USE OF ALTERNATIVE THERAPIES BY ACTIVE DUTY AIR FORCE PERSONNEL

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HARRIS

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ABSTRACT

Use of alternative therapies by Americans is being documented and found quite common. Personnel serving in the military have access to a unique health care system and may also have different cultural values than the general public. According to Kleinman's concept of a health care system as a social reality, three aspects of any health care system are the popular lay sector, or self treatment, the traditional sector, and the folk sector, where alternative therapy falls. As the military looks at Building Healthy Communities, with emphasis on self care and healthy lifestyles, alternative therapies may play a key role as an intermediary between self care and tertiary care in the traditional, costly health care system. The purpose of this study was to determine extent of use of alternative health care by active duty Air Force personnel. Survey forms were mailed to 205 active duty officers in the Washington, D.C. area. Response rate was 58%. Thirty-four percent of respondents had used at least one form of alternative therapy. Massage therapy was most commonly used (15 responders), followed by herbs (11), relaxation techniques (10), megavitamin therapy (10), and, finally chiropractic therapy (9). Commercial weight loss programs and self-help groups were also used by the respondents. Symptoms for which alternative therapies were used included back problems (16), allergies (9), sprains/strains (9), headaches (9), and weight problems (8). Some personnel indicated they used alternative therapies as prevention, not for disorders. Fifty-eight percent of respondents, whether they had previously used these therapies or not, indicated they would use alternative therapies if indicated. The top therapies officers would use were chiropractors, relaxation techniques, massage therapy, and megavitamin. The study concludes use of alternative therapies in the sample of the military population is similiar the general public.

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by

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Introduction

The Problem

Over the past five to ten years, interest has arisen in alternative types of medicine and the people who use these services. Use of alternative therapies has been found widespread among Americans, and recent studies have documented the extent of use among some groups. Alternative therapies are generally considered to be any treatment outside the mainstream of conventional medicine. These unconventional or alternative therapies include treatments by chiropractors, acupuncturists, herbal therapists, and many more. Eisenberg et al. (1993) published results of an extensive survey exploring use of alternative therapies and estimated that one out of three Americans used an unconventional therapy in 1990. Expenditure associated with this use in 1990 was $13.7 billion dollars, of which three-fourths was paid out-of-pocket. The survey found over 70 percent of users of alternative therapies did not inform their medical doctor about their use. Most insurance plans do not provide reimbursement for alternative therapy.

The United States military provides a comprehensive health care system for active duty personnel that strongly emphasizes prevention, and readily treats illness and injury (Williams & Torrens, 1988). The military health care system, like most traditional civilian counterparts, offers limited types of alternative therapies to beneficiaries. There is no reimbursement to active duty personnel for any type of health care, traditional or alternative, sought outside the military health care system, unless a referral is made for a specific disorder for which the system does not provide the service.

It is crucial for health care providers, civilian and military, to understand the various forms of alternative therapies since patients seeking conventional therapies may also be using alternative treatments. Most users of alternative therapies do not inform their medical doctors of their use. This may be due to patients' perceptions of their traditional provider as having a lack of knowledge of alternative therapies or disbelief in their effectiveness (Eisenberg, et al., 1993). This lack of communication cannot be beneficial to the client-physician relationship, and a condescending attitude toward a patient's use of alternative health practices can only hinder that connection.

The Problem Statement

Use of alternative therapies in the civilian population is being documented through research. To date, no studies have explored use by active duty military personnel.

Need for the Study

There is no research available to document if health care practices of active duty military personnel are similar to those of the general population. Findings of alternative therapy use in the general population may not be validly applied to military personnel. Kleinman (1988) suggests a health care system is based on cultural phenomena, and the military environment is a unique culture. Therefore, health practices of military personnel may differ from those of the general population. A study is needed to identify use of alternative medicine by military personnel.

The role of alternative medicine vis-a-vis traditional medicine is undefined. Research must be done to determine use of these treatments by the public. Documenting

providers' knowledge of various alternative treatments and the extent of use of these therapies is an important first step in the exploration of how traditional and alternative therapies are intertwined.

The United States spends more than 14% of the gross domestic product on medical care. Fries (1994) presents two rationale for this high cost of health care: 1) health care need; and 2) health care demand. Need refers to the country's illness burden, where excess need is generated by occurrence of preventable illness, such as those resulting from cigarette and alcohol use, obesity, or other preventable factors. Demand refers to requests for medical services. Excess demand for services unlikely to improve health, such as visits to providers for simple colds, increases health care costs. Self care in the form of improved lifestyles and self management of minor problems can reduce health care costs on the need and demand side (1993). Alternative therapies may influence health care costs by offering improved lifestyles through stress reduction techniques such as Yoga or self help groups. Alternative therapy may offer an intermediate care option for illness that is less expensive than traditional medical care. Eisenberg et al. (1993) found the average cost of alternative therapies was less than $30 per visit.

Providers of health care must know what types of alternative practices are in use amongst their clients. Health care providers may one day be in a position to teach clients self care options that may include forms of what are today considered alternative therapies. They may make referrals to alternative providers as a less costly measure to treat chronic pain or minor illness.

The United States Air Force plan to build "Healthy Communities" (Chapman, 1995) is focusing on teaching individuals medical self care and wellness lifestyles. Alternative therapies may enter into this concept as self care interventions are explored or as an intermediate step to seeking tertiary care.

Research must first establish the public demand for alternative treatments and determine which alternative strategies are effective. Demand for and use of alternative therapies may be different within different cultures. Therefore, an initial effort is necessary to determine use of alternative therapies by military personnel.

Conceptual Framework

Kleinman (1980) states the health care system is a concept and not an entity. The model of the health care system is derived from understanding how people in a particular social setting think about health care. It includes beliefs about sickness, decisions about how to respond to episodes of illness, and expectations and evaluations of a particular kind of care. It is also derived from understanding how people act in and use the components of a health care system. Thus, a health care system must be viewed from the perspective of social and cultural settings for it includes people's beliefs and patterns of behavior.

Kleinman emphasizes health care systems are forms of social reality, as are political systems, religious systems, kinship systems, and language. Social reality denotes the world of human interactions existing outside the individual and between individuals. It is a transactional world where everyday life is established and social roles

are defined and performed. Social realities differ among different societies, social groups, professionals, and families and individuals.

Individuals differ in their acceptance of social norms and the degree to which they follow these norms. These decisions affect how an individual will react to sickness and choose and evaluate various health care practices. Therefore, a health care system is formed by a collective view and shared pattern of usage, though individuals may vary in their social reality.

Kleinman describes a structural model of health care systems for application to research in both developed and developing countries. In this model, health care is described as a local cultural system composed of three overlapping sectors: popular, professional, and folk.

The popular sphere of health care is the largest part of any system, and contains several levels: individual, family, social network, and community beliefs and activities. This is the lay popular culture arena in which illness is first defined and health care activities are initiated. According to Kleinman, in the United States, 70 to 90 percent of all illness episodes are managed within the popular sector. Self treatment by the family or individual is the first therapeutic intervention resorted to by most people in various cultures.

After patients receive treatment in any sector, they return to the popular sector to evaluate it and decide what to do next. The popular sector interacts with the professional and folk sectors which are often isolated from each other. The popular sector functions as the chief source and most immediate determinant of care. Lay persons activate their

health care by deciding when and whom to consult, whether to comply, when to choose other treatment alternatives, whether care is effective, and whether they are satisfied with the quality.

The professional sector is comprised of organized healing professions. Freidson (1970) described how modern medicine used legal and political means to force other healing traditions to disband. Professional organizations became a source of social power. Health care systems are especially affected by the level of technological and social development, including the status of therapeutic institutions, biomedical technologies, and professional personnel.

Alternative therapies tend to lie within the third sector defined by Kleinman (1980), known as the folk sector. Folk medicine is often classified as sacred or secular, but this division is often blurred in practice. Herbalism, manipulative treatments, special systems of exercise, and symbolic healing are examples of secular folk healing.

The structural components of health care systems are the three sectors noted, and interaction occurs between them as patients use all three. Boundary lines exist between sectors which form points of entrance and exit as patients follow their illness trajectories.

Research Questions

Military personnel, with the unique culture of military life, may also have a unique health care system. The lay popular culture and the folk sector may be different within the military than in the general population, and thus affect health care decisions and care seeking behavior. Therefore, the following research questions have been posed:

1. What proportion of active duty Air Force officers have used alternative therapies during the past two years?
2. What alternative therapies are being used by active duty Air Force officers?
3. How frequently are alternative therapies being used?
4. What are the major physical complaints for which alternative therapies are being sought by active duty Air Force officers?
5. Is there any relationship between demographic characteristics of Air Force officers and their use of alternative therapies?
6. Do Air Force officers find alternative therapies beneficial if they have been used?
7. Would Air Force officers use these therapies if they were integrated into the professional military health care system?

Use of alternative health care is the dependent variable being studied. Independent variables are age, rank, duty title, marital status, gender, and time on active duty.

Definition of Terms

Active Duty Air Force Officer

A male or female officer, defined as one serving under commissioned service, currently on active duty status in the Air Force division of the United States military.

Professional Military Health Care System

The formal health care system within the United States military, staffed by physicians, nurse practitioners, physician assistants, midwives, registered nurses, trained medical technicians, and other ancillary professional and para-professional staff.

Frequency

The number of times any event is repeated in a given period or group (Merriam Webster's Unabridged Dictionary, 1993).

Demographics

Includes age, gender, rank, duty title, marital status, and time on active duty.

Career

An Air Force career will be defined as the period from the beginning of entrance into service as an active duty Air Force officer until the present. Breaks in service time will not be included as being part of the career nor will time from commissioning until entrance into active duty service.

Alternative Therapies

Many words have been used to describe alternative health care. Such terms include nonorthodox, complementary, adjunctive therapy, or natural health care (Huebscher, 1994). This study will employ the term alternative therapies. In the literature review discussion, the term actually used by the study being reviewed will be utilized.

One mechanism used to classify various healing modalities is a healing matrix (Table I). A healing matrix relates traditional professional care on a continuum with alternative therapies (Engebretson & Wardell, 1993). Techniques are organized by the preparation and traditionalism of the healer, designated by the horizontal axis of the matrix. The vertical axis represents the healing modalities, ranging from concrete to

abstract. The first column lists biomedical practices, which are considered as both professional and folk health practices in the United States (Kleinman, 1980). The next four columns lists interventions ranging from conventional interventions to more intuitive healing methods. While marginal healers have a formal curriculum of study and forms of licensure and credentialing, they are not recognized as traditional medical practitioners in the United States. In alternative healing, often the knowledge base is passed on through working with a more experienced healer and not through a formal curriculum.

Definition of Therapies

The first four definitions are from Spiglelblatt et al., 1994 and the remaining are taken from Engebretson & Wardell, 1993.

Chiropractic. The manipulation of the spinal column in order to correct nerve compressions believed to cause bodily dysfunctions.

Acupuncture. The insertion of needles into specific points on the body in order to treat various disorders.

Homeopathy. A method of treating disease by use of an infinitesimal amount of dilutions of natural substances.

Naturopathy. A method of treating disorders involving the use of diet, herbal medicine, and environmental modifications.

Rolfing. Designed to counteract the effects of gravity on the balance of the body. Uses a deep massage with knuckles, painful at times, to loosen fascia and muscle and facilitate return to their natural position.

Massage therapy. Ranges from Swedish massage, Trager, sports massage. Muscles are massaged, using various strokes and movements to increase circulation, relieve pain and tension, and relaxes muscles.

Cranio-sacral therapy. Manipulation of the skull, based on theories that the sutures of the skull are not completely fused and manipulation can move cerebrospinal fluid and realign bones. Healers are trained through specialized workshops.

Feldenkrais. A method of physical movement developed by Moshe Feldenkrais to help people move freely and gracefully. Students are taught awareness through movement types of exercise. Therapists are certified by the Feldenkrais Guild.

Yoga, Akido, Tai Chi. Systematic uses of moving, breathing, and ritual that integrate body and mind. Each of these is part of a larger spiritual philosophy of life that directs all activities of one's life. Yoga was developed in India. Akido and Tai Chi are Oriental forms of movement.

Reflexology. Involves massaging pressure points on the foot or hand. Reflexology practitioners believe that each organ and gland in the body has a corresponding reflex point on the bottom of the feet. These points are massaged to release blocked energy so it can flow through the meridians. Its' roots are in the Orient and other ancient cultures. Special training is required to work with energy releasing. Certification is provided through the Ingham method.

Herbal therapy. Herbal therapy has origins in many ancient cultures, and may be found in traditional medicine as well. The American Botanical Council publishes a journal known as HerbalGram as a resource on herbal remedies.

Aromatherapy. Involves the use of essential oils applied during massage or heating the oils in a diffuser so the aroma permeates the room for inhalation. Use of these oils is learned from aromatherapists, classes, or books.

Flower remedies. Flower remedies are essences of wildflowers, and are preserved in alcohol and taken sublingually. They are used for a variety of physical and psychological concerns of the individual.

Reiki. A form of therapeutic touch that involves balancing of energy flow. Reiki means Universal life force. Healers receive a series of initiations that align and attune their energy centers. The healer uses light touch to make universal energy available to the recipient, who can then balance his or her own energy. The healer acts as a conduit to channel universal energy to the recipient.

Magnetic or polarity healing. These healers place their hands in certain positions on or near the recipient to direct and rebalance energies. Good health is felt to result when energy is in balance. Therapeutic touch is based on this concept. Healers use specific placements of the hands to sweep the energy field of the recipient's body. Techniques are used to take out negative energy and put in positive energy.

Use of color, crystals, and imaging. These also work to facilitate the flow and balance of energy. Crystals are thought to concentrate and direct energies. Other

gems and stones are also used according to their structures and colors. Color and sound are used either without or in combination with imaging and meditation to balance energy.

Visualizations and affirmations. These are types of auto-suggestion or mind over matter. Affirmations are statements spoken aloud and thought to influence the subconscious to obtain a desired result. Visualization is used to enhance the affirmation by picturing the result. This has been used to visualize healing at the cellular level.

Self-help groups. Often these are focused on a particular topic such as addiction. Recovery programs can be very organized with regular meetings. Some groups are led by psychologists or other professionals and some are led by lay people.

Table I
Healing Matrix

	Orthodox		Marginal	Alternative
Physical Manipulation	Surgery Physical Therapy	Chiropractic	Rolfing Feldenkrais	Cranial-sacral alignment Massage therapy Yoga, Akido, Tai-Chi Reflexology
Ingested or applied substances	Pharmacology	Homeopathy Vitamin Therapy	Naturopathic remedies Herbs Flower remedies	Aromatherapy Diet Alternatives

Note. Alternative therapies are arranged in the four columns from conventional(orthodox) treatments to increasingly marginal alternative therapies.

Source: Adapted from Engebretson J. & Wardell, D. (1993)

Orthodox		Marginal		Alternative
Uses of Energy	Laser Surgery	Acupuncture	Reiki	Chakra balancing
		Acupressure	Magnetic or polarity healing	Radionics
			Therapeutic Touch	Uses of gems, crystals, color
Mental	Psychiatry	Secular or spiritual counseling	Self-help groups	Psychic, spiritual, or intuitive healing
Spiritual	Psychology		Visualizations	
		Established support groups (ie. 12 step programs)	Affirmations	

Note. Alternative therapies are arranged in the four columns from conventional (orthodox) treatments to increasingly marginal therapies.

Source: Adapted from Engebretson J. & Wardell, D. (1993)

Limitations of the Study

The study was limited by the relatively brief amount of time that was available to complete it. Study costs were financed personally, as no grants were available. Thus it was necessary to keep the sample size small and limited to the Washington, D.C. area. Consequently, results may not be generalizable to Air Force officers nationwide. Officers stationed in the D.C. region may have access to more forms of alternative therapy than those in more remote areas. Moreover, personnel in administrative positions may migrate to the D.C. geographical area later in their career to fulfill promotion requirements. Thus, respondents may be more homogenous in age and rank than the Air Force officer population as a whole.

Assumptions of the Study

This study is based on the following assumptions:

1. All responses of study subjects are valid.
2. All respondents understood and followed directions in completing the survey form.

Summary

This study was concerned with the use of alternative therapies by the of Air Force officers. The importance of the study lies in its attempt to assist providers of military health care to better understand the health care practices of the patients they serve in the unique military culture. In efforts to reduce health care costs, various self care strategies are being explored. Some of these may come under the category of alternative care. Knowledge of the extent of acceptance of alternative therapies is valuable is in building healthy communities.

The description of this study continues in Chapter Two with a review of literature exploring related studies. The methodology is presented in Chapter Three, and the subsequent chapter presents the results of the data analysis. A summary of findings, implications drawn from the study and recommendations for future studies and practice are presented in the final chapter.

CHAPTER II

Review of the Literature

Few studies are available that document use of alternative health care among any population group in the United States. In Great Britain, alternative therapies have extensive usage because they are an integral part of the health care system, and therefore more research has been done regarding users of alternative therapy than in some other countries. This chapter will review literature pertaining to use of alternative therapies in this country and also in other countries, primarily Great Britain and Canada. Focus of the literature reviewed will be on use of alternative therapies among the general population, research dealing with therapies used and reasons why persons choose alternative therapies, and the process involved in choosing alternative therapists.

Use of Alternative Therapy

Emerging studies in the United States are beginning to document the use of alternative therapies by the general population and among specific populations. As noted earlier, Eisenberg et al. (1993) published results of an extensive telephone survey of 1,539 individuals from randomly selected English speaking households in the United States. One in three respondents had used a form of alternative therapy in 1990. Use of unconventional therapy was more common in persons ages 25 to 49 than among younger or older individuals. Use was less common among African Americans than among members of other racial groups. It was more common among persons with some college education than those with no college education, and among those with annual incomes above $35,000 than those with lower incomes. Use was also higher in persons living in

Western states versus those in other parts of the country. This hallmark study, with a large randomly selected sample, gave valuable insight into alternative medicine use by Americans. However, the exclusion of non-English speaking households and those without a telephone somewhat limits the generalizability of this study.

Prior to this study, most research focused on use of unorthodox therapies by specific groups of persons. In 1984, Cassileth, Lusk, Strouse, and Bodenheimer published conclusions of interviews with 304 cancer center patients and 356 cancer patients under care of unorthodox practitioners. Interviews addressed patient's experiences with both standard and unorthodox treatments. Patients using unorthodox therapies, either exclusively or in conjunction with conventional treatments, tended to be white and better educated than those using only conventional therapy. Most widely used alternative therapies were metabolic therapy, diet therapy, megavitamins, imagery, and spiritual healing. Almost all patients receiving alternative therapies believed patients should take an active role in their health care, while 74% of patients on conventional therapy had this belief. Since the cancer center patients were predominantly inpatients while users of alternative treatments were outpatients, they probably had limited access to alternative therapies, making these conclusions dubious.

Cleary (1982) interviewed 1,026 persons in rural Wisconsin to determine extent of chiropractic use. Ten percent indicated using a chiropractor in the past 12 months. Users of chiropractors tended to be older and have more chronic health problems, such as back pain, headaches, and respiratory symptoms, than persons not using chiropractors. It would be difficult, however, to generalize the findings in a rural community to the general U.S. population.

Smart, Mayberry, and Atkinson (1986) assessed alternative medicine use in patients with irritable bowel syndrome, organic upper gastrointestinal disorders, and Crohn's disease. Patients were asked to complete a mailed questionnaire. Results from the three groups were analyzed for differences using Chi-square. More patients with irritable bowel syndrome had consulted alternative medicine practitioners than had patients in the other two groups. Those with irritable bowel syndrome were also more likely to seek alternative care when they felt conventional therapy had failed. Homeopaths were the most frequently consulted by irritable bowel patients. Herbal remedies were the most common home treatments. This study found users of alternative therapy were more likely to be women and younger than non-users. The researchers assume in the discussion, without evidence, that use of alternative medicine reflects attention-seeking behavior by the patients rather than assuming flaws in conventional treatment which may encourage patients to seek care elsewhere.

Use of unconventional remedies by arthritis sufferers was investigated by Cronan, Kaplan, Posner, Blumberg, and Kozin (1989). In a metropolitan community, they found 84% of persons with musculoskeletal disorders had used an unconventional remedy. Most used therapies were exercise, prayer, relaxation techniques, massage, and whirlpool and hot tub treatments. The sample was selected from random telephone calls to 1,811 individuals, of which 382 reported having arthritis or other musculoskeletal complaints. A telephone interview was conducted with willing participants with musculoskeletal problems to identify which alternative treatments had been used, if any. Twenty-seven percent had tried vitamins, calcium, and other dietary remedies. The authors concluded

most alternative therapies used by arthritis patients are neither harmful nor expensive. Most patients (40-60%) using massage, relaxation, whirlpool therapy, or exercise found the treatments helpful and the researchers advocate physicians suggest these treatments to their patients as inexpensive alternatives. Cost of treatment, however, was not a research question in this study.

Northcott and Bachynsky (1993) found results similar to Eisenberg et al. (1993) in a randomized survey of 464 households in Edmonton, Canada where 25% had used alternative therapies, with chiropractic therapy being most used. Face to face interviews were conducted after persons were randomly selected from a 1988 census list. Results were compared with responses from another independent sampling done in 1979 where the same interview had been conducted. The researchers attempted to determine if alternative therapy use was changing. They found a slight, statistically insignificant increase in use of alternative therapy between 1979 and 1988. No limitations were discussed in the report, but the results would be limited by the fact that two independent samples were used instead of repeating the interview with the original sample. Generalizability of these results are probably be limited to the Edmonton,Alberta area of Canada.

Spigelblatt, Ammara, Pless, and Buyver (1994) looked at use of alternative medicine by children visiting a pediatric outpatient clinic of a university hospital in Quebec. Eleven percent of children in this study had used a form of alternative therapy. Greatest use was of chiropractors, followed by homeopathy. Naturopathy, acupuncture, osteopathy, and oligotherapy followed in that order. Twenty-three percent of the parents

in this study had also used alternative therapy, and children were more likely to have used alternative therapies if the parents also used them. The study was a convenience sample, with 2055 questionnaires distributed at clinic visits. Although large, this may not have been a representative sample of the Canadian pediatric population. Children visiting a university hospital may have more chronic or devastating illnesses and sought more options than the general population.

Eisenberg et al. (1993) found relaxation techniques were the most commonly used alternative therapy, followed by chiropractic therapy, massage therapy, imagery, spiritual healing, commercial weight loss programs, and lifestyle diets such as macrobiotics. Herbal medicine, megavitamin therapy, self help groups, biofeedback, hypnosis, and acupuncture were used less often by this population.

Murray and Shepherd (1993), conducted a study using a convenience sample of patients visiting an inner London general practice to determine use of alternative medicine in Britain. A questionnaire was sent to 372 registered patients of varying age groups. Response rate was 63%. Thirty-four percent of men and 46% of women responding had tried some form of alternative medicine over the past 10 years. Greatest usage was for physical treatments such as massage or chiropractic treatments, followed by homeopathy and acupuncture. The researchers further conducted a qualitative interview of 20 respondents who used alternative therapies heavily. They attempted to understand health beliefs and reasons for use among those who had tried a variety of treatments. Any findings related to health beliefs were not discussed, but the therapists time and attention were the most highly valued aspect of alternative practice among

interviewed patients. They also report that users of alternative medicine frequently used orthodox therapies and had higher rates of chronic illness. Due to the convenience sampling technique, results would not be generalizable to the general population in either Great Britain or the United States.

Eisenberg et al. (1993) found alternative therapies were sought most often for back problems (36 percent), anxiety (28 percent), headaches (27 percent), chronic pain (26 percent), and cancer or tumors (24 percent). Many Americans also use alternative therapies for nonserious problems as well as health promotion and disease prevention.

Thomas, Carr, Westlake, and Williams, (1991) surveyed patients using non-orthodox care providers by persons in Great Britain. They focused on care provided by non-medical practitioners belonging to national professional associations. A survey form was mailed to a stratified random sample of at least 25 patients from 146 practitioners. A minimum of 25 patients per practitioner were used. Major problems for consulting alternative care were musculoskeletal, especially neck and back pain or arthritis. Spigelblatt et al. (1994) found that for children, alternative healers were mainly consulted for respiratory or musculoskeletal problems.

Characteristics of Users of Alternative Therapy

Furnham and Forey (1994), undertook an extensive study involving 160 participants in two separate groups. One group was visiting a general practitioner and the other an alternative practitioner. Patients were queried about demographic variables, alternative therapies tried, general beliefs about illness, health consciousness, illnesses for which they would seek alternative care or a general practitioner, and health locus of

control. Those patients who consulted an alternative therapist were confident in that practitioner's abilities. However, patients of both general practitioners and alternative therapists would consult conventional medicine first for certain problems, including angina, blood pressure, bronchitis, cancer, incontinence, kidney problems, leukemia, and pneumonia. General practitioner patients saw more threats to their health and believed more strongly in conventional therapies. Alternative therapy patients had lower scores on provider control over health. Though the results were interesting, the detailed amount of information these researchers attempted to study was cumbersome and did not lend itself well to their concise reporting style.

Other research studies have attempted to identify common health beliefs of persons who practice alternative therapies. Furnham and Bhagrath (1993) distributed questionnaires to 80 patients from a traditional medical practice and 80 patients from the practice of a homeopath. Scales with known validity and reliability were used to evaluate health consciousness, health risk, and general beliefs and locus of control. The questionnaire compared health consciousness, perceived health risks, illness prevention, general health beliefs, treatment preference, medical history, mental health, and health locus of control between the two groups of patients. Multivariate and univariate analyses were performed. The researchers found homeopathic patients take less notice of popular health care recommendations, believe in numerous healthy lifestyle methods to prevent illness, had more trust in their chosen primary health care provider, and were somewhat older and with higher incomes. They also believed more in potential self control over health. The researchers caution that the samples were convenience samples

and may not be representative of all consumers of alternative and orthodox medicine.

The findings supported a previous study by Furnham and Smith (1988) which also compared beliefs of patients seeing a homeopath versus a general practitioner. Questionnaires were distributed to every 10th patient at each practice. The main hypothesis tested was that homeopathic patients would have a completely different belief system concerning the origin of illness and maintenance of health than people consulting a general practitioner. Homeopathic patients were more skeptical about the efficacy of traditional doctors and believed strongly that treatment should support the whole person. Homeopathic patients were much more dissatisfied with their general practitioner than were patients of the conventional physicians. No difference was found in the groups regarding their perceived susceptibility to disease.

Sample size was small in both the previously mentioned studies comparing conventional medicine use to homeopathy. Results stemming from evaluation of homeopathic patients cannot be generalized to all users of alternative therapies such as chiropractors, hypnotists, massage therapists, or acupuncturists.

Furnham and Forey (1994) found little difference in demographic characteristics of persons seeking traditional and alternative treatments. The major difference was that the alternative medicine group was more skeptical about traditional care than users of traditional health care.

Furnham (1994) published another study looking at beliefs of those using alternative therapy, after evaluating 350 completed questionnaires from British subjects. He does not discuss the population from which the sample was selected, but does indicate

that it is a convenience sample in which 71% were female. Again, respondents were queried regarding health beliefs using established scales. Furnham found that the more subjects believed in alternative medicine, the more they believed in controllable or internal causes of health, illness, and recovery. Favorable attitudes toward alternative therapy were negatively correlated with fatalistic or external health beliefs.

In a more recent study, Furnham and Beard (1995) again attempted to explain differences in beliefs between persons using traditional versus alternative therapies. In a questionnaire given to 187 patients seeking a general practitioner, acupuncturist, or shiatsu therapist, they asked questions related to health beliefs, Just World Beliefs, and questions to determine psychiatric well-being. The Just World Belief hypothesis focuses on the tendency of people to blame victims of misfortune for their own fate. Persons believing in a just world may see illness as a consequence, not as fate or luck. Every third patient registering for an appointment was given a survey form. Patients of alternative providers stressed the importance of emotional well-being more than traditional provider's patients. Alternative medicine patients were not found to have a higher index of mental illness, and both groups equally believed in a "just world". However, beliefs of patients attending acupuncturists and shiatsu therapists may not be representative of all seeking alternative therapy.

Montebriand and Laing (1991) undertook a qualitative ethnographic study to determine if a desire for control was a factor in using alternative care. The locus of control phenomena was not felt to be stable as many persons change their locus of control in various situations. Some patients appeared to take control of their illness from the

hands of orthodox medicine, but then quickly relinquished control of treatment to a healer with whose techniques they were not familiar. The researchers concluded that locus of control is not static, but constantly changing during illness. Based on these qualitative conclusions, health locus of control may not be a predictive variable determining use of alternative versus conventional therapies.

Semmes (1989) also conducted a qualitative study, interviewing 100 African Americans to describe five themes in conversion to natural health care. First was the shaping of health beliefs prior to obtaining knowledge of professional or formal systems of natural health care, or acquiring the need to select natural health care over orthodox medical care. These beliefs help prepare the user for acceptance of alternative therapy. Secondly, the individual must make a decision to go to a health practitioner, necessitated by the illness experience itself. Thirdly, a lifestyle change occurs regarding consciousness of causes of health and disease and the role of the individual in the therapeutic process. Fourthly, a patient/practitioner encounter occurs and the individual evaluates the therapy. Lastly, the natural health care user generalizes his or her use of this treatment to subsequent illness experiences and may become a regular user. Since his study sample was African-American, one cannot assume all ethnic groups go through the same process in choosing therapy, natural or orthodox.

Summary

Aside from Eisenberg et al. (1993), little research has been conducted regarding use of alternative therapies by Americans. Some literature exists regarding use of alternative therapies by persons with specific problems, such as cancer, arthritis, or

musculoskeletal problems. Approximately one in three Americans have used a form of alternative therapy. Eisenberg et al. (1993) found the most common therapies were relaxation techniques, chiropractor use, and massage therapy.

There are many British and Canadian studies concerning use of alternative therapies by the general population. The research in those countries has moved on to focus on characteristics of persons using alternative treatments to gain an understanding of why people pursue the treatments. Overall, users of alternative care in Britain and Canada believe that individuals should have more control over health care decisions than those who rely solely on conventional treatments. Due to a socialized health system offering different forms of health care, these study results cannot be generalized to this country.

The literature does verify the extensive use of alternative therapy within the folk sector as described by Kleinman (1980) in the conceptual framework. The interaction between the professional and folk sectors seem to vary according to the level of integration of alternative treatments into the mainstream health care system.

CHAPTER III

Methodology

This chapter outlines the methods used to carry out the study. Sections within this chapter include the study design; population and study sample; development of the survey form; pilot study; instrument validity; data collection and analysis procedures; and measures for protection of human subjects. Results of the study will be presented in Chapter IV.

Design

The design of this study is a descriptive survey whose purpose is to determine the extent of alternative therapy use among active duty Air Force officers. This design was chosen to develop a basic sense of use of alternative therapies by Air Force personnel. The research was designed to gain insight into alternative therapy use in the unique social and cultural setting of the Air Force. As Kleinman (1980) states, use of or willingness to use various health care methods is related to cultural and social settings. No other studies have been found on this topic. The design has the advantage of allowing the researcher to quickly collect meaningful data from a small sample of military personnel at a relatively low cost.

Population and Study Sample

The population under study was 5,907 Air Force officers stationed within a 40 mile radius of Washington, D.C. It was felt that if officers from all geographical locations were included, other variables, such as access to alternative therapies, would be introduced which may confound the results. A random sample of 250 officers from this

population was obtained from the Department of Defense Manpower Data Center in Fort Ord, California using the Defense Eligibility Enrollment Reporting System (DEERS). The sample was selected using a SAS sample program, which identified eligible sample members by zip codes within the 40 mile radius. A duty address was obtained for each sample member. Privacy Act regulations prohibited revealing a home address.

Protection of Human Subjects

The proposal for the study was presented to the Institutional Review Board of the Uniformed Services University of the Health Sciences Research Department. The survey under protocol N06102 was deemed exempt from human subject use. Anonymity was assured for the respondents. Survey forms were not coded in any way that could identify the respondent. Respondents were asked not to write their names on the survey form or return envelope.

Instrumentation

The data collection instrument used for this study was developed after a thorough review of the literature, and was based on most used therapies found in the Eisenberg et al. (1993) study. The instrument (AppendixA) is a questionnaire which contains a demographic checklist to obtain data on Air Force Specialty Code (AFSC), age, gender, rank, duty title, marital status, and time on active duty. The instrument includes the alternative therapies from Table 1 that had been found by Eisenberg et al. (1993) to be the most widely used. Respondents were asked to indicate the frequency of their use, whether they had seen a provider offering the specific treatment, whether the treatment was beneficial, and how many times a provider was seen. They were asked to report the

average payment to the alternative care providers they had seen. Respondents were also asked to note whether they would use each therapy if it were available within the military.

Content validity was assessed by three experts who reviewed and approved the survey instrument. The assessors included the Director of the Department of Alternative Medicine for the National Institutes of Health (NIH), the Coordinator of Alternative Medicine Seminars at the Uniformed Services University of Health Sciences (USUHS), and the USUHS Epidemiologist. Based upon input from the NIH director, a section was added to determine if users of an alternative therapy found the treatment beneficial. No other changes were suggested by this panel of experts.

The questionnaire was submitted to the Survey Branch at AFMPC/DPSAS, Randolph Air Force Base, Texas where it was approved for use with Air Force active duty members and given a survey control number of USAF SCN 95-88 (Appendix B). Under instructions from the Survey Branch, the sample was limited to company and field grade officers. General grade officers were not included in the survey.

The questionnaire was pretested by administering it to nine nurse practitioner students at USUHS to eliminate ambiguous, difficult, or troublesome items. Comments were obtained related to readability and interpretation of the survey items. The students found the directions to be easily understood and completed the questionnaire as expected. Thus, the pretest served as a reliability test of the questionnaire. Formal reliability testing was not done as the items are unambiguous, clearly worded, and elicit objective, straightforward responses.

Data Collection Procedures

The questionnaire was mailed to 240 of the randomly selected sample members. A letter (Appendix C) that defined alternative therapies and gave instructions for questionnaire completion accompanied each questionnaire, along with a self-addressed, stamped return envelope. The questionnaire was estimated to take 15 minutes to complete.

Data Analysis Procedures

Descriptive statistics were prepared for all items on the questionnaire. Questions on use of alternative therapies were cross tabulated with demographic characteristics. Coefficients of correlation were computed to determine if any correlations between these variables existed and statistical significance of correlations was computed. The SPSS programs were used to compute study data and assess statistical significance.

Summary

This chapter has summarized the research design and methods for the sample of respondents. The development of the survey form was discussed and data collection procedures were reviewed. Data analysis was described using SPSS software. The data analysis results will be presented in Chapter Four.

CHAPTER IV

Data Analysis

The results of this study are organized around the questions that guided the inquiry. The demographic characteristics of the sample are described first, followed by frequencies, percentages, and correlations of the variables with alternative health care usage.

Description of the Study Sample

The study sample originally consisted of 250 randomly selected active duty officers stationed within a 40 mile radius of Washington, D.C. Ten members of the sample had to be eliminated from the sample list because of a lack of a correct duty address and the inability to use private home addresses. Of the 240 questionnaires that were mailed, 35 were returned because the addressee was no longer at the mailing address and no forwarding address was available. Of the remaining 205 sample members, 118 returned the completed questionnaire for a response rate of 58%.

Demographic Data

As seen in Table 2, 74 percent of respondents were male and 26 percent were female. (Females represented 22% of the original sample of 250 personnel.) Although ages ranged between 18 years to 50, most respondents (71%) were between 35-49 years old. Ninety-one percent were Caucasian and eight percent were African-American. Two persons did not answer this question. Forty-one percent had been in the military between 15-20 years and 24 percent had served greater than 20 years. The majority of respondents were in field grade ranks of Major (38%) or Lieutenant Colonel (25%).

Twenty-two percent were Captains. An overwhelming majority (82%) were married. A variety of occupations were represented, although 17 (14.4%) of respondents left this portion unanswered or filled in an incomplete code number for the duty title.

Research Question #1

What proportion of active duty Air Force officers have used alternative therapies during the past two years?

Of 118 respondents, 40 (34%) had used at least one form of alternative therapy. Nineteen had used one therapy, and 21 had used two or more forms of alternative therapies. Seventy-eight respondents had not used any form of alternative therapy. Since the standard error of the percentage of users was determined to be .044, the confidence is 95% that the percentage of users of alternative therapy in the total population falls witin a range of 26% to 42%.

Table 2
Demographics of 118 Respondents

Characteristic	No	%	Characteristic	No	%
Gender			Rank		
Male	87	73.7	0-1 (2nd Lieutenant)	6	5.1
Female	31	26.3	0-2 (1st Lieutenant)	4	3.4
Age			0-3 (Captain)	26	22
18-24	3	2.5	0-4 (Major)	38	38
25-34	28	23.7	0-5 (Lt Colonel)'	29	29
35-49	84	71.2	0-6 (Colonel)	15	15
≥50	3	2.5	Marital Status		
Race or Ethnic Group			Single	15	12.7
Asian	1	0.9	Married	97	82.2
Hispanic	1	0.9	Divorced	6	5.1
African-American	9	8.0	Duty Title		
Caucasian	105	90.5	Readiness	21	17.8
Years in Service			Acquisitions/contracting	8	6.8
0-4	8	6.8	Engineers/scientists	5	4.2
5-9	13	11	Health care	12	10.2
10-14	27	22.9	Pilots/navigators	20	16.9
15-20	41	34.7	Special investigations	4	3.4
>20	29	24.6	Computer/information	16	13.6
			Support Personnel	15	12.7

Research Question #2

What alternative therapies are being used by active duty Air Force officers?

The prevalent therapies used by active duty Air Force members are presented in Table 3. The most commonly used alternative therapy was massage therapy, used by 15 respondents. This was followed by herbal therapy (11), relaxation techniques (10), megavitamin therapy (10), chiropractor use (9), commercial weight loss programs (6), and self help groups (6).

Research Question #3

How frequently are alternative treatments being used?

The information from this question is difficult to pinpoint as the ranges available for selection were large. Forty six providers of alternative treatments were sought in various categories for varying numbers of total visits during the past two years. Twelve respondents consulted massage therapists for as few as one and as many as ten sessions. The next most frequently consulted provider category was chiropractor. Six respondents had seen a chiropractor for between one to ten visits, two had gone between 11-29 times, and one had gone greater than or equal to 30 times.

Self-help groups were utilized by two respondents for between 11-29 sessions, and two had utilized this therapy for greater than 30 visits. Two respondents had visited an acupuncturist for at least one, and fewer than 10 times. Weight loss clinics were visited by four persons at various frequencies. No respondents reported seeing a provider of homeopathy, naturopathy, or biofeedback, although use of these techniques was annotated. Presumably the healing methods in these areas were self taught.

Table 3
Frequency of Use of Unconventional Therapy in 118 Respondents

Type of Therapy	No. Used in Past 2 Years	No. Saw A Provider
Massage	15	12
Herbs	11	1
Relaxation Techniques	10	4
Megavitamins	10	3
Chiropractor	9	9
Commercial Wt Loss	6	4
Self Help Groups	6	4
Visualizations	5	2
Yoga, Akido, Tai Chi	4	2
Acupressure	4	2
Homeopathy	3	-
Acupuncture	2	2
Biofeedback	1	-
Naturopathy	1	-
Therapeutic Touch	1	1

Note. # denotes Number of respondents. (-) denotes no respondents with this response.

Persons seeking alternative therapies were willing to pay out-of-pocket expenses for their visits (Table 5). The majority (19 of 46) reported the amount spent per visit to an alternative provider was $20.00 or less per visit. Eight persons reported spending between $21-39 dollars per visit, eleven paid $40-59 dollars for each visit. Eight persons, five of whom saw massage therapists, reported paying $60.00 or more per visit. Since the purpose of this study was not to determine the precise amounts of money spent on alternative therapies by military members, exact dollar amounts were not obtained.

Research Question #4

What are the major physical complaints for which alternative therapies are being sought by active duty Air Force officers?

Major physical problems for which Air Force officers sought care by alternative therapists are listed in Table 4. Sixteen respondents used alternative care for back problems, nine for allergies, and nine each for headaches and sprains or strains. Eight personnel

Table 4
Symptoms for Which Alternative Therapies were Used Based on 118 Respondents

Problem	No	Percent
Back Problems	16	13.6
Allergies	9	7.6
Headaches	9	7.6
Sprains/Strains	9	7.6
Weight Problems	8	6.8
Anxiety	5	4.2
Arthritis	2	1.7
Digestive Problems	2	1.7
Hypertension	2	1.7
Depression	1	0.8
Others (Neck pain, addictions)	5	5.1

had consulted alternative therapists for weight problems, and five had used these therapies for anxiety. Several persons commented that they did not use alternative therapies for specific disorders, but as part of a healthy lifestyle.

Research Question #5

Is there any relationship between demographic characteristics of Air Force officers and their use of alternative therapies?

The only statistically significant demographic characteristic of users of alternative medicine was gender(.05 level). Women were more frequent than men. Of 31 female respondents, 15 had used at least one form of alternative therapy. Race and ethnic origin also was statistically significant, but due to the very small number of respondents who were not Caucasian, this cannot be interpreted as having statistical relevance.

Research Question #6

Do Air Force officers find alternative treatments beneficial if they have been used?

The majority of users of alternative therapies found them beneficial (Table 5). All nine users of chiropractors responded that the treatment was beneficial. Eleven of 15 users of massage therapy felt it was beneficial. Six of 10 users of megavitamin therapy responded that the treatments were helpful, while five out of six users of self-help groups found this beneficial, and one did not.

Table 5
Treatment Benefit and Dollars Spent
Based on 118 Respondents

Treatment	Total No. Using Therapy	Beneficial		Dollars Spent			
		Yes	No	≤20	21-39	40-59	≥$60
Acupressure	4	2	-	-	-	-	2
Acupuncture	2	1	-	1	-	-	1
Chiropractor	9	9	-	3	2	3	1
Herbs	11	6	-	1	-	-	-
Massage	15	11	1	3	1	3	5
Homeopathy	3	1	2	1	-	-	-
Megavitamins	10	6	-	-	1	1	1
Relaxation Techniques	10	7	-	2	1	1	-
Self-Help Groups	6	5	1	2	1	1	-
Therapeutic Touch	1	1	-	-	1	-	-
Visualization	5	3	1	2	1	-	-
Weight Loss	6	3	1	2	-	2	-
Yoga, Akido, Tai Chi	4	3	-	2	-	-	-

Note. A hyphen denotes no response to this item. N=118

Research Question #7

Would Air Force officers use these therapies if they were integrated into the professional military health care system?

Many personnel indicated they would use alternative health care treatments if they were part of the military health care system (Table 6). Even among the 78 personnel who had indicated no previous use of alternative therapies, 38% would use at least one of the listed treatments if available within the military. Of the 118 respondents, 70 (59%) including those who had used or not previously used alternative therapies, would use a form of alternative therapy if it were available within the military health care system. Forty-six (39%) indicated they would use massage therapy, 35 (29.7%) would use a chiropractor, and 31 (26.3%) would use relaxation techniques. Twenty (16.9%) would use acupuncture, 17 (14.4%) would use herbs, and 18 (15.3%) would use a commercial weight loss program if available. Many persons who had not used alternative treatments did not complete the survey form in its entirety, and may have overlooked this question. Thus, the 38% of respondents who had not used alternative therapies, but indicated they may use it if needed, may be higher.

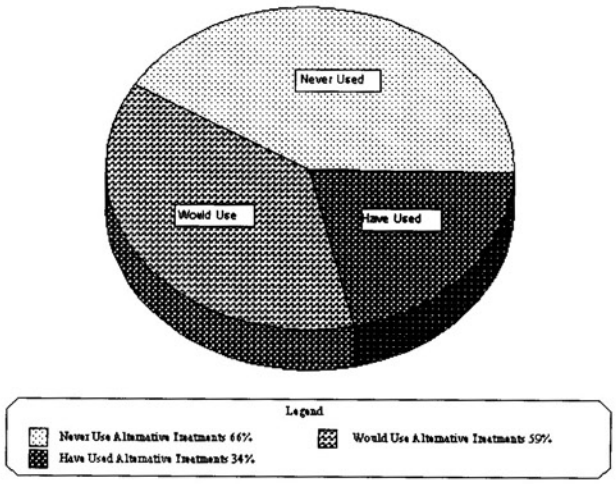

Figure 1.
Retrospective and Prospective Use of Alternative Therapies
N=118

Table 6
Number of Respondents Who Would Use if Offered in Military System
Based on 118 Respondents

Therapy	Yes		No		No Reply	
	Number	Percent	Number	Percent	Number	Percent
Massage	46	39	20	17	52	44
Chiropractor	35	29	39	33	56	47
Relaxation	31	26	30	25	57	48
Acupuncture	20	17	39	33	59	50
Megavitamin	19	16	40	34	59	50
Commercial Weight Loss	18	15	40	34	60	51
Herbs	17	14	42	36	59	50
Yoga, Akido, Tai Chi	17	14	41	35	60	51
Self-Help	14	12	45	38	59	50
Acupressure	13	11	44	37	61	52
Biofeedback	13	11	44	37	61	52
Homeopathy	12	10	44	37	62	52
Therapeutic Touch	9	8	48	41	61	52
Visualization	9	8	50	42	59	50
Naturopathy	6	5	51	43	61	52
Hypnosis	5	4	52	44	61	52
Reiki	3	2	54	46	61	52

Additional Findings

Some additional findings other than those addressed by the research questions were obtained by the questionnaire. An interesting finding concerned use of weight loss programs. All six respondents who had used a commercial weight loss program were female.

Other findings included narrative comments made by the respondents. Ten respondents commented on some personal alternative therapies. Most involved relaxation methods. One respondent noted he used herbal teas and herbal baths for relaxation and stress relief. Another commented on his use of antioxidants and healthy lifestyle as a means of prevention against disease. One Lieutenant added that he used laugh therapy and music to relax. Others had done research on various herbs and vitamin supplements, and were using these for illness prevention.

Two individuals commented that they preferred alternative therapy to conventional therapy because conventional physicians offered only "pills", and they preferred non-drug treatments. Two respondents specifically requested the military to offer chiropractic care because of past benefits they had experienced. Four persons commented on their willingness to try alternative treatments if they felt it was necessary, though they had no past experience in the area.

Four of the respondents said that there was no place in military medicine for alternative therapies. They felt it was a waste of tax dollars, and persons wishing these treatments should pay for the expense on their own.

CHAPTER V

Summary, Discussion, Conclusions, Recommendations

This chapter focuses on the discussion and implications of the results. It begins with a summary of the study, followed by discussion and possible explanations of the findings. Implications for practice and for further research are included.

Summary of the Study

To date, little research has been done regarding use of alternative therapies by the general American public. Eisenberg et al. (1993) published results of a study noting use of alternative therapies by one in three Americans. No research is available regarding use of alternative therapies within the unique culture of the military. This study examined use of alternative therapies by active duty Air Force officers in a study population located within a forty mile radius of the Washington, D.C. metropolitan area. The conceptual framework for this study drew on Kleinman (1980) and his development of health care systems as forms of social reality and how these systems differ between various social groups and cultures. Kleinman described a structural model of health care systems composed of three overlapping sectors: popular, professional, and folk. The folk sector included alternative therapies and the professional sector included conventional medical practices. The popular sector, wherein lies the lay popular culture, serves as a liaison between the professional and folk sector and helps determine the health care sought by members of society. Though Eisenberg et al. (1993) suggest that one of three Americans use alternative therapies, Kleinman (1980) states that use may be different between various social groups and sub-cultures. Thus, the major purpose of this

study was to explore use of alternative therapies by active duty military personnel to see how it differed from other groups.

A descriptive survey design was used to examine use of alternative therapies by the study sample. The survey questionnaire was developed with reference to findings from Eisenberg et al. (1993). Validity was confirmed using two experts in the field of alternative medicine, and an epidemiologist. Clarity of the questions was determined by pretesting the survey with nine nurse practitioner students. The questionnaire was mailed with an introductory instruction letter and self-addressed, stamped return envelope to a random sample of 250 active duty Air Force officers. The response rate was 58%. Anonymity of respondents was ensured by lack of any identification.

Responses to the research questions were analyzed by descriptive statistics, such as frequencies and percentages in addition to correlation coefficients when appropriate. Tables were designed to display study results.

The major study findings were: Active duty Air Force personnel used alternative therapies at the same rate as Eisenberg et al. (1993) found among the general population. Thirty-four percent had used at least one form of alternative therapy. Most frequently used therapies among sample respondents in the sample were massage therapy, herbs, relaxation techniques, chiropractor use, followed by commercial weight loss programs, and self help groups. The most common problem for which alternative therapies were sought were back problems, allergies, headaches, sprains or strains, weight problems, and anxiety. All of these, with the exception of weight problems, were included in Eisenberg's list of the top 10 medical conditions for which alternative treatments are sought. The only notably significant demographic characteristic correlating with use of

alternative healers was gender. Most users of alternative therapies found the treatment beneficial. Most persons seeing an alternative healer went as little as one or as many as 10 times. The majority of total respondents spent under twenty dollars per visit on alternative therapy. However, several paid at least sixty dollars per visit to an alternative healer. When asked if they would use alternative therapies if available in the military health care system, 59% of total respondents indicated they would use alternative therapies, with massage therapists, chiropractors, relaxation techniques, and acupuncturists being the most desired.

Implications of the Findings

The results of this study indicate that though the military is a unique sub-culture, use of alternative therapy compares to usage in mainstream American culture. Air Force members are using alternative therapies, and even if not presently using alternative therapies, 59% would use them if they felt it was indicated. This demonstrates a general acceptanceof treatments other than those offered by conventional medicine. As the Air Force moves toward building healthy communities and wellness lifestyles, alternative medicine practices may well be instituted without great resistance. Most used alternative therapies are those related to stress reduction, such as massage and relaxation techniques. Many members are using herbs and megavitamins for self treatment or illness prevention. Nurse practitioners, physicians, and physician assistants who provide health care for military beneficiaries need to be aware of use of alternative therapies. In the Eisenberg et al. (1993) study, 72% of users of unconventional therapies did not inform their health care provider of use of these therapies. Health care providers must remain informed about current trends in alternative treatments, such as vitamin and mineral supplements.

They should keep abreast of research identifying benefits and safety issues. Some treatments or supplements may be dangerous for certain individuals, and providers must offer an open forum for discussion of these treatments with their patients. Nurse practitioners, with a strong focus on prevention of illness, may consider incorporating alternative treatments in teaching patients stress reduction and relaxation techniques.

Some forms of what may be considered marginal forms of alternative therapies are already available within some military health care facilities. Often these are offered within the mental health care services. Examples include self-help groups, visualizations, biofeedback, and relaxation techniques. These services are not available at each installation, and access is often limited. Having the resources available within the mental health department may carry a stigma that is difficult to eliminate. With the acceptance of many of these forms of alternative therapy, the health care facility may want to investigate offering the services in settings other than through mental health departments.

Paterson and Peacock (1995) report the difficulties and benefits of having alternative health care practitioners as part of the primary health care team in a small practice in England. Physicians in the practice could refer patients to an alternative therapist or the patient could self-refer. Physicians expressed positive sentiments about having the alternative providers readily available. These cooperative models are becoming more prevalent in England, but may well be a long term outcome in America where studies on alternative medicine use are just emerging. In striving toward a healthier force, the Air Force should be aware of development of these collaborative systems.

Interpretation of Findings

The findings of this study are based on a relatively small sample of active duty Air Force members from the metropolitan Washington D.C. area. There may be more access to alternative providers in such a setting than a more rural setting. The faster pace and stress of the high profile military duties in this area may stimulate seeking forms of stress reduction that persons in other areas do not require.

That personnel do seek care from alternative providers may mean they are not getting comprehensive care from their military health care providers. Perhaps military providers do not offer holistic approaches that deal with interpersonal issues or stress reduction techniques and options.

The popular sector within the military culture may also determine for what health problems military providers are sought for conventional treatments. There may be no support system for use of conventional military providers for some problems, and this may bring about decisions to obtain care from alternative healers. As Kleinman (1980) noted, within the popular sector many health care decisions are made, and determinations are also made as to what requires treatment seeking behavior and the source from which treatment is to be sought.

Implications for Further Research

This study documents the extent of alternative medicine use within the American population. It indicates use of alternative treatments does not differ within the military culture.

Further research needs to be done to determine the reasons persons decide to seek alternative care. Studies should also explore possibilities of integration of alternative

therapies within the conventional system. This could be especially beneficial in the areas of disease prevention and stress reduction.

This particular study warrants replication Air Force wide. Further areas to explore include obtaining accurate data on utilization of services and expenditures on alternative care. This could be done with minor modifications to the questionnaire used in this study by having respondents supply the actual numerical answers to these questions instead of circling a range of numbers. Other areas of interest include use of alternative therapies by military dependents, and reasons for use of alternative therapies as well as characteristics of users of alternative therapies in both the Air Force and the American population as a whole.

APPENDIX A

SURVEY QUESTIONNAIRE

ALTERNATIVE THERAPY SURVEY

1. Please write in your duty AFSC.

_____

For the following, please darken the circles next to the correct response.

2. What is your gender?

○Male ○ Female

3. What is your age?

○18-24 ○35-49
○25-34 ○ ≥ 50

4. What is your race or ethnic group?

○ Asian ○ African-American
○ Hispanic ○ Caucasian
○ Other

5. What is your rank?

○0-1 ○ 0-5
○0-2 ○ 0-6
○0-3 ○ ≥0-7
○0-4

6. What is your marital status?

○Single ○Divorced
○Married ○Widowed

7. How many years have you served on Active Duty?

○0-4 years ○15-20 years
○5-9 years ○ > 20 years
○10-14 years

The next two sections will pertain to any alternative forms of health care you have received. Please consider all treatments you have received <u>over the past 2 years.</u>

8. From the following list, please darken the circle beside **<u>all problems</u>** for which you sought the help of an alternative healer (you may first want to look over the healing methods listed on the back of the questionnaire).

○ Back problems

○ Allergies

○ Arthritis

○ Anxiety

○ Headaches

○ Sprains or Strains

○ Digestive problems

○ Depression

○ High Blood Pressure

○ Weight problems

○ Cancer or tumor

○ Blood sugar problems

Please list any others below.

_____
_____
_____

Please turn over for Part II ☞

Treatment	Used therapy in past 2 years	Saw a provider for treatment	Number of times provider seen for treatment/assistance	How much did you pay in dollars for each visit?	Treatment Beneficial	I'd use if available in the military
Relaxation techniques	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Chiropractic	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Massage	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Acupuncture	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Megavitamin Therapy	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Hypnosis	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Commercial Weight Loss Program	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Biofeedback	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Homeopathy	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Naturopathy	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Acupressure	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Therapeutic Touch	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Self Help Groups	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Herbs	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Reiki	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Visualizations	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No
Yoga, Akido, or Tai Chi	○ Yes ○ No	○ Yes ○ No	○ 0 ○ 1-10 ○ 11-29 ○ ≥ 30	○ ≤ 20 ○ 21-39 ○ 40-59 ○ ≥ 60	○ Yes ○ No	○ Yes ○ No

Please write in any other alternative therapies you have used which are not listed.

Additional comments:

APPENDIX B

AIR FORCE SURVEY CONTROL NUMBER

DEPARTMENT OF THE AIR FORCE
HEADQUARTERS AIR FORCE MILITARY PERSONNEL CENTER
RANDOLPH AIR FORCE BASE TEXAS

11 September 1995

MEMORANDUM FOR UNIFORMED SERVICES UNIVERSITY OF
THE HEALTH SCIENCES
ATTN: MAJOR HARRIS

FROM: AFMPC/DPSAS
550 C Street West, Ste 35
Randolph AFB TX 78150-4737

SUBJECT: Request for Survey Control Number (Your FAX 7 Sep 95)

Your proposed Alternative Therapy Survey is approved for use with Air Force active duty members. Please restrict your sample to company and field grade officers only. A control number of USAF SCN 95-88 is assigned and expires on 31 Dec 95. Questions about this action can be directed to me at DSN 487-5680.

CHARLES H. HAMILTON
Chief, Survey Branch

APPENDIX C

INTRODUCTORY LETTER

UNIFORMED SERVICES UNIVERSITY OF THE HEALTH SCIENCES
F. EWARD HÉBERT SCHOOL OF MEDICINE
4301 JONES BRIDGE ROAD
BETHESDA, MARYLAND 20814-4799

TEACHING HOSPITAL
WALTER REED ARMY MEDICAL CENTER
NAVAL HOSPITAL, BETHESDA
MALCOLM GROW AIR FORCE MEDICAL CENTER
WILFORD HALL AIR FORCE MEDICAL CENTER

Dear Colleague:

You have been selected as part of a random sample to participate in an important study concerning the use of alternative medicine services by Air Force personnel. The results of the study will also show whether military personnel would like to have these services available within the military health care system. I am undertaking this study as a graduate student in the Family Nurse Practitioner program at the Uniformed Services University of Health Sciences (USUHS).

In 1993, Dr. David Eisenberg and his colleagues published a study on prevalence, costs, and patterns of use of alternative or unconventional medicine in the United States. The results showed that use of alternative medicine is very prevalent among Americans, and most care is paid for by the individual. Conventional medicine is practiced or directed by physicians, physician assistants, or nurse practitioners. Alternative therapies are generally considered to be any treatment outside this mainstream of conventional medicine. These unconventional therapies are numerous, and include treatments by chiropractors, acupuncturists, herbal therapists, and many more.

The survey takes approximately fifteen minutes to complete. Your anonymity is assured and individual responses will remain confidential. After study results are compiled, the report will be reviewed by USUHS faculty and by personnel at the Air Force Surgeon General's office. Please fill in the information promptly after receipt and return the survey in the self-addressed, stamped envelope provided.

Please follow directions for each question carefully. Add any comments you feel relative to the study. Please do not place your name on the questionnaire. If you have additional input, or would like a copy of the study results, please address inquiries to me at the following address:

Maj. Betty S. Harris
1624 Hiddenbrook Dr.
Herndon, VA 22070

Thank you for your participation in this research project. Please return the completed questionnaire within two weeks.

BETTY S. HARRIS, Maj, USAF, NC
Family Nurse Practitioner Student

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