbands living with HIV/AIDS, with knowledge about HIV transmission and the power of condom use negotiation in order to protect their sexual and reproductive health.

8.7 Divorce Disturbance

Extended from this case, we find a contrasting phenomenon, especially in rural Yunnan. When men are infected for whatever reason, the uninfected wives usually devoted themselves to taking care of them and sometimes risk their lives to get pregnant and give birth. The common result is that the wives quickly become infected. However, when women are infected, the uninfected husband usually asked for a divorce; even when the husbands are reluctant, the in-law parents take action to push them to get a divorce. If women become infected through selling blood, their situation is better; if they get infected through extramarital sex, divorce seems to be the only option. For example, Y12 (F, 25) became infected through extramarital sex. Her husband went for an examination and was found to be HIV-negative, and they divorced immediately. Based on the different ways men and women living with HIV/AIDS are treated, we can tell that gender inequality is deeply embedded in the patriarchal family system. People have more moral tolerance of men living with HIV/AIDS, while there is more discrimination toward women living with HIV/AIDS.

Case Two: I have to support the whole family

Y29, female, age 57, Han nationality. There are five people in her family, her husband, three sons and her. Her three sons are all addicted to drugs and infected with AIDS. The sons sold all the family's savings, property, and farmland to pay for drugs. As a result, the family owns no farmland and therefore has no agricultural income. At the time of the interview, two of them are still in the work camp for rehabilitation and the other one stays at home with nothing to do. The three sons are all single. The eldest son was married before, but his wife could not stand him and left, and their son, Y29's grandson, died at an early age. Her husband got cerebral apoplexy in 2005 and has been in bed ever since. He could not work but kept on drinking every day. If no alcohol was offered, he would make all kinds of trouble. The whole family relies on Y29's hard work at selling baozi and rice noodles at the market every morning.

8.8 Women as Main Supporters

In the past, the existence of gender inequality in rural families often leads to the conclusion that men are the main supporters and contributors in the family. This case and many others that we encountered in our fieldwork show that women become the main supporter of the whole family when men living with HIV/AIDS lose their capacity to work. However, even in this situation, the traditional belief that men are superior to women is still dominant in the process of family planning, and gender inequality within a family has not changed that much in that women have not been the main decision makers.

Gender inequality is deeply associated with the local ethics and customs in Yunnan. Back in 1945, Fei Xiaotong and Zhang Zhiyi (Fei & Zhang, 2006) pointed out during their fieldwork in Lu Village, Yunnan, that the local custom is that women work hard while men remain idle during the day. As they describe,

Even in rich families, women and girls work in the field regularly... it seems unfair that foot-bonded women work industriously in the mud and men are idling their days off.

During our fieldwork, we noticed that the current family life script is similar to the situation 60 years ago: women work very hard and men enjoy life by using drugs. Some women, both wives and mothers, told the interviewers directly, “*Since he is infected by the illness, if drug use can make him relax and comfortable, let it be.*” Fortunately, in the case of Y29, the husband did not infect his wife with HIV; in some other cases, even when the women are infected, they still are the caregivers and family supporters. For example,

A4 is a 37-year-old female and infected with HIV through selling blood. The whole burden of supporting the family is shouldered by her because her husband has chronic bronchitis and arthritis and cannot do any physical labor or work outside the town. Her elderly mother-in-law has high blood pressure so she cannot work, either. Both children are at school. The source of their income is her work in nearby towns, which she takes on when she is not working the farm. She mainly works as a painter and earns 800 RMB per month from that source. During the busy farming season, she comes back home to sustain the family's daily life. One would assume that her husband would offer her care and consolation in return for her hard work. On the contrary, she said that her husband asked for a divorce after she was diagnosed with HIV in 2003; however, the villagers and Buddhist believers persuaded him to stay with her. He remains a little indifferent to the interviewee.

8.9 Feminization of Poverty

The theoretical hypothesis of mainstream poverty measurement is “equal distribution of poverty within a family.” From gender perspective, this hypothesis should be revised as follows: a gender hierarchy of poverty exists within a family, which means that there exists a gender difference in expenditures (Wang & Ci, 2005). Specifically, the gender difference means that within a poor family, when comparing women and men, who eats better, who wears better clothes, who spends more, and who gets more educational investment and career training. During the fieldwork we found that, in these families with PLWHA, women often turned into the main supporters of the family and at the same time became the first victims of the family's poverty. In this case, Y29 is the main supporter of the family, but she has to obey her husband, and all the money earned by her hard work is wasted by her son's addiction of drugs and her husband's addiction to alcohol. There was no money left for her.

Wei and Hui's study on reproductive health of rural women in Gansu central finds that it takes three months on average for an adult woman to see a doctor after the emergence of the illness, one month longer than for an adult men. It takes 48 hours for a girl to see doctor, while a boy sees a doctor within 24 hours (Wei & Hui, 2005). Our study also finds that if both husband and wife are PLWHA, when the money is limited, men are always the first priority in seeking medical help. Women's biological vulnerability, the traditional belief that men are superior to women and the reality of poverty within HIV/AIDS families together create a huge barrier for women's awareness of their own health and result in the feminization of poverty.

As a result of the spread of HIV/AIDS, many single parents, especially widows, have been

left to care for their families. However, in the research field of poverty in China, both measurement and assistance treat the family as the basic unit, which effectively ignores the structural differences between integrative family and single parent family, and directly overlooks the feminization of poverty in HIV/AIDS families.

8.10 Challenge to the Family's Stability

As the Chinese saying goes, raising children provides against old age. At Y29's age, she should be taken care of by her sons and playing with her grandchildren; instead, she has to work hard to take care of her sons. The phenomenon of "the aged take care of the young" has becoming common in HIV/AIDS families: 16 informants report that they have had this experience and Y6's story is particularly distinguished:

Y6, male, aged 79, has ten children including eight sons and two daughters. Except for the younger daughter who does not take drugs, all of the other nine children are addicted to drugs. The third son died of HIV/AIDS as a result of drug use. At the time of interview, the other three sons have been diagnosed with AIDS: two are married and one is single.

In HIV/AIDS families death becomes common and inevitable; 33 informants report that they have experienced deaths among their direct relatives (including parents, children, siblings, and dating partners). Just like Y6, 10 informants reported that there are more than three people infected in their core families or extended families. H20's story is unforgettable:

H20 is a 39-year-old HIV-infected man. There are ten members in his family: H20, his wife, his parents, one daughter and one son, his older brother's two children and his older sister's two children. H20 has one older brother and five older sisters. His older brother and his sister-in-law died of AIDS and left a boy and a girl, who were adopted by H20. Four sisters out of the five are infected with HIV. His oldest sister and brother-in-law also died of AIDS, leaving two daughters, who were also adopted by H20. He and his wife are also infected with HIV through blood selling.

Out of 97 married informants, 31 reported that both sides of the couple are infected, 11 were widows and 4 were widowers. Nine of them divorced more or less because of the disclosure of the illness, and 7 of them remarried after the ex-spouse's death; remarriage sometimes became a route of transmission. Twelve of them reported that isolation and conflicts, especially between spouse and in-laws, sometimes turns out to be the most unbearable consequence. A16 (F, 48), a widow who is HIV-positive, adopted an AIDS orphan, viewing her daughter as a new way of saving themselves and others.

Chinese ideal harmonious society has the following characteristics, as listed in *The Book of Rites*, "A competent provision was secured for the aged till their death, employment for the able-bodied, and the means of growing up to the young. They showed kindness and compassion to widows, orphans, childless men, and those who were disabled by disease, so that they were all sufficiently maintained."¹⁴³ HIV/AIDS challenges these ideals in all aspects and creates obstacles and difficulties in the provision of social and medical assistance.

¹⁴³ The book of rites, in Chinese, 《礼记》, Translated by James Legge. In Chinese, 使老有所终, 壮有所用, 幼有所长, 矜寡孤独废疾者皆有所养。 <http://www.sacred-texts.com/cfu/like/like07.htm>

Case Three: I have no home to live

A10, female, age 23. Her husband died of AIDS half a year ago, and she was a mother of two little girls, a six-year-old and a younger one, two years of age. She is also HIV- infected through sexual intercourse. Her husband's family worried that she would infect other family members, so they did not allow them to live with them. She has no choice but to live in the county hospital with her two children. Feeling sorry for her, the hospital exempts her from charges for water, electricity, and rent. She lives on the subsidy of 150 RMB per month. Her maternal home is far away in Gansu Province, and she has no money to travel back. She says she cannot imagine how the children will survive after she dies. She says she is young and does not want to leave the world at such a young age, as tears flow down her cheeks.

We can understand A10's story from the perspective in-law conflict, and tend to criticize the mother in-law's actions. However, deep down, this incident of A10 and her two children's homelessness stems from the living arrangement of women after marriage. In China, married women are used to leaving the maternal home and living with husband's family. This living arrangement is one of important symbols of gender inequality in rural areas, which are closely related to rights of inheritance, property and farmland. Lacking of these rights prevent rural women from empowerment and sustainable development.

After the husband's death, the direct reason for A10 and her children becoming homeless is that she does not have the rights of inheritance and farmland, and therefore has no bargaining power to fight the in-laws. In rural areas, villages with limited land usually refuse to increase farmland for the family that just has a daughter in-law, while they immediately grab the farmland from the family that has the daughter who gets married (Bossen, 2002; Jacka, 2006). This most common practice in the rural economy further marginalizes married women and worsens women's poverty. During the fieldwork, we noticed that many drug users sold their farmland without their wives' agreement in order to pay for drugs. However, the transaction is often conducted in secret, with the women kept in the dark, since a woman's consent is not necessary for the these kinds of transactions. For example:

Y30 (F, 40) is an AIDS-infected widow with two children. Her husband died of AIDS in 2004. The family has practically no income. Her husband took drugs before he died. He sold (rented) the 0.5 acres of farmlands to others, and she cannot get it back.

Living arrangements after marriage constitute the basis of discrimination against women and strengthens the traditional vulgar custom of "regarding men as superior to women." Here, we notice that both of A10's children are girls, and this may be the other reason that A10 is isolated in the in-law family. During the fieldwork, we noted that there were many cases of widows living with HIV/AIDS in the in-law families facing discrimination, but it seems that A10's situation is the most difficult. One of the reasons is that the other widows have sons, and the in-law family would not expel the mother in consideration of the welfare of their grandsons. For example:

At the time of interview, Y39 (F, 25), an infected widow, kept crying. Her plight at home was poor and her parents-in-law kept burdening her with their problems. According to the village doctor, one of the main reasons her parents-in-law are keeping her at home is the existence of the grandson and because Y39's dead husband

was her parents-in-law's only son.

For a long time, research on the Chinese rural community emphasized that the rural community has strong sense of geographic boundaries and is a highly cooperative and integrative community. The inner solidarity relies on both the unity of families and patriarchal clans, and the exclusion of outsiders. A10 is an outsider, a woman, and an HIV infector, and therefore she bears multiple discriminations from the community.

8.11 Conclusions

In 2000, Parker, Easton and Klein (2000) reviewed ten years of literature pertaining to the structural factors or social determinants that are shaping the HIV/AIDS epidemic in developing nations. The social determinants were first identified and then organized into the following three major categories: 1) economic (under)development and poverty; 2) mobility; and 3) gender inequalities (Cunha, 2007). This study examines the findings in China by focusing on the interconnection of poverty and gender inequality. The issue of mobility is also observed in our 110 interviewees' lives, such as some informants migrating to the city as a floating population and the spread of commercial sex and informants' participation, etc. However, that is not the core of the analysis in this study.

This study is a preliminary endeavor to delineate the socio-cultural script of rural PLWHA. It documents the new wave of "feminization of HIV/AIDS" that has entered the Chinese epidemic and examines the impact of the combination of biological vulnerability and a gender-based power structure on people, especially rural women, living with HIV/AIDS. Based on the discussion of power struggles between marital couples – including topics such as transmission routes, disclosure, condom negotiation, and divorce disturbance – this study further demonstrates how HIV/AIDS challenges family structures and stability, makes women both caregivers and family supporters, and exposes the reality of the feminization of poverty within HIV/AIDS families. In the end, this study sheds light on the poverty experienced by infected women, which is due not only to the severity of this contagious disease, but to their living arrangements, prevalent rights of inheritance and farmland, and the traditional belief that "men (are) superior to women."

This study has several implications for HIV/AIDS prevention and interventions that focus on improving the quality of life for PLWHA and their families.

Given the pervasiveness of HIV/AIDS infection within the heterosexual community, determining avenues for improving safer sex is critical to reducing of the spread of HIV. Reducing the practice of unprotected intercourse among women at risk for HIV and other STIs is a public health priority.

During the fieldwork, we noticed that all children under nine years old who were living with HIV/AIDS were infected through mother-child transmission. In contrast, medical developments have been found to be effective in preventing such transmission. The emergence of HIV/AIDS in children can be attributed to: 1) infected pregnant women not receiving the necessary medical treatment; and 2) the lack of knowledge related to HIV/AIDS and reproductive health among infected women. Therefore, preventing mother-child transmission has to do with educating women at risk for HIV with knowledge about how HIV/AIDS is transmitted, promoting safer sex and condom usage; and empowering women

to protect their sexual rights and reproductive health.

During the fieldwork, 12 PLWHA reported that their spouses and children had not been examined although they were at risk for contracting HIV/AIDS. Many people chose avoidance because of their fear. For example, both the Y5 (M, 29) and A9 (F, 33) couples are all HIV infectors, but they did not send their children for examination:

I am afraid of the influence on the children if they are diagnosed as AIDS infected. Anyway, since the illness is incurable, it makes no difference whether we get an examination or not. (Y5, M, 29)

He is so young, my husband and I would not be able to bear finding out he was infected. (A9, F, 33)

In the long term, persuading people at risk for HIV/AIDS to have examinations as early as possible benefits those people, their families, and their communities. This responsibility should be on the public health education agenda.

Moreover, we realized that it is not enough to ask women to change individual behaviors to solve this social problem (for example, demanding that their partners wear condoms), since the study found that the feminization of HIV/AIDS and of poverty in HIV/AIDS families are deeply associated with gender oppression and hierarchies of sexual power. Therefore, it is urgent to design interventions to address the social and economic inequalities that limit a person's ability to make healthy decisions, rather than to try to change the knowledge, attitudes and beliefs of the individual. As Cunha (2007) points out, HIV/AIDS is a social issue and, as such, solutions are needed at multiple levels, including the formulation of long-term plans to reverse economic and social inequalities.

Chapter 9: People and Household Living With HIV/AIDS:

Findings from the Household Survey

Xiaohua Wang
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9.1 Descriptive Statistics

The sample covers both the Global Fund (GF) and the Ministry of Health (MOH) pilot program counties. It intends to understand the impact and effectiveness of both programs. The social assistant program is a national program with funding matched by central and local revenues, the level of support and entitlement also differ by locations.

9.1.1 Sample Distribution

For the household surveys, 1120 households were interviewed in 12 counties and 4 provinces. Information on 4850 individuals within these 1120 households was collected. The four provinces are Henan, Anhui, Guizhou and Yunnan. Among them, Henan and Anhui are located in Global Fund Round 3 region, and Guizhou and Yunnan are located in Global Fund Round 4 region. Table 9.1.1.1 presents the sample distribution.

Table 9.1.1.1: Sample Distribution

Sample Size	Round 3 of Global Fund			Round 4 of Global Fund			Total
	Henan	Anhui	Sub-total	Guizhou	Yunnan	Sub-total	
Individual	1719 (35.4%)	1414 (29.2%)	3133 (64.4%)	319 (6.6%)	1398 (28.8%)	1717 (35.4%)	4850
Household	368 (32.9%)	311 (27.8%)	679 (60.6%)	99 (8.8%)	342 (30.5%)	441 (39.1%)	1120

Not all counties in each province are covered by Global Fund. Some are MOH pilot program counties covered (see Chapter 3 for detailed descriptions of the MOH Pilot program Counties), regardless of the coverage of Global Fund. Among the 12 surveyed counties, 8 are under the Global Fund (Shangcai, Henan; Funan, Anhui; Fuyang, Anhui; Linqun, Anhui; Yingzhou, Anhui; Longchuan, Yunnan; Guiyang, Guozhou; and Duyun, Guizhou); among these 8 counties, 5 also covered by MOH pilot programs (Shangcai, Henan; Funan, Anhui; Fuyang, Anhui; Linqun, Anhui; Guiyang, Guizhou). In addition, 3 more counties are MOH pilot program counties only (Yingjiang, Yunnan; Zhijin, Guizhou; Tongren, Guizhou), which are not supported by the Global Fund. Table 9.1.1.2 provides the details of the sample distribution by Global Fund and by MOH.

Table 9.1.1.2 Surveyed Counties/Districts by Global Fund and MOH Program

Province	County/District	Global Fund	MOH
Henan	Shangcai County	Round 3	Yes
Anhui	Jingjiu District ¹⁴⁴	Round 3	Yes
	Yingzhou District of Fuyang City	Round 3	Yes
	Funan County	Round 3	Yes
	Linquan County	Round 3	Yes
Yunnan	Ruili City	Not covered	No
	Longchuan County	Round 4	No
	Yingjiang County	Not covered	Yes
Guizhou	Zhijin County	Not covered	Yes
	Tongren City	Not covered	Yes
	Duyun City	Round 4	No
	Nanming District of Guiyang City	Not covered	Yes

Table 9.1.1.3 below shows the distribution of surveyed households among the Global Fund and the MOH pilot program counties. Among the 1120 households, 142 are living in the non-Global Fund and non-MOH pilot program counties; 133 households are living in non-Global Fund and MOH pilot program counties; 166 households are living in Global Fund and non-MOH pilot program counties; and 679 households are living in the counties that are both covered by the Global Fund and MOH pilot programs.

Table 9.1.1.3: Sample Distribution by Global Fund and MOH Pilot Programs

	No-MOH Pilot Program County		MOH Pilot Program County		Total	
	N	%	N	%	N	%
No-Global Fund Program County	142	51.6%	133	48.4%	275	24.6 %
Global Fund Program County	166	19.6%	679	80.4%	845	75.4%
Total	308	27.5%	812	72.5%	1120	100.0%

Global Fund and MOH Pilot program counties have completed overlapped in Global Fund Round 3 programs, but not completely overlapped in Round 4 programs. Table 9.1.1.4 describes the overlapping situation with respect to the surveyed households.

¹⁴⁴A county-level administration with 10 urban communities and 10 villages. Survey was conducted in 6 villages hardest hit by HIV/AIDS.

Table 9.1.1.4: Household Sample Distribution by Global Fund Rounds of Programs and MOH Pilot Programs.

Type of Program Coverage	Round 3		Round 4		Total	
	n	%	n	%	n	%
Both Global Fund and MOH Pilot	679	100.0%	0	0.0%	679	60.6%
Global Fund County	0	0.0%	166	37.6%	166	14.8%
MOH Pilot County	0	0.0%	133	30.2%	133	11.9%
Neither Global Fund nor MOH Pilot	0	0.0%	142	32.2%	142	12.7%
Total	679	60.6%	441	39.4%	1120	100.0%

Table 9.1.1.5 presents the distribution by individuals according to Global Fund and MOH Pilot Program Coverage.

Table 9.1.1.5: Individual Sample Distribution by Global Fund Rounds of Programs and MOH Pilot Programs

Type of Program Coverage	N	%
Both Global Fund and MOH Pilot	3,133	64.6
Global Fund County	650	13.4
MOH Pilot County	523	10.8
Neither Global Fund nor MOH Pilot	544	11.2
Total	4,850	100.0

Among the 4850 individuals, 1345 are living with HIV/AIDS, which accounts for 29.6% of the total. Table 9.1.1.6 presents the distribution of the sample by province.

Table 9.1.1.6: Distribution of the Individuals by Province

Sample	Anhui		Guozhou		Henan		Yunnan		Total	
	N	%	N	%	N	%	N	%	N	%
Not infected	999	70.7%	204	63.9%	1212	70.5%	1000	71.5%	3415	70.4%
Infected	415	29.3%	115	36.1%	507	29.5%	398	28.5%	1435	29.6%
Total	1414	29.2%	319	6.6%	1719	35.4%	1398	28.8%	4850	100.0%

9.1.2 Household Characteristics

9.1.2.1 Household Size and Structure

The average family¹⁴⁵ size is 4.33, with a minimum of 1 person per household and a maximum of 14. Among surveyed households, 25.4% households have 2 to 3 persons and 62.1% have 4 to 6 persons. Over 90% are nuclear families or comprise three generations. Table 9.1.2.1 provides a detailed description of household size and structure.

¹⁴⁵ Here, the terms “family” and “households” are used interchangeably.

Table 9.1.2.1: Surveyed Household Size and Structure

Household Size (Person)	N	%	Structure (Generations)	N	%
1	38	3.4	1	75	6.7
2-3	285	25.4	2	684	61.1
4-6	695	62.1	3	329	29.4
>=7	102	9.1	4	32	2.9
Total	1120	100	Total	1120	100.0

9.1.2.2 Highest Educational Level of the Household Members

Over half of the households include someone who has graduated from middle school and nearly 30% of the households include someone who has graduated with primary school. Less than 10% of the households include someone who holds a high school diploma. Table 9.1.2.2 presents the highest educational level attained by household members.

Table 9.1.2.2: The Highest Educational Level of the Household Members

Highest Educational Level	N	%
No schooling	23	2.1
Primary school	330	29.5
Middle school	596	53.2
High school	99	8.8
Technical school	42	3.8
College	13	1.2
University or post-graduate	17	1.5
Total	1120	100.0

9.1.2.3 Households Receiving Social Assistance

Type of Social Assistance Received

Among the 1120 households surveyed, 475 households are covered by the Minimum Living Standard Guarantee Program (MLSGP), and 327 households receive cash benefits from the Tekun¹⁴⁶ Program. Together, nearly 72% of the households are covered by social assistance programs (Table 9.1.2.3).

Table 9.1.2.3: Type of Social Assistance Received

Type	N	%
MLSGP	475	42.4
Tekun	328	29.3
Regular	317	28.3
Total	1119	100.0

Years under Social Assistance

The average number of years that social assistance has been received in the households is 3.35, with a minimum of 1 year and a maximum of 7 years. The majority of households have

¹⁴⁶ Support to families living in destitution. In 2007, the Tekun program was merged into MLSGP.

received social assistance for 3 years (43.9%) or 4 years (29.8%), while 14.2% have received benefits for 2 years.

Table 9.1.2.4: Basic Statistics on Years of Receiving Social Assistance Benefits

	N	Min	Max	Mean	STD
Years covered by MLSGP/Tekun	801	1.00	7.00	3.34	0.94

Table 9.1.2.5: Years of Receiving Social Assistance Benefits

Years under MLSGP/Tekun (year)	1	2	3	4	5	6	7	Total
N	13	114	352	239	73	7	4	802
%	1.6	14.2	43.9	29.8	9.1	0.9	0.5	100

Level of Cash Benefits for MLSGP/Tekun

The average cash benefits received in 2006 was 27.45 yuan, with the lowest being 3.57 yuan and the highest, 150 yuan per person per month.

Table 9.1.2.6: Benefit Levels of Social Assistance

	N	Minimum	Maximum	Mean	STD
Benefit Level per Person	769	3.57	150.00	27.45	18.94

2006 Social Assistance Benefits to the Surveyed Households

Among the 802 households covered by social assistance programs, in 2006 96.5% or 774 households received cash benefits and 74.1% or 594 households benefited from in-kind support.

Table 9.1.2.7: 2006 Social Assistance Benefits

	No Benefit Received		Benefit Received		Total	
Type of Benefit	N	%	N	%	N	%
Cash	28	3.5%	774	96.5%	802	100.0%
In-kind	208	25.9%	594	74.1%	802	100.0%

9.1.2.4 Income and Expenditures of the Households

Table 9.1.2.8 below provides details on annual income and expenditure levels by income quintile. The households in the lowest and second lowest income quintiles were living in absolute poverty, with annual incomes of 344.95 yuan and 768.29 yuan per person respectively. All were below or near the poverty line of 693 yuan (2006 poverty line). The income figures in 2006 did not include cash or in-kind support through social assistance. The average income per person per year was 3956 yuan for the highest income quintile households. The average income per person per year was 1617.36 yuan.

The average expenditure was 839 yuan per person per year, which exceeds the average income. This discrepancy is due to the fact that that social assistance and cash benefits were not included in the income figures, and also because the households did not report their full income to outsiders because social assistance programs are largely means tested and many of the households were afraid of losing the benefits if they were to report their true income.

Table 9.1.2.8: Income and Expenditure by Income Quintile

Income Quintile	N	Income		Expenditure Quintile	N	Expenditure	
		Mean	SD			Mean	SD
1st	109	334.95	138.94	1st	202	841.77	205.31
2nd	224	768.29	120.20	2nd	224	1366.66	130.02
3rd	225	1204.33	145.30	3rd	224	1873.21	171.91
4th	224	1833.61	245.20	4th	224	2827.20	418.06
5th	208	3956.89	1788.84	5th	202	6472.03	2501.07
Total	1079	1617.36	1478.65	Total	1076	2636.07	2248.99
F(4,1074)		651.923***		F(4,1071)		839.241***	

Table 9.1.2.9 presents expenditure patterns by income group. In general, food accounts for the highest proportion of expenditure, at 38.16% of the total. The next highest category is daily living followed by health. Expenditures for production come after health, and the lowest category of expenditure is education. Low income households spent more on food, and the high income group spent more on daily living and medical.

Table 9.1.2.9: Patterns of Expenditure by Quintile

Income Quintile	Daily Living		Food		Production		Education		Medical	
	Mean	SD	Mean	SD	Mean	SD	Mean	SD	Mean	SD
1st	27.96%	0.15	49.89%	0.18	11.26%	0.11	3.82%	0.06	7.63%	0.12
2nd	27.92%	0.13	42.32%	0.15	12.88%	0.09	5.23%	0.08	11.23%	0.14
3rd	28.58%	0.14	39.91%	0.16	12.49%	0.09	5.59%	0.09	12.96%	0.15
4th	33.54%	0.20	34.00%	0.17	8.91%	0.09	5.27%	0.10	16.35%	0.19
5th	48.41%	0.28	25.46%	0.19	4.98%	0.07	2.67%	0.08	15.90%	0.22
Total	33.08%	0.20	38.16%	0.19	10.21%	0.10	4.57%	0.08	12.86%	0.17
F (4, 1103)	45.102***		55.605***		25.758***		4.381*		9.507***	

9.1.2.5 Distribution of HIV/AIDS Infected in Household

Among the households surveyed, 74.3% or 832 have one household member infected with HIV/AIDS, and 23.4% of the surveyed households have two people living with HIV/AIDS; 2.1% or 24 households have 3 people who are infected, and 2 households have 4 people living with HIV/AIDS.

Table 9.1.2.10: Number of Infected in Household

Number of People Living with HIV/AIDS in the Households (person)	N	%
1	832	74.3
2	262	23.4
3	24	2.1
4	2	.2
Total	1120	100.0

Among the households interviewed, 238 or 21.3% have had someone die of HIV/AIDS.

Table 9.1.2.11: Death from HIV/AIDS in Household

Family Member(s) Died of HIV/AIDS	N	%
Yes	238	21.3
No	882	78.8
Total	1120	100.0

9.1.2.6 Children in the Household

Children under the age of 17 are present in 72.1% or 808 households. Among the households interviewed, 441 households have one child and 333 households have two children.

Table 9.1.2.12: Children in the Household

Households with Children	N	%
No	312	27.86
Yes	808	72.14
Total	1120	100.0

Table 9.1.2.13: Number of Children in the Household

Number of Children	N	%
0	312	27.86
1	441	39.37
2	333	29.73
3	34	3.04
Total	1120	100.0

9.1.3 Individual Characteristics

9.1.3.1 Social Demographics

Among the 4850 individuals in the sample, 2527 are male, accounting for 52.2% of the total, and 2318 are female, accounting for 47.8% of the total. As for marital status, 45.8% are married, 44.3% are never married, and 9.8% are widowed, separated or divorced. Out of the total sample, 29.2% under the age of 18, 22.9 are 18 to 30, 26.3% are 30 to 45, 12.1% are 45-60, and 9.5% are over the age of 60.

As for educational level, 42.9% have received primary school education, 27.6% have attended middle school and nearly a quarter received no schooling at all.

Table 9.1.3.1: Basic Demographics of the Individuals

Variable	Category	N	%
Sex	Male	2527	52.2
	Female	2318	47.8
	Total	4845	100.0
Marital Status	Married	2194	45.8
	Widowed	383	8.0
	Separated/ Divorced	88	1.8
	Never Married	2121	44.3
	Total	4786	100.0
Age Group	<18	1414	29.2
	18-30	1112	22.9
	30-45	1275	26.3
	45-60	589	12.1
	>60	460	9.5
	Total	4850	100.0
Educational Level	No schooling	1201	24.8
	Primary School	2073	42.9
	Middle School	1336	27.6
	High School	136	2.8
	Technical School	51	1.1
	College	15	.3
	University or	21	.4
	Post-graduate		
Total Sample		4833	100.0

For those children under the age of 18, Table 9.1.3.2 presents distribution by age group.

Table 9.1.3.2: Age Distribution of the Children

Age Group	N	%
<5	249	17.6
5-14	747	52.8
14-17	418	29.6
Total	1414	100.0

9.1.3.2 Death from AIDS in the Households

Among the 373 individuals who are widowed, 44.5% or 166 of their spouses died of AIDS. Among the 1834 individuals whose fathers are dead, 278 or 15.2% died of AIDS. There were 176 mothers who died of AIDS. Death from AIDS is a common risk in those families.

Table 9.1.3.3: Reasons of Deaths of Close Relatives

Reason for Death	Death of Spouse		Death of Father		Death of Mother		Death of Children	
	N	%	N	%	N	%	N	%
AIDS	166	44.5	278	15.2	176	13.4	16	51.6%
Other	207	55.5	1556	84.8	1138	86.6	15	48.4%
Total	373	100.0	1834	100.0	1314	100.0	31	100.0

9.1.3.3 Foster Care due to HIV/AIDS

In 40 households, 47 elderly individuals and/or children are under foster care in other households or include elderly individuals and/or children under foster care in their household. Among the 47 foster care individuals, 14 or 29.8% are there because of the death of parents or children, and 11 of them are there because their parents or children are infected, accounting for 23.4%.

Table 9.1.3.4: Reasons for Foster Care

Reasons for Foster Care	N	%
Parents or children infected	11	23.4
Parents or children died	14	29.8
Other reasons	22	46.8
Total	47	100.0

9.2 HIV/AIDS Testing

9.2.1 Characteristics of People Living with HIV/AIDS

Among the 1435 individuals living with HIV/AIDS, 1390 are adults, accounting for 96.9%. 45 are children. Among the adult sample of this study, 40.5% are infected. Among all the children sampled, 3.2% are infected. Table 9.2.1.1 below describes the situation.

Table 9.2.1.1: People Living with HIV/AIDS

Type	Total		Adults		Children≤17	
	N	%	N	%	N	%
Infected	1435	29.6%	1390	40.5%	45	3.2%
Not Infected	3415	70.4%	2046	59.5%	1369	96.8%
Total	4850	100.0%	3436	70.8%	1414	29.2%

Table 9.2.1.2 presents the distribution of HIV/AIDs infected and non-infected among Global Fund and MOH Pilot program Counties. There was no significant difference among the types of counties ($\chi^2=0.846$, $df=3$, $p>0.05$).

Table 9.2.1.2: Distribution of People Living with HIV/AIDS

Type	Type of Program Coverage				Total	
		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County		Neither Global Fund nor MOH Pilot
Not Infected	N	2,211	461	369	374	3,415
	%	70.6%	70.9%	70.6%	68.8%	70.4%
Infected	N	922	189	154	170	1,435
	%	29.4%	29.1%	29.4%	31.3%	29.6%
Total	N	3,133	650	523	544	4,850
	%	64.6%	13.4%	10.8%	11.2%	100.0%

9.2.2 Demographics of HIV/AIDS Infected

Of those infected with HIV/AIDS, 56.8% are males, 70.1% are married, and 59% are in the range of 30 to 45 years of age. With respect to education, 46.2% have attended primary school and 28.4% have had no schooling at all. Table 9.2.2 provides the basic demographics of the HIV/AIDS infected.

Table 9.2.2: Demographics of HIV/AIDS Infected

Variable	Category	N	%
Sex	Male	814	56.8
	Female	620	43.2
	Total	1434	100.0
Marital Status	Married	1004	70.1
	Widowed	188	13.1
	Separated/Divorced	63	4.4
	Never Married	176	12.3
	Total	1431	100.0
Age Group	<18	45	3.1
	18-29	190	13.2
	30-45	846	59.0
	46-60	299	20.9
	>60	54	3.8
	Total	1434	100.0
Educational Level	No schooling	407	28.4
	Primary school	661	46.2
	Middle school	311	21.7
	High school	35	2.4
	Technical school	12	.8
	College	4	.3
	University or post-graduate	1	.1
Total		1431	100.0

9.2.3 Years since HIV/AIDS Diagnosis

For people living with HIV/AIDS, the longest was diagnosed 19 years ago, and the latest was diagnosed 1 year ago. On average, they have diagnosed for 5.26 years. The majority (57.9%) of them are diagnosed 4-6 years ago. Table 9.2.3 presents the distribution of years of diagnosis.

Table 9.2.3 Years since HIV/AIDS Diagnosis

Years since Diagnosis	N	%
1	6	.4
2-3	318	22.4
4-6	822	57.9
7-10	189	13.3
>10	84	5.9
Total	1419	100.0

9.2.4 Health Care Institutions for HIV Testing

Of the HIV tests that were carried out, 78% were done in County CDC, and 13% were done in City CDC. A small proportion of the tests were done in other health care institutions. See table 9.2.4 for details.

Table 9.2.4 Health Care Institutions for HIV Testing

Institutions	N	%
Township Clinics	31	2.2
County Hospitals	24	1.7
County Women and Children Health Care Centers	3	.2
County CDC	1115	78.0
City Hospitals	13	.9
City Women and Children Health Care Centers	1	.1
City CDC	186	13.0
Others	56	3.9
Total	1429	100.0

9.2.5 Institutions Organizing HIV Testing

Health department organized 83% of the HIV testings. A small proportion of the testing was organized by other government agencies or social groups. See Table 9.2.5 below for a detailed distribution of the institutions that have organized the testing.

Table 9.2.5 Institutions Organizing HIV Testing

Institutions	N	%
Health Departments	1,182	83.0
Other Government Agencies	60	4.2
Social Groups	13	.9
Other Institutions	168	11.8
Unknown	1	.1
Total	1,424	100.0

9.2.6 Source of Payment for HIV Testing

HIV testing was free of charge in 81% of the cases, and 16.9% of the testing was paid out of pocket.

Table 9.2.6: Source of Payment for HIV Testing

Payment Sources	N	%
Out of Pocket	242	16.9
Free	1186	83.1
Total	1428	100.0

9.2.7 Knowledge of Household Members with HIV/AIDS before HIV Testing

Of those infected with HIV/AIDS, 74.8% did not know if any other members of their households had HIV/AIDS before testing. However, 25.2% of them knew before the testing that there were household members who had been infected and 12.6% of them had someone die of HIV/AIDS before the testing.

Table 9.2.7 Knowledge of Household Members with HIV/AIDS before HIV Testing

	N	%
Yes	179	12.6
Yes, someone died	179	12.6
No	1064	74.8
Total	1422	100.0

9.3 HIV/AIDS Treatment

9.3.1 HIV/AIDS Treatment Situation and Reasons for not Seeking Treatment

Among people living with HIV/AIDS, 62.2% have received treatment. For those who did not seek treatment, 21.8% did not do so due to financial difficulties, 17.8% could not start treatment because they had other health problems, 14.9% gave up treatment because they believed HIV/AIDS is not curable, while 12.9% were afraid of stigma or being discriminated against. Table 9.3.1.1 and 9.3.1.2 present these findings.

Table 9.3.1.1: Treatment Situation

Being Treated	N	%
Yes	889	62.2
No	541	37.8
Total	1430	100.0

Table 9.3.1.2: Reasons for Not Being Treated

Reasons for not being treated	N	%
Financial difficulties	22	21.78%
Cannot due to other health problems	18	17.82%
It is not curable	15	14.85%
Afraid of discrimination, do not want to have CD4 tested	13	12.87%
Detoxification center	10	9.90%
Never checked CD4	9	8.91%
Side effects are not bearable	5	4.95%
Do not want to acknowledge being infected	3	2.97%
Plan to seek treatment in the future	3	2.97%
Don't know where to get treatment	2	1.98%
Inconvenient to obtain transportation	1	0.99%
Total	101	

There are significant differences in receiving treatment among the Global Fund Counties,

MOH Pilot program counties and other counties. Of those infected in both Global Fund and MOH Pilot program counties, 79.8% have received treatment and 35.8% of those infected in Global Fund Program Counties Only have obtained some treatment. 24.7% of those infected in MOH Pilot Program Counties Only and 30% of the people with HIV/AIDS in counties with no Global Fund and MOH Pilot Programs have received treatment. See Table 9.3.1.3 for details. The people living with HIV/AIDS in both Global Fund and MOH Pilot program counties have a much higher percentage of being treated than those infected people living in other counties. The statistical test $\chi^2(3, 1427) = 342.93$, and the difference is very significant ($p < 0.001$).

Table 9.3.1.3: Treatment by County Type

Treatment		Type of Program Coverage				Total
		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	
Being Treated	N	733	67	38	51	889
	%	79.8%	35.8%	24.7%	30.0%	62.2%
Not Being Treated	N	186	120	116	119	541
	%	20.2%	64.2%	75.3%	70.0%	37.8%
Total	N	919	187	154	170	1430
	%	64.3%	13.1%	10.8%	11.9%	100.0%

9.3.2 Number of Treatments Received

9.3.2.1 Number of Treatments Received for People Living with HIV/AIDS

On average, the people surveyed who are living with HIV/AIDS have received treatment less than 1 time. Many have received no treatment, and the maximum number of treatments any one has received is 10. People living with HIV/AIDS in both Global Fund and MOH Pilot Program covered counties receive more treatments than those in other counties.

Table 9.3.2.1: Difference in Treatment by Type of County

Type of County	N	Mean	STD	F(3,1430)	Post hoc
Both Global Fund and MOH Pilot (a)	923	1.04	.75	50.494***	ab***
Global Fund County (b)	187	.63	1.34		ac***
MOH Pilot County (c)	154	.36	.71		ad***
Neither Global Fund nor MOH Pilot (d)	170	.40	.85		bc**
Total	1434	.85	.90		bd*

Of those who have received treatments, 51.5% received 1 treatment, 32.5% received two treatments, 10.7% received three treatments, and only 5.3% received more than three treatments. Table 9.3.2.2 provides the details. In total, 662 treatments were reported by the 375 people who responded.

Table 9.3.2.2: Number of Treatments

Number of Treatments	n	%
1	193	51.5
2	122	32.5
3	40	10.7
4	9	2.4
5	6	1.6
6	1	.3
7	2	.5
8	1	.3
10	1	.3
Total	375	100.0

The people in Global Fund Counties or the MOH Pilot program counties received more treatments than those counties with no program, and the differences are statistically significant ($\chi^2_{(1,661)}=56.451, P<0.001$). See table 9.3.2.3 for more details.

Table 9.3.2.3: Number of Treatments by Type of Program Coverage

			Global Fund		Total
			Not Covered	Covered	
MOH Pilot	Not Covered	N	31	69	100
		% within MOH Pilot Counties	31.0%	69.0%	100.0%
		% within Global Fund Counties	46.3%	11.6%	15.1%
	Covered	N	36	526	562
		% within MOH Pilot Counties	6.4%	93.6%	100.0%
		% within Global Fund Counties	53.7%	88.4%	84.9%
Total		N	67	595	662
		% within MOH Pilot Counties	10.1%	89.9%	100.0%
		% within Global Fund Counties	100.0%	100.0%	100.0%
		% of Total	10.1%	89.9%	100.0%

Table 9.3.2.4 presents the distribution of person-times of treatments. Of 662 treatments among 375 people, 79.5% were conducted in both Global Fund and MOH Pilot Counties, and an additional 10.4% were done in Global Fund Counties.

Table 9.3.2.4: Distribution of Total Treatments by Type of Program Coverage

Type of County	N	%	χ^2 (df=3)
Both Global Fund and MOH Pilot	526	79.5	1052.163**
Global Fund County	69	10.4	*
MOH Pilot County	36	5.4	
Neither Global Fund nor MOH Pilot	31	4.7	
Total	662	100.0	

Among the Global Fund programs, Round 3 Provinces provided more treatments than Round 4 Provinces, and the MOH Pilot Counties provided more treatments than non-MOH Pilot Counties. Table 9.3.2.5 shows the differences.

Table 3.2.5: Difference of Treatment by Type of Programs

Program Coverage	N	%	χ^2 (df=1)
Round 3 Provinces	526	79.5%	229.758***
Round 4 Provinces	136	20.5%	
Non-Global Fund Counties	67	10.1%	421.124***
Global Fund Counties	595	89.9%	
Non-MOH Pilot Counties	100	15.1%	322.124***
MOH Pilot Counties	562	84.9%	
Total	662	100.0	

9.3.3 Location of Treatment

9.3.3.1 Health Care Institutions Providing Treatments to People Infected with HIV/AIDS

Over half (51.81%) of the treatments were done in village clinics, 19% were done in county hospitals, and 10.14% of the treatments were done in township clinics. Among the valid sample of 374 individuals who have reported their treatment locations, 194 of them attended village clinics for treatment and on average they received 1.47 treatments there. Of the total number, 74 or 19.79% went to the county hospitals an average of treatments 1.42 times. Another 55 or 14.71% of the valid sample sought treatment in city hospitals and they have received an average of 1.27 treatments. For the 48 people treated in township clinics, the average treatments per person was 1.17 times. See Table 9.3.3.1 for details.

Table 9.3.3.1: Location of Treatments

Health Care Institutions	Person-times		Persons			
	N	%	N	%	Mean	STD
Village Clinics	286	51.81	194	51.87%	1.47	.97
Township Clinics	56	10.14	48	12.83%	1.17	.43
County Hospitals	105	19.02	74	19.79%	1.42	.76
County Family Planning Stations	2	0.36	2	0.53%	1.00	.00
County CDC	24	4.35	15	4.01%	1.60	1.12
City Hospitals	70	12.68	55	14.71%	1.27	.62
City Family Planning Stations	2	0.36	1	0.27%	2.00	.
City CDC	3	0.54	2	0.53%	1.50	.71
Other Healthcare Institutions	4	0.72				
Total	552	100.0%	374			

9.3.3.2 Difference in Locations of Treatment among Program Coverage Counties

In Global Fund Round 3 covered counties, most of the infected people sought treatments in village clinics and/or township clinics. In Round 4 covered counties, infected people were more likely to go to the county hospitals or county CDC for treatments. For details, please see tables 93.3.2 and table 93.3.3 below.

Table 93.3.2: Treatment Locations by Type of Programs

Health Care Institutions		Global Fund		Global Fund		MOH Pilot Counties		Total
		Round 3	Round 4	Not-covered	Covered	Not-covered	Covered	
Village Clinics	N	236	50	12	274	41	245	286
	%	56.9 %	39.7%	20.3%	56.8 %	43.6%	54.8%	52.9%
Township Clinics	N	50	6	5	51	3	53	56
	%	12.0%	4.8 %	8.5%	10.6 %	3.2 %	11.9 %	10.4 %
County Hospitals	N	70	35	13	92	27	78	105
	%	16.9 %	27.8%	22.0%	19.1%	28.7%	17.4%	19.4 %
County CDC	N	5	19	15	9	17	7	24
	%	1.2%	15.1%	25.4%	1.9 %	18.1%	1.6 %	4.4 %
City Hospitals	N	54	16	14	56	6	64	70
	%	13.0%	12.7 %	23.7%	11.6 %	6.4 %	14.3 %	12.9 %
Total	N	415	126	59	482	94	447	541
	%	76.7 %	23.3%	10.9%	89.1%	17.4 %	82.6 %	100.0%
χ^2 (4, 537)		58.234***		85.423***		64.114***		

Table 9.3.3.3: Treatment Locations by Type of Program Coverage

Location		Type of Program Coverage				Total
		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	
Village Clinics	N	236	38	9	3	286
	% within GF/MOH Pilot Counties	56.9%	56.7%	28.1%	11.1%	52.9%
Township Clinics	N	50	1	3	2	56
	% within GF/ MOH Pilot Counties	12.0%	1.5%	9.4%	7.4%	10.4%
County Hospitals	N	70	22	8	5	105
	% within GF/ MOH Pilot Counties	16.9%	32.8%	25.0%	18.5%	19.4%
County CDC	N	5	4	2	13	24
	% within GF/ MOH Pilot Counties	1.2%	6.0%	6.3%	48.1%	4.4%
City Hospitals	N	54	2	10	4	70
	% within GF/ MOH Pilot Counties	13.0%	3.0%	31.3%	14.8%	12.9%
Total	N	415	67	32	27	541
	% of Total	76.7%	12.4%	5.9%	5.0%	100.0%

9.3.4 Type of Treatment Received

9.3.4.1 Type of Treatment

Of the types of treatment received, 63.4% are anti-infection and 29.6% are Anti-Retroviral therapy (ARV). Less than 5% reported other type of treatment.

Table 9.3.4.1: Type of Treatment

Type of Treatment	Person-times		Persons			
	N	%	N	%	Mean	STD
ARV	161	29.76%	67	18.06%	2.40	1.21
CD4 Testing	1	0.18%	1	0.27%	1.00	.
Child Delivery Service of Infected Mothers	1	0.18%	1	0.27%	1.00	.
Anti-infection	343	63.40%	285	76.82%	1.20	.50
Other	35	6.47%	17	4.58%	2.06	2.68
Sample Size			371	100.0%		

9.3.4.2 Type of Treatment by Program Coverage

Considering the majority of the treatments are either anti-infection or ARV, the comparisons are made only based on these two types of treatment. Tables 9.3.4.2a and 9.3.4.2b present the difference in treatments among the Global Fund and MOH Pilot Counties, and between Round 3 and Round 4 of Global Fund programs. The results show that the people living with HIV/AIDS in Round 3 and in MOH Pilot Counties in Round 4 received more anti-infection treatments, and those who live in Round 4 Global Fund counties received more Anti-Retroviral therapy.

Table 9.3.4.2a: Type of Treatment by Program Coverage

Type of Treatment		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	Total
ARV	N	101	36	14	10	161
	%	25.3%	75.0%	41.2%	45.5%	31.9%
Anti-infection	N	299	12	20	12	343
	%	74.8%	25.0%	58.8%	54.5%	68.1%
Total	N	400	48	34	22	504
	%	79.4%	9.5%	6.7%	4.4%	100.0%
χ^2		(3, 501) = 52.356***				

Table 9.3.4.2b: Type of Treatment by Global Fund Provinces and Counties and MOH Pilot Counties

		Global Fund		Global Fund		MOH Pilot Counties		Total
		Round 3	Round 4	Not-covered	Covered	Not-covered	covered	
ARV	N	101	60	24	137	46	115	161
	%	25.3	57.7	42.9	30.6	65.7	26.5	31.9
Anti-infection	N	299	44	32	311	24	319	343
	%	74.8	42.3	57.1	69.4	34.3	73.5	68.1
Total	N	400	104	56	448	70	434	504
	%	79.4	20.6	11.1	88.9	13.9	86.1	100.0
χ^2 (1, 503)		39.960***		3.451		42.642***		

9.3.4.3 Correlation between Type and Location of Treatment

Village clinics, township clinics, county hospitals and city hospitals performed more anti-infection treatments and county CDC performed more ARVs. The difference is statistically significant (χ^2 (4, 488) = 63.659, $p < 0.001$).

Table 3.4.3: Correlation between Type and Location of Treatment

Health Care Institutions	ARV		Anti-infection		Total	
	N	%	N	%	N	%
Village clinics	114	42.5%	154	57.5%	268	54.5%
Township clinics	6	12.0%	44	88.0%	50	10.2%
County hospitals	24	25.0%	72	75.0%	96	19.5%
County CDC	13	72.2%	5	27.8%	18	3.7%
City Hospitals	1	1.7%	59	98.3%	60	12.2%
Total	158	32.1%	334	67.9%	492	100.0%

9.3.5 Payment for Treatment

9.3.5.1 Out-of-Pocket Payment

A total of 534 treatments had complete payment information; 273 or 51.1% were treated free and 28.5% were partially free. Out-of-pocket payment accounted for 20.4% of the total.

Source of Payment for Treatment

Payment Sources	N	%
Free	273	51.1
Out-of-Pocket	109	20.4
Partially Free	152	28.5
Total	534	100.0

9.3.5.2 Out-of-Pocket Payment by Type of Program Coverage

Tables 3.5.2a and 3.5.2b shows that the out-of-pocket payments in Global Fund covered counties are much lower than in non-Global Fund program counties, and Round 3 counties are the lowest in terms of the percentage of out-of-pocket payments.

Table 9.3.5.2a: Out of Pocket Payment by Type of Program Coverage

Payment Sources		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	Total
Free	N	202	40	13	18	273
	%	49.6%	66.7%	36.1%	58.1%	51.1%
Out-of-Pocket	N	57	19	23	10	109
	%	14.0 %	31.7%	63.9%	32.3%	20.4%
Partially Free	N	148	1	0	3	152
	%	36.4%	1.7 %	.0%	9.7%	28.5%
Total	N	407	60	36	31	534
	%	76.2%	11.2%	6.7%	24.4%	100.0%
χ^2		(6, 528) =90.419**				

Table 9.3.5.2b: Out-of-Pocket Payment by Type of Program Coverage, Provinces and Counties

Type of Program Coverage		Payment Sources								χ^2 (2, 502)
		Free		Out of Pocket		Partial Free		Total		
Global Fund	Round 3	202	49.6%	57	14.0%	148	36.4%	407	76.2%	72.626* **
	Round 4	71	55.9%	52	40.9%	4	3.1%	127	23.8%	
Global Fund Program	Not Covered	31	46.3%	33	49.3%	3	4.5%	67	12.5 %	47.061* **
	Covered	242	51.8 %	76	16.3 %	149	31.9 %	467	87.5 %	
MOH Pilot	Not Covered	58	63.7%	29	31.9%	4	4.4%	91	17.0%	32.791* **
	Covered	215	48.5%	80	18.1 %	148	33.4%	443	83.0%	
Total		273	51.1%	109	20.4%	152	28.5%	534	100.0%	

9.3.5.3 Sources of Payment

With respect to the sources of out-of-pocket payments, savings and support from relatives are the main sources, and borrowing ranks third. As for payments not made by the individuals, funding comes almost exclusively from the health department.

Table 9.3.5.3: Sources of Payment

Source of Out-of-Pocket Payments	N	%	Sources when not Paid by the Individuals	N	%
Self-savings	185	75.51	Civil Affairs	2	1.2
Relative Support	27	11.02	Health	157	97.5
Borrowing	24	9.80	Other Government Agencies	1	.6
Selling Assets	5	2.04	Unknown	1	.6
Other	4	1.63			
Total	245	100.0	Total	161	100.0

9.3.5.4 Cost Per Treatment by Payment Source

On average, each treatment, if paid out-of-pocket, would cost 3348 yuan. For free treatment, the payment made by the health department was 5857 yuan.

Table 9.3.5.4: Average Cost per Treatment, by Payment Source

Payment Source	N	Min	Max	Mean	STD
Self-savings	183	5	100000	2988	9502
Relative support	26	200	20000	2931	4084
Borrowing	22	7	20000	5220	5728
Selling Assets	2	2000	3000	2500	707
Other	1	400	400	400	.
Total out-of-pocket	222	5	100000	3348	9441
Total payments made by health departments	61	5	43000	5857	7991

Table 9.3.5.4b shows that out-of-pocket payment is a heavy burden on individual households when the financial burden is not shared by public programs.

Table 9.3.5.4b: Per Treatment Cost, by Payment Sources

	Free			Out-of-Pocket			Partially Free			t
	N	Mean	STD	N	Mean	STD	N	Mean	STD	
Out-of-Pocket Payments				94	4997	121945	113	1679	2589	2.82**
Supported by Public Programs	13	1816	1708				44	7418	8884	-3.94***

9.3.5.5 Future Treatment Plan

There are 1207, or 84.9%, of the people living with HIV/AIDS in this study who have indicated that they plan to seek treatment in the future. Another 66 people decided not to seek treatment. For people who do not want to seek treatment, financial difficulties or believing the HIV/AIDS cannot be cured are the main reasons. See tables 3.5.5a and 3.5.5b for details.

Table 9.3.5.5a: Future Treatment Plan

Future Treatment Plan	N	%
Plan to seek treatment	1207	84.9
Do not want to seek treatment	66	4.6
Uncertain about seeking treatment in the future	149	10.5
Total	1422	100.0

Table 9.3.5.5b: Reasons for Not Seeking Treatment

Reasons	N	%
Financial Difficulties	31	46.27%
Disease is not curable	23	34.33%
Do not want to go through treatment	4	5.97%
Afraid of discrimination	3	4.48%
Side effects are not bearable	3	4.48%
Other reasons	3	4.48%
Total	67	100.00%

9. 4 Social Assistance to Households with HIV/AIDS Infected Members

9.4.1 Assistance Received by Households

While targeted social assistance to poor households exists under the national Five-Guarantee Programs and Minimum Living Standard Guarantee Programs, the data shows that since the first diagnosis of the HIV/AIDS infection in the households surveyed, over half of those households have received some assistance outside these means-tested programs.

Table 9.4.1.1: Recipients of Non Means-Tested Assistance

	n	%
Received	578	51.7
Did not receive	541	48.3
Total	1119	100.0

Households living in Global Fund and MOH Pilot counties received more HIV/AIDS assistance than households living in other counties. The difference in the delivery of the national HIV/AIDS assistance program between Global Fund counties is statistically significant ($\chi^2 (3, 1116) = 268.694, p < 0.001$). This indicates that the Global Fund has a positive contribution toward the delivery of the government programs toward people living with HIV/AIDS.

Table 9.4.1.2: HIV/AIDS Assistance by Program Coverage

		Type of Program Coverage				Total
		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	
Received HIV/AIDS assistance	N	482	44	15	37	578
	%	71.1%	26.5%	11.3%	26.1%	51.7%
Did not receive HIV/AIDS assistance	N	196	122	118	105	541
	%	28.9%	73.5%	88.7%	73.9%	48.3%
Total	N	678	166	133	142	1119
	%	60.6%	14.8%	11.9%	12.7%	100.0%

9.4.2 Type of Social Assistance

Among the 964 incidents of assistance received by the surveyed households, in-kind support is predominant, and cash assistance accounts for only 6.5%.

Table 4.2: Type of Social Assistance

Type of Assistance	N	%	Type of Assistance	N	%
Cash only	62	6.4	Any Cash	98	10.2
In-kind only	866	89.8	Any In-kind	901	93.5
Cash and in-kind	35	3.6	Any Medical	1	0.1
Cash and medical	1	0.1			
Total	964	100.0	Total	964	100.0

9.4.3 Type of Social Assistance by Program Coverage

There is no significant difference in cash assistance among counties covered by different programs ($\chi^2 (3, 961) = 4.608, p > 0.05$). However, in-kind support differs significantly from the lower incidence occurred in MOH Pilot counties only ($\chi^2 (3, 961) = 10.683, p < 0.05$).

Table 9.4.3.1: Type of Social Assistance by Program Coverage

Type of Assistance		Type of Program Coverage				Total
		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	
Cash assistance	N	69	8	6	15	98
	%	9.2%	11.1%	16.7%	14.4%	10.2%
In-kind support	N	712	65	30	94	901
	%	94.7%	90.3%	83.3%	90.4%	93.5%

Comparisons are also made between Global Fund Rounds of Programs and results show those households in Round 3 provinces received more in-kind support than in Round 4 provinces. Non-Global Fund counties have more cash support provided to households with people living with HIV/AIDS. No significant difference is found between MOH Pilot and non-Pilot counties. See table 9.4.3.2 for these findings.

Table 9.4.3.2: Type of Social Assistance by Program Coverage, Province and County

Program Coverage	Cash Assistance		In-kind Support	
	N	%	N	%
Round 3 Provinces	68	8.9%	720	94.7%
Round 4 Provinces	30	14.7%	181	88.7%
χ^2 (df=1)	5.840*		9.515**	
Non-Global Fund Counties	22	15.5%	126	88.7 %
Global Fund Counties	76	9.2 %	775	94.3%
χ^2 (df=1)	5.174*		6.106*	
Non-MOH Pilot	23	13.9%	149	89.8%
MOH Pilot Counties	75	9.4 %	752	94.2%
χ^2 (df=1)	2.989		4.508*	

9.4.4 Social Assistance Providers

Among all agencies that provide social assistances, government agencies bear the most responsibility. Some government-affiliated NGOs, as well as the Global Fund, also provide assistance to those households that include people living with HIV/AIDS. Table 9.4.4 lists the agencies that provide social assistance.

Table 9.4.4: Social Assistance Providers

	Households	%
Civil Affairs	139	14.4
Health	70	7.3
Other government departments	258	26.8
Government-affiliated agencies	126	13.1
Global Fund	65	6.7
Other agencies/organizations	241	25
Total	899	100.0

9.4.5 Social Assistance Needs by People Living with HIV/AIDS

While the needs of the people and their families living with HIV/AIDS are multi-dimensional, the assistance that is most needed is for livelihood and basic living. Medical financial aid ranks second, and educational assistance is in third place. Social support is also an important need identified by the survey households. Table 9.4.5 provides the details.

Table 9.4.5: Social Assistance Needs Identified

Needs Identified	Households	%
Livelihood/basic living	786	70.18%
Medical financial aid	454	40.54%
Educational assistance	294	26.25%
Social support	168	15.00%
Fund for Production	27	2.41%
Housing	60	5.36%
Cash	36	3.21%
Help with cultivating the land	3	0.27%
Other	148	13.21%

9.5 Impact of HIV/AIDS

9.5.1 The Impact of HIV/AIDS on Households

The biggest impact of HIV/AIDS on households is the reduction in income, and the next largest is on association with relatives and friends. The impact on family daily living and marital relationships comes in third.

Table 9.5.1: Dimensions of Impact of HIV/AIDS on Households

Level of Impact: 1=no; 2=a little; 3=general; 4=big; 5=very big	N	Min	Max	Mean	STD
Household income	1112	1	5	3.51	1.408
Household daily living	1103	1	5	2.00	1.192
Family relations	1089	1	5	1.68	1.13
Marital relations	865	1	5	1.90	1.194
Children - schooling	713	1	5	1.74	1.19
Children - employment	322	1	5	1.37	.832
Association with friends and relatives	1000	1	5	2.23	1.35
Association with neighbors	1108	1	5	1.80	1.56
Other Impact	118	1	5	3.35	1.593
Other areas specified	80	1	5	1.90	1.428

9.5.1.1 Impact on Household Income

Of all respondents, 30.8% said that HIV/AIDS had very large impact on household income, 30.7% said the impact was big, and only 14.3% said there was no impact.

Table 9.5.1.1a: Impact of HIV/AIDS on Household Income

Level of Impact	N	%
No impact	159	14.3
A little impact	142	12.8
General	127	11.4
Big impact	341	30.7
Very big impact	343	30.8
Total	1112	100.0

For the reasons behind the impact on household income, 31.52% said that because the illness, the person who is infected cannot work; 22.94% said the person's physical strength was reduced due to the illness; 20.46% said that medical costs were higher at the same time income has decreased. For those who said the impact was not big, the main reason was that those who were infected were still in relatively good health, or they were not the main labor force in the household or had not worked before being diagnosed with HIV/AIDS. Table 9.5.1.1b shows the detailed results.

Table 9.5.1.1b: Reasons for HIV/AIDS Impact on Household Income

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Cannot go to work due to HIV/AIDS	0	6	23	69	93	191	31.52%
Reduced physical strength due to HIV/AIDS	0	13	12	80	34	139	22.94%
Reduced income and increased medical costs	0	3	11	61	49	124	20.46%
Health condition is fair, still working after HIV/AIDS diagnosis	30	24	9	0	0	63	14.40%
Not main labor force in the household, no income before diagnosis	23	11	9	0	1	44	7.26%
In detoxification center, cannot work	10	3	2	6	7	28	4.62%
Cannot find job	0	0	1	0	6	7	1.16%
Not in the mood of working	0	0	0	2	2	4	0.66%
Other reasons	2	2	0	1	1	6	0.99%
Total	65	62	67	219	193	606	100.00%

9.5.1.2 Impact on Household Daily Living

Contrary to the impact on household income results, about half of the respondents said there was no impact on household daily living, and 25% said the impact was minor. Less than 20% said the impact was big or very big.

Table 9.5.1.2a: Impact on Household Daily Living

Level of Impact	N	%
No impact	522	47.3
A little impact	276	25.0
General	119	10.8
Big impact	150	13.6
Very big impact	36	3.3
Total	1103	100.0

Table 9.5.1.2b: Reasons of HIV/AIDS has Impact on Household Daily Living

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Separate eating or daily living to avoid infecting others	2	66	19	30	3	120	38.96%
Financial difficulties/reduced income/increased medical costs	1	12	13	21	7	54	17.53%
Bad mood/ big psychological pressure	1	13	12	9	1	40	12.99%
A little impact	10	3	0	0	0	13	4.22%
Reduced association with family members /avoid contacts with other members	2	4	1	2	2	11	3.57%
No one to take care of children	0	1	7	2	1	11	3.57%
Stigma	0	0	3	4	2	9	2.92%
Dependent on others for activities of daily living	0	0	1	5	2	8	2.60%
Health condition is fair	5	1	2	0	0	8	2.60%
Family members do not understand/often quarrel or have troubles	0	0	2	4	1	7	2.27%
Reduced quality of life	0	3	2	0	1	6	1.95%
Understanding family members	5	1	0	0	0	6	1.95%
Death of family members due to AIDS	0	0	1	5	0	6	1.95%
In detoxification center	2	0	1	2	0	5	1.62%
Very short period of diagnosis	2	0	0	1	0	3	0.97%
Cannot get married	0	0	0	0	1	1	0.32%
Total	30	104	64	85	21	308	100.00%

Of those infected, 38.96% reported that due to separate eating and daily living routines, they felt their daily life was affected; 17.53% reported financial difficulties and reduced income because they could not work and faced increased medical costs; and 12.99% felt they were often in a bad mood and experienced psychological pressure. See table 9.5.1.2b above for the reported reasons for the impact of HIV/AIDS on household daily living.

9.5.1.3 Impact on Family Relations

Only 11.4% of the respondents reported a big or very big impact on family relations, while 67% said they experienced no impact on family relations.

Table 9.5.1.3a: Impact on Family Relations

Level of Impact	N	%
No impact	730	67.0
A little impact	144	13.2
General	91	8.4
Big impact	85	7.8
Very big impact	39	3.6
Total	1089	100.0

Table 9.5.1.3b: Reasons of HIV/AIDS has Impact on Family Relations

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Family members do not understand, often quarrel or have troubles or avoid contact	0	3	9	23	8	43	29.66%
Understanding the family members	20	3	2	0	0	25	17.24%
Bad marital relationships or divorce or spouse left home	0	5	2	8	3	18	12.41%
Avoid contact or live alone	2	2	6	1	3	14	9.66%
Afraid of passing disease to family members	1	4	5	3	1	14	9.66%
Death of family members due to AIDS	0	1	0	3	7	11	7.59%
Difficult to find someone to marry	1	1	0	1	1	4	2.76%
Health condition is fair	3	0	0	0	0	3	2.07%
Bad mood	0	3	1	2	0	6	4.14%
In detoxification center	1	1	0	1	0	3	2.07%
Very short period of diagnosis	2	0	0	0	0	2	1.38%
Reduced income	0	0	0	1	0	1	0.69%
Reduced physical strength	0	0	1	0	0	1	0.69%
Total	30	23	26	43	23	145	100.00%

The main reason for an impact on family and relationships was that family members did not understand or accept the situation, and always quarrel or avoid contact. The second biggest reason is bad marital relations, which resulted in divorce or in the spouse leaving home. For those experiencing little impact, understanding among family members is very important. See table 9.5.1.3b above for details.

9.5.1.4 Impact on Marital Relationships

Of the married or once-married respondents 10.5% reported a big impact and 9.8% reported very big impact of HIV/AIDS on their marital status. However, 66.2% reported no impact. Based on field visit findings, many of them hide their illness from their spouses, and many of their spouses have died.

Table 9.5.1.4a: Impact on Marital Relationships

Level of Impact	N	%
No impact	573	66.2
A little impact	66	7.6
General	50	5.8
Big impact	91	10.5
Very big impact	85	9.8
Total	865	100.0

Table 9.5.1.4b: Reasons of HIV/AIDS has Impact on Marital Relationships

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Spouse died	0	0	1	24	27	52	30.41%
Divorced/ left home	0	0	10	14	23	47	27.51%
Always quarrel, worsened relationship	0	4	14	10	2	30	17.54%
Mutual understanding of spouses	10	2	3	0	0	15	8.77%
Afraid of infection	0	2	4	5	3	14	8.19%
Not afraid of infection	6	0	0	0	0	6	3.51%
Both got infected	2	1	0	0	0	3	1.75%
Just married	1	0	0	0	0	1	0.58%
Very short period of diagnosis	1	0	0	0	0	1	0.58%
Complain the poor economic condition	0	1	0	0	0	1	0.58%
In detoxification center	0	0	0	1	0	1	0.58%
Total	20	10	32	54	55	171	100.00%

Among the people who have reported an impact on marital relationships, 30.41% reported the death of spouse, 27.51% reported a broken marriage; and 17.54% reported worsened marital relations and quarrels. Mutual understanding between spouses reduced the impact of HIV/AIDS on marital relationships. See table 9.5.1.4b above for more details.

9.5.1.5 Impact on Children's Schooling

As for the impact on children's schooling, only 15% said the impact was big or very big and over 65% reported no impact.

Table 9.5.1.5a: Impact on Children Schooling

Level of Impact	N	%
No impact	459	65.7
A little impact	87	12.4
General	47	6.7
Big impact	85	12.2
Very big impact	21	3.0
Total	699	100.0

The main reason for the impact on children's schooling was financial difficulty. Stigma and pressures felt by children ranked second and third.

Table 9.5.1.5b: Reasons of HIV/AIDS has Impact on Children Schooling

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Dropped out of school due to financial difficulties	0	1	4	26	8	39	27.46%
Being discriminated against	0	9	9	16	0	34	23.94%
Pressures felt by the children	0	5	15	11	0	31	21.83%
Had impact before but now it is better	1	8	1	0	0	10	7.04%
Cost of education is too high	0	1	2	7	0	10	7.04%
Others knew but did not mind	4	0	0	0	0	4	2.82%
Children do not want to study	1	1	1	0	1	4	2.82%
Currently no impact	1	1	1	0	0	3	2.11%
Children dropped school due to HIV/AIDS	0	0	1	2	0	3	2.11%
Transferred to other schools or other classes	0	0	1	2	0	3	2.11%
Afraid of infection	0	0	0	1	0	1	0.70%
Total	7	26	35	65	9	142	100.00%

9.5.1.6 Impact on Children's Employment

Of the respondents, 82.6% reported no impact on children's employment because others did not know about the infection. Less than 7% reported a big or very big impact.

Table 9.5.1.6a: Impact on Children's Employment

Level of Impact	N	%
No impact	266	82.6
A little impact	23	7.1
General	8	2.5
Big impact	19	5.9
Very big impact	6	1.9
Total	322	100.0

The table below excluded those who said their employers did not know about their HIV/AIDS infection. For those whose HIV/AIDS infection is known, the main reason for feeling the impact was that employers did not want to accept them, and the second reason was the discrimination they felt in the workplace.

Table 9.5.1.6b: Reasons of HIV/AIDS has Impact on Children's Employment

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total
	N	N	N	N	N	%
Employers did not accept the applications	0	0	3	4	0	7 36.84%
Introduced by acquaintances	4	0	0	0	0	4 21.05%
Being discriminated	0	0	2	1	0	3 15.79%
Working outside places, no big impact	2	0	0	0	0	2 10.53%
Others knew, but did not mind	1	0	0	0	0	1 5.26%
Never thought of it	0	0	1	0	0	1 5.26%
No discrimination in the family	1	0	0	0	0	1 5.26%
Total	8	0	6	5	0	19 100.00%

9.5.1.7 Impact on Association with Relatives and Friends

Of the total, 46.7% reported no impact, mainly due to the fact that others did not know about the infection; 19.6% reported a big impact and 5.2% reported a very big impact.

When an impact was felt on the individual's association with his or her relatives and friends, 41.74% reduced contact or even had no contact at all; 19.13% reported discrimination by relatives. See tables 9.5.1.7a and 9.5.1.7b for more details.

Table 9.5.1.7a: Impact on Association with Relatives and Friends

Level of Impact	N	%
No impact	467	46.7
A little impact	138	13.8
General	147	14.7
Big impact	196	19.6
Very big impact	52	5.2
Total	1000	100.0

Table 5.1.7b: Reasons of HIV/AIDS has Impact on Associations with Relatives and Friends

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Reduced contact or no contact at all	3	14	27	84	16	144	41.74%
Relatives looked down on the family	1	13	30	18	4	66	19.13%
Take the initiative to avoid contact with relatives and friends	2	6	5	17	7	37	10.72%
Most relatives and friends understood	10	3	18	0	0	31	8.99%
Afraid of passing the disease to others	1	6	12	7	1	27	7.83%
Now it is better	4	5	9	3	0	21	6.09%
Not many relatives and friends	4	3	1	1	1	10	2.90%
Many relatives are infected too	6	0	1	1	0	8	2.32%
Very short period of diagnosis	1	0	0	0	0	1	0.29%
Total	32	50	103	131	29	345	100.00%

9.5.1.8 Impact on Association with Neighbors

Of the total, 60.3% reported no impact on their association with neighbors mainly because others did not know about the infection or many in the same villages were also infected; 9.7% reported a big impact, and 3% reported a very big impact.

As for the reasons for impact on association with neighbors, 24.47% reported being looked down on by fellow villagers, 19.41% reported that others had a phobia of the infection and 16.46% reported reduced contact with neighbors. For those who reported no big impact, the main reason was that the neighbors knew the about infection but that many other villagers had also been diagnosed with HIV/AIDS. See tables below for more details.

Table 9.5.1.8a: Impact on Associations with Neighbors

Level of Impact	N	%
No impact	610	60.3
A little impact	151	14.9
General	122	12.1
Big impact	98	9.7
Very big impact	30	3.0
Total	1011	100.0

Table 5.1.8b: Reasons for HIV/AIDS Impact on Associations with Neighbors

Reasons	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Being looked down	0	16	24	16	2	58	24.47%
Afraid of being infected	1	12	21	10	2	46	19.41%
Reduced contacts	0	5	10	17	7	39	16.46%
Most neighbors understood	1	6	19	1	0	27	11.39%
Take initiative to avoid contacts	1	3	2	11	5	22	9.28%
Now it is much better	5	4	2	2	0	13	5.49%
People knew, did not mind	11	0	0	0	0	11	4.64%
Many villagers were infected too	8	0	1	0	1	10	4.22%
No big impact	3	3	2	0	0	8	3.38%
Very short period of diagnosis	2	0	0	0	0	2	0.84%
Very few neighbors	0	0	1	0	0	1	0.42%
Total	32	49	82	57	17	237	100.00%

9.5.1.9 Other Impacts

Because of the poor health status of some respondents, they cannot engage in jobs that require a great deal of physical strength (50.25%), or they reported changes in family decision-making powers, etc. See table 9.5.1.9 for other dimensions of the impact.

Table 9.5.1.9: Other Impacts of HIV/AIDS

Impact	No impact	A little impact	General	Big impact	Very big impact	Total	
	N	N	N	N	N	N	%
Labor intensity	4	11	7	44	33	99	50.25%
No change in decision power	56	0	1	0	4	61	30.96%
Changes in decision-making powers	17	2	1	7	0	27	13.71%
Division of labor	3	0	0	2	1	6	3.05%
Bad mood	0	0	0	2	1	3	1.53 %
Business suffered	0	0	0	1	0	1	0.51%
Total	80	13	9	56	39	197	100.00%

9.5.1.10 Impact on Households by Program Coverage

The One-way ANOVA analysis results show that, except for the impact on the children's employment, there are significant differences by program coverage in other dimensions of the impact on households. With respect to impact on household income, GF program counties and both GF and MOH Pilot counties reported a greater impact. With respect to impact on household daily living, both GF and MOH Pilot counties report a smaller impact than the MOH Pilot only counties. With respect to the impact on family relations, the lowest score was observed in both GF and MOH Pilot counties. With respect to the impact on marital relations, again, the lowest score was observed in both GF and MOH Pilot counties, and the

GF program only counties also reported lower scores than other counties. Similar to the impact on family relations, both GF and MOH Pilot counties reported the least impact. However, contrary to the impact on marital relations, regarding the impact on association with relatives and friends, the highest score was observed in both GF and MOH Pilot counties, and the GF program only counties have also reported higher scores than other counties. For the impact on the association with neighbors, the MOH Pilot only counties have reported greater impact, and the total impact is also greatest in the MOH Pilot only counties. The findings are presented in Table 9.5.1.10a.

Table 9.5.1.10a: Impact on Households by Program Coverage

Variable	Program	N	Mean	STD	F	Post hoc
Household Income	Both Global Fund and MOH Pilot (a)	679	3.95	1.056	67.312**	a-b***
	Global Fund County (b)	163	2.96	1.6	*	a-c***
	MOH Pilot County (c)	128	2.83	1.784		a-d***
	Neither Global Fund nor MOH Pilot (d)	142	2.67	1.428		b-d*
	Total	1112	3.51	1.408		
Household Daily Living	Both Global Fund and MOH Pilot (a)	678	1.93	1.095	3.445*	a-c**
	Global Fund County (b)	161	2.04	1.341		
	MOH Pilot County (c)	124	2.3	1.525		
	Neither Global Fund nor MOH Pilot (d)	140	2.05	1.088		
	Total	1103	2.00	1.192		
Family Relations	Both Global Fund and MOH Pilot (a)	673	1.52	1.007	10.936**	a-b***
	Global Fund County (b)	159	1.92	1.315	*	a-c***
	MOH Pilot County (c)	121	1.89	1.353		a-d***
	Neither Global Fund nor MOH Pilot (d)	136	1.95	1.163		
	Total	1089	1.68	1.134		
Marital Relations	Both Global Fund and MOH Pilot (a)	589	1.69	1.277	15.546**	a-b***
	Global Fund County (b)	110	2.15	1.604	*	a-c***
	MOH Pilot County (c)	69	2.3	1.612		a-d***
	Neither Global Fund nor MOH Pilot (d)	97	2.59	1.573		b-d*
	Total	865	1.90	1.421		
Children Schooling	Both Global Fund and MOH Pilot (a)	508	1.65	1.088	4.100**	a-b**
	Global Fund County (b)	82	2.06	1.558		a-d*
	MOH Pilot County (c)	38	1.92	1.421		
	Neither Global Fund nor MOH Pilot (d)	71	1.96	1.2		
	Total	699	1.74	1.190		
Children Employment	Both Global Fund and MOH Pilot (a)	236	1.38	0.935	2.200	
	Global Fund County (b)	44	1.14	0.632		
	MOH Pilot County (c)	13	1.08	0.277		
	Neither Global Fund nor MOH Pilot (d)	27	1.63	1.043		
	Total	320	1.35	.898		
Association with Relatives and Friends	Both Global Fund and MOH Pilot (a)	667	2.28	1.309	10.805**	a-b*
	Global Fund County (b)	133	2	1.403	*	a-c***
	MOH Pilot County (c)	78	2.81	1.683		a-d***
	Neither Global Fund nor MOH Pilot (d)	122	1.8	1.065		b-c***
	Total	1000	2.23	1.348		c-d***
Association with Neighbors	Both Global Fund and MOH Pilot (a)	677	1.67	1.024	26.662**	a-c***
	Global Fund County (b)	134	1.80	1.249	*	b-c***
	MOH Pilot County (c)	74	2.89	1.652		c-d***
	Neither Global Fund nor MOH Pilot (d)	126	1.85	1.051		
	Total	1011	1.80	1.158		
Overall Impact on Households	Both Global Fund and MOH Pilot (a)	679	2.1243	.633	3.957**	a-c**
	Global Fund County (b)	163	2.0860	1.009		b-c**
	MOH Pilot County (c)	128	2.3644	1.070		c-d**
	Neither Global Fund nor MOH Pilot (d)	142	2.0982	.848		
	Total	1112	2.1430	.789		

Univariate analyses show that the main effect of MOH Pilot program was its significant impact on household income, family relations, marital relations, associations with relatives and friends, and associations with neighbors. The main effect of the GF program was its significance to the impact on household income, household daily living, family relations, marital relations and associations with neighbors, and the interaction effect of the MOH Pilot and GF programs was significant to the impact on household income, household daily living, family relations, children's employment, associations with relatives and friends, and associations with neighbors. Table 9.5.1.10b presents the findings in more details.

Table 9.5.1.10b: F-tests of Differences in Impact on Households

Dimensions of Impact	With GF vs without GF Program	With vs without MOH Pilot Program	GF and MOH Pilot Programs vs Other
Household Income	52.423***	34.967***	18.281***
Household Daily Living	4.412*	0.649	3.837*
Family Relations	5.253*	7.106**	4.045*
Marital Relations	15.965***	8.121**	0.466
Children Schooling	0.371	2.631	1.840
Children Employment	0.332	0.866	5.606*
Associations with Relatives and Friends	2.026	31.302***	9.814**
Associations with Neighbors	42.653***	22.184***	36.116***

Because the existence of interaction effect between GF and MOH Pilot programs, Table 9.5.1.10c presents the further analyses on the interaction effects.

When separating the effect of GF program from the MOH Pilot program, the results show that in children's employment, the non-MOH Pilot counties have a greater impact than MOH Pilot counties. However, with respect to association with relatives, friends, and neighbors, the MOH Pilot counties reported a larger impact than in non MOH Pilot counties.

In GF program counties, the MOH Pilot counties observed a larger household impact than non-MOH Pilot counties. On contrary, the impact on family relations was greater in non-MOH Pilot counties.

When we separate the MOH Pilot counties and compare the effect of GF program, the results show that in MOH Pilot counties, the impact on household income was greatest in the GF program counties. In non-MOH Pilot counties, the no GF program counties reported a higher impact on household daily living, family relations, association with relatives and friends, and association with neighbors. For the impact on children's employment, in non- MOH Pilot counties, the impact is larger in no GF counties. The following table presents the results.

Table 9.5.1.10c: Interaction Effect of HIV/AIDS Impact on Households

Dimensions of Impact	No GF Program Counties					With GF Program Counties				t-GF Program effect
	MOH Pilot	N	Mean	STD	t- MOH Pilot effect	N	Mean	STD	t-MOH Pilot effect	
Household Income	Non-MOH Pilot	142	2.67	1.428	-0.813	163	2.96	1.600	-9.613***	-1.648
	MOH Pilot	128	2.83	1.784		679	3.95	1.056		-9.671***
Household Daily Living	Non-MOH Pilot	140	2.05	1.088	-1.536	161	2.04	1.341	1.031	0.090
	MOH Pilot	124	2.30	1.525		678	1.93	1.095		3.188***
Family Relations	Non-MOH Pilot	136	1.95	1.163	0.357	159	1.92	1.315	4.229***	0.165
	MOH Pilot	121	1.89	1.353		673	1.52	1.007		3.494**
Children Employment	Non-MOH Pilot	27	1.63	1.043	2.571*	44	1.14	.632	-1.638	2.485*
	MOH Pilot	13	1.08	.277		236	1.38	.935		-1.153
Associations with Relatives and Friends	Non-MOH Pilot	122	1.80	1.065	-5.171***	133	2.00	1.403	-2.252	-1.252
	MOH Pilot	78	2.81	1.683		667	2.28	1.309		3.239***
Associations with Neighbors	Non-MOH Pilot	126	1.85	1.051	-5.455***	134	1.80	1.249	1.256	0.353
	MOH Pilot	74	2.89	1.652		677	1.67	1.024		9.047***

The main effects of GF program and MOH Pilot programs are significant with respect to the impact on marital relations. Table 9.5.1.10d shows that the impact is greater in non-MOH Pilot counties, and is also greater in no GF program counties.

Table 9.5.1.10d: Main Effect of Impact on Marital Relations

Program	N	Mean	STD	t
No MOH Pilot Program	207	2.36	1.600	5.391***
With MOH Pilot Program	658	1.76	1.328	
No GF Program	166	2.47	1.590	5.854***
With GF Program	699	1.77	1.343	

T-tests are also performed to compare the differences between Global Fund Program Rounds. For impacts on household daily living, family relations, marital relations, children's schooling, and association with neighbors, Round 3 provinces reported lower impact than Round 4 provinces; however, for impacts on household income and other dimensions, the Round 3 counties reported higher scores. No differences are found for the impacts on children's employment and association with relatives and friends.

Table 9.5.1.10e: Global Fund Program Round Effect

Dimensions of Impact	GF Program Round	N	Mean	STD	t
Household Income	3	679	3.95	1.056	14.067
	4	433	2.82	1.605	***
Household Daily Living	3	678	1.93	1.095	-2.502*
	4	425	2.12	1.325	**
Family Relations	3	673	1.52	1.007	-5.719*
	4	416	1.92	1.276	**
Marital Relations	3	589	1.69	1.277	-6.433*
	4	276	2.34	1.600	**
Children's Schooling	3	508	1.65	1.088	-3.442*
	4	191	1.99	1.401	**
Children's Employment	3	236	1.38	.935	0.801
	4	84	1.29	.785	
Association with Relatives and Friends	3	667	2.28	1.309	1.841
	4	333	2.12	1.417	
Association with Neighbors	3	677	1.67	1.024	-5.071*
	4	334	2.06	1.354	**
Other Dimensions	3	105	3.50	1.539	2.958*
	4	13	2.15	1.573	*

9.5.2 Impact on PLWHA

9.5.2.1 Changes in Employment of PLWHA

Among the 1431 PLWHA, 1291 worked before their diagnosis, and 326 stopped working, accounting for 25.3%.

Table 9.5.2.1a: Work Status before and after Diagnosis

Work Status before Diagnosis	Current Work Status				Total	
	Working		Not working			
	N	%	N	%	N	%
Working	965	74.7%	326	25.3%	1291	90.2%
Not working	12	8.6%	128	91.4%	140	9.8%
Total	977	68.3%	454	31.7%	1431	100.0%

Among the 326 PLWHA who worked before, 265 stopped working because of HIV/AIDS, 42 or 13% are not working because they are currently in a detoxification centers. See Table 9.5.2.1b for details.

Table 9.5.2.1b: Reasons for Not Working Now

Reasons for not working	N	%
Because of HIV/AIDS	265	82.0%
In detoxification center	42	13.0%
Disabled, sick and/or old age	9	2.8%
Taking care of family members	2	0.6%
Cannot find jobs	3	0.9%
Do not want to find jobs	2	0.6%
Total	323	100.0%

9.5.2.2 Changes in Occupation of PLWHA

Of the total PLWHA in the sample, 27.8% have changed occupations, mainly from none-farmers to farmers, or taking up household chores.

Table 9.5.2.2a: Changes in Occupations

Occupation Change	N	%
No change	695	72.2
Changed	268	27.8
Total	963	100.0

Table 9.5.2.2b: Changes in Occupation of PLWHA before and after Diagnosis

Occupation	Occupation before Diagnosis		Occupation after Diagnosis	
	N	%	N	%
Farmer	91	34.0	149	55.6
Enterprise worker	57	21.3	6	2.2
Professionals (teachers, medical doctors, lawyers)	2	.7		
Professionals (nurses, chefs, technicians, etc)	1	.4	1	.4
Enterprise or organization managers	2	.7		
attendant; waiter; baggage man; porter; stewardship; busboy; server; steward, etc	5	1.9		
Private business owners	1	.4	2	.7
Self-employed	8	3.0	1	.4
No fixed jobs	30	11.2	11	4.1
Family chores	8	3.0	82	30.6
Other occupations	63	23.5	16	6.0
Total	268	100.0	268	100.0

9.5.2.3 Changes in Locations of Employment of PLWHA

Among the 964 infected who reported employment relocation, 131 moved closer to home, and majority of them returned to the villages.

Table 9.5.2.3a: Changes in Employment Location

Location Change	N	%
No change	812	84.2
Further from home	21	2.2
Closer to home	131	13.6
Total	964	100.0

Table 9.5.2.3b: Changes in Employment Location before and after Diagnosis

Employment Location	Employment Location before Diagnosis		Employment Location after Diagnosis	
	N	%	N	%
Same village	19	12.50%	124	81.58%
Same township not same villages	4	2.63%	5	3.29%
Same county not same townships	24	15.79%	10	6.58%
Same province not same county	14	9.21%	3	1.97%
Other provinces	91	59.87%	10	6.58%
Total	152	100.00%	152	100.00%

9.5.2.4 Changes in Schooling of Infected Children

Of the infected children, 7.8% have dropped out of school due to HIV/AIDS or financial difficulties.

Table 9.5.2.4: Changes in Schooling of Infected Children

Schooling Status	N	%
Still in school	27	93.1
Dropped out due to HIV/AIDS	1	3.4
Dropped out due to financial difficulties	1	3.4
Total	29	100.0

9.5.2.5 Activities of Daily Living of the PLWHA

Of the PLWHA surveyed, 93.2% ADP independent, 5% are partially dependent and 1.9% are completely dependent on others for care.

Table 9.5.2.5a: ADL Status of PLWHA

ADL Status	N	%
Completely dependent	27	1.9
Partially dependent	71	5.0
Completely ADL independent	1333	93.2
Total	1431	100.0

Table 9.5.2.5b: PLWHA Currently Needing Care

Need Care for ADL	N	%
Yes	82	5.7
No	1348	94.3
Total	1430	100.0

9.5.3 Impact on the Non-Infected Family Members

9.5.3.1 Changes in Employment Status of Non-Infected Family Members

Among the 3340 non-infected, 1477 were working before someone in the household was diagnosed with HIV/AIDS. Among the 1477 non-infected who were employed, 90 stopped working, accounting for 6.1%; and 314 started working, accounting for 16.9%. The difference between previous working and current working is statistically significant (χ^2 (1, 3339) = 1957.153, $p < 0.001$).

Table 9.5.3.1: Changes in Employment Status of the Non-Infected

Working or not before someone in the household was diagnosed with HIV/AIDS	Current Work Status				Total	
	Working		Not working			
	N	%	N	%	N	%
Working	1387	93.9%	90	6.1%	1477	44.2%
Not working	314	16.9%	1549	83.1%	1863	55.8%
Total	1701	50.9%	1639	49.1%	3340	100.0%

9.5.3.2 Changes in Occupations of Non-Infected Family Members

Of those continued working, 18.7% of those non-infected people have changed occupations. The number of those engaged in farming has decreased, and the number of people employed as migrant workers or doing household chores has increased.

Table 9.5.3.2a: Change in Occupation of the non-Infected

Change in Occupation	N	%
No change	1119	81.3
Changed	258	18.7
Total	1377	100.0

Table 9.5.3.2b: Type of Occupations Changed

Occupation	Occupation before someone in the household was diagnosed with HIV/AIDS		Occupation after someone in the household was diagnosed with HIV/AIDS	
	N	%	N	%
Farmer	165	64.0	38	14.7
Enterprise worker	30	11.6	55	21.3
Professionals (nurses, chefs, technicians, etc)	2	.8		
Attendant; waiter; baggage man; porter; stewardship; busboy; server; steward, etc	7	2.7	18	7.0
Private business owners			3	1.2
Sales persons			2	.8
Self-employed	7	2.7	12	4.7
No fixed jobs	11	4.3	30	11.6
Family chores	7	2.7	32	12.4
Other occupations	29	11.2	68	26.4
Total	258	100.0	258	100.0

9.5.3.3 Change in Working Location of the Non-Infected Family Members

Among those non-infected persons who continued working, 230 have changed locations. Among them, 152 have re-located farther from home to find employment, and 78 have found employment closer to home. For those who sought employment farther from home, the main reason was they had to seek outside employment opportunities to earn an income. Those who moved closer to home did so because they needed to take care of someone who was infected.

Table 9.5.3.3: Changes in Employment Location of Non-Infected

Change in Location	N	%
No change	1148	83.3
Further from home	152	11.0
Closer to home	78	5.7
Total	1378	100.0

9.5.3.4 Schooling of Non-Infected Children

Among the 1155 school-age children, 970 or 84% are still attending schools after someone in their family was diagnosed with HIV/AIDS. However, 152 or 13.2% have dropped out of school due to financial difficulties faced by the households. Table 9.5.3.4 provides the details.

Table 9.5.3.4: Schooling of the Children

Schooling	N	%
Still Attending School	970	84.0
Dropped out due to financial difficulties	152	13.2
Dropped out due to discrimination	4	.3
Dropped out for other reasons	29	2.5
Total	1155	100.0

9.6 Financial Burden of HIV/AIDS

9.6.1 Barriers to Seeking Treatment

Table 9.6.1.1: Barriers to Seeking Treatment among the Surveyed Households

Barriers Reported	Yes		No		Total	
	N	%	N	%	N	%
In the past six months, you and/or your family members could not seek treatment because of lack of money	449	43.51%	583	56.49%	1032	100
In the past six months, you and/or your family members were not hospitalized because of lack of money, even though the doctors recommended hospitalization	138	34.07%	267	65.93%	405	100
In the past six months, you and/or your family members had to terminate treatment because of lack of money	174	28.76%	431	71.24%	605	100
Do you think now if you or your family member is sick, you or your family member will seek treatment immediately?	731	80.60%	176	19.40%	907	100
Do you think that due to concerns about costs, you or your family member will not seek treatment when feeling ill?	520	52.31%	474	47.69%	994	98

If we code yes as (1) and no as (0) and add the five items (the question number 4: Do you think now if you or your family member is sick, you or your family member will seek treatment immediately, was reversed the answer with (1) =no and (0) =yes), we have a total score ranged from 0 to 5, with the higher the score, the more difficulties faced by the family in seeking health care.

The respondents living in both GF and MOH Pilot program covered counties reported fewer barriers than those in other counties. The respondents living in no GF and non-MOH Pilot counties reported fewer barriers than GF or MOH Pilot only counties, and the respondents in MOH Pilot only counties reported fewer barriers than GF program only counties. See table 9.6.1.2 for the F-test results.

Table 9.6.1.2: Barriers to Seeking Treatment by Program Coverage

Program	N	Mean	STD	F	Post hoc
Both Global Fund and MOH Pilot (a)	678	1.1018	1.26770	(3, 1094) =21.061***	ab***
Global Fund County (b)	166	1.9699	1.39881		ac***
MOH Pilot County (c)	133	1.6241	1.53051		ad*
Neither Global Fund nor MOH Pilot (d)	121	1.3802	1.50696		bc*
Total	1098	1.3270	1.38610		bd***

9.6.2 Barriers to Seeking Treatment by Program Type

There are significant differences among program types, with significantly fewer barriers in both GF and MOH Pilot counties. See table 9.6.2.1 for details.

Table 9.6.2.1: Barriers in Seeking Treatment by Program Type

Barriers		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	Total	χ^2
Could not seek treatment because of lack of money	N	225	117	56	51	449	(3,1029)=
	%	33.9%	74.5%	52.8%	48.6%	43.5%	91.300***
Were not hospitalized because of lack of money	N	51	36	34	17	138	(3,402)=
	%	23.9%	50.0%	49.3%	33.3%	34.1%	24.971***
Had to terminate treatment because of lack of money	N	110	23	26	15	174	(3,602)=
	%	25.5	36.5%	41.9%	31.3%	28.8%	9.536***
Seek treatment immediately when sick	N	515	74	80	62	731	(3,904)=
	%	76.0%	61.2%	76.9%	68.9%	66.6%	53.512***
Due to concerns about costs, will not seek treatment when feeling ill	N	284	104	76	56	520	(3,991)=
	%	41.9	68.4%	62.3%	50.9%	47.4%	28.870***

Households in Global Fund Round 4 provinces report more barriers than households living in Round 4 provinces. See table 9.6.2.2 for details.

Table 9.6.2.2: Barriers to Seek Treatment for the Main Program Effects

Barriers Reported		Global Fund Program Round		GF Program Coverage		MOH Pilot Program Coverage		Total
		3	4	No	Yes	No	Yes	
Could not seek treatment because of lack of money	n	225	224	107	342	168	281	449
	%	33.9%	60.9%	50.7 %	41.7 %	64.1 %	36.5 %	43.5%
χ^2 (1, 1031)		70.145***		5.599*		60.712***		
Were not hospitalized because of lack of money	n	51	87	51	87	53	85	138
	%	23.9%	45.3%	42.5%	30.5%	43.1%	30.1%	34.1%
χ^2 (1, 404) =		20.526***		5.389*		6.391**		
Had to terminate treatment because of lack of money	n	110	64	41	133	38	136	174
	%	25.5	37.0	37.3%	26.9%	34.2	27.5	28.8%
χ^2 (1, 604) =		8.017***		4.755*		1.998		
Seek treatment immediately when sick	n	515	216	142	589	136	595	731
	%	76.0	51.4	55.7%	69.9 %	47.4	73.4	66.6%
χ^2 (2, 1096)		70.192***		17.992***		64.674***		
Due to concerns about costs, will not seek treatment when feeling ill	n	284	236	132	388	160	360	520
	%	41.9	56.2	51.8 %	46.0 %	55.7	44.4	47.4%
χ^2 (2, 1096)		21.696***		2.216		11.253**		

9.6.3 Medical Financial Aid by Program Type

Among all the surveyed households, 707 or 64.4% have received medical financial aid. The households in both GF and MOH Pilot counties have significant higher probabilities of

receiving medical financial aid ($\chi^2 (3, 1094) = 817.272, p < 0.001$).

Table 9.6.3: Medical Financial Aid by Programs

Receiving Medical Financial Aid		Both Global Fund and MOH Pilot	Global Fund County	MOH Pilot County	Neither Global Fund nor MOH Pilot	Total
No medical financial aid	N	23	160	118	90	391
	%	3.4%	96.4%	88.7%	74.4%	35.6%
With medical financial aid	N	655	6	15	31	707
	%	96.6%	3.6%	11.3%	25.6%	64.4%
Total	N	678	166	133	121	1098
	%	61.7%	15.1%	12.1%	11.0%	100.0%

9.6.4 Reduction of the Burden of Medical Costs after Receiving Medical Financial Aid

Among households that have benefited from the medical financial aid, 64.78% said the burden of medical costs has decreased a lot, and 31.4% reported a small reduction in medical costs burden. Only less than 4% said that medical financial aid had not reduced the burden of high medical costs due to HIV/AIDS.

Table 9.6.4.1: Reduction of the Burden Medical Costs after Receiving Medical Financial Aid

Reduction of Medical Costs Burden	N	%
No reduction	27	3.82%
Reduced a little	222	31.40%
Reduced a lot	458	64.78%
Total	707	100.00%

If we code no reduction as (1), reduced a little as (2) and reduced a lot as (3), we have a scale of burden reduction with value ranges from 1 to 3. Based on the analysis of One-way ANOVA, the result shows that the households in both GF and MOH Pilot counties reported the highest level of burden reduction. See table 9.6.4.2 for details.

Table 9.6.4.2: Level of Burden Reduction by Program Type

Program Type	N	Mean	STD	F(3,703)	Post hoc
Both Global Fund and MOH Pilot (a)	655	2.66	.54	25.419*	a-b**
Global Fund County (b)	6	2.00	.00	**	a-c***
MOH Pilot County (c)	15	1.80	.68		a-d***
Neither Global Fund nor MOH Pilot (d)	31	2.10	.47		
Total	707	2.61	.56		

Univariate analysis shows that the main effect of MOH Pilot program in medical cost burden reduction due to medical financial aid is not significant ($F (1, 706) = 1.713, p > 0.5$), but the GF program main effect ($F (1, 706) = 7.606, p < 0.001$) and the interaction effect between GF and MOH Pilot programs is significant ($F (1, 706) = 11.966, p < 0.001$).

Separate analyses show that in MOH Pilot counties, burden reduction is bigger in GF counties. And in GF program counties, burden reduction is bigger in MOH Pilot counties. See

table 9.6.4.3 for the results.

Table 9.6.4.3: Interaction Effects of Burden Reduction

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t- MOH Pilot Program effect	
No	31	2.10	.47		6	2.00	.00	-3.009***	0.496
Yes	15	1.80	.68	1.729	655	2.66	.54		-6.100***

A t-test was performed to test the difference in the level of medical cost burden reduction between GF program Round 3 and 4. The result presented in Table 9.6.4.4 indicates that the reduction in Round 3 provinces for households is greater than in Round 3 provinces.

Table 9.6.4.4: Level of Reduction in Medical Cost Burden between GF Program Rounds

	GF Program Round	N	Mean	STD	t
Level of Reduction of Medical Cost Burden	3	655	2.6580	.53529	8.545**
	4	52	2.0000	.52394	*

Table 9.6.4.5 shows that the level of burden reduction after receiving medical financial aid is significantly different across program types, with Round 3 provinces, GF program covered counties and MOH Pilot program counties having a higher level of burden reduction.

Table 9.6.4.5: Reduction of Medical Cost Burden across Program Types

Level of Reduction		Global Fund Program Round		GF Program Coverage		MOH Pilot Program Coverage		Total
		3	4	No	Yes	No	Yes	
No reduction	N	20	7	7	20	2	25	27
	%	2.9%	1.7%	2.8%	2.4%	.7%	3.1%	2.5%
Reduced a little	N	184	38	32	190	30	192	222
	%	27.1%	9.0%	12.9%	22.4%	10.2%	23.9%	20.2%
Reduced a lot	N	451	7	7	451	5	453	458
	%	66.5%	1.7%	2.8%	53.1%	1.7%	56.3%	41.7%
No medical financial aid	N	23	368	208	183	250	141	391
	%	3.4%	87.6%	81.9 %	21.7%	87.1 %	17.4%	35.6%
Total	N	678	420	254	844	287	811	1098
	%	61.7%	38.3%	23.1%	76.9%	26.1 %	73.9 %	100.0%
χ^2 (3, 1095)		821.871***		328.577***		461.436***		

9.6.5 Self-assessed Current Living Standard by Program Type

In general, among the surveyed households, 53.6% believed their standard of living is much worse than other households in the villages, and 21.4% believed their standard of living is about the same, and the rest believed theirs is a little worse than other households.

Table 9.6.5.1: Self-Assessed Living Standard

Living standard	N	%
About the same	235	21.4
A little worse	275	25.0
Much worse	588	53.6
Total	1098	100.0

If we code the self-assessed living standard as 1-2 scales, the One-way ANOVA shows the GF counties residents believed their living standards were lower and the same was true for the residents in both GF and MOH Pilot program counties. See table 9.6.5.2 for more details.

Table 9.6.5.2: Self-assessed Living Standard by Program Type

Program Type	N	Mean	STD	F(3,1095)	Post hoc
Both Global Fund and MOH Pilot (a)	678	2.34	.782	9.388***	a-b**
Global Fund County (b)	166	2.53	.744		a-d***
MOH Pilot County (c)	133	2.22	.856		b-c***
Neither Global Fund nor MOH Pilot (d)	121	2.05	.865		b-d***
Total	1098	2.32	.804		

The Chi-squared test shows that the people living in GF counties believed their standard of living was lower than people in other counties.

Table 9.6.5.3: Program Effects in Self-assessed Living Standard

Self-assessed Living Standard	GF Program Round		GF Program Coverage		MOH Pilot Program Coverage		Total	
	3	4	No	Yes	No	Yes		
About the same	N	131	104	79	156	67	168	235
	%	19.3%	24.8%	31.1 %	18.5%	23.3 %	20.7%	21.4%
A little worse	N	186	89	61	214	59	216	275
	%	27.4%	21.2%	24.0 %	25.4 %	20.6 %	26.6 %	25.0%
Much worse	N	361	227	114	474	161	427	588
	%	53.2%	54.0%	44.9 %	56.2 %	56.1 %	52.7 %	53.6%
Total	N	678	420	254	844	287	811	1098
	%	61.7%	38.3%	23.1%	76.9%	26.1 %	73.9 %	100.0%
χ^2 (2, 1096)	7.654		19.305***		4.280			

Univariate analysis shows that the main effect of MOH Pilot program is not significant ($F(1, 1097) = 0.034$, $p > 0.5$), but both the GF effect ($F(1, 1097) = 24.566$, $p < 0.001$) and the interaction effect ($F(1, 1097) = 8.772$, $p < 0.01$) are significant. The program effect in GF counties and the GF effect in non MOH Pilot program counties is significant, and the interaction effects show the respondents reported worst living standard.

Table 9.6.5.4: Self-assessed Living Standard by GF and MOH Pilot Programs

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t-MOH Pilot Program effect	
No	121	2.05	.865		166	2.53	.744		-5.044***
Yes	133	2.22	.856	-1.559	678	2.34	.782	2.845**	-1.608

Table 9.6.5.5 below shows there is no significantly difference in self-assessed standard of living between Global Fund Round 3 and 4 provinces.

Table 9.6.5.5: Self-assessed Living Standard by GF Program Round

	GF Program Round	N	Mean	STD	t
Self-assessed living standard	3	678	2.34	.782	0.929
	4	420	2.29	.839	

9.7 Social Support for People Living with HIV/AIDS (PLWHA)

9.7.1 Social Support from Friends

When asked “How many close friends do you have from whom you can get support and help?” 45.9% of the HIV/AIDS infected respondents surveyed said, “none”; 16.6% said, “1 or 2”; 21.8% said, “3 to 5”, and 15.7% said, “six or more”. See table 9.7.1.1 below.

Table 9.7.1.1: Number of Close Friends Who Can Provide Support and Help to PLWHA

Support from Friends	n	%
None	425	45.9
1-2	154	16.6
3-5	202	21.8
6 or more	145	15.7
Total	926	100.0

A variable scale was created with (1) for none; (2) for 1-2; (3) for 3-5; and (4) for six or more. The higher the score, the more close friends the person had for support and help. One-way ANOVA analyses showed that the highest level of peer support was found in counties without any Global Fund (GF) or MOH Pilot program coverage. The second highest level of support was in the counties with GF but not the MOH Pilot program support. See table 9.7.1.2 for the results.

Table 9.7.1.2: Level of Peer Support by Program Coverage

County Programs available	N	Mean	STD	F(3,923)	Post hoc
Both Global Fund and MOH Pilot (a)	611	1.97	1.152	9.266	a-b***
Global Fund County (b)	125	2.36	1.035	***	a-d***
MOH Pilot County (c)	110	1.95	1.070		b-c**
Neither Global Fund nor MOH Pilot (d)	80	2.54	1.124		c-d***
Total	926	2.07	1.140		

Univariate analyses show that the effect of the MOH Pilot program on peer support was significant ($F(1, 925) = 23.762$, $p < 0.001$), but the effect of the GF program ($F(1, 925) = 0.633$, $p > 0.05$), and the interaction effect of the GF and MOH Pilot programs ($F(1, 925) = 0.980$, $p > 0.05$) were not significant.

Comparisons were made between Global Fund Round 3 and 4 provinces, between counties

covered by the GF program counties and those that were not, and between counties both covered and not covered by the MOH Pilot program. Table 9.7.1.3 presents the results. Round 4 provinces and counties not covered by the MOH Pilot program had higher levels of support from friends.

Table 9.7.1.3: Level of Peer Support by Program

Program	Category	N	Mean	STD	t
Global Fund Program Round	3	611	1.97	1.152	-3.688***
	4	315	2.26	1.093	
Global Fund Counties	No	190	2.20	1.128	1.733
	Yes	736	2.04	1.142	
MOH Pilot Program Counties	No	205	2.43	1.072	5.150 ***
	Yes	721	1.97	1.139	

9.7.2 Social Support from Neighbors

36.5% of the surveyed PLWHA said that their neighbors care for them very much; 29% said their neighbors care for them; 18.8% said their neighbors care for them a little when they face difficulties, and 15.7% said their neighbors do not care for them at all.

Table 9.7.2.1: Support from Neighbors for PLWHA

Level of Support from Neighbors	N	%
Do not care for each other, only a superficial acquaintance with each other.	146	15.7
Care for a little when facing difficulties	174	18.8
Cared for by neighbors	269	29.0
Most of the neighbors care for them very much	338	36.5
Total	927	100.0

A variable scale was created with (1) for “do not care for each other, only a superficial acquaintance with each other”; (2) for “care a little when facing difficulties”; (3) “cared for by neighbors”; and (4) for “most of the neighbors care for them very much”. The higher the score, the more support the person has experienced from neighbors. One-way ANOVA analyses showed that the highest level of neighborhood support was found in counties with both GF and MOH Pilot programs. The second highest level of neighborhood support was in counties without either program. See table 9.7.1.2 for the results.

Table 9.7.2.2: Level of Support from Friends by Program Coverage

Program Coverage	N	Mean	STD	F(3,924)	Post hoc
Both Global Fund and MOH Pilot (a)	612	3.01	.956	19.800***	a-b***
Global Fund County (b)	125	2.54	1.202		a-c ***
MOH Pilot County (c)	110	2.28	1.264		b-c*
Neither Global Fund nor MOH Pilot (d)	80	2.99	1.131		b-d***
Total	927	2.86	1.079		c-d***

Univariate analyses found that only the interaction effect of the GF and MOH Pilot programs is statistically significant ($F(1, 926) = 40.377, p < 0.001$), and the effects of GF ($F(1, 926)$

=2.443, $p>0.05$) and MOH Pilot programs ($F(1, 926) = 1.611$, $p>0.05$) are not significant.

Further analyses were conducted by separating the interaction effect, and the results showed that in counties not covered by the MOH Pilot program, the PLWHA in counties without the GF program had more support from their neighbors. In counties covered by the MOH Pilot program, counties also covered by the GF program had higher neighborhood support levels.

In counties without the GF program, higher neighborhood support was found among counties without the MOH Pilot program as well. In counties with a GF program, higher neighborhood support was found in counties covered by the MOH Pilot program. See table 9.7.2.3 for more details.

Table 9.7.2.3: Interaction Effect in Level of Peer Support for GF and MOH Pilot Counties

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t-MOH Pilot Program effect	
No	80	2.99	1.131	3.969***	125	2.54	1.202	-4.786***	2.637**
Yes	110	2.28	1.264		612	3.01	.956		-7.031***

Table 9.7.2.4 shows that the level of support and care from friends is significantly higher in Global Fund Round 3 provinces than Round 4 provinces.

Table 9.7.2.4: Support Level from Friends of PLWHA by Global Fund Program Round

	N	Mean	STD	t
GF Program	3	612	3.01	.956
Round	4	315	2.57	1.233

9.7.3 Living Arrangement

In the past year, PLWHA had overwhelmingly lived with family members. Only 4% of them lived alone.

Table 9.7.3.1: Living Arrangement of PLWHA in the Past Year

Living Arrangement	N	%
Living alone, far away from family members	36	4.0
Frequently changing locations, and most of the time lived with strangers.	4	.4
Living with classmates, colleagues or friends	6	.7
Living with family members	861	94.9
Total	907	100.0

We coded the living arrangement as 1 to 4 with 4 indicating “living with family members”. The higher the score, the more likely the individual was to be living with people who were familiar to them. One-way ANOVA results showed that PLWHA in both GF and MOH Pilot counties and counties covered by neither program were more likely to live with family

members or with familiar people.

Table 9.7.3.2: Living Arrangement by Program Coverage

Program Coverage	N	Mean	STD	F(3,904)	Post hoc
Both Global Fund and MOH Pilot (a)	607	3.96	.347	25.174*	a-b***
Global Fund County (b)	116	3.72	.840	**	a-c ***
MOH Pilot County (c)	107	3.46	1.135		b-c***
Neither Global Fund nor MOH Pilot (d)	77	3.92	.422		b-d*
Total	907	3.87	.603		c-d***

Univariate analyses showed that the effect of the MOH Pilot program ($F(1, 906) = 4.864$, $p < 0.05$), and the effect of the GF program ($F(1, 906) = 8.266$, $p < 0.01$) were significant. The interaction effect of the GF and MOH Pilot programs ($F(1, 906) = 44.262$, $p < 0.001$) was also significant.

Further analyses were conducted by separating the interaction effect, and the results showed that in counties not covered by the MOH Pilot program, the PLWHA living in counties not covered by the GF program were more likely to live with family members or familiar people. Within MOH Pilot program covered counties, the PLWHA in counties covered by the GF program had more living arrangement support from people they know well and are close to.

Within counties without a GF program, PLWHA were more likely to live with family members than in counties without a MOH Pilot program. Within GF program counties, the higher likelihood of living with familiar people was found in MOH Pilot program covered counties. See table 9.7.3.3 for more details.

Table 9.7.3.3: Interaction Effect of Living Arrangement

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t-MOH Pilot Program effect	
No	77	3.92	.422	3.420 ***	116	3.72	.840	-4.975	2.160 *
Yes	107	3.46	1.135		607	3.96	.347	***	-8.779***

Table 9.7.3.4 shows that PLWHA in Global Fund Round 3 provinces are more likely to live with families members than the Round 4 provinces.

Table 9.7.3.4: Living Arrangement by Global Fund Program Round

	Round	N	Mean	STD	t
Global Fund Program Round	3	607	3.96	.347	6.666***
	4	300	3.68	.898	

9.7.4 Sources of Material and Moral Support

When PLWHA faced difficulties, most material support came from relatives. 68.97% reported that they had received such support. Family members ranked as the second most important source with 41.84% acknowledging it. 18.27% of PLWHA said they had received

support from neighbors, and 16.32% reported support from their spouse. As for consolation and care, family members came first and relatives ranked second. Spousal support ranked third. This can be explained by the limited amount of resources available. When they needed material support, most of the resources from family members had already been used up. Many of the respondents were not married, hence the low level of spousal support. See table 9.7.4.1 for more details.

Table 9.7.4.1: Source of Material and/or Moral Support for PLWHA's

Source of Material and/or Moral Support	When facing difficulties, number of PLWHA who reported this source of material and problem solving support.		When facing difficulties, number of PLWHA who reported this source of consolation and/or care	
	N	%	N	%
No one	56	6.05%	97	10.49%
Spouse	151	16.32%	361	39.03%
Other family members	387	41.84%	412	44.54%
Friends	149	16.11%	159	17.19%
Neighbors	169	18.27%	192	20.76%
Relatives	638	68.97%	385	41.62%
Colleagues	1	0.11%	2	0.22%
Work unit	2	0.22%	0	0.00%
CCP, Youth League, Trade unit, or other Government Affiliated Organizations	30	3.24%	21	2.27%
Religious or other Non-Government Social Organizations	6	0.65%	2	0.22%
Lending agency	8	0.86%		0.00%
Total	925	100.00%	925	100.00%

When each source was given a value of 1 and the total number of sources tallied for each person, the more sources of support reported for that person, the higher his personal score. One-way ANOVA compared the number of sources of material and moral support by type of support and county programs. Table 9.7.4.2 shows that more moral support was reported in counties with both GF and MOH Pilot program coverage. More material support was reported in counties with the GF program.

Table 7.4.2: Source of Support by Program Coverage

Source of Support	County Program Coverage	N	Mean	STD	F(3, 949)	Post hoc
Moral Support	Both Global Fund and MOH Pilot (a)	616	1.79	.84	9.096***	ac***
	Global Fund County (b)	128	1.75	.92		ad***
	MOH Pilot County (c)	111	1.46	.72		bc**
	Neither Global Fund nor MOH Pilot (d)	98	1.41	1.02		bd**
	Total	953	1.71	.87		
Material Support	Both Global Fund and MOH Pilot (a)	616	1.66	.85	3.226*	ab*
	Global Fund County (b)	128	1.88	.92		bc*
	MOH Pilot County (c)	111	1.59	.85		bd**
	Neither Global Fund nor MOH Pilot (d)	98	1.55	1.09		
	Total	953	1.67	.89		

9.7.5 Support for Emotional Difficulties and Hardships Related to Daily Life.

When PLWHA felt upset, 51.87% of them would talk with their family members, 18.9% would talk to other HIV infected friends; 16.26% would talk to their relatives, and 15.38% would talk to their neighbors. 22.86% had no one to talk to. When facing hardships related to daily living, 70.22% would seek assistance from relatives and 10.89% would ask help from neighbors.

Table 9.7.5.1: Support for Emotional Difficulties and Hardships Related to the Daily Life of PLWHA.

Source of Support	Support for Emotional Difficulties		Support for Hardships Related to Daily Life	
	N	%	N	%
No one	104	22.86%	29	6.44%
Family Members	236	51.87%	20	4.44%
Relatives	74	16.26%	316	70.22%
Neighbors	70	15.38%	49	10.89%
Infected Friends	86	18.90%	7	1.56%
Non-infected Friends	38	8.35%	9	2.00%
Friends	4	0.88%		0.00%
Village Doctors	9	1.98%	6	1.33%
Villagers' Committee			14	3.11%
Total	455	100.00%	450	100.00%

By adding all the people that the respondent could talk to when feeling upset, we created a score indicative of his level of support. A higher score indicates more people from which he could receive support. Table 9.7.5.2 presents the results and shows that PLWHA in counties covered by the GF program but not the MOH Pilot program had more people with whom they could talk. The lowest score was observed in both GF and MOH Pilot program covered counties.

Table 9.7.5.2: Number of Sources for Support for PLWHA

County Program Coverage	N	Mean	STD	F (3, 949)	Post hoc
Both Global Fund and MOH Pilot (a)	616	.65	1.08	47.420***	ab***
Global Fund County (b)	128	2.09	1.90		ac***
MOH Pilot County (c)	111	1.71	2.38		ad***
Neither Global Fund nor MOH Pilot (d)	98	1.10	.99		bc*
Total	953	1.01	1.52		bd*** cd**

9.7.6 Association Circle of PLWHA

With family members and relatives excluded, 42.7% of the PLWHA associated regularly with

5 or more people, 30.4% associated with 3-5 people, 17.1% associated with 1-2 people and 9.8% had no companions outside family circles. Table 9.7.6.1 below presents the results.

Table 9.7.6.1: Number of Associates outside extended Family Circle

Association Circle	n	%
No one	45	9.8
1-2	78	17.1
3-5	139	30.4
Over 5	195	42.7
Total	457	100.0

Among the friends of PLWHA, 3.4% claimed all were infected, 25.2% said their friends came primarily from households with someone who was infected; 21.3% reported that their friends came from households with no infected members.

Table 9.7.6.2: Family Background of Friends of PLWHA

Family Background of Friends	n	%
All families infected	15	3.4
Most from infected families	110	25.2
Not sure about their friends' family situation	102	23.4
Few are from infected families	116	26.6
None from infected families	93	21.3
Total	436	100.0

To measure the prevalence of uninfected people in the association circles of PLWHA, we ranked the “none from the infected families” as (5) and “all families infected” as (1). The higher the score, the more likely the PLWHA is associating with people coming from uninfected families. It would therefore be the largest Association Circle Score. The One-way ANOVA results show that the largest Association Circle Scores were observed in counties covered by both GF and MOH Pilot programs. The second largest score was reported in counties covered by neither program.

Table 9.7.6.3: Association Circle Score by Program Coverage

County Program Coverage	N	Mean	STD	F(3,454)	Post hoc
Both Global Fund and MOH Pilot (a)	238	3.20	.872	5.311**	a-b*
Global Fund County (b)	106	2.93	1.071	*	a-c***
MOH Pilot County (c)	38	2.58	1.222		b-c*
Neither Global Fund nor MOH Pilot (d)	75	3.03	1.039		c-d*
Total	457	3.06	.995		

Univariate analyses show that the effect of the MOH Pilot program ($F(1, 456)=0.632, p>0.05$) was not significant. The effect of the GF program ($F(1, 456)=5.433, p<0.01$) was significant. The interaction effect of the GF and MOH Pilot programs ($F(1, 456)=9.979, p<0.01$) was also significant.

Further analyses were conducted by separating the interaction effect, and the results show in MOH Pilot program covered counties, the PLWHA's association circle score was larger in counties also covered by the GF program.

In counties without a GF program, the PLWHA's association circle score was larger in counties without a MOH Pilot program. In GF program counties, the larger association circle score was observed in MOH Pilot program counties. See table 9.7.6.4 for more details.

Table 9.7.6.4: Interaction Effect on Association Circle Scores

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t-MOH Pilot Program effect	
No	75	3.03	1.039	2.037*	106	2.93	1.071	-2.444*	0.581
Yes	38	2.58	1.222		238	3.20	.872		-3.844***

PLWHA in Global Fund Round 3 provinces had a higher chance of associating with people who were not from the HIV/AIDS infected families.

Table 9.7.6.5: Association Circle Scores by Global Fund Program Round

Global Fund Program Round	N	Mean	STD	t
3	238	3.20	.872	3.227***
4	219	2.90	1.094	

9.8 Family Support and Care for People Living with HIV/AIDS

9.8.1 Support and Care Received from Family Members

Among the support and care received by PLWHA, spousal support and care ranked the highest, care and support from parents came second, children next, followed finally by support and care from siblings. Other family members, such as in-laws, also provided support to PLWHA. See table 9.8.1.1 for details.

Table 9.8.1.1: Support and Care for PLWHA Received from Family Members

Source of Support	None		Very Little		General		Full Support		Total	
	n	%	n	%	n	%	n	%	n	%
Spouse	13	2.0	8	1.2	47	7.2	585	89.6	653	100.0
Parents	94	14.6	95	14.8	70	10.9	385	59.8	644	100.0
Children	112	14.9	121	16.1	105	13.9	415	55.1	753	100.0
Siblings	64	7.4	136	15.7	170	19.7	495	57.2	865	100.0
Other family members	70	8.7	158	19.7	225	28.0	351	43.7	804	100.0

If we score “none” with (1), “very little” with (2), “general” with (3), and “full support” with (4), we have a variable scale with values ranging from 1 to 4. The higher the score, the more support and care received by the HIV infected person. Table 9.8.1.2 presents the level of support by source. The highest level of support came from spouses and the second highest was from the siblings. A paired t-test (table 9.8.1.3) showed significant differences between sources of support. The lowest level of support came from siblings and other family members.

Table 9.8.1.2: Source and Level of Support for PLWHA

Source of Support	N	Mean	STD
Spouse	653	3.84	.526
Parents	644	3.16	1.143
Children	753	3.09	1.140
Siblings	865	3.27	.977
Other family members	804	3.07	.989

Table 9.8.1.3: Paired t-test for Source and Level of Support

	Parents	Children	Siblings	Other family members
Spouse	12.859***	15.721***	13.425***	18.204***
Parents		2.293*	-3.507***	0.113
Children			-4.008***	0.353
Siblings				8.903***

Table 9.8.1.4: Comparisons of Level of Support by Sources

Source of Support	N	Mean	STD	F	Post hoc	
Spouse (a)	376	3.85	.510	(4,372) =71.447** *	ab***	ac***
Parents (b)	376	3.06	1.189		ad***	ae***
Children (c)	376	2.96	1.213		bd***	cd***
Siblings (d)	376	3.30	.951		ce*	de***
Other family members (e)	376	3.12	.948			

Post-hoc tests showed that spousal support and sibling support were higher than the support received from parents, children, or other family members. See Table 9.8.1.4 above for the results.

9.8.2 Level of Support by Program Coverage

One-way ANOVA tests were performed and the results are presented in Table 9.8.2.1. Except for support from other family members, all other sources of family support differ significantly by program coverage. For spousal support, both GF and MOH Pilot program covered counties were significantly higher than the counties with no GF or MOH Pilot programs. In terms of parental support, however, counties with both GF and MOH Pilot program coverage were much lower than other counties. Levels of support from children and from siblings were significantly higher in GF counties but not in MOH Pilot program counties.

Table 9.8.2.1: Level of Supports by Program Coverage

Source of support	Program support in county	N	Mean	STD	F	Post hoc
Spouse	Both Global Fund and MOH Pilot (a)	482	3.87	.461	2.826*	a-d**
	Global Fund County (b)	74	3.78	.668		
	MOH Pilot County (c)	51	3.84	.612		
	Neither Global Fund nor MOH Pilot (d)	46	3.65	.737		
	Total	653	3.84	.526		
Parents	Both Global Fund and MOH Pilot (a)	412	2.97	1.208	12.168**	a-b*** a-c*** a-d**
	Global Fund County (b)	85	3.65	.751		
	MOH Pilot County (c)	92	3.43	1.041		
	Neither Global Fund nor MOH Pilot (d)	55	3.38	.952		
	Total	644	3.16	1.143		
Children	Both Global Fund and MOH Pilot (a)	589	3.11	1.106	7.668**	a-b** a-c** b-c*** b-d***
	Global Fund County (b)	65	3.52	.954		
	MOH Pilot County (c)	59	2.63	1.325		
	Neither Global Fund nor MOH Pilot (d)	40	2.78	1.330		
	Total	753	3.09	1.140		
Siblings	Both Global Fund and MOH Pilot (a)	586	3.29	.945	4.190**	a-c** b-c**
	Global Fund County (b)	111	3.42	.900		
	MOH Pilot County (c)	101	2.97	1.153		
	Neither Global Fund nor MOH Pilot (d)	67	3.27	1.024		
	Total	865	3.27	.977		
Other family members	Both Global Fund and MOH Pilot (a)	576	3.09	.941	1.922	
	Global Fund County (b)	93	3.17	1.028		
	MOH Pilot County (c)	82	2.89	1.133		
	Neither Global Fund nor MOH Pilot (d)	53	2.89	1.155		
	Total	804	3.07	.989		

Univariate analyses showed that the effect of the MOH Pilot program was significant on spousal support. The effect of the MOH Pilot program and interaction effect of the MOH Pilot and GF programs was significant for parental support and the effect of GF and MOH Pilot programs was significant for children and sibling support. There were no significant differences found in level of support from other family members. See table 9.8.2.2 for the F-test results.

Table 9.8.2.2: F-Values of Univariate Analyses

Source of support	GF Program effect on support	MOH Pilot Program effect on support	Combined Program effect on support
Spouse	1.639	4.976*	0.685
Parents	0.772	7.348**	10.036**
Children	20.396***	4.154*	0.914
Siblings	6.659**	5.594*	0.794
Other family members	5.547*	0.144	0.171

Because a significant difference was found in level of parental support for the interaction effect of GF and MOH Pilot programs, separate analyses were performed and the results are shown in the following table 9.8.2.3.

The results indicate that for PLWHA living in GF counties, parental support in counties without MOH Pilot program support was higher than in counties with it. In MOH Pilot

program counties, counties without the GF program had a higher level of parental support.

Table 9.8.2.3: Level of Parental Support for PLWHA by GF and MOH Pilot Programs

MOH Pilot Program Coverage	Non-GF County			t-MOH Pilot Program effect	GF County			t-MOH Pilot Program effect	t-GF Program effect
	N	Mean	STD		N	Mean	STD		
No	55	3.38	.952	-0.308	85	3.65	.751	5.001***	-1.834
Yes	92	3.43	1.041		412	2.97	1.208		

More analyses were conducted to test the levels of support by program coverage, and the results are listed in Tables 9.8.2.4, 8.2.5 and 9.8.2.6.

Table 9.8.2.4 shows that the level of support from children, siblings and other family members was higher in the GF counties. However, the level of parental support was lower.

Table 9.8.2.5 shows that level of spousal support was higher in MOH Pilot program covered counties but they also had lower levels of parental support. No difference was found for levels of support from children, siblings, and other family members between counties covered by the MOH Pilot program and those that were not.

Table 9.8.2.4: Level of Support for PLWHA by GF Program Coverage

Source of support	GF Program Coverage	N	Mean	STD	t
Spouse	No	97	3.75	.677	-1.856
	Yes	556	3.86	.493	
Parents	No	147	3.41	1.006	3.119**
	Yes	497	3.08	1.171	
Children	No	99	2.69	1.322	-3.837***
	Yes	654	3.15	1.098	
Siblings	No	168	3.09	1.110	-2.635**
	Yes	697	3.31	.939	
Other family members	No	135	2.89	1.137	-2.286 *
	Yes	669	3.10	.953	

Table 9.8.2.5: Level of Support by MOH Pilot Program Coverage

Source of support	MOH Pilot Program Coverage	N	Mean	STD	t
Spouse	No	120	3.73	.695	-2.559**
	Yes	533	3.87	.477	
Parents	No	140	3.54	.843	4.568***
	Yes	504	3.05	1.192	
Children	No	105	3.24	1.165	1.407
	Yes	648	3.07	1.135	
Siblings	No	178	3.37	.949	1.504
	Yes	687	3.24	.984	
Other family members	No	146	3.07	1.081	0.035
	Yes	658	3.07	.968	

Table 9.8.2.6: Level of Support for PLWHA by GF Program Round

Source of support	GF Program Round	N	Mean	STD	t
Spouse	3	482	3.87	.461	2.258*
	4	171	3.77	.671	
Parents	3	412	2.97	1.208	-5.837***
	4	232	3.50	.926	
Children	3	589	3.11	1.106	0.948
	4	164	3.02	1.256	
Siblings	3	586	3.29	.945	0.931
	4	279	3.22	1.043	
Other family members	3	576	3.09	.941	1.110
	4	228	3.00	1.101	

Table 9.8.2.6 above shows that level of spousal support was higher in GF Round 3 counties than in GF Round 4 counties. Lower levels of parental support, however, were found in these same counties. No difference was found for levels of support from children, siblings, and other family members between GF Round 3 and 4 counties.

9.9 Psychological Effect of HIV/AIDS Infection

There were three variables used to measure the psychological effect on the respondents to their infection with HIV/AIDS. One was about the mood the infected usually felt. It was measured as (1) good, not at all gloomy, (2) normal, (3) somewhat gloomy, (4) gloomy, and (5) very gloomy. The second variable was about the helplessness the infected normally felt. It was measured as (1) not at all helpless; (2) a little; (3) somewhat serious; (4) serious; and (5) very serious helplessness. The third variable was measuring the perceived pressure from the people surrounding them. It was measured as (1) no pressure; (2) a little pressure; (3) some pressure; (4) quite a lot of pressure; and (5) heavy pressure. The higher the score, the more social pressure the infected felt.

9.9.1 Psychological Pressure

Table 9.9.1: Psychological Pressure Felt by the People Living with HIV/AIDS

Measurements	N	Min	Max	Mean	STD
Gloominess	458	1	5	2.97	.978
Helplessness	456	1	5	2.55	1.108
Perceived Social Pressure	456	1	5	1.98	1.188

9.9.2 Psychological Pressure by Program Coverage

A one-way ANOVA was done on the psychological pressure scores and the findings indicated there was no difference in feelings of helplessness and perceived social pressure across program counties. However, both Global Fund and MOH Pilotprogram counties reported higher scores related to gloominess.

Table 9.9.2.1: Psychological Pressure by Program Coverage

Measurement	Program Coverage in County	N	Mean	STD	F	Post hoc
Gloominess	Both Global Fund and MOH Pilot (a)	238	3.04	.870	2.783*	a-d** b-d*
	Global Fund County (b)	106	3.02	1.163		
	MOH Pilot County (c)	38	2.89	1.085		
	Neither Global Fund nor MOH Pilot (d)	76	2.68	.927		
	Total	458	2.97	.978		
Helplessness	Both Global Fund and MOH Pilot (a)	238	2.56	1.012	2.018	
	Global Fund County (b)	105	2.71	1.306		
	MOH Pilot County (c)	38	2.50	1.059		
	Neither Global Fund nor MOH Pilot (d)	75	2.31	1.102		
	Total	456	2.55	1.108		
Perceived Social Pressure	Both Global Fund and MOH Pilot (a)	237	1.87	1.030	1.939	
	Global Fund County (b)	105	2.20	1.410		
	MOH Pilot County (c)	38	1.97	1.305		
	Neither Global Fund nor MOH Pilot (d)	76	2.05	1.232		
	Total	456	1.99	1.188		
Combined score of psychological pressure	Both Global Fund and MOH Pilot (a)	238	2.49	.736	1.830	
	Global Fund County (b)	106	2.64	1.073		
	MOH Pilot County (c)	38	2.46	.850		
	Neither Global Fund nor MOH Pilot (d)	76	2.35	.851		
	Total	458	2.50	.856		

Univariate analyses were performed to assess the difference between counties supported by the Global Fund, the MOH Pilot program, or combined support and those that were not supported in these ways. The findings in table 9.9.2.2 show that the people living with HIV/AIDS in Counties supported by the Global Fund program usually felt gloomier. Other measures were not significantly different.

Table 9.9.2.2: F-tests of Psychological Pressure by Type of Program (F value and significance)

Measure	Global Fund Counties versus Other Counties	MOH Pilot Program Counties versus Other Counties	Both Global Fund and MOH Pilot Program Counties versus Other Counties
Gloominess	4.622*	1.087	0.699
Helplessness	3.341	0.022	1.868
Perceived Social Pressure	0.030	2.204	0.822

Univariate analysis confirmed the above findings for counties with the Global Fund and those without it. See table 9.9.2.3 below for more details.

Table 9.9.2.3: Psychological Pressure for Counties with and without Global Fund (GF) Support

Measurement	Presence of GF Program	N	Mean	STD	t
Gloominess	Non-GF Counties	114	2.75	.983	-2.671*
	GF Counties	344	3.03	.968	*
Helplessness	Non-GF Counties	113	2.37	1.087	-1.980*
	GF Counties	343	2.61	1.111	
Perceived Social Pressure	Non-GF Counties	114	2.03	1.251	0.409
	GF Counties	342	1.97	1.167	
Combined score of psychological pressure	Non-GF Counties	114	2.3830	.851	-1.687
	GF Counties	344	2.5388	.856	

Table 9.9.2.4 compares the psychological pressure variables for counties with and without MOH Pilot program based on univariate analysis. The results showed that the perceived pressure in counties not supported by the MOH Pilot program was significantly higher.

Table 9.9.2.4: Psychological Pressure on PLWHA in Counties with and without the MOH Pilot Program

Measurement	MOH Pilot Program	N	Mean	STD	t
Gloominess	No	182	2.88	1.081	-1.529
	Yes	276	3.02	.902	
Helplessness	No	180	2.54	1.239	-0.059
	Yes	276	2.55	1.017	
Perceived Social Pressure	No	181	2.14	1.337	2.216 *
	Yes	275	1.89	1.070	
Combined score of psychological pressure	No	182	2.5183	.99460	0.372
	Yes	276	2.4879	.75174	

Table 9.9.2.5: Psychological Pressure on PLWHA between GF Program Rounds

Measurement	GF Round	N	Mean	STD	t
Gloominess	3	238	3.04	.870	1.755
	4	220	2.88	1.079	
Helplessness	3	238	2.56	1.012	0.213
	4	218	2.54	1.207	
Perceived Social Pressure	3	237	1.87	1.030	-1.988
	4	218	2.09	1.306	*
Combined score of psychological pressure	3	237	2.4909	.73744	-0.266
	4	216	2.5123	.97506	

Comparisons between Global Fund Round 3 and 4 were made based on a univariate analysis and the results are presented in Table 9.9.2.5 above. It shows that the perceived pressure in Round 4 counties was significantly higher.

9.10 PLWHA Initiative to Communicate Concerns and Worries, to Seek Help and to Participate in Group Activities.

9.10.1 Initiative to Communicate Concerns and Worries

Among the PLWHA surveyed, 20.2% said they would pour out their concerns and worries to someone, 40% would not say anything to others, and 35.8% said they would talk only to their closest friends.

Table 9.10.1.1: PLWHA's level of Initiative in Communicating Concerns and Worries

Level of Initiative to Communicate Concerns and Worries	N	%
Never talked to anyone	370	40.0
Only talked to 1 or 2 closest friends	331	35.8
Would talk if asked first by friends	37	4.0
Would talk to others to obtain support and understanding	187	20.2
Total	925	100.0

We scored “never talked to anyone” with (1), “only talked to 1 or 2 closest friends” as (2); “would talk if asked first by friends” as (3), and “would talk to others to obtain support and understanding” as (4). This created a variable with values range from 1 to 4. The higher the score, the more likely the person would be to seek someone to talk to about his or her concerns and worries. A One-Way ANOVA was performed among the different kinds of counties (program support or not). Table 9.10.1.2 presents the results. Only counties with MOH Pilot program support had lower scores than other kinds of counties.

Table 9.10.1.2: PLWHA Initiative to Communicate Concerns and Worries by Type of Programs

Program Coverage in County	N	Mean	STD	F(3,921)	Post hoc
Both Global Fund and MOH Pilot (a)	610	2.12	1.189	6.122*	a-c* **
Global Fund County (b)	125	2.09	1.085		b-c**
MOH Pilot County (c)	110	1.64	.763		c-d*
Neither Global Fund nor MOH Pilot (d)	80	1.96	.878		
Total	925	2.04	1.117		

Univariate analyses were performed to test the difference between counties and provinces with GF coverage, MOH Pilot Program, and GF Program Rounds. Table 9.10.1.3 shows the results. It indicates that the PLWHA in GF Counties were more likely to talk about their concerns and worries ($F(1,921) = 9.668$, $p < 0.01$). Using an independent sample for a t-test showed that PLWHA in GF Round 3 provinces and in GF Counties were more likely to talk to others.

Table 9.10.1.3: PLWHA Initiative to Communicate Concerns and Worries by Program

Programs Coverage		N	Mean	STD	t
Round of GF (Province)	3	610	2.12	1.189	2.866**
	4	315	1.90	.949	
GF Program	No	190	1.77	.827	-3.773 ***
	Yes	735	2.11	1.171	
MOH Pilot Program	No	205	2.04	1.009	-0.077
	Yes	720	2.05	1.147	

9.10.2 PLWHA Initiative to Seek Help

Among the PLWHA surveyed, 21.5% said they would rely on themselves and not seek help from others at all. 37.2% seldom sought help from others, 30.3% said they would sometimes seek help from others, and 11% said they often sought help from others such as family members, friends, or organizations. The results are shown in table 9.10.2.1 below.

Table 9.10.2.1: PLWHA Initiative to Seek Help

Initiatives	N	%
Self-reliant, not seeking help from others at all	199	21.5
Seldom seek help from others	344	37.2
Sometimes seek help from others	280	30.3
Often seek help from others	102	11.0
Total	925	100.0

We scored “Self-reliant, not seeking help from others at all” with (1), “seldom seeking help from others” as (2), “sometimes seeking help from others” as (3), and “often seeking help from others” as (4). We therefore created a variable with values ranging from 1 to 4. The higher the score, the more likely the person would seek help from others. A One-Way ANOVA was performed among the different kinds of counties. Table 9.10.2.2 presents the results. Counties with the MOH Pilot program were the only ones to have a lower score than other types of counties in PLWHA’s initiative to seek help from others. This is similar to the results of the study of their initiative to talk to others.

Table 9.10.1.2: Initiative to Seek Help by Type of Programs

Program Coverage	N	Mean	STD	F(3,921)	Post hoc
Both Global Fund and MOH Pilot	610	2.35	.900	4.114**	a-c***
Global Fund County	125	2.28	.997		b-c*
MOH Pilot County	110	2.03	.990		c-d**
Neither Global Fund nor MOH Pilot	80	2.39	.907		
Total	925	2.31	.930		

Univariate analyses were performed to test the difference between GF Counties, MOH Pilot Program Counties, and GF Program Rounds. The results found that the effect of the MOH Pilot program was not significant ($F(1,921) = 3.062$, $p > 0.05$), and the effect of the GF

program was not significant either ($F(1.921)=1.799, p>0.05$). However, the interaction effect of GF and MOH Pilot Programs was significant ($F(1.921)=7.054, p<0.01$). Further tests indicated that only the MOH Pilot Program effect was significant in Non-GF counties. The findings are presented in table 10.2.3. In counties without GF or MOH Pilot programs, PLWHA were more likely to seek help from others. In counties with both MOH Pilot and GF programs, PLWHA were also more likely to seek help from others.

Table 9.10.2.3: Initiative to Seek Help by Type of County

MOH Pilot Program Coverage	Non-GF County			t-MOH Pilot Program effect	GF County			t-MOH Pilot Program effect	t-GF Program effect
	N	Mean	STD		N	Mean	STD		
No	80	2.39	.907	2.600**	125	2.28	.997	-0.769	0.780
Yes	110	2.03	.990		610	2.35	.900		

Table 9.10.2.4 below presents the comparisons between GF program rounds, GF counties and MOH Pilot program counties. PLWHA in provinces with GF Round 3 were more likely to seek help from others. No difference was found between GF and non-GF counties, and between counties with and without the MOH Pilot program.

Table 9.10.2.4: Initiative to Seek Help by Program Provinces and Counties

Programs Coverage		N	Mean	STD	t
Round of GF (Provincial)	3	610	2.35	.900	2.097*
	4	315	2.22	.981	
GF Program	No	185	2.20	.966	-1.770
	Yes	740	2.34	.920	
MOH Pilot Program	No	210	2.30	.969	-0.144
	Yes	715	2.31	.919	

9.10.3 Initiative to Participate in Group Activities

Among the PLWHA surveyed, 74.4% said they never participated in group activities such as those organized by a political party, trade union, or religious organization. 9% said they occasionally participated in such activities, 13.7% said they often participated in group activities, and only 2.9% said they were active in group activities. The results are shown in table 9.10.3.1 below.

Table 9.10.3.1: PLWHA Participation in Group Activities

Participation in Group Activities	N	%
Never	688	74.4
Occasionally	83	9.0
Often	127	13.7
Very Active	27	2.9
Total	925	100.0

We scored “never participate in group activities” with (1), “occasionally” as (2), “often” as (3), and “very active” as (4). This created a variable with values ranging from 1 to 4. The

higher the score, the more active the person would be in participating in group activities. A One-Way ANOVA was performed among different kinds of counties, and Table 9.10.3.2 presents the results. The counties without GF or MOH Pilot program support had significantly higher scores than other types of counties indicating that PLWHA in these counties are more actively participating in group activities. This actually confirms the findings of the field visits that PLWHA in these counties were more likely to hide their illness and pretend they were normal.

Table 9.10.3.2: Participation in Group Activities by Type of Programs

Program coverage	N	Mean	STD	F(3,921)	Post hoc
Both Global Fund and MOH Pilot	611	1.27	.692	4.114**	a-b***
Global Fund County	124	1.64	.957		a-c ***
MOH Pilot County	110	1.69	.946		a-d ***
Neither Global Fund nor MOH Pilot	80	2.19	.943		b-d***
Total	925	1.45	.836		c-d***

Univariate analyses were performed to test the difference between GF Counties, Counties with MOH Pilot Programs, and GF Program Round Provinces. Table 9.10.3.3 shows the results. It indicates that the PLWHA in GF Round 4 Provinces were more likely to participate in group activities than PLWHA in GF Round 3 Provinces. PLWHA in non-GF counties were more likely to participate in group activities than those in GF counties. PLWHA in counties without the MOH Pilot program were also more likely to participate in group activities. These findings are again consistent with the findings from field visits. These visits found that PLWHA in counties without support programs were not willing to disclose their illness and acted as normal as they could.

Table 9.10.3.3: PLWHA's Participation in Group Activities by type of Province and County

Program Coverage		N	Mean	STD	t
Round in GF Provinces	3	611	1.27	.692	-9.399***
	4	314	1.80	.974	
GF County	No	185	1.91	.974	8.737***
	Yes	740	1.34	.755	
County with MOH Pilot Program	No	209	1.84	.985	7.926***
	Yes	716	1.34	.750	

9.11 Other Findings

9.11.1: Identification with the State

A positive view of the State was found to be quite common among the people living with HIV/AIDS. Table 9.11.1 below presents the answers to the question of how they viewed the government.

Table 9.11.1: The Status of the State in the Minds of People Living with HIV/AIDS

Category	N	%
Exceptionally High	66	14.5
Very High	283	62.2
High	45	9.9
Average	46	10.1
Relatively Low	7	1.5
Very Low	8	1.8
Total	455	100.0

If we score “Very low” as (1), “Relatively low” as (2), “Average” as (3), “High” as (4), “Very high” as (5), and “Exceptionally high” as (6), we have created a variable with values ranging from 1 to 6. The higher the score, the more strongly positive the identification with the State will be. A One-Way ANOVA was performed among different types of counties. There was no difference found between county support programs, see table 9.11.1.1 for details.

Table 11.1.1: Identification with the State by Type of Programs

County Program Coverage	N	Mean	STD	F(3,921)	Post hoc
Both Global Fund and MOH Pilot	237	2.21	.810	2.253	
Global Fund County	106	2.27	1.183		
MOH Pilot County	38	2.66	1.300		
Neither Global Fund nor MOH Pilot	74	2.28	1.054		
Total	455	2.27	.998		

Univariate analyses were performed to test the effect of GF and MOH Pilot programs and the interaction effect of GF and MOH Pilot programs. There were no significant differences found.

Table 9.11.1.2: Identification with the State by type of Provincial and County Support Programs

Program Coverage		N	Mean	STD	t
Round of GF (Provincial)	3	237	4.79	.810	1.468
	4	218	4.66	1.166	
GF Program	No	112	4.59	1.151	-1.691
	Yes	343	4.77	.940	
MOH Pilot Program	No	180	4.72	1.129	-0.091
	Yes	275	4.73	.904	

9.11.2 The Most Important Concerns Felt by People Living with HIV/AIDS

When asked for their most important concerns and where they suffered most, the PLWHA said that their biggest source of suffering was in the current hardships of daily living. The second most important concern was that their children would lose their parents. Their third concern was that their children might be stigmatized. A detailed list of concerns and sources of suffering is presented in Table 9.11.2.

Table 9.11.2: Most Important Concerns Identified by PLWHA.

Concerns/Sources of Suffering	1 st Most Painful		2 nd Most Painful		Total	
	N	%	N	%	N	%
Current hardship in daily life	166	37.73%	91	30.95%	257	35.01%
Children will lose parents	147	33.41%	52	17.69%	199	27.11%
Children will be stigmatized	42	9.55%	52	17.69%	94	12.81%
No one to talk about their concerns	12	2.73%	34	11.56%	46	6.27%
Difficulties in Treatment and poor health	37	8.41%	8	2.72%	45	6.13%
Poor social environment	12	2.73%	26	8.84%	38	5.18%
Children have difficulties to find mates to marry	6	1.36%	7	2.38%	13	1.77%
Financial difficulties	4	0.91%	6	2.04%	10	1.36%
Finding someone to marry	5	1.14%	4	1.36%	9	1.23%
Housing	1	0.23%	5	1.70%	6	0.82%
No one to take care of their parents	2	0.45%	3	1.02%	5	0.68%
Failing as husband or wife in family		0.00%	4	1.36%	4	0.54%
Failing as a child	2	0.45%	1	0.34%	3	0.41%
Family strife	2	0.45%	1	0.34%	3	0.41%
History of Substance abuse	1	0.23%		0.00%	1	0.14%
Sense of Helplessness	1	0.23%		0.00%	1	0.14%
Total	440	100.00%	294	100.00%	734	100.00%

9.11.3 Important Needs Identified by People Living with HIV/AIDS

61% of PLWHA valued the visit from government leaders even when they weren't supplying financial aid. 23.45% believed it was important to improve the connection and association amongst infected people. Only 15.55% believed that improving the connection between the infected and non-infected people was important. See table 9.11.3.1 for details.

Table 9.11.3.1: Important Needs Identified

Important Needs	N	%
Visit from government leaders (without financial aid)	255	61.00%
Improving the connection and association amongst infected people	98	23.45%
Improving the connection between infected and non-infected people	65	15.55%
Total	418	100.00%

Visits from government officials ranked very high on PLWHA's wish list of needs. See Table 9.11.3.2 for details.

Table 9.11.3.2: Level of Importance of Needs Identified by PLWHA

Important Needs	Very important		Important		Average		Not very important		Not important at all		Total	
	N	%	N	%	N	%	N	%	N	%	N	%
Government leaders visit (without financial aid)	216	47.4	139	30.5	31	6.8	24	5.3	46	10.1	456	100.0
Improve connection and association amongst infected people	169	37.0	163	35.7	57	12.5	24	5.3	44	9.6	457	100.0
Improve the connection between infected and non-infected people	135	29.8	116	25.6	102	22.5	36	7.9	64	14.1	453	100.0

If we score “Not important at all” as (1), “Not very important” as (2), “Average” as (3), “Important” as (4), and “Very Important” as (5), we have created a variable with values ranging from 1 to 5. The higher the score, the higher importance attached to the need. A comparison among the three most important needs was made. The government leaders’ visit ranked highest. This finding indicates that PLWHA want to see leaders so they can voice their concerns directly.

Table 9.11.3.3: Comparisons among the Three Most Important Needs

Important needs	N	Mean	STD	F(2, 450)	Post hoc
Leaders from government visit (without financial aid)	452	3.99	1.292	24.184***	ab* ac***
Improve the connection and association among infected people	452	3.87	1.229		bc***
Improve the connection between infected and non-infected people	452	3.50	1.359		

A one-way ANOVA was performed to test each of the variables among various types of counties. The results are presented in Table 9.11.3.4. Table 11.3.4 shows that in counties covered by the GF program, PLWHA attached significantly higher importance to the visits of government officials. The importance of improving the connection and association amongst infected people was ranked significantly lower in counties covered by the MOH Pilot program. There were no significant differences found related to the importance of improving the connection between infected and non-infected people.

Table 9.11.3.4: Important Needs by Program Coverage

Needs Identified	Program Coverage	N	Mean	STD	F	Post hoc
Visit from government leaders	Both Global Fund and MOH Pilot	238	3.88	1.230	3.545*	a-b** b-c**
	Global Fund County	106	4.30	1.374		
	MOH Pilot County	38	3.68	1.378		
	Neither Global Fund nor MOH Pilot	74	4.09	1.241		
	Total	456	4.00	1.290		
Improve the connection and association among infected people	Both Global Fund and MOH Pilot	238	3.92	1.141	2.935*	a-c** b-c* c-d**
	Global Fund County	106	3.85	1.392		
	MOH Pilot County	38	3.29	1.450		
	Neither Global Fund nor MOH Pilot	75	3.93	1.189		
	Total	457	3.85	1.246		
Improve the connection between infected and non-infected people	Both Global Fund and MOH Pilot	238	3.52	1.308	0.177	
	Global Fund County	102	3.41	1.472		
	MOH Pilot County	38	3.45	1.267		
	Neither Global Fund nor MOH Pilot	75	3.52	1.446		
	Total	453	3.49	1.363		

Univariate analyses show that the effect of MOH Pilot program is significant to the importance of visits from government officials. The effect of the MOH Pilot program and interaction effect of the MOH Pilot and GF programs was significant to the importance of improving the connection and association amongst infected people. As found previously, there was no significant differences found related to the importance of improving the connection between infected and non-infected people. See table 9.11.3.5 for more details.

Table 9.11.3.5: F-Values of Univariate Analyses

Important Need Identified	GF County vs no GF County	MOH Pilot County vs non MOH Pilot County	Interaction between MOH Pilot and GF Programs
Visits from government leaders	1.879	7.873**	0.001
Improve the connection and association amongst infected people	3.599	4.075*	6.185*
Improve the connection between infected and non-infected people	0.012	0.013	0.330

Because a significant difference was found for the interaction effect of GF and MOH Pilot programs on the importance of improving the connection and association amongst infected people, separate analyses were performed. The results are shown in the following table 9.11.3.6. The results indicate that PLWHA in counties without a MOH Pilot program attached more importance to this need. PLWHA in MOH Pilot program covered counties that also had the GF program attached more importance to it than those in non-GF counties.

Table 9.11.3.6: Importance of Improving Connection and Association among Infected people by Type of Programs

MOH Pilot Program Coverage	Non-GF County				GF County				t-GF Program effect
	N	Mean	STD	t-MOH Pilot Program effect	N	Mean	STD	t-MOH Pilot Program effect	
No	75	3.93	1.189	2.522*	106	3.85	1.392	-0.468	0.426
Yes	38	3.29	1.450		238	3.92	1.141		-3.021**

Table 9.11.3.7 below presents the comparison between provincial GF program rounds, GF counties, and MOH Pilot program counties. PLWHA in Round 4 provinces attached more importance to official visits than PLWHA in Round 3 provinces.

Table 9.11.3.7: Importance of Needs by Provincial and Program Coverage

Important support needed	Programs	N	Mean	STD	t
Visits from government leaders	GF Round 3 Province	238	3.88	1.230	-2.004
	GF Round 4 Province	218	4.12	1.343	*
	County without GF Program	112	3.96	1.297	-0.401
	GF Program County	344	4.01	1.289	
	County without MOH Pilot Program	180	4.22	1.321	2.951*
	MOH Pilot Program County	276	3.86	1.251	*
Improvements to the connection and association amongst infected people	GF Round 3 Province	238	3.92	1.141	1.159
	GF Round 4 Province	219	3.78	1.350	
	County without GF Program	113	3.72	1.313	-1.323
	GF Program County	344	3.90	1.222	
	County without MOH Pilot Program	181	3.88	1.309	0.455
	MOH Pilot Program County	276	3.83	1.205	
Improvements to the connection between infected and non-infected people	GF Round 3 Province	238	3.52	1.308	0.508
	GF Round 4 Province	215	3.46	1.423	
	County without GF Program	113	3.50	1.383	0.050
	GF Program County	340	3.49	1.358	
	County without MOH Pilot Program	177	3.46	1.458	-0.405
	MOH Pilot Program County	276	3.51	1.300	

Chapter 10: The Impact of Global Fund and MOH Pilot Programs on Households with HIV/AIDS Infected: A Multivariate Analysis

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Introduction

To understand the impact of the Global Fund and the MOH Pilot Programs on HIV/AIDS infected and their families, we have estimated multivariate models to control for other covariates. We used a multi-dimensional approach to measure the impact. The key questions are listed below:

- **Treatment:** we want to know whether the Global Fund and/or the MOH Pilot programs really have increased the probability of seeking ARV or anti-infection treatments.
- **Financial Support:** we want to know whether the Global Fund and/or the MOH Pilot programs really have increased the financial supports to the PLWHA and their families in terms of cash, in-kind and medical financial assistance. We also want to know whether the programs have reduced the burden of medical costs of HIV/AIDS treatments to the households with members living with HIV/AIDS.
- **Social Support:** we want to know whether people living in the Global Fund and/or the MOH Pilot counties have increased social support.
- **Family Support:** we want to know whether people living in the Global Fund and/or the MOH Pilot counties have increased family support.
- **Impact of HIV/AIDS on Households:** we want to know whether the Global Fund and/or the MOH Pilot programs have reduced the impact of HIV/AIDS on households.
- **Psychological Pressure:** we want to know whether the Global Fund and/or the MOH Pilot programs have reduced the psychological pressure on people living with HIV/AIDS.

10.1 HIV/AIDS Treatment

Table 10.1 shows the Logistic regression result on whether the infected being treated. It predicts the treatment (1) versus non-treatment (0). The results show that the controlling for covariates, the PLWHA in both Global Fund and MOH Pilot counties have significant higher probability of being treatment. Since all of the counties with both programs are in Global Fund Round 3 provinces, this result indicates that the people living in Global Fund Round 3 provinces are more likely to get treatments. However, in Round 4 provinces, comparing with the counties with no Global Fund and no MOH Pilot programs, the Global Fund programs and the MOH Pilot programs do not have significant impact on the likelihood of getting treatment for those infected.

Table 10.1 Logistic Model of Being Treated

Variable Groups	Variables	Parameter Estimates
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Infected	Male	-.512***
	Age	.025***
	Primary School	.196
	Middle School	.282
	High School	1.139**
	Married	.179
	Widowed	-.092
	Separated/Divorces	.408
	Family Size	-.114
	Average Income	.003
	Average Expenses	-.008
	Death of HIV/AIDS	-.327
	Social Assistance Entitlement	-1.044**
	More than one Infected	.044
Household	Cash assistant	.759*
	In-kind support	.030
	Medical financial aid	.267
	Two Generations	.477
	Three Generations	.710
	Highest Education Attained: Primary School	.386
	Highest Education Attained: Middle School	.465
Program Coverage	Highest Education Attained: High School	.294
	Both GF and MOH Programs	1.963***
	GF Program Only	.224
	MOH Program Only	-.496
Constant		-2.000

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

10.2 Financial Support Received

We estimated the probability of receiving cash, in-kind and medical financial aids of the households surveyed. Table 10.2 presents the findings of the Logic models. Controlling for the household and individual characteristics, people living in both Global Fund and MOH Pilot program counties have significantly higher likelihood of receiving cash, in-kind and medical financial assistances. These counties are all located in the Global Fund Round 3 program areas, and most of the infected are through blood transmissions. However, comparing with counties with neither programs, people living in Global Fund or MOH Pilot program counties have lower probability of receiving cash, in-kind and medical financial assistances. Because the social assistance programs are managed by the civil affairs bureaus, and the health services are managed by the health bureaus, this finding indicates that in Global Fund Round 3 counties, the program coordinates better, and more coordination between health and social programs are required.

Table 10.2 Financial Support Received

Variable Groups	Variables	Cash	In-kind	Medical
		Assistance	Support	Financial Aid
		Parameter	Parameter	Parameter
Respondents	Male	1.867*	-.368	-1.631*
	Infected	.782	-.203	-.042
	Male*Infected	-1.956*	.424	1.612*
	Age	.025	.000	.023
	Married	.033	.214	.452
	Widowed	.997	.777	-.503
	Separated/Divorces	-.596	.291	.397
	Primary School	.561	.339	.324
	Middle School	-.260	.291	.754
	High School	-.134	-.138	.419
	Family Size	-.190	.045	.071
	Highest Education Attained: Primary School	.324	-.223	.372
	Highest Education Attained: Middle School	.114	-.341	.754
	Highest Education Attained: High School	.619	.154	.693
	Two Generations	2.398***	.126	.643
Households	Three Generations	2.302*	-.343	.279
	More than one Infected	.657	.669**	-.198
	Death of HIV/AIDS	-.385	-.027	.489
	Social Assistance Entitlement	5.916***	1.527***	.998**
	Average Income	-.086*	-.020	-.035
Program Coverage	Average Expenses	.098*	-.011	.009
	Both GF and MOH Programs	2.088***	2.950***	3.670***
	GF Program Only	-1.137*	.525	-1.913***
	MOH Program Only	.337	-.821*	-.936*
	Constant	-7.245	-2.114	-4.270
N		1118	1118	1118
-2log likelihood		241.285	719.824	471.385
Cox & Snell R ²		.631	.476	.591
Nagelkerke R ²		.898	.657	.808
Predict percentage correct		97.1	87.9	92.8

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

10.3 Level of Family Support

Table 10.2: The Impact of Global Fund on Family Support

Category	Variables	Spouses	Parents	Children	Siblings	Others
		Parameter	Parameter	Parameter	Parameter	Parameter
Infected	Age	.020	-.061***	.060***	-.027***	-.015*
	Male	.194	.175***	.137**	.069	.099
	Primary School	.227	.004	-.013	-.046**	-.018
	Middle School	.063	.017	.032	.085***	.067***
	Higher School	.298	.460**	.038	.067	.388**
	Married	.065	.029	.052	.112	.222
	Widowed	-.201	.090	.137	.144	.267
	Separated/Divorced	—	.020	-.163	-.243	-.512
Family	Family Size	—	.381	—	.218	.124
	Income per person in 1000 RMB	—	.568	—	.296	.313
	Expenses per person in 1000 RMB	—	.313	—	.131	.495
	Highest educational attainment of the family: primary school	-.584	-.233	-1.021	-.467	-1.786**
	Highest educational attainment of the family: middle school	-.418	-.443	-1.009	-.600	-2.076**
	Highest educational attainment of the family: high school	.696	.180	-.800	-.407	-1.812**
	Two generations	.566	—	—	.305	.388
	Three generations	.264	—	—	.392	.278
	Death of HIV/AIDS	.489	.263	.139	.215	.116
	Social Assistance Program covered	-.452	-.123	.026	.192	-.058
	More than 1 persons infected	.502	.034	-.052	-.290*	-.199
Program Coverage	Both GF and MOE Pilot	.977*	.011	.161	.108	.628**
	GF Only	.730	.800**	1.547***	.444	.560
	MOE Pilot Only	.860	.400	-.162	-.532*	.004
N		641	644	753	865	804
-2log likelihood		480.281	1348.227	1696.911	1899.896	1968.276
Chi-squared		28.126	84.006	80.604	42.363	42.513
Cox & Snell R ²		.043	.122	.102	.048	.052
Nagelkerke R ²		.078	.137	.112	.053	.056

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

Five variables used to measure the level of family support: support from spouses, from parents, from children, from siblings and from other members of the households. Controlling for the characteristics of the infected and the households, people in both Global Fund and MOH Pilot program covered counties reported higher level of support from spouses and other family members. People in Global Fund covered counties reported higher level of support

from parents and children. However, people in MOH Pilot counties reported less support from the siblings. In addition, few variables are significant in predicting the level of supports from the families.

10.4 Level of Social Support

Table 10.4 Level of Social Support

Category	Variables	Support from Friends	Living Closer to Families	Support from Neighbors
		Parameter	Parameter	Parameter
Infected	Age	-.006	-.048	-.002
	Male	.145	.365	-.119
	Primary School	.224	-1.033	.156
	Middle School	.175	-.165	.044
	Higher School	-.227	-1.246	-1.177**
	Married	.178	3.001***	.547*
	Widowed	-.210	2.369**	.453
	Separated/Divorced	.020	2.083**	.368
	Family Size	.003	.825***	.124*
	Income per person in 1000 RMB	.044*	-.020	.054*
	Expenses per person in 1000 RMB	.034	.035	-.015
	Highest educational attainment of the family: primary school	-.016	.204	-.445
	Highest educational attainment of the family: middle school	-.065	-.530	-.406
	Highest educational attainment of the family: high school	.202	1.679	-.307
Households	Two generations	.341	.723	.541
	Three generations	.404	-.384	.500
	Death of HIV/AIDS	.462*	-.398	.030
	Social Assistance Program covered	-.447	-.278	-.323
	More than 1 persons infected	-.051	1.995	-.262
	Both GF and MOE Pilot	-.518	-.126	-.058
	GF Only	-.263	-1.184	-.899***
	MOE Pilot Only	-.928***	-2.310**	-1.086***
	N	926	907	927
	-2log likelihood	2301.789	263.637	2367.290
Program Coverage	Chi-square	65.540	161.918	102.254
	Cox & Snell R ²	.068	.163	.104
	Nagelkerke R ²	.074	.437	.112

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

In terms of level of social support, the findings show that there are no significant difference between both program counties and neither program counties, but Global Fund Program

County alone, and the MOH Pilot program county alone is negatively associated with the social support, when controlling for other variables. People living with HIV/AIDS in MOH Pilot County alone, reported that they have less close friends, are less likely to live with family members and tend to live by themselves or with non-acquaintances, and feel less care and concerns from neighbors. PLWHA in Global Fund County alone feel less care and concerns from neighbors, comparing with people living with no program counties. This is perhaps due to the fact, that because of the awareness of the HIV/AIDS in the program counties, more people know the diseases, and they might be phobia of HIV/AIDS, and try to distance themselves with the infected. Table 10.4 above presents the model estimates.

10.5 Impact of HIV/AIDS on Households and on Family Members

The model estimates shows that people living in both GF and MOH Pilot program counties, in general, reported lower level of impact of HIV/AIDS on families, except for the impact on income level. Self-assessed impacts on daily living, family relations, marital relations, and associations with neighbors are significantly less than non-project counties. People living with HIV/AIDS in the Global Fund program counties also perceived less impact in marital relations and children employment, and People living with HIV/AIDS in the MOH pilot program counties reported less impact on children employment. However, the impact on household incomes are bigger among the Global Fund program counties, perhaps due to the fact that many people are sicker and are less likely to work. In addition, PLWHA in the MOH Pilot program alone counties reported higher level of impact on the associations with relatives and friends, and with neighbors. More explanations are required to understand this result. Social support has significantly reduced the self-assessed impact of HIV/AIDS on household and family members. Tables 10.5.1 and 10.5.2 present the detailed model estimates.

Table 10.5.1 Model Estimates of Impact of HIV/AIDS

Category	Variables	Income	Daily	Family	Marital
		Parameter	Living Parameter	Relations Parameter	Relations Parameter
Infected and Respondents	Age	-.022**	-.001	.008	-.014
	Male of Respondent	-.812	.225	-.354	.110
	Infected	-1.696**	-.369	-.137	-.810
	Male infected	1.705	-.279	.405	—
	Primary School	.300	.403*	.225	-.066
	Middle School	.443	.580**	.240	.135
	Higher School	.173	1.125**	.735	-.381
	Married	.746**	.397	.085	—
	Widowed	1.016**	1.088**	.098	—
	Separated/Divorced	.566	.308	.355	—
	Family Size	-.157**	-.059	-.100	-.341***
	Income per person in 1000 RMB	-.043	.031	-.012	.019
	Expenses per person in 1000 RMB	.025	-.017	-.029	-.083**
	Support from friend	-.213***	-.220***	-.142*	-.304***
	Living closer to families	-.268*	-.373**	-.505***	-.404*
Households	Support from neighbors	.020	-.143*	-.170*	-.086
	Highest educational attainment of the family (HEA): primary school	.777	.737	.281	-.396
	HEA: middle school	1.027	.758	.116	-.588
	HEA: high school	1.310*	1.016	.123	-.194
	Two generations	.454	.349	.010	1.024*
	Three generations	.640	.593	.527	1.515**
	More than 1 persons infected	.885***	.154	-.166	-.965***
	Death of HIV/AIDS	.356	-.466*	.117	1.386***
	Social Assistance Program covered	.275	-.177	.252	-.539
	Cash assistant	.926**	.595	-.010	.483
Program Coverage	In-kind support	-.147	-.110	-.229	-.238
	Medical financial aid	.390	.916***	.516	-.184
	Both GF and MOE Pilot	.659*	-1.205***	-.971**	-.946*
	GF Only	.712*	.027	-.005	-1.029**
N	MOE Pilot Only	.010	-.159	-.393	-.682
		922	915	900	748
-2log likelihood		2462.977	2356.518	1727.462	1423.000
Chi-square		256.071	99.039	82.544	173.779
Cox & Snell R ²		.243	.103	.088	.207
Nagelkerke R ²		.256	.110	.101	.235

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

Table 10.5.2 Model Estimates of Impact of HIV/AIDS (cont.)

Category	Variables	Children Schooling	Children Employment	Associations with Relatives and Friends	Association with Neighbors
		Parameter	Parameter	Parameter	Parameter
Infected and Respondents	Age	-.022	.022	.007	.001
	Male of Respondent	-.080	.714	2.660*	-.553
	Infected	-.709	-2.333**	-.417	-.504
	Male infected	—	—	-2.251	.738
	Primary School	.371	.749	-.199	-.221
	Middle School	.246	.483	-.572**	-.454
	Higher School	-.331	-.137	-.230	-.185
	Married	—	—	-.052	-.074
	Widowed	—	—	-.413	-.280
	Separated/Divorced	—	—	.161	.565
	Family Size	-.047	.092	-.060	-.077
	Income per person in 1000 RMB	-.057	-.040	-.107**	-.040
	Expenses per person in 1000 RMB	-.052	.005	-.018	.010
	Support from friend	-.125	-.859***	-.037	-.193**
	Living closer to families	.021	-.320	-.429***	-.449**
	Support from neighbors	-.148	.399*	-.489***	-.763***
	Highest educational attainment of the family: primary school	-.527	-.474	1.074	1.602
Households	HEA: middle school	-.159	-.169	1.588*	1.731
	HEA: high school	—	—	1.432	2.216*
	Two generations	—	—	.155	.468
	Three generations	—	—	.514	.814
	More than 1 persons infected	.264	.803*	.106	.143
	Death of HIV/AIDS	-.044	-.088	.141	-.139
	Social Assistance Program covered	-.938	-3.249*	-.125	.238
Program Coverage	Cash assistant	2.012**	—	.535	.511
	In-kind support	.478	.564	.581*	-.047
	Medical financial aid	-.040	2.340	-.080	-.146
	Both GF and MOE Pilot	-.941	-1.407	.031	-.769*
	GF Only	.764	-2.651*	.003	-.349
	MOE Pilot Only	.764	-2.751*	1.056**	.830*
N		597	284	840	846
-2log likelihood		1210.811	308.413	2191.456	1773.968
Chi-square		41.103	59.594	147.507	233.570
Cox & Snell R ²		.067	.189	.161	.241
Nagelkerke R ²		.076	.261	.172	.266

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

10.6 Psychological Pressure on People Living with HIV/AIDS

Table 10.6 presents the model estimates on the psychological pressure of the infected. For the perceived pressure from others, there is no difference by type of program coverage. However, for the feeling of helplessness and bad mood, GF in Round 4 counties and MOH Pilot programs have relations. PLWHA in these counties reported higher level of bad mood and helplessness. Social support has a mitigating effect in reducing the psychological pressure, while higher level of impact of the disease increases the psychological pressure. Again, the model estimates do not fit the hypothesis and further analyses are required to better understand the effect of the programs.

Table 10.6 Psychological Pressure on People Living with HIV/AIDS

Category	Variables	Bad Mood	Helplessness	Perceived Pressure from Others
		Parameter	Parameter	Parameter
Infected	Age	-.009	-.016	-.029*
	Male	-.596*	-.353	-.104
	Primary School	-.081	.009	-.197
	Middle School	.209	-.120	.189
	Higher School	-.795	-.154	-.056
	Married	.173	.086	.057
	Widowed	-.205	.224	-1.257*
	Separated/Divorced	-.163	-.353	.096
	Support from friends	-.172	.048	.187
	Living closer to families	-.141	-.067	-.649**
	Support from neighbors	-.186	-.287**	-.155
	Impact on household income	.249**	.098	.047
	Impact on daily living	.468***	.368***	.294**
	Impact on family relations	.217*	.169	.008
	Impact on associations with friends and relatives	.187	.224*	.222*
	Impact on associations with neighbors	.002	.171	.633***
Households	Family Size	.007	-.098	-.233*
	Income per person in 1000 RMB	-.004	-.012	.093*
	Expenses per person in 1000 RMB	-.050	-.013	-.072
	Highest educational attainment of the family: primary school	-.636	-.568	.499
	HEA: middle school	-.599	-.372	.506
	HEA: high school	-.659	-.213	-.095
	Two generations	-.533	-.111	-.244
	Three generations	-.829	-.381	.381
	More than 1 persons infected	-.269	-.029	-.153
	Death of HIV/AIDS	.152	.239	.828**
	Social Assistance Program covered	.629	.576	-.240

Program Coverage	Cash assistant	-.424	.411	1.070*
	In-kind support	-.493	-.455	.186
	Medical financial aid	.585	.266	-.241
	Both GF and MOH Pilot	.217	-.042	-.116
	GF Only	.835*	1.244***	.714
	MOH Pilot Only	1.579**	1.470**	.382
N		396	394	395
-2log likelihood		947.617	1034.513	912.472
Chi-square		131.417	115.226	147.754
DF		33	33	33
p value		.000	.000	.000
Cox & Snell R ²		.282	.254	.312
Nagelkerke R ²		.302	.268	.335

*significant at 0.05level; **significant at 0.01 level; *** significant at 0.001 level.

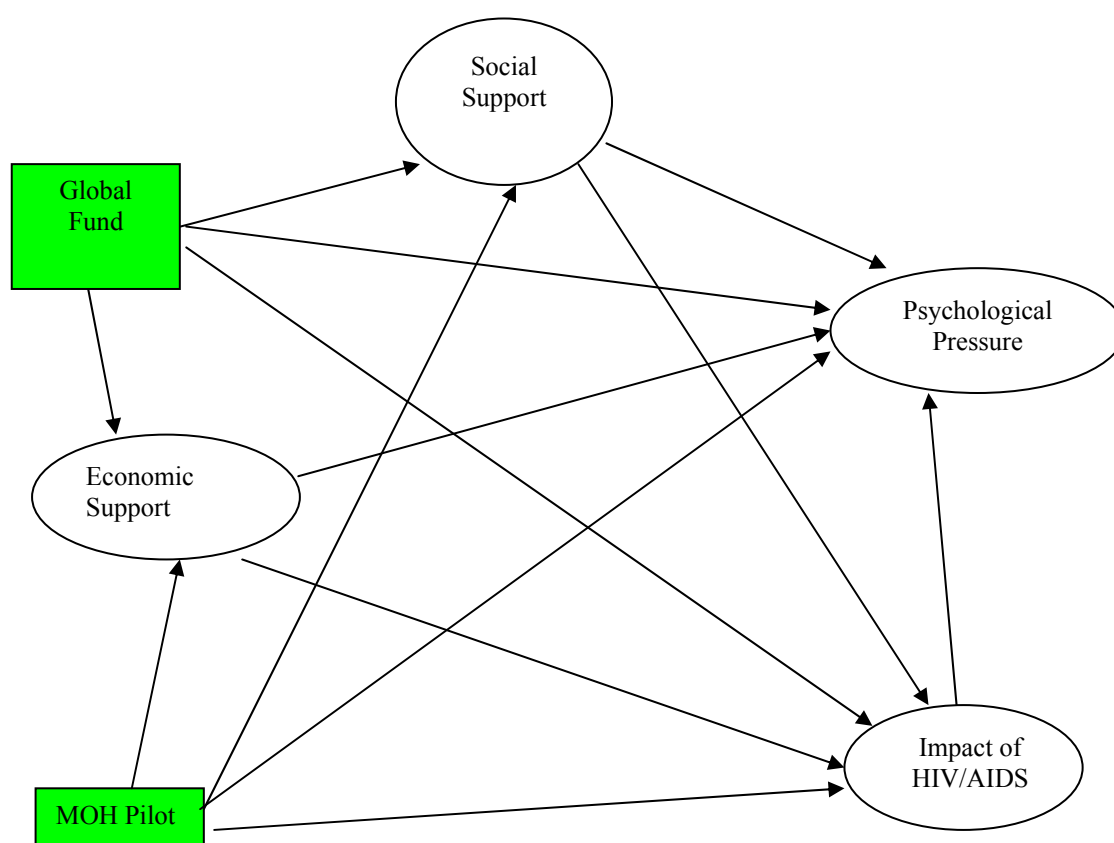
Chapter 11: The Impact of GF and State Programs on Households with

HIV/AIDS Infected: A Structural Equation Model

Xiulan Zhang
Xiaohua Wang

11.1 Framework of the Structural Model

Chart 11.1 illustrates the framework of the structural equation models



The programs (both Global Fund and MOH Pilot) will have direct impacts on the financial support that individuals and families living with HIV/AIDS, and also will have impact on the social and family support levels of the infected received.

The assumptions of direct intervention effects are listed as follow:

- The Global Fund and MOH Pilot programs will increase the level of financial and economic support, measured by cash, in-kind and medical financial assistances.
- The Global Fund and MOH Pilot programs will increase the level of social support, measured by number of friends, living with family members, and cares and concerns from neighbors.
- The Global Fund and MOH Pilot programs will reduce the psychological pressure, measured by bad mood, sense of helplessness and perceived pressures from people surrounding them.
- The Global Fund and MOH Pilot programs will reduce the level of impact of HIV/AIDS, measured by impact on association with friends, and association with neighbors.

The indirect effect of the programs can be observed by the mediating effect of economic and financial support, social support, and family support on the reduction of psychological pressure and impact of HIV/AIDS.

11.2 The Structural Equation Model Estimates

We estimated a structural equation model using AMOS on the psychological pressure and the model parameter below indicates a good fit of the model.

Table 10.7 AMOS Model Fit Parameters

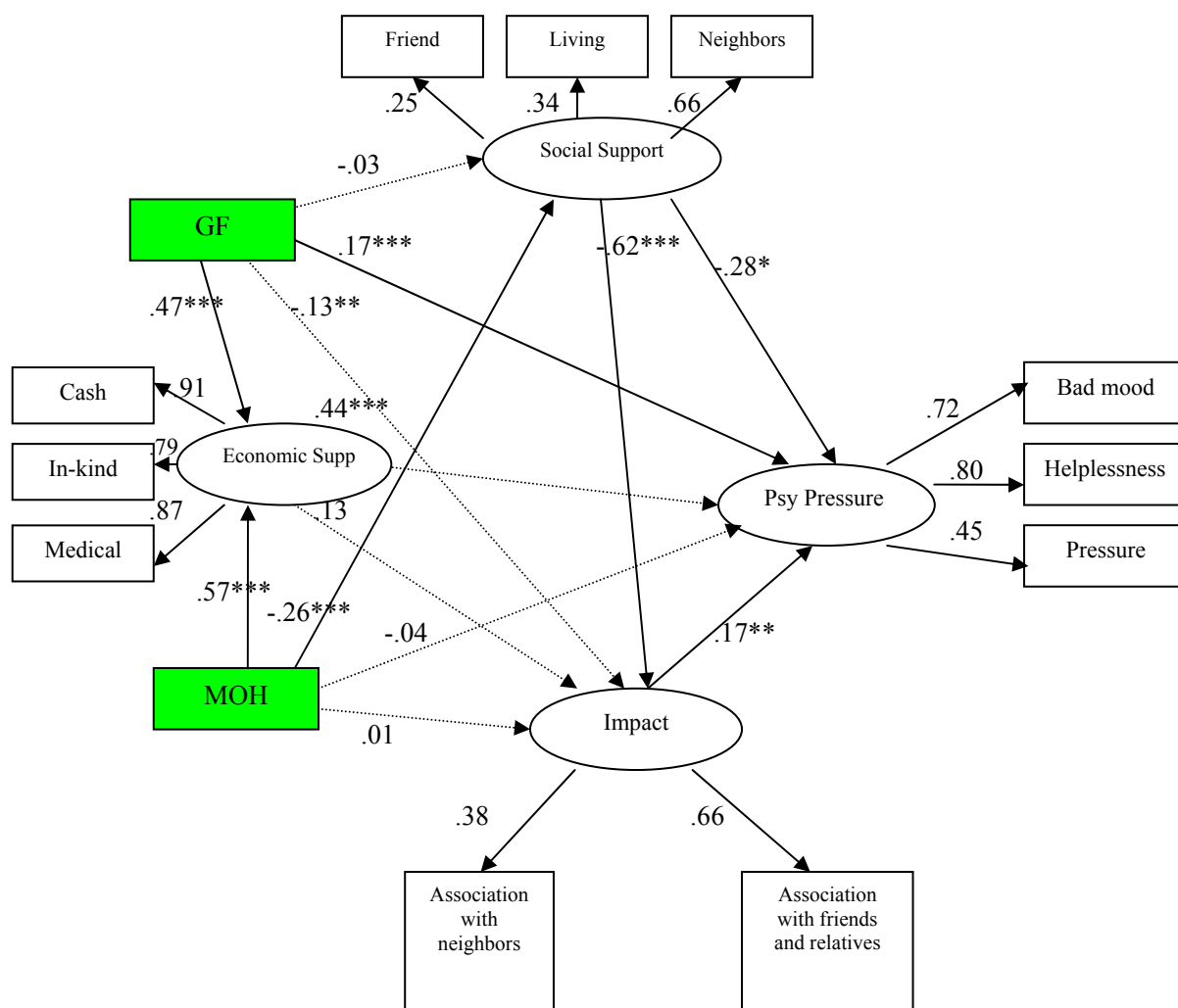
χ^2	df	χ^2/df	NFI	RFI	IFI	TLI	CFI	RMSEA
211.536	51	4.148	.954	.930	.965	.946	.965	.053

Main results:

- The AMOS model result shows that that both Global Fund and MOH Pilot programs increased the economic support of the households living with HIV/AIDS. The economic support significantly increases the level of social support.
- There is no direct effect of Global Fund on the social support; however, the indirect effect of the Global Fund on the social support can be estimated as positive, and significant.
- The direct effect of MOH Pilot program on the social support is negative, however, the indirect effect through the economic support route is positive and total effect of the MOH Pilot program on social support is negligible.
- Higher level of social support reduces the psychological pressure felt by the infected, and also reduces the level of impact of HIV/AIDS on the associations with friends, relatives and neighbors.
- For the impact of HIV/AIDS on the associations with friends, relatives and neighbors, the direct effects of Global Fund and MOH Pilot programs are not significant. There is also no direct effect of MOH Pilot program on psychological pressure. The direct effect of economic support on psychological pressure, as well as on impact on associations with friends, relatives and neighbors is not significant. However, the Global Fund program has a direct positive effect on psychological pressure of the infected.
- Higher level of impact of HIV/AIDS on the associations with friends, relatives and neighbors increases the psychological pressure on the infected.
- The AMOS model estimates show that the economic and social support has strong

mediating effect on people and households living with HIV/AIDS.

We have tried various models to estimate the effect on family support, however, the most striking finding of the structural equation model is that the family support has bear no significant relationships with all program interventions and has also no effect on the impact of the disease and the psychological pressures perceived by the infected. Perhaps due to the general poor conditions of the infected families, the support within families is very limited to generate significant effect on the infected, or perhaps the strong family support across all the counties. It is also due to the fact, that for families coping with HIV/AIDS, the best and most effective approach is to intervene at the individual family levels. However, the current programs have few family support components.



Chapter 12: Conclusions and Recommendations

Xiying Wang
Xiulan Zhang
Yurong Zhang

This project is based on academic research and theoretical interrogation with the purpose of policy advocacy and social change in order to finally build up a harmonious world with comprehensive health care and without stigma and discrimination for PLWHA and prevent and control the widespread illness of HIV/AIDS. Combining both quantitative and qualitative research methods, this project is a preliminary endeavor to catch the demographic characteristics of rural people and household living with HIV/AIDS, and delineate the socio-cultural script of their lives including challenges they face, family internal support and conflict, their social support network, the social and medical assistance they receive etc. This project is a comparative study, not only between four different provinces in central and western China, but between counties without any Global Fund or MOH Pilot program coverage, and counties covered by Global Fund and MOH Pilot respectively and together. This chapter has the following three parts: the first part concludes the key findings of this project, the second part discusses the adversity, the third part makes some recommendations for program design, future studies, and improving existing policies.

12.1 Key Findings

This project points out that the Chinese HIV epidemic has entered a new wave of spread among ordinary population, heterosexual sex becomes the most common route of transmission and feminization of HIV/AIDS becomes an irresistible trend, and most women get infected through marital sex. This project describes how social determinants of poverty, gender inequality, and mobility impact on the spread of the epidemic and the daily lives of PLWHA. From the gender perspective, this project pays special attention to rural women living with HIV/AIDS and illustrates their struggles, difficulties, problems due to the combination of biological vulnerability and a gender-based power structure.

The entanglement of HIV/AIDS with poverty is another important feature of China's HIV epidemic. The strong association between the HIV epidemic and poverty can be mainly illustrated by the following two points: 1) In terms of geographical distribution, China's HIV epidemic is concentrated in poor rural areas; 2) The majority of HIV-infected and AIDS patients are among peasants and floating populations, and their common characteristic is relative poverty. This project further highlights that the feminization of poverty within the household living with HIV/AIDS is a phenomenon ignored by most researchers and studies.

Almost all informants believed that their social network had become very narrow. For material support, 45.9% of PLWHA believe that they have no friends for seeking help, and they depend more on neighbors and relatives instead. For emotional difficulties, they would

like to talk with family members, other HIV infected friend, relatives, and neighbors. Understanding from family members is extremely important for PLWHA: for two third of the PLWHA think that their family relationship have not changed much because their family members offer them powerful support; for those who state that HIV/AIDS has huge impact on family relations, the main reason that they offered is that family members did not understand or accept the situation, and therefore conflict, isolation, separation, even divorce are followed. Among the support and care received by PLWHA, spousal support and care ranked the highest, parents came second, children next, followed finally by siblings and in-laws.

Social assistance for HIV/AIDS affected people has not been created as separate schemes, and rural PLWHA and their families are usually covered by the interconnection of “Five Guarantees”, Dibao, Tekun, MFA, and “Four exemptions and one care.” Shangcai county, Henan Province, has implemented the most complicated and well-developed schemes of social assistance for people and household living with HIV/AIDS. Moreover, Henan province offer social assistance to almost all the infected households, while in other provinces, only a small section of the households and individuals are covered by the benefits.

In Yunnan, the rural private clinics is recruited by the local CDC as the basic unit of health care system of fighting HIV/AIDS, and therefore village doctors have many functions: HIV/AIDS knowledge education, behavioral intervention and surveillance, home visit, physical examination, AVR drug distribution and minor anti-opportunistic infection treatment. In Henan and Anhui, the establishment of AVR clinics replaces the significances and functions of private clinics and village doctors. This project describes the situation and difficulties that three-level network of county-township-village health unit that rural PLWHA use most. Moreover, this project points out the drawbacks, ineffectiveness, and unreliability of the three-level network in combating HIV/AIDS under the guidance of “marketization/privatization” and “decentralization” of China’s health policy.

This project testify key hypotheses by finding that Global Funding projects are indispensable supplement to government funding, especially MOH pilot program, because 1) households in localities with Global Fund support have greater access to health care than in localities without Global Fund support; 2) PLWHA and communities in localities with Global Fund support have more HIV/AIDS-related knowledge and are more willing to eliminate HIV/AIDS-related stigma and discrimination than PLWHA and communities in localities without Global Fund support; 3) Government leaders in localities with Global Fund support are more likely to have positive attitudes towards the social and medical assistance that PLWHA and their families needed; 4) Localities with Global Fund have promoted the coordination mechanism within the local government even if no enormous amount of money invested; 5) Best results on social assistance, medical treatment, and social support are found in localities with both Global Funding project and MOH pilot program.

12.2 Discussions

In the following, we will focus on discussing the problems and obstacles that China faced during the work of preventing and controlling HIV epidemic.

12.2.1 Lack of Systematic Public Education

China need invest a lot in public education regarding HIV/AIDS knowledge, safe sex practice, personal hygiene, and other public health practices that might nip the epidemics in the bud. Right now, the educational work on combating HIV/AIDS are usually carried out in the market of the villages and townships. However, it is still sensitive for most rural Chinese to talk about the sexual issue in the public sphere, therefore distributing knowledge of HIV/AIDS through the platform of community-based market does not function well.

There are many misunderstanding of HIV/AIDS among PLWHA, and sometimes they do not have a clear understanding of the danger of AIDS. HIV infected people are usually told that, “the incubation period of the HIV virus in the human bodies is generally 12 to 13 years.” Some respondents with HIV positive told the researchers that they did not fear since they will get sick in 10 years. In the place that drug abuse is widespread like Yunnan, the villagers have witnessed the hazardousness of intravenous drug use and resist it by nature. Though HIV/AIDS goes hand-in-hand with drug use, somehow the risky of the former is covered up by the later.

12.2.2 Lack of Clear Statistics of PLWHA

The reported figure of PLWHA in China is not accurate. Right now, the reported figure comes from three routes: first, the detection from the health care institutions; second, the surveillance of detoxification centers and methadone maintenance treatment clinics; third, the information collected from all tiers of CDCs. In the detoxification centers, the drug addicts may be tested for many times since they are always in and out. It's common for them to continue their drug use after releasing from the detoxification centers, and when the next time they enters the centers, they would be tested again. Therefore, the figure from the detoxification centers has the chance to be repetitive. In the area with high rate of drug use, many young and middle-aged people died every year, and the villagers usually regarded drug use as the reason of their death since they had the history of drug use. No one knows whether they are infected or not. In fact, AIDS cause more death than the reported. Lacking of clear information of PLWHA, it's extremely difficult to carry out the prevention work with direct targets, not mention the treatment and controlling.

12.2.3 Lack of Government Leadership and Coordination

The interviews with the related government officials indicated that although the coordination committee has been established, and many line departments at local levels are providing some in-kind assistance when needed. Other departments still believe that responsibility for HIV/AIDS belongs to MOH, and the biggest complain from MOH and local health bureau is “why it is only our business since HIV/AIDS is a social issue?”

In practice, MOH has to take the lead and sometimes brings another troubles. For example, while the State Council has issued the social assistance policy to the families with HIV/AIDS and the policy is a mandate of the Ministry of Civil Affairs and its local

branches, however, only the health bureau has the names of the infected, and the Civil Affairs agencies cannot obtain the list of the families with infected members, and they can not deliver the policies to the needy households. In addition, if the Civil Affairs agencies have limited funding, they can use this as an excuse of not delivering the policy at all. A powerful mechanism of multi-department planning and coordination needs to be established in order to increase the governmental efficiency in dealing with HIV/AIDS.

12.2.4 Lack of Sustainable Method of Social Assistance

During the social assistance system for PLWHA, the direct cash assistance composed a huge percentage of total public funding. The direct cash assistance is definitely helpful for poor rural PLWHA to improve their lives, however, this method of social assistance is temporary and unsustainable. It is urgent to establish sustainable social and medical assistance system in order to deal with the widespread epidemic and establish nationwide safety network of public health.

12.2.5 Challenges for Health Provision

Strengthen the healthcare system, especially of three levels network of village-township-counties health units for rural PLWHA, is an urgent mission for coping with the situation that those infected are gradually in urgent need of treatment as HIV has progressed to AIDS. In general, the Township public health centers are the weakest among the three-level health unit for rural PLWHA, for example, 78% HIV testing were done in County CDC, only 2.2% HIV testing were done in Township public health centers. For treatment, over half were done in village clinics (including private clinics and AVR clinics), 19% were done in county hospitals, and 10.14% were done in township public health centers. Improving the existing three levels of healthcare should fill the gap of human resource and technical facilities and establish clear systems of referrals.

According to the national policy of “four exemptions and one care,” PLWHA are supposed to receive free antiretroviral drugs and treatment. As more people get infected, more people need to get ARV therapy, however, the ARV-related examinations and surveillance fee are too expensive to be supported by the public funding. For example, when HIV infected people firstly take the antiretroviral drugs, they need under close attention to: within the first month, they need to have 4 times blood tests, and within the first three months, the tests would accumulate to 5 to 6 times. In the relative poor central and western China, the public funding is never enough and the local CDCs and hospitals lack of enough professional health works to maintain the regular ARV therapies. Therefore in most situations, PLWHA only can get free antiretroviral drugs instead of treatment. Moreover, in many places that no medical assistance on anti-opportunistic infection treatments offered, PLWHA have to bear heavy financial burden of seeing doctors.

12.2.6 Lack of Cooperation within NGOS

There are many NGO involved in combating HIV/AIDS, such as the Ford Foundation,

Doctors without Border/Médecins Sans Frontières (MSF), Save the Children (UK), The Salvation Army, The Australian Red Cross, and The Amity Foundation etc.. They have launched many programs in China, however many of their work are repetitive since lacking of cooperation and communication with each other. For different locations with similar serious high rate infection, some obtains multiple projects, others receives none.

The unsustainability is another main problem when NGOs involved in combating HIV/AIDS because their involvement is usually conducted by project, when the project ends, the funding will be withdrew. More attention should be focused on integrating resources with project implementation.

In order to solve these difficulties and challenges, there are some governmental work should be done. First, Implement a coordinated, multi-sectoral, rights-based, right-reduction policy at all levels of government. The objectives include supports better co-ordination of activities and communication between various departments and levels of governments, as well as relevant GONGOs and NGOs. Community-based service organizations and self-support groups are encouraged to participate.

Second, The issue of HIV/AIDS is not only about controlling one contagious disease, but is related to establish a sustainable and effective public health system to copy with all kinds of epidemics and diseases and protect people's welfare. The government has to put "prevention first" as the priority of Chinese public health system by strengthening all tiers of CDCs and three level health units and nurturing qualified rural doctors. The prevention work should not only focus on the issue of HIV/AIDS, but extending the emphasis to other diseases and health issues including sexually transmitted diseases such as gonorrhea and syphilis, women's reproductive health, and drug abuse etc. Developing New Rural Cooperative Medical System as basis and promote establishment of rural public health safety network by providing universal health services for all the citizens, regardless of where within the country they live. Demand analysis of the drug users living with HIV/AIDS, and create conditions for them to stay within the communities.

Third, Increasing central financing attracting international funding for poor areas. Now funds for HIV/AIDS prevention and control have three types: central government finance (central special fund), local government finance (local fund) and social contributions. For western China, there are no effective mechanisms to guarantee financial resource from local government since the local GDP is quite low. However, the central government should guarantee that the work of preventing and controlling HIV/AIDS wouldn't stop because the local governments do not have money.

12.3 Recommendations

12.3.1 Recommendations on Program Design

12.3.1.1 Program on Public Education

The program is designed to create serials of courses and activities to provide the general public the information about HIV prevention, transmission routes, and promote safe sex.

The purpose of the program is to promote awareness, acceptance, commitment and

involvement in HIV/AIDS related issues among the general public through mass media outlets, including television, radio, newspaper and the Internet.

12.3.1.2 Program on Gender Mainstreaming the Existing Policies

The program is designed to improve the gender sensitivity of the existing policies by training policy makers of relevant departments at all levels of government in order to improve their gender awareness during their daily work and policy-making.

12.3.1.3 Women Empowerment Program

The program is designed to raised consciousness among HIV/AIDS affected women by educating them with HIV/AIDS knowledge, reproduction health, and mother-children transmission. Empowering them to be active participants of their lives, not passive objects of social assistance. Teaching them to protect their right, learn to negotiate using condom in order to decrease the infection through sex between couples.

12.3.1.4 Counseling Training Program for Psychologists and Social Workers

The traditional VTC service, voluntary testing is the emphasis and the counseling service is more like a supplement, which mainly focus offering HIV/AIDS related knowledge. However, the counseling service seldom touches on PLWHA's psychological suffering and pains, namely fear, anxiety, depression, stress, loneliness, despair etc. The program is designed to train psychologists/social workers with the ability to offer psychological help to PLWHA and their family members. After training, the psychologists and social workers would be able to deliver: 1) PLWHA's support workshop, emphasizes on supporting each other to copy with and live with the disease optimistically; 2) bereavement workshop, exploring the meaning of life and death and obtaining peace in heart to face family member's death because of AIDS; 3) workshop on training peer educators among high-risk groups, such as intravenous drug users, homosexual men, and sex workers, since the peer counseling is more acceptable method for these sensitive groups.

12.3.1.5 Educational Program within High-risk Groups

High-risk groups include migrant workers, sex workers, intravenous drug users, homosexual men, and youth, and we have to design programs targeting different groups.

12.3.1.5.1: For Migrant Workers

In general, migrant workers are the group that poorly informed about the threat of HIV/AIDS. Education and HIV/AIDS related knowledge should be offered at factories, construction sites, and service industries that employ migrant workers in order to preventing them engage in high-risk activities.

12.3.1.5.2: For Sex Workers

Encourage peer education among sex worker on condom usage and negotiation, self-protection. Promote 100% Condom Use Program and distribute free condoms. Encourage and support sex workers to seek testing. Explain the link between STD infection and HIV transmission, and encourage them seek STD treatment in qualified

STD clinics rather than by untrained, unqualified individuals.

12.3.1.5.3: For Drug User

Safer method for injecting illicit drugs is taught. Needle and syringes exchange program is promoted. Encourage them to quit drug by using the service of methadone maintenance treatment and detoxification clinics.

12.3.1.5.4: For Youth

Implementing sex and health education programs in schools. Training teachers, sex educators, social workers, counselors, and peer educators to learn using “straight talk” to provide information about safe sex before students become sexually active. Providing youth with the information and resources that they need to have in order not to be involved in dangerous activities such as drug use, and commercial sex.

12.3.1.6 Program on Self-support Group Management

During the fieldwork, we notice that many PLWHA think that self-support group creates an easier atmosphere and makes them feel more helpful and comfortable. Therefore, Self-support groups are more easily accepted and can gain the trust and influence from PLWHA. However, we also note that the some self-support groups exist huge management problems. For example, one leader involved in drug trafficking, the other leader use the sponsored money for other purposes rather than HIV/AIDS related activities. On one hand, the local government should encourage the establishment of self-support groups among PLWHA since it is significant for them at the same time offering surveillance and guidance; on the other hand, management program needs to be design to train the leaders with the basic skills of management support, technical assistance, fundraising.

12.3.1.7. Program on Community Development

In areas with high rates of infection, the program is design to promote the community development by doing the following multiple works: poverty relief, support of education, nutrition and health care, eliminating stigma and discrimination of PLWHA, and living skill training.

12.3.2 Recommendations on Future Studies

This study also shows many directions and potentials for further studies which could not accomplish here because the limit of time, resource and budget. We would like to classify suggested further studies in the following categories:

12.3.2.1 Following up Issues among Rural PLWHA

This project adopts convenient sampling in four selected provinces, it is ideal to conduct a longitudinal PLWHA’s household survey and interviews by using national wide random

sampling every three or five years. Therefore the project can trace the change of the epidemic, the development of PLWHA's lives, and offer more space for more in-depth analyses. It is also useful to set up a complete data set as a research platform not only for researchers within the project group, but for other researchers national and international as well.

This project focuses on rural HIV/AIDS group and the main routes of transmissions are injection drug use in Yunnan and Guizhou and commercial blood/plasma donation in Henan and Anhui. Therefore the further studies exploring HIV/AIDS issue need start with understanding the local social contexts: the history and the current situation of the spread of drug use in Yunnan and illegal blood transaction in Hennan and Anhui.

This project finds that China enters a new wave of HIV/AIDS transmission, and heterosexual intercourse between intimate couples is becoming a pervasive way of HIV/AIDS infection. Under this condition, further studies on the sexuality of infected couples with the intention to determine avenues for improving safer sex and reducing unprotected sex are highly recommended.

During the fieldwork, we noticed that all children under nine years old who were living with HIV/AIDS were infected through mother-child transmission. In contrast, medical developments have been found to be effective in preventing such transmission. The emergence of HIV/AIDS in children can be attributed to: 1) infected pregnant women not receiving the necessary medical treatment; and 2) the lack of knowledge related to HIV/AIDS and reproductive health among infected women. Therefore, further studies on preventing mother-child transmission has to be done to promote safer sex and condom usage and protect women's sexual rights and reproductive health.

The HIV/AIDS-related stigma prevails in PLWHA and their family members' lives, which makes them feel isolated and neglected and brings them so many troubles and difficulties. Based on the measurement and description of stigma and discrimination that PLWHA reported in this study, the further studies need to explore how the eliminate stigma and discrimination and create a harmonious psychological living environment for them.

12.3.2.2 Following up Studies for Different Populations

This project is mainly focused on rural adult PLWHA, and somehow neglecting AIDS orphan and infected children. The further studies need to be done to probe how these children cope with their parents' death and their own illness, how they perceive their present and future and develop all kinds of strategies to survive.

During the fieldwork, we interviewed one woman with HIV positive adopted a girl with HIV positive and local government subsidized the woman for her work. It seems that both the woman and the little girl get along with each other during the short time we spent with them. During the household survey, we find that 47 of total 1120 children under the age of 17 are under foster care. Family foster care is usually regarded as a best way for orphans, however few studies to trace these foster families to further explore and observe the group of children's adaptation and relationships in the new families. This issue definitely needs to be further studied.

This project is focused on the rural area, and the next step of the project should extend from the rural to the city, and pay attention to other high risky groups including migrant workers, homosexual men, and sex workers.

During the household survey, we noticed that many HIV infected people migrated to the cities to be working laborers. Sometimes their family members cannot explain clearly where they are, what do they do for a living, and even do not know whether they are still alive or not. For these floating populations scattered in the “army” of working laborers, it’s extremely difficult to identify them and offer them necessary help and knowledge since they have strong mobility and flexibility. Existing migrant studies focus more on their work from the perspective of exploitation of global capital, while seldom touch on their private lives, love, dating, and sexuality. In order to prevent the HIV epidemic spreading among the group, it is urgent to conduct a preliminary study on migrant workers to understand their attitude, perception, and behavior of the daily activities and sexual lives. This study will help related governing bodies, policy-makers, social workers, researchers to capture the living situation of the group and further design effective policies and strategies to launch programs of combating HIV/AIDS.

12.3.2.3 Following up Studies on Social Policy

Since 2003, the central government has implemented the social assistance policy for PLWHA termed as “Four exemptions and one care” (si mian yi guan huai). Specifically, “Four exemptions” means that HIV/AIDS infected people can receive the following services in the locally designated hospitals or clinics free of charge: taking medicine and receiving treatment; testing and consulting; childbearing counseling, birth-giving service, and mother-to-child transmission prevention; and psychological rehabilitation and free compulsory education for orphans. And “one care” is that government provides social assistance for AIDS infected patients and their family members if they have economic difficulties, and give the able-bodied patients support to encourage them to be engaged in income-generating activities where this is deemed possible. The further studies need to assess the outcomes of the policy in different provinces from the following perspectives: 1) for controlling the HIV epidemic; 2) for the benefits of infected people and their families; 3) for evaluating the existing institutions that performing the policy; 4) for further improvement.

In the project, we find that there are so many resources put their effort to help the HIV/AIDS groups and communities, including different levels of government from the central to the local, different governing bodies such as Ministry of Civil Service, Ministry of Health, women federation, etc; all kinds of NGOs, the Global Fund, Save the children, etc; and some self-help self-support groups organized by PLWHA. Sometimes, their work are overlap, in some worse situations, even counteract one another. Further studies need to be done to construct a coordination model between different governing bodies, NGOs, and self-support groups.

Through describing PLWHA’ everyday lives, this project has pointed out gender inequality is one of the main reasons shaping the HIV/AIDS epidemic and made patriarchal values transparent. Therefore, it is urgent for the further studies to explore gender mainstreaming the existing social policy on HIV/AIDS.

In the project, we find that many informants are minorities, including Dai nationality, Yi nationality, and Jingpo nationality. Therefore the further studies need to pay attention to the intersection between issue of ethnicity and HIV/AIDS and propose policy with ethnicity sensitive.

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Appendix: Household Survey Questionnaire

Questionnaire Number:

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Rural Social Assistance Interview questionnaire

We are conducting a survey on social assistance and social service. Every family wants a better life and also wants to make contributions to the society. However, each family may face various problems and needs many kinds of assistance and support. This survey is to ask your opinions and understand your needs, needs information and knowledge basis for making related future policies. The information of this survey is confidential.

Thanks for your support and cooperation!

Place of Interview: _____ **Province** _____ **City** _____ **County** _____

_____ **Town/Township** _____ **Village** _____

Name of the respondent: _____ **Name of the interviewer:** _____

Duration of Interview: _____ **Minutes**

Interview Record

*Department of Social Assistance, Ministry of Civil Affairs
Institute of Social Development and Public Policy, Beijing Normal University
November, 2006*

H-1. The Respondent of this questionnaire is: [1] Hh head [2] Spouse of the hh head [3] Other Members of the hh [4] Other ☐

H-2. Which type of beneficiary of the following is your hh?

[1] Five Guarantees hh [2] Minimum Living Guarantee hh [3] Tekun hh [4] Non-poor hh → **A** ☐

H-3. The Minimum Living Guarantee

H-3a. In which year your hh was approved of the Minimum Living Guarantee?	H-3b. Has your hh ever received Minimum Living Guarantee benefits in 2006? 1 Received 2 Not received → H-3e	H-3c. How much is the approved “Minimum Living Guarantee monthly” subsidy for your hh? (Yuan)	H-3d. How much is the total subsidy that your hh has actually received in 2006? (Yuan)	H-3e. Has your hh receive any benefit in kind in 2006? 1 Yes 2 No → A	H-3f. Benefits in kind received in 2006, → A	
					Benefit category	If received, fill in blank with actual quantity; If not received, fill in blank with “0”
					H-3f1. Food	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-3f2. Edible oil and other	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-3f3. Clothes	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> piece
					H-3f4. Beddings	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> set
_____ year		_____ Yuan	_____ Yuan		H-3f5. Fuel (e.g. firewood and carbon etc).	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-3f6. Other (specify)	

H-4.The Tekun Household

H-4a. In which year your hh was approved of The Tekun?	H-4b. Has your hh ever received Tekun benefits in 2006? 1 Received 2 Not received → H-4e	H-4c. What is the approved monthly benefit rate for your hh? (Yuan)	H-4d. What is the Tekun benefit amount your hh has actually received in 2006? (Yuan)	H-4e. Has your hh ever received benefit in kind in 2006? 1 Yes 2 No → A	H-4f. Benefits in kind received in 2006, → A	
					Benefit category	If received, fill in blank with actual quantity; If not received, fill blank with “0”
					H-4f1. Food	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-4f2. Edible oil and other	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-4f3. Clothes	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> piece
					H-4f4. Beddings	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> set
_____ Year		_____ Yuan	_____ Yuan	°	H-4f5. Fuel (e.g. firewood and carbon etc).	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-4f6. Other(specify)	

H-5.The Rural Five Guarantees

H-5a. In which year your hh was approved of The Rural Five Guarantees?	H-5b. Has your hh ever received the Rural Five Guarantees benefits in 2006? 1 Received 2 Not received → H-5e	H-5c. What is the approved monthly benefit rate for your hh? (Yuan)	H-5d. What is the benefits your hh received in 2006?	H-5e. Has your hh ever received benefits in kind in 2006? 1 Yes 2 No → A	H-5f. Benefits in kind received in 2006, → A	
					Benefit category	If received, fill in blank with actual quantity; If not received, fill blank with “0”
					H-5f1. Food	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-5f2. Edible oil	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-5f3. Clothes	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> piece
					H-5f4. Beddings	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> set
_____ Year		_____ Yuan	_____ Yuan		H-5f5. Fuel (e.g. firewood and carbon etc).	<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/> kilogram
					H-5f6. Other(specify)	

A. Basic Household Information

A. Code of hh member	A2. Name of hh member	A3. Gender: 1 Male 2 Female	A4. Age	A5. Relationship to the hh head (use code box) >> next person	A6. Highest education attainment (use code box)	A7. Marital status (20and above) 1 Married 2 Spouse died → A10 3 Divorced → A11 4 Never married → A11	A8. Is spouse now living in the hh? No , fill in blank with “0” Yes , fill in blank with spouse’s code → A11	A9. Reasons for not living in this hh 1 Working in other places → A11 2 Divorced → A11 3 Died 4 Other → A11	A10. Cause of spouse’s death: 1 Died of AIDS 2 Other	A11. Is father living in the hh? No , fill in blank with “0” Yes , fill in blank with father’s code → A14	A12. Reasons for not living in this hh? 1 Working in other places → A14 2 Divorced → A14 3 Died 4 Other → A14	A13. Cause of father’s death: 1 Died of AIDS 2 Other	A14. Is mother now living in the hh? No , fill in blank with “0” Yes , fill in blank with mother’s code >> next one	A15. Reasons for not living in this hh 1 Working in other places >>next one 2 Divorced >> next one 3 Died 4 Other >> next one	A16. Cause of mother’s death: 1 Died of AIDS 2 Other
01															
02															
03															
04															
05															
06															
07															
08															

Code box for Question A5 (relationship to hh)

1 Hh head	2 Spouse	3 Child	4 Parent	5 Parent-in-law	6 Grand parent
7 Brother/sister	8 Grand child	9 Daughter/son-in-law	10 Other relative	11 Not-relative	

Code box for Question A6 (Highest education attainment)

1 Primary school unfinished	2 Finished primary school	3 Junior high school	4 Senior high school	5 Occupational technical/technical secondary school	6 Junior college	7 Above undergraduate
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A17. Is there any eldly or child being adopted in this hh? [1] Yes [2] No → B ☐

A18. Fill in the blank with the corresponding hh members' code	A18a. Reasons of being adopted? 1 Parent or child suffering from AIDS 2 Parent or child died of AIDS 3 Spouse suffering AIDS 4 Spouse died of AIDS 5 Other	A18b. Have your hh received any kind of reward for taking care of him/her? 1 Yes 2 No → next person	A18c. What kind of reward, the amount and how was it given? Who gave the reward?
A18.1			
A18.2			
A18.3			

B. Information of other children who died or lives outside of hh

B1. Does the HH have children who moved out, set up their own families or died and therefore are now not living in this hh?

[1] Yes [2] No → C ☐

B2. Child's code	B3. Name (List the names by age in descending order)	B4. Gender 1 Male 2 Female	B5. Age	B6. Reasons for not living in this hh: 1 Marriage 2 Being adopted → B8 3 Died → B10 4 Other	B7. Current residency 1 This village 2 This township 3 This county 4 This province 5 Other province >> next person	B8. Reasons for being adopted 1 Parents suffering from AIDS 2 Other	B9. Places of foster home 1 Relatives 2 Friends 3 Neighbor 4 Government 5 NGO 6 Other >> next person	B10. Cause of death 1 Suffering from AIDS 2 Other
B01								
B02								
B03								
B04								
B05								

C. Information of AIDS patient, HIV carrier in the hh (Ask and find out who is AIDS patient, HIV+ carrier, fill in the hh code)

C1. Family member code	C2. Current status: 1 HIV+ 2 AIDS >> next person	C3. Date of HIV test (as HIV/AIDS)		C4. Where was the HIV test given: 1 Township hospital 2 County hospital 3 County women and children care center 4 County CDC 5 City hospital 6 City women and child care center 7 City CDC 8 Other	C5. Which organization or department organized this HIV check (see code box for C5)	C6. Is this HIV check free? 1 free 2 At one's own expenses	C7. Before you were diagnosed HIV positive, was there any other family member already diagnosed HIV positive? 1 Yes 2 No → C9 3 Yes, but already died of AIDS → D	C8. Code of family member who was diagnosed HIV positive	C9. Have you received any treatment after being diagnosed HIV positive? 1 Yes → D1 2 No	C10. Reasons for not receiving treatment: 1 Thinks treatment no use 2 Don't know where to get treatment 3 Financial difficulty 4 Afraid of discrimination 5 Physical inconvenience 6 Lives too far away 7 Inconvenient transportation 8 Other (specify) >> Next person → E1
		Year	Month							

Code box for C5				
1 Civil affairs department	2 Health department	3 Other government department	4 Social groups	5 Local civil society organizations
6 Non-local NGO	7 The global fund	8 Other	9 Don't know	

D. Basic treatment information of AIDS patient and HIV carrier

The first AIDS patient or HIV carrier in the hh

D1h1. How many times have you received treatments?

D1h2. Place of receiving therapy of antiretroviral (see code box for D1c)

D1. Hh Code of the AIDS patient or HIV carrier	D1a. Sequence number of treatment	D1b. Date of treatments		D1c. Place of treatment (see code box for D1c)	D1d. How were you treated? (see code box for D1d)	D1e. Free or paid 1 Free → D1g 2 Paid service 3 Partially paid	D1f. Amount and source of the payment (Yuan)					D1g. Amount and source of free treatment	
		Year	Month				D1f1. Personal savings	D1f2. Financial assistance from relatives	D1f3. Debt and loan	D1f4. Selling durables	D1f5. Other	D1g1. Amount	D1g2. Source (see code box for D4g)
	First												
	Second												
	Third												
	Fourth												
	Fifth												
	Sixth												
	Seventh												
	Eighth												

Code box for D1c	[1] Village clinic	[2] Township hospital	[3] Township birth control department	[4] County level hospital
	[5] County birth control department	[6] County women and children care center		[7] County CDC
	[8] City hospital	[9] City birth control department	[10] City women and children care center	[11] City CDC
Code box for D1d	[1] Antiretroviral treatment	[2] HIV antibody preliminary test	[3] HIV consultation for pregnant woman	[4] HIV guidance for childbirth
	[5] Childbirth service	[6] Prevention of mother-to-child transmission		[7] Healing psychotherapy service
	[8] Treatment of opportunistic infection	[9] Other (specify)		
Code box for D1g2	[1] Civil affairs department	[2] Health department	[3] Other government department	[4] Social group
	[5] Local civil society organization	[6] Non-local civil society organization	[7] The Global Fund	[8] Other
				[9] Don't know

The second AIDS patient or HIV carrier in the hh

D2h1. How many times have you received treatments?	D2h2. Place of receiving therapy of antiretroviral (see code box for D2c)

D2. Hh Code of the AIDS patient or HIV carrier	D2a. Sequence number of treatment	D2b. Date of treatments		D2c. Place of treatment (see code box for D2c)	D2d. How were you treated? (see code box for D2d)	D2e. Free or paid 1 Free → D2g 2 Paid service 3 Partially paid	D2f. Amount and source of the payment (Yuan)					D2g. Amount and source of free treatment	
		Year	Month				D2f1. Personal savings	D2f2. Financial assistance from relatives	D2f3. Debt and loan	D2f4. Selling durables	D2f5. Other	D2g1. Amount	D2g2. Source (see code box for D4g)
	First												
	Second												
	Third												
	Fourth												
	Fifth												
	Sixth												
	Seventh												
	Eighth												

Code box for D2c	[1] Village clinic	[2] Township hospital	[3] Township birth control department	[4] County level hospital
	[5] County birth control department	[6] County women and children care center		[7] County CDC
	[8] City hospital	[9] City birth control department	[10] City women and children care center	[11] City CDC
Code box for D2d	[1] Antiretroviral treatment	[2] HIV antibody preliminary test	[3] HIV consultation for pregnant woman	[4] HIV guidance for childbirth
	[5] Childbirth service	[6] Prevention of mother-to-child transmission		[7] Healing psychotherapy service
	[8] Treatment of opportunistic infection	[9] Other (specify)		
Code box for D2g2	[1] Civil affairs department	[2] Health department	[3] Other government department	[4] Social group
	[5] Local civil society organization	[6] Non-local civil society organization	[7] The Global Fund [8] Other	[9] Don't know

The third AIDS patient or HIV carrier in the hh

D3h1. How many times have you received treatments?	D3h2. Place of receiving therapy of antiretroviral (see code box for D3c)

D3. Hh Code of the AIDS patient or HIV carrier	D3a. Sequence number of treatment	D3b. Date of treatments		D3c. Place of treatment (see code box for D3c)	D3d. How were you treated? (see code box for D3d)	D3e. Free or paid 1 Free → D3g 2 Paid service 3 Partially paid	D3f. Amount and source of the payment (Yuan)					D3g. Amount and source of free treatment	
		Year	Month				D3f1. Personal savings	D3f2. Financial assistance from relatives	D3f3 Debt and loan	D3f4 Selling durables	D3f5. Other	D3g1. Amount	D3g2. Source (see code box for D4g)
	First												
	Second												
	Third												
	Fourth												
	Fifth												
	Sixth												
	Seventh												
	Eighth												

Code box for D3c	[1] Village clinic	[2] Township hospital	[3] Township birth control department	[4] County level hospital
	[5] County birth control department	[6] County women and children care center		[7] County CDC
	[8] City hospital	[9] City birth control department	[10] City women and children care center	[11] City CDC
Code box for D3d	[1] Antiretroviral treatment	[2] HIV antibody preliminary test	[3] HIV consultation for pregnant woman	[4] HIV guidance for childbirth
	[5] Childbirth service	[6] Prevention of mother-to-child transmission		[7] Healing psychotherapy service
	[8] Treatment of opportunistic infection	[9] Other (specify)		
Code box for D3g2	[1] Civil affairs department	[2] Health department	[3] Other government department	[4] Social group
	[5] Local civil society organization	[6] Non-local civil society organization	[7] The Global Fund [8] Other	[9] Don't know

The fourth AIDS patient or HIV carrier in the hh

D4h1. How many times have you received treatments?	D4h2. Place of receiving therapy of antiretroviral (see code box for D4c)

D4. Hh Code of the AIDS patient or HIV carrier	D4a. Sequence number of treatment	D4b. Date of treatments		D4c. Place of treatment (see code box for D4c)	D4d. How were you treated? (see code box for D4d)	D4e. Free or paid 1 Free → D4g 2 Paid service 3 Partially paid	D4f. Amount and source of the payment (Yuan)					D4g. Amount and source of free treatment	
		Year	Month				D4f1. Personal savings	D4f2. Financial assistance from relatives	D4f3. Debt and loan	D4f4. Selling durables	D4f5. Other	D4g1. Amount	D4g2. Source (see code box for D4g)
	First												
	Second												
	Third												
	Fourth												
	Fifth												
	Sixth												
	Seventh												
	Eighth												

Code box for D4c	[1] Village clinic	[2] Township hospital	[3] Township birth control department	[4] County level hospital
	[5] County birth control department	[6] County women and children care center		[7] County CDC
	[8] City hospital	[9] City birth control department	[10] City women and children care center	[11] City CDC
Code box for D4d	[1] Antiretroviral treatment	[2] HIV antibody preliminary test	[3] HIV consultation for pregnant woman	[4] HIV guidance for childbirth
	[5] Childbirth service	[6] Prevention of mother-to-child transmission		[7] Healing psychotherapy service
	[8] Treatment of opportunistic infection	[9] Other (specify)		
Code box for D4g2	[1] Civil affairs department	[2] Health department	[3] Other government department	[4] Social group
	[5] Local civil society organization	[6] Non-local civil society organization	[7] The Global Fund	[8] Other
				[9] Don't know

E. Social and economic profiles of AIDS patient or HIV carrier in the hh

E1. Hh Code of the AIDS patient or HIV carrier	E2. Was the person working before HIV infection? 1 Working 2 Not working → E5	E3. The type of work? <i>(see Code box for E3)</i>	E4. Where was the workplace located? 1 This village 2 This township 3 This county 4 This province 5 Other province	E5. Reasons for not working before diagnosed with AIDS/HIV+ 1 Student 2 Preschool child 3 Old and weak 4 Disabled or illness 5 Taking care of family members 6 Other (specify)	E6. Is the person working now? 1 Working 2 Not working → E9	E7. What kind of work is it? <i>(see Code box for E7)</i>	E8. Where is the workplace now? 1 This village 2 This township 3 This county 4 This province 5 Other province → E11	E9. Reasons for not working now 1 Study in school 2 Preschool child → E11 3 Old and weak → E11 4 Disabled or illness → E11 5 Suffering from AIDS → E11 6 Family member needs care → E11 7 Other (specify) → E11	E10. Currently, is the person still study in school? 1 In school now 2 Dropped out of school because of AIDS 3 Dropped out because of financial difficulty 4 Dropped out because of other reasons	E11. Can he (she) take care of himself? 1 Cannot 2 Partially can 3 Fully can	E12. Is there anybody giving care? 1 Yes 2 No	E13. the primary caregiver's code (fill in the blank with family member's code)	E14. What about having future treatment? 1 Yes → F 2 No 3 It depends → F	E15. Reasons for not willing to have future treatment 1 Believe that there is no cure 2 Don't know where to get the treatment 3 Financial difficulty 4 Afraid of discrimination 5 Physical inconvenience 6 Live too far away from hospital 7 Inconvenient transportation 8 Other (specify)

Code box for E3 and E7

1 Farmer	4 Technical work (nurse, cook, technician)	7 Office clerk	10 Private business owner	13 Housekeeping
2 Industrial worker (including township workers)	5 Party/government official	8 Salesperson	11 Individual business owner	14 Other
3 Professionals (teacher, lawyer, doctor)	6 Enterprise, public service unit manager/administrator	9 Worker in service industry	12 Irregular worker	

F.

Social and economic profiles of other family members in the hh (similar to form A, -fill in the name and code of non-HIV/AIDS hh member)

F1. Code of hh member	F2. Hh member's Name	F3. Currently working or not 1 working 2 not working → F6	F4. The type of work (see code box for F4)	F5. Where is the work place 1 This village 2 This township 3 This county 4 This province 5 Other province	F6. Was the hh member working or not, before other family member had been diagnosed with HIV positive or AIDS 1 working 2 not working → F9	F7. The type of previous work (see code box for F7)	F8. Where was the previous working place? 1 This village 2 This township 3 This county 4 This province >> Next person	F9. Reasons for not working before family member was diagnosed with HIV/AIDS 1 Study in school 2 Preschool child → E11 3 Old and weak → E11 4 Disabled or illness→E11 5 Suffering from AIDS→E11 6 Family member needed care → E11 7 Other (specify) → E11	F10. What kind of school were you attending before? 1 Elementary school 2 Junior high school 3 Senior high school 4 Occupational, technical school and secondary school 5 Junior college 6 School of undergraduate or above → F12	F11. Reason for not working now 1 Study in school 2 Preschool >> next person 3 Old and weak >> next person 4 disabled/illness >> next person 5 Family member needs care >> next person 6 Family member with HIV/AIDS and needs care >> next person 7 Other (specify) >> next person	F12. Still in school now? 1 In school now 2 Dropped out because of financial difficulty 3 Dropped out because of the fear of discrimination 4 Dropped out because of other reasons

Code box for F3 and F7

1 Farmer	4 Technical work (nurse, cook, technician)	7 Office clerk	10 Private business owner	13 Housekeeping
2 Industrial worker (including township workers)	5 Party/government official	8 Salesperson	11 Individual business owner	14 Other
3 Professionals (teacher, lawyer, doctor)	6 Enterprise, public service unit manager/administrator	9 Worker in service industry	12 Irregular worker	

G. Hh's income and expenditure in 2006:

Serial number	Income source	Amount (Yuan)	Serial number	Expenditure item	Amount (Yuan)
G 101	Food (equivalent in cash)		G 119	Food (rice, flour, other grains,-equivalent in cash)	
G 102	Fruit and vegetable (equivalent in cash)		G 120	Vegetables, potato, sweet potato etc.	
G 103	Livestock and fowl (equivalent in cash)		G 121	Meat, egg and milk etc.	
G 104	Oil plants, cotton and hemp (equivalent in cash)		G 122	Fruits, cigarettes and tea	
G 105	Other agricultural income		G 123	Clothing	
G 106	Profits from family business and individual business		G 124	Daily life expenses	
G 107	Wages (work in local or other places outside of hometown)		G 125	Purchasing durables	
G 108	Medical assistance (including deduction and reimbursement)		G 126	Cost of Enterprise operating(including stuff, salary and electricity)	
G 109	Free service or reimbursement of Rural Cooperative Medical Scheme		G 127	Cost of agricultural production(including water and electricity fee and rent of equipment)	
G 110	Educational assistance (including deduction and cash subsidy)		G 128	Education for children	
G 111	Other social assistance benefits		G 129	Health care expenses	
G 112	Borrow money from relatives or friends.		G 130	Estovers	
G 113	Borrow loan from the bank		G 131	Transportation fare	
G 114	Financial assistance from relative and children (including gifts and cash)		G 132	Telephone charges (phone, Internet, cable TV)	

G 115	Inheritance		G 133	Entertainment	
G 116	Deposit interest from the bank		G 134	Gifts (wedding, funerals, holiday, party etc.)	
G 117	Other (1) (specify: _____)		G 135	Electricity, water and fuel charges	
G 118	Other (2) (specify: _____)		G 136	House and equipment maintenance service charge	
			G 137	Other (1) (specify: _____)	
			G 138	Other (2) (specify: _____)	

H. Besides benefits from Tekun, Minimum Living Guarantee and Five Guarantees system, have your hh received other social benefit since family member(s) had been diagnosed with HIV/AIDS? 1 Yes 2 No → I

H1. Times of receiving benefits	H2. Benefit receiving date		H3. Benefit description (see code box for H3)	H4. Amount of benefits received, such as cash, reimbursement of medical service charge and in kind	H5. Benefit provider (see code box for H5)
	Year	Month			
First				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	Code box for H3 1 Cash (Yuan) 2 Food (kilogram) 3 Edible oil (kilogram) 4 Clothes (piece) 5 Bedding (set) 6 Fuel such as firewood, coal and carbon etc. (kilogram) 7 Medical Assistance 8 "Four Frees and One Care" 9 Other (specify: _____)
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
Second				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
Third				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
Forth				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	
				<input type="text"/> <input type="text"/> <input type="text"/> <input type="text"/>	

Code box for H5
1 Civil affairs department

			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		2 Health department 3 Other government agencies 4 Social groups 5 City/county local civil society organization 6 Non-local civil society organization 7 Party or government agency; enterprise or public service unit 8 The Global Fund 9 Other 10 Don't know
Fifth			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Sixth			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Seventh			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Eighth			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Ninth			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Tenth			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
Eleventh			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		
			<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>		

Twelfth			□□□□		
			□□□□		
			□□□□		

I. Impact of AIDS members, HIV positive members on hh:

[1] None [2] A little

[3] Medium

[4] A lot

[5] Huge

[6] NA

Impact aspects	Impact level	Description	What measures have your hh taken to deal with the impact?
11. Hh income	<input type="checkbox"/>		
12. Hh daily life	<input type="checkbox"/>		
13. Family relationship	<input type="checkbox"/>		
14. Marriage	<input type="checkbox"/>		
15. Descendant's schooling	<input type="checkbox"/>		
16. Descendant's employment	<input type="checkbox"/>		
17. Social communications with relatives and friends	<input type="checkbox"/>		
18. Social communication with villagers	<input type="checkbox"/>		
19. Other (specify: _____)	<input type="checkbox"/>		

J. Please answer the following questions:

J1. During the last six months, were you or your family member ill but not able to see doctor because of the lack of money?	[1] Yes	[2] No	[3] NA	<input type="checkbox"/>
J2. During the last six months, were you or your family member suggested hospital treatment but you or your family member did not have the hospital treatment because the service charge was too high to afford?	[1] Yes	[2] No	[3] NA	<input type="checkbox"/>
J3. During the last six months, did you or your family member have to stop receiving medical treatment because the charge was too high and unaffordable	[1] Yes	[2] No	[3] NA	<input type="checkbox"/>
J4. Do you think you and your family members will see doctor in time when it is needed?	[1] Yes	[2] No	[3] Not sure	<input type="checkbox"/>
J5. Do you think you and your family members will hesitate and not see doctor because it is too expensive	[1] Yes	[2] No	[3] Not sure	<input type="checkbox"/>
J6. After receiving medical assistance, do you feel the family's burdens have been eased? [1] No [2] Yes, to some degree [3] Yes, greatly [4] Haven't received any medical assistance				<input type="checkbox"/>
J7. Compared with other families' livings in the village, your family's living is [1] Similar to others [2] A bit lower than others [3] Much lower than others				<input type="checkbox"/>
J8. At present, what kinds of helps in the following are most needed for your family? (multiple choices) [1] Assistance on living [2] Medical assistance [3] Educational assistance [4] Care from the society [5] Other 1 (specify: _____) [6] Other 2 (specify: _____)				<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>

K. Social Support¹ (If the respondent is with AIDS or HIV positive, answer the following questions)

K1. How many close friends do you have -- friends you can get support from? [1] None [2] 1-2 [3] 3-5 [4] 6 or more than 6	<input type="checkbox"/>
K2. In recent year, you have been: [1] Alone, isolated from the family [2] Moving a lot, living with strangers most of the time [3] Living with classmates, colleagues and friends [4] Living with your family [5] Alone and have no family	<input type="checkbox"/>
K3. The relationships between you and your neighbors are: [1] Acquaintances with no care about each other [2] May give a little care if someone is in trouble [3] Some of them care about you [4] Most of them care about you	<input type="checkbox"/>
K4. The relationships between you and your colleagues are: [1] Acquaintances with no care about each other [2] May give a little care if someone is in trouble [3] Some of them care about you [4] Most of them care about you [5] NA	<input type="checkbox"/>

K5. Support and care received from family members (check the blank space)					
Family member	[1] None	[2] Little	[3] Average	[4] Fully	[5] NA
K5a. Spouse (lover)					
K5b. Parents					
K5c. Son/daughter					
K5d. Siblings					
K5e. Other family member (e.g. sister-in-law)					
K6. When you were in trouble, who had offered you financial help or had helped you solve the problem? (multiple choices):					<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>
1 Nobody 2 Spouse 3 Other family member 4 Friend 5 Relative 6 Colleague 7 Employer/working unit 8 Unions, the party groups and governmental or partially governmental organizations 9 Non-governmental religion organization or social groups etc. 10 Other (specify: _____)					
K7. Who had consoled you and cared you when you were in trouble?					<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>
1 Nobody 2 Spouse 3 Other family member 4 Friend 5 Relative 6 Colleague 7 Employer/working unit 8 Unions, the party groups and governmental or partially governmental organizations 9 Non-governmental religion organization or social groups etc. 10 Other (specify: _____)					
K8. How would you confide your trouble?					<input type="checkbox"/>
[1] Never confide it [2] 1to2 persons with very close relationship [3] Will talk if friend ask [4] Will initiate the talk and seek understanding and support					
K9. Who would you turn to if you are in trouble?					<input type="checkbox"/>
[1] Manage it by yourself [2] Seldom seek help from others [3] Sometimes seek help from others [4] Often seek help from family, relatives and organizations					
K10. How often do you join activities organized by party organizations, Unions, or religion organizations?					<input type="checkbox"/>
[1]Never [2]Occasionally [3] Often [4] Very often with great enthusiasm					

L. Social Support2 (If the respondent is with AIDS or HIV positive, answer the following questions)

1. Who would you confide to if you are in trouble?(multiple choices): [] [] [] [] [] []					
[1] None [2] Family member [3] Relative [4] Neighbor [5] Friend who has AIDS [6].Friend who does not have AIDS [7] Other _____, of which, who is the one that you mostly turn to except your family members? _____					
2. Who would you usually turn to when your family needs help? []					
[1] None [2] Relative [3] Neighbor [4] Friend who has AIDS [5] Friend who does not have AIDS [6] Village government [7] Other _____, of whom, who is the one you mostly turn to except your family members? _____					
3. Besides your family and relatives, how many people are there in your social circle?					
[1] Almost none [2] 1 – 2 [3] 3 – 5 [4] More than 5 []					
4. Are these friends in your social circle from families that has members infected with HIV?					
[1] All of them [2] Most of them [3] Some of them [4] A few of them [5] None of them []					
5. Usually you mood is: [1] Very gloomy [2] Gloomy [3] A little gloomy [4] Normal [5] Pretty good []					
6. Usually you may have feelings of helpless, which is					
[1] Very strong [2] A kind of strong [3] Strong [4] Not strong [5] None []					
7. The pressure you feel from other surrounding people is:					
[1] Very high [2] A kind of high [3] High [4] Not high [5] None []					
8. Which of the following issues ranks the first that makes you feel painful _____; and the issue in the second place is _____;					
[1] The current difficult life [2] The current poor positioning in society [3] Nobody to confide trouble to [4] The husband/wife is hopeless [5] Worrying that the children are losing their parent [6] Worrying that the children are going to bear the bad name of “AIDS” later [7] Other _____					
9. What is the position of the country in your mind (greatness, respect)?					
[1] Superior [2] Very high [3] Pretty high [4] Average [5] Fairly low [6] Very low []					
10. Please rate the significance of the following events (check the applicable space)					
Events	[1] Very significant	[2] Fairly significant	[3] Medium	[4] Not so significant	[5] Not significant
A. Being visited by superior government leaders (no money)					
B. Creating more opportunities for people with AIDS and HIV to social with each other					
C. Improving the relationship between HIV positive people and normal people					
Which of them do you consider that is most important? _____					
11. Do you have any goal of helping yourself (improve life)?					
[1] Very definite goals [2] Fairly definite goals [3] Not so definite [4] Not definite at all []					
12. Which way do you think is better, --if possible, all the people with HIV in the village joint together to change their lives, or each family work alone?					