CHAPTER I



INTRODUCTION

Background and rationale

There is at this time no effective vaccine against human immunodeficiency virus (HIV), the causative agent of AIDS. Similarly, there is as yet no agent or combination of agents capable of curing the disease. So it has become a health problem affecting psychosocial, somatic, economic and political well-being of individuals and the societies throughout the world. In developed countries, the spidemic of HIV infection has drastically altered the sexual revolution that characterized the 1960s and 1970s. In addition, the AIDS epidemic has influenced such diverse areas as injection drug use, discrimination in housing and employment, and access to health care, particularly among undeserved populations such as inner city mothers and infants. In the developing countries the impact of the AIDS epidemic has been even more devastating.

The first decade of the AIDS epidemic is a story of people, policies, and politics in conflict. It exemplifies the need to strike a balance between courage and cowardice, hope and despair, compassion and discrimination, and the

struggle between scientific facts and irrational fears. It also reveals the emergence of activism and intolerance in the face of the inequities of health care.

The first report on the epidemic appeared on June 5, 1981, in the Center for Disease Control (CDC) weekly publication, Morbidity and Mortality Weekly Report (MMWR). Although the article described five previously healthy homosexual men, the title, "Pneumocystis Pneumonia-Los Angeles," omitted any reference to homosexuals. According to Shilts (1987), this omission was intentional in an attempt to avoid offending the gay community and inflaming homophobes. Thus, politics was part of the HIV/AIDS epidemic from the beginning.

Between June 1981 and May 1982, CDC received reports of 355 cases of Kaposi's sarcoma and/or serious opportunistic infection occurring among previously healthy persons, including homosexual and bisexual men (281 cases,or 79.1 percent), heterosexual men (41 cases, or 11.6 percent), men of unknown sexual orientation (20 cases, or 5.6 percent), and heterosexual women (13 cases or 3.6 percent) (CDC,1982a). Blood transfer via intravenous drug use was implicated in the majority of the affected heterosexual men and women. By July 1982, the problem was also noted in heterosexual Haitian immigrants to the United States and in recipients of blood

products (CDC, 1982b, 1982c). Although the evidence was clear that this was not a disease exclusively of homosexual men, it was being referred to as the gay plague. In September 1982, the CDC designated the disease as an acquired immunodeficiency syndrome (AIDS) and for the first time defined its characteristics.

By 1983, there was a pervasive attitude that AIDS was a disease of a "disposable" portion of society-gay men and intravenous drug users. Walker (1991) describes it best by noting that while the average American viewed AIDS as a sad affair, it was something that affected "them," not "us." and "they" (being undesirable) were dispensable.

During the first years after the original description of AIDS the disease appeared largely confined to middle class homosexual men, intravenous drug users, and recipients of blood products in the Western world. It is clear that the epidemic is now evolving into a mainly heterosexually transmitted disease of the developing world, and of poor and marginalized populations in the industrialized world as is the case for many other infectious diseases. As of December 31, 1992, a cumulative total of 611,509 cases of AIDS have been reported to the World Health Organization (WHO). Of these, 55% had occurred in the industrialized world. However, the officially reported number of AIDS cases represents only the

tip of the iceberg as far as the developing world is concerned, where many cases are not diagnosed and reporting to the public health authorities is far less than complete. On the basis of HIV prevalence data and ad hoc surveys, it is estimated that as of early 1993, a total of about 2.5 million AIDS cases in adults and children have occurred in the world with over 80% originating from the Third World. WHO estimates that more than 14 million individuals, including 1 million children, have been infected with HIV by early 1993. Less than 3,000 cases of AIDS have been reported from Asia by the end of 1992, representing 0.5% of all cases globally reported to WHO. The actual cumulative number of cases was probably closer to 30,000. WHO estimates that at least 1.5 million people were infected with HIV.

The spread of HIV-1 infection in Thailand was typical example of the dynamic build-up of an epidemic in different segments of the population and in different geographic areas, as well as the importance of highly vulnerable "core" groups in the spread of HIV-1. Thus, HIV-1 initially spread rapidly among injecting drug users, followed by a second wave of spread among female prostitutes, and then by a third wave of slower spread among young men. It is likely that the next wave will include women in the general population. The prevalence of AIDS is increasing every year. Base on the WHO



extrapolation method. the burden of infection and disease in Thailand was estimated at 1 to 3.4 million cumulative AIDS by the year 2000 (Viravaidya M.,1990). At that time 30% of all deaths will be due to AIDS and one hundred thousand of Thai children will be suffer from AIDS.

AIDS situation in Thailand, up date from AIDS Newsletter, vol. 12, 16 June 1993 reported that ministry of health had received reports totally 4,274 cases of AIDS and AIDS Related Complex(ARC) till 31 May 1993. It was AIDS 2,039 cases, male 1,778 cases, female 261 cases, the proportion of male to female was 6.8: 1. ARC was 2,235 cases, male 1,807 cases, female 328 cases, the proportion of male to female was 5.8:1. The director of National Blood Bank, Prof.Dr. Chaivaj Nuchprayoon, said that there was about 0.9% of population or five hundred thousand HIV positive in Thailand now. increasing rate is 0.2 % it was estimated that the HIV positive will be 600.000 in the next year. This situation leads to the hospital burden. During the last two years, the AIDS patients was only 0.3 % of medical ward in Chulalongkorn hospital. This number is increasing to 2% and about 27% of death cases are AIDS patients.

Yet at the same time, the search for means to control the AIDS epidemic was leading to radical changes in modern bio-medical science. Also it was changing in the views about



patient-physician relationships and the clinical trials process. The challenge is to harness the new insights and attitudes into a constructive approach leading to more rapid progress against HIV and its consequences, and to set up a mechanism to respond rapidly to future epidemics.

In 1987, the International Council of Nursing (ICN) and WHO released a joint declaration emphasizing that AIDS-HIV is an international health problem of extraordinary urgency and highlighting the need for international leadership, cooperation, and collaboration to control the spread of the epidemic. ICN and WHO urged their members to assist in efforts to deal with the AIDS crisis by keeping informed of new developments relative to the prevention and care of people for AIDS.

The National League for Nursing (NLN) of America established AIDS guidelines for schools of nursing in 1988 and held a 2 days conference to update them in 1992. There appears to be consensus that schools of nursing are responsible for preparing their students to meet the challenge of the HIV epidemic. Whether the biggest members and taking roll as the closest persons but information in the literature on curriculum development or policies regarding the care for HIV patients in schools of nursing is still limited. Chitty found that nursing education in general had responded to the

epidemic but suggested that educators should use more affective and behavioral learning methods in order to modify the attitudes of nursing students.

The second Thai national nursing education seminar has held in september 3rd, 1993 concluded that in nursing operation they intended to produce nurses to be able to give holistic nursing care, cover physical psychological spiritual and social needs, by using nursing process theory and nursing ethic.

There is a critical need for nursing programs that prepare knowledgeable nursing professionals who can assume leadership roles in combating this epidemic and can have positive attitudes towards AIDS patients to better fulfil their tasks and roles as the health personnel who are closest to the patients. Therefore, it is logical to ask whether the nursing curriculum results in the creation of these positive attitudes and lead to have the intention to care for HIV positive persons behavior. This can partially be answered by this study; a study of exploring how the variables relate to the intentions to care for HIV positive among nursing students in Bangkok metropolis by using the Ajzen-Fishbein (1980) theory of reasoned action.

Objective of the study

To determine the factors which are the determinant of intentions of nursing students in Bangkok metropolis to care for HIV positive persons.

Research Questions

- 1. Are attitude toward behavior and /or subjective norm of nursing students the determinants of intention to care for HIV positive persons?
- 2. What is the level of association between the attitudes toward behavior and/or subjective norm of nursing students and the intention to care for HIV positive persons?

Hypotheses :

- 1. There is no relationship between A_{α} and I_{α}
- 2. There is no relationship between S. and I.
- 3. A_1 and S_2 can not be determinants of I.
- 4. There are no different among items in b., e. and $A_{\underline{1}}$ between the one who intended to care for HIV positive persons and not intended to.
- 5. There are no different among items in n., m. and S_{γ} between the one who intended to care for HIV positive persons and not intended to.

Where A_2 = Attitude toward the behavior

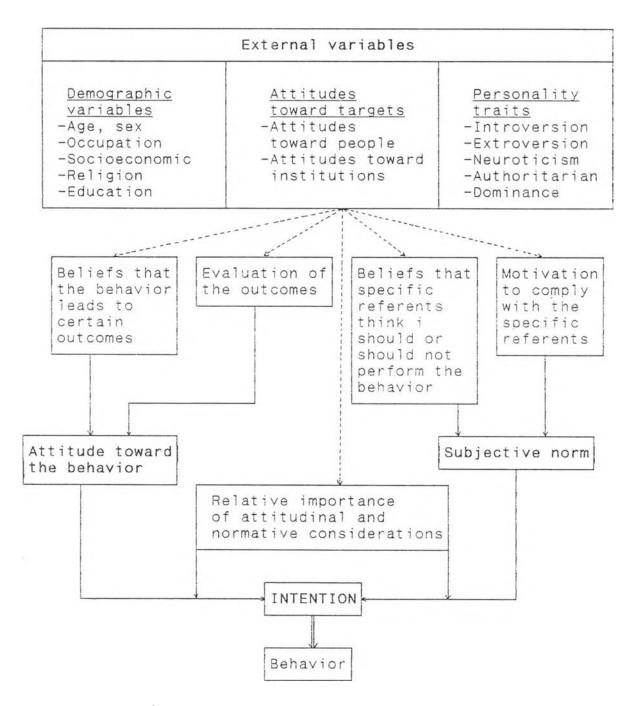
 $S_{ij} = Subjective norm$

I = Intention

- b. = Behavioral belief that behavior B leads to consequence i
- e. = Evaluation of consequence i
- n. = Normative belief that group or individual i think i should(or should not) perform the behavior
- m: = Motivation to comply with group or individual i

Assumption

Caring for HIV positive persons of nursing students are behaviors under volitional control and can be predicted by the intended care behaviors.



- ----- Possible explanations for observed relations between external variables and behavior
- Stable theoretical relations linking beliefs to behavior

Operational definitions

Attitude toward behavior .

Attitude toward behavior (A_3) is the nurse's feeling of favorableness or unfavorableness for caring persons who are HIV positive. It consists of behavioral beliefs (beliefs about the consequences of performing the behavior), each of which is multiplied by her evaluation of that consequence.:

Attitude toward behavior = f(Specific behavioral beliefs) X (Qutcome expectancy)

Subjective norm

Subjective norm (S_{γ}) is the nurse's perception that most people who are important to her think she should or should not perform the caring behavior for persons who are HIV positive. This subjective norm is made up of normative beliefs (beliefs about what each "significant other" thinks she should do), each of which is multiplied by the person's motivation to comply with that other:

Subjective norm = $f(Normative belief) \times (Motivation to comply)$

Intended care behavior

Intended care behavior (I) is the likelihood that a nurse will engage in given care behavior for persons who are HIV positive. According to the theory, it is a function of

two basic determinants; attitudes toward care for persons who are HIV positive and subjective norm:

Nursing student

Nursing student means nursing students who are studying in the last year of the four-year nursing curriculum in Bangkok metropolis.

HIV positive

HIV positive is defined as a person who has infected from human immunodeficiency virus (HIV) according to the Centers for Disease Control (CDC, January 1993) has classified as follow:

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CD ₁ Count	А	8	С	
>500	A1	81	C1	-
200-500	A2	82	C2	
<200	АЗ	83	С3	

Category A

- -Asymptomatic HIV infection
- -Persistent generalized lymphadenopathy

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-Acute retroviral syndrome
     Category B (formerly "ARC")
-Bacillary angiomatosis
-Candidiasis : oral, recurrent vaginal
-Cervical dysplasia
-Constitutional symptoms: e.g., fever or diarrhea more than
1 month
-Hairy leukoplakia, oral
-Herpes zoster
-Idiopathic thrombocytopenic purpura
-Listeriosis
-Pelvic inflammatory disease
-Peripheral neuropathy
     Category C (AIDS-defining conditions)
-CD count less than 200 cells/cu.mm.
-Candidiasis : pulmonary, esophageal
-Cervical cancer
-Coccidioidomycosis
-Cryptococcosis, extrapulmonary
-Cryptosporidicsis
-Cytomegalovirus
-Encephalogathy, HIV
-Herpes simplex : Esophageal(chronic more than 1 month)
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- -Histoplasmosis
- -Isosporiasis
- -Kaposi's sarcoma
- -Lymphoma
- -Mycobacterium avium
- -Mycobacteria kansasıi
- -Mycobacteria tuberculosis
- -Pneumocystis carinii
- -Pneumonia, recurrent
- -Progressive multifocal leukemia
- -Salmonellosis

* Revised classification system of HIV disease Centers for Disease control and Prevention

Signs and symptoms of Acute HIV infection :

The frequent of signs and symptoms occur to the Acute $\hspace{1cm}$ HIV infected patients :

Signs or symptoms	Frequency(%)
Fever	97
Adenopathy	77
Pharyngitis	73
Rash	70

(continue)

Signs or symtoms	Frequency(%)
Myalgia or arthralgia	58
Thrombocytopenia	51
Leukopenia	38
Diarrhea	33
Headache	30
Elevated serum aminotransferase level	23
Nausea and vomiting	20
Hepatosplenomegaly	17
Oral thrush	10
Encephalopathy	8
Neuropathy	8

Common complications associated with stages of HIV disease :

Early HIV disease:

- -Acute seroconversion
- -Varicella zoster virus (VZV)
- -Herpes simplex virus (HSV)
- -Epstein-Bark virus (EBV)

Middlee HIV disease :

-Bacterial disease; Mycobacterium tuberculosis,
Rochalimaea quintana, Salmonella, Syphilis, Clostridium
difficil, Neisseria gonorrhoea

- -HSV
- -EBV
- -Lymphoma [Kaposi's sarcoma(KS)]
- -Human herpes virus type 6 (HHV-6)
- -Pneumocystis carinii pneumonia (PCP)

Late HIV disease :

-Bacterial disease; Mycobacterium Avium Complex (MVC), Mycobacterium, tuberculosis, Rhodococcus equi. R. quintana, Salmonella, C. difficile, Nocadia, Cryptococcus

- -Histoplasmosis; Aspergillus
- -Coccidioidomycosis (Candida sp.)
- -HSV/VCV
- -Cytomegalovirus (CMV)
- -Toxoplasmosis
- -PCP
- -Lymphoma(KS)

EXPECTED BENEFIT

The result of this study would be presented to the nursing curriculum committee of the Thai Red Cross Society College of Nursing. It would be the information for the administrators or anyone who are interested in nursing education. The information might be used to design an appropriate intervention program to improve the intended care behavior for caring HIV positive person.