

Running head: The Alaska Federal Healthcare Partnership

Alaska and the Alaska Federal

Health Care Partnership

By

Richard W. Hoyt

MAJ, USA

This Graduate Management Project submitted
In partial fulfillment of graduation requirements for the
U.S. Army-Baylor University
Master's in Health Care Administration Program

Report Documentation Page

Form Approved
OMB No. 0704-0188

Public reporting burden for the collection of information is estimated to average 1 hour per response, including the time for reviewing instructions, searching existing data sources, gathering and maintaining the data needed, and completing and reviewing the collection of information. Send comments regarding this burden estimate or any other aspect of this collection of information, including suggestions for reducing this burden, to Washington Headquarters Services, Directorate for Information Operations and Reports, 1215 Jefferson Davis Highway, Suite 1204, Arlington VA 22202-4302. Respondents should be aware that notwithstanding any other provision of law, no person shall be subject to a penalty for failing to comply with a collection of information if it does not display a currently valid OMB control number.

1. REPORT DATE AUG 2002		2. REPORT TYPE Final		3. DATES COVERED Jul 2001 - Jul 2002	
4. TITLE AND SUBTITLE Alaska and the Alaska Federal Health Care Partnership				5a. CONTRACT NUMBER	
				5b. GRANT NUMBER	
				5c. PROGRAM ELEMENT NUMBER	
6. AUTHOR(S) MAJ Richard W. Hoyt				5d. PROJECT NUMBER	
				5e. TASK NUMBER	
				5f. WORK UNIT NUMBER	
7. PERFORMING ORGANIZATION NAME(S) AND ADDRESS(ES) US Army MEDDAC-AK Bassett Army Community Hospital 1060 Gaffney Road Fort Wainright, AK 99703				8. PERFORMING ORGANIZATION REPORT NUMBER	
9. SPONSORING/MONITORING AGENCY NAME(S) AND ADDRESS(ES) US Army Medical Department Center and School Bldg 2841 MCCS-HRA (US Army-Baylor Program in HCA) 3151 Scott Road, Suite 1412 Fort Sam Houston, TX 78234-6135				10. SPONSOR/MONITOR'S ACRONYM(S)	
				11. SPONSOR/MONITOR'S REPORT NUMBER(S) 35-02	
12. DISTRIBUTION/AVAILABILITY STATEMENT Approved for public release, distribution unlimited					
13. SUPPLEMENTARY NOTES The original document contains color images.					
14. ABSTRACT The intent of the Alaska Federal Healthcare Partnership is to expand clinical and support capabilities of the Alaska Native Medical Center (ANMC), Third Medical Group(3MDG), Bassett Army Community Hospital (BACH), 354th Medical Group (354th MDG), United States Coast Guard (USCG) and Veterans Administration (VA) through sharing of resources. The Alaska Federal Healthcare Partnership seeks to deliver cost effective health care to Indian Health Service (IHS), VA, USCG and Department of Defense(DoD) beneficiaries. The Partnership has demonstrated savings of over one million dollars annually. This is a significant accomplishment when the cost of health care in Alaska routinely exceeds 200 percent of CONUS costs and very few providers accept Medicare or TRICARE. This project examines the qualitative aspects of health care delivery by the AFHCP to eligible beneficiaries within Alaska.					
15. SUBJECT TERMS Alaska Federal Health Care Partnership					
16. SECURITY CLASSIFICATION OF:			17. LIMITATION OF ABSTRACT UU	18. NUMBER OF PAGES 119	19a. NAME OF RESPONSIBLE PERSON
a. REPORT unclassified	b. ABSTRACT unclassified	c. THIS PAGE unclassified			

Acknowledgments

I want to acknowledge and thank those people whose guidance and assistance were instrumental in completing this project.

First and foremost, I want to thank God for continuing to guide and watch over my family and me.

I extend my thanks to Colonel James K. Gilman, Commander, Bassett Army Community Hospital, for allowing me to perform my residency in his hospital and for ultimately providing the topic of the GMP.

To my co-preceptor, Colonel Cathy Johnson, Deputy Commander for Nursing (BACH), for keeping me motivated and providing timely guidance and mentoring.

To my co-preceptor, Lieutenant Colonel Doug Schroeder, Deputy Commander for Administration (BACH), for providing the resources to complete this task and always keeping an open door to my questions.

To Dr. A. David Mangelsdorff, my academic advisor, counselor and reader, for his timely guidance and wisdom during my academic experience.

My special thanks goes to the AFHCP Project Support Office. In particular, I want to thank, Ms. Susan Yeager (Director of the AFHCP-PSO) and Captain William Bohl (Deputy Director of the AFHCP-PSO). Their assistance was invaluable in gathering the data and putting it in perspective.

Thanks also to Ms. K. Lee Hardcastle, Chief of Managed Care (BACH) and one of the founding members of the AFHCP, for providing great insight into the Partnership.

To Ms. Joyce Lindberg, Secretary to the Commander (BACH), for her support, encouragement, travel arrangements, proofreading skills, and her positive attitude.

Finally, my most sincere thanks to my lovely wife Kim and our children for their patience, understanding and love during the many hours it took to complete the Baylor program and this Graduate Management Project.

Abstract

The intent of the Alaska Federal Healthcare Partnership is to expand clinical and support capabilities of the Alaska Native Medical Center (ANMC), Third Medical Group (3MDG), Bassett Army Community Hospital (BACH), 354th Medical Group (354th MDG), United States Coast Guard (USCG) and Veteran's Administration (VA) through sharing of resources. The Alaska Federal Healthcare Partnership seeks to deliver cost effective health care to Indian Health Service (IHS), VA, USCG and Department of Defense (DoD) beneficiaries. The Partnership has demonstrated savings of over one million dollars annually. This is a significant accomplishment when the cost of health care in Alaska routinely exceeds 200 percent of CONUS costs and very few providers accept Medicare or TRICARE. This project examines the qualitative aspects of health care delivery by the AFHCP to eligible beneficiaries within Alaska.

Table of Contents

Title Page	1
Acknowledgments	2
Abstract	3
Table of Contents	4
List of Tables.	6
List of Figures	7
Chapter 1 Introduction	8
Introduction	8
Alaska Background	8
Alaska	8
Alaska Economy	9
Alaska Demographics	10
Living In Alaska	11
Health Care In Alaska	12
Literature Review	19
Partnership Background	27
The Partnership	27
Mission Statement	30
Goals	30
About The Partnership	31
Partnership Demographics.	32
The Formal Agreement	34
Purpose and Research Objective	35
Chapter 2 Methods and Procedures.	38
Participants	38
Assumptions	38
Materials	38
Design and Procedure	39
Limitations of the Study	40

Chapter 3 Results	42
Objective 1 Achievement of Stated Partnership Goals.	42
Objective 2 Costs and Benefits of Bassett's Participation	58
Chapter 4 Discussion	66
Objective 1 Achievement of Stated Partnership Goals.	66
Objective 2 Costs and Benefits of Bassett's Participation	71
Chapter 5 Conclusions and Recommendations	72
Conclusion	72
Recommendations	73
References	75
Appendix A Veterans Affairs.	80
Appendix B Department of Defense.	83
Appendix C U.S. Coast Guard.	87
Appendix D IHS/Tribal Entities.	90
Appendix E Initial Eight Partnership Goals.	95
Appendix F AFHCAN Project	99
Appendix G AFHCP Current Contracts/ Agreements/MOUs/LOAs	112
Appendix H Acronyms	118

List of Tables

Table

1. Comparison of Age-Adjusted Death Rates for the Ten Leading Causes of Death in Alaska and the United States, 1998	14
2. Health Care Infrastructure and Health Indicators for Alaska	15
3. 1995 Increased Access Numbers Based on Staff Sharing	42
4. Significant AFHCP Contracts with Savings for Fiscal Year 1995	44
5. Shared Staff and Equipment Ventures with Access Numbers and Savings for FY 1996	45
6. 1998 AFHCP Agreements with Cost-Savings	48
7. Significant Cost-Saving AFHCP Contracts for Fiscal Years 2000, 2001	49
8. Significant AFHCP Initiatives with Increased Access Numbers for FY 2000, 2001	50
9. Partnership Support Office Cost-Benefit Analysis	53
10. Fiscal Year 2002 PSO Personnel Budget with Facility Contribution	60
11. Fiscal Year 2002 PSO Operating Costs	61
12. Recommended Facility Contribution for FY 2002 PSO Expenses	62
13. Cost Benefit Comparison for Bassett Army Community Hospital.	62
14. TRICARE Pacific Population and Enrollment for Alaska as of June 2001	66

List of Figures

Figure

1. Projected Percentage Change in Total Population and Population 65+ years of Age	12
2. Initial Partnership Population Beneficiaries	32
3. Initial Partnership Breakdown by Age	33
4. Current Federal Beneficiary Population	34
5. Historical Cost Avoidance Figures Attributed to AFHCP Initiatives	52
6. Historical Net Financial Outcomes for the AFHCP	54
7. PSO Organizational Structure with Sponsor	59
8. BACH Costs and Financial Benefits for FY 1998-2001	63
9. FY 1998 AFHCP Realized Financial Savings and Cost Avoidance by Partner	64
10. FY 1999 AFHCP Realized Financial Savings and Cost Avoidance by Partner	64
11. FY 2000 AFHCP Realized Financial Savings and Cost Avoidance by Partner	65
12. FY 2001 AFHCP Realized Financial Savings and Cost Avoidance by Partner	65

Chapter One: Introduction

Introduction

The Alaska Federal Health Care Partnership (AFHCP) is a model of success for cooperation among Federal agencies. It is a creative approach to mitigate a significant health care deficiency in a geographically isolated and medically underserved area. There are numerous factors that led to the formulation of the AFHCP. They will be addressed from the perspective of the past, present and future. The project and some of the initiatives sponsored by the Partnership will also be addressed. To fully appreciate why the Partnership was formed, a thorough understanding of the environment is necessary. The next few pages will examine and discuss the main factors contributing to the formation of the Partnership. Although lengthy, the information is essential to appreciate the magnitude of the Partnership and the intent behind its formation.

Alaska Background

Alaska

Alaska is a Pacific state and the 49th state admitted to the United States on January 3, 1959. At 43 years old, Alaska is a comparatively young state.

With a landmass of 590,000 square miles, Alaska ranks as the largest state and the least densely populated with only 627,000 people. Alaska is one fifth of the total area of the continental United States or two and one half times larger than Texas. It is said to be the “last frontier” and is the home of Eskimos, Indians, Aleuts and immigrants from all over the United States seeking wealth and adventure. Alaska has strategic

importance to the United States and the whole North American continent because of its northwestern proximity to the Asian continent. (Rogers, 1990)

Alaska is rugged with 17 of the 20 tallest mountains in the United States. There are 39 separate mountain ranges in Alaska and more than 3 million lakes over 20 acres in size. There are more than 3000 rivers in the state, including the Yukon River, which is 1875 miles long (in Alaska) and is the third longest river in the United States. The numerous rivers are critical because during the long winters, the frozen rivers become roadways and landing strips for remote villages receiving their annual supplies. There are only 3 major highways linking the state (Rogers, 1990).

Alaska Economy

Alaska's economy relies heavily upon government activities. Government, inclusive of local, state and Federal agencies, provides the basis for many of the state's private industries (Rogers, 1990). Government is the largest employer in the state (Bureau of Economic Analysis, 2001). Alaska's economy is driven primarily by oil, tourism and fishing (Alaska Visitor Information – Economy, 2001). Other important industries in the state are timber, mining and agriculture. The oil and gas industry is the largest component of Alaska's economy. Nearly 85 percent of the state budget is supplied by oil revenues. The fortunes of Alaska's oil industry, and therefore many sectors of the economy, are dependent upon world prices (Alaska Visitor Information – Economy, 2001).

Tourism is also a major contributor to Alaska's economy. The industry attracts over 1.1 million visitors annually. Tourism is Alaska's second largest employer. The fishing industry is fueled by the rich coastal waters of Alaska and harvests nearly 6

billion pounds of seafood annually and is the world's largest supplier of wild salmon. Timber, mining and agriculture round out the rest of the major economic resources. The timber industry is diverse and draws from the two largest national forests in the United States. The mining industry is fueled by half of the nation's coal reserves and the largest zinc and silver mines in the United States. There are 15 million acres of soil suitable for farming in Alaska with only 1 million currently used. The agriculture industry is aided by the extremely long summer days, which can produce record-breaking yields from crops (Alaska Visitor Information – Economy, 2001).

Alaska Demographics

The population of Alaska is approximately 627,000 (U.S. Census Bureau, 2001). Almost half of the inhabitants reside in Anchorage, the largest city. There is almost one square mile of land per person. Alaska's population size ranks 48th in the Union for most populated states, right before Vermont and Wyoming (Census, 2001). The population breaks down into 48% women, which ranks 50th among states and 5.8% over 65, which also ranks 50th among states. Only 0.4% of the population is 85+ years or older, which also ranks 50th among states (Census, 2001). 91% of the population graduated from high school, which ranks 2nd in the nation. The state ranks 10th in the nation for percentage of population living at or near the poverty level with a 9.4% rate. The unemployment rate is considerably higher than the rest of the nation with a 6.4% rate which ranks 49th. The state ranks 1st in median household income with an average median income of \$49,717. This figure is deceiving when taken in context with the high cost of living within the state (Census, 2001).

Living In Alaska

Living in Alaska is expensive. Since the first gold strike, Alaska's higher cost of living has been a major topic of conversation. A body of lore and myth surrounds the idea of how much things cost in Alaska versus the rest of the nation. Consumer price index for Alaska is mainly based on the prices and spending trends in Anchorage. The Anchorage Consumer Price Index is probably the most important cost-of-living index in Alaska. Anchorage is the only community in the state where the U.S. Department of Labor's Bureau of Labor Statistics (BLS) produces such an index, and is often treated as the de facto statewide inflation measure. In most cases, price changes in Anchorage do not differ radically from other communities in the state (Fried and Windisch-Cole, 2001).

Although medical care costs are a fairly small component of the CPI and are unable to impact the overall index very much, their meteoric rise in Anchorage over time has caught people's attention (Fried and Windisch-Cole, 2001). During the past decade, medical care costs in Anchorage have grown by 68.8%, while the overall index increased by only 27.2%. As the state and national population continues to age and the need for health care expands, ever-rising costs will continue to challenge affordability for these services (Fried and Windisch-Cole, 2001).

The American Chamber of Commerce Researchers Association (ACCRA) published results from a detailed cost-of-living survey conducted in more than 300 U.S. cities. The survey confirmed that the cost of living in Fairbanks, Anchorage and Kodiak was well above the national average. Anchorage's cost index was 22.9% above the national average, Fairbanks' cost index was 20.1%, and Kodiak's cost index was 29.1%

above the national average (Fried and Windisch-Cole, 2001). The biggest cost differentials in Alaska’s marketplace were grocery prices, health care, and miscellaneous goods and services. In each of these categories, the three Alaska cities of Fairbanks, Anchorage and Kodiak, ranked among the five most expensive out of 303 cities surveyed in the cost of living survey. Physician visits, for example, are nearly as expensive in Fairbanks as in New York’s Manhattan Borough (Fried and Windisch-Cole, 2001). There were only eleven other U.S. cities surveyed that had costs 20% above the national average.

Health Care in Alaska

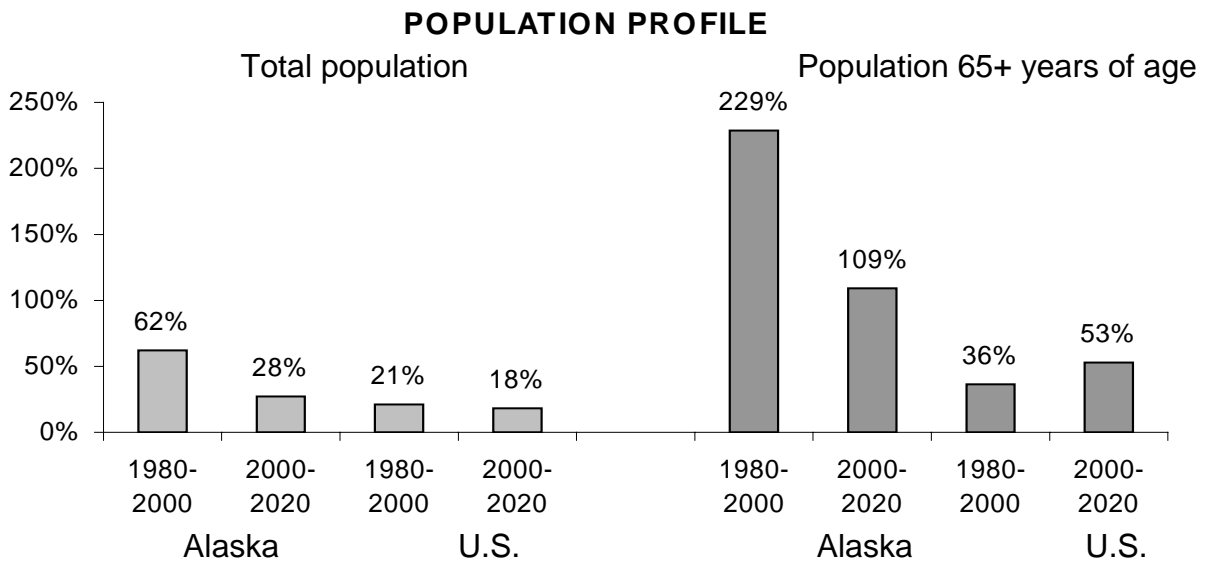


Figure 1. Projected percentage change in total population & population 65+ years of age. (Health Resources and Services Administration, 2000)

Providing health care in Alaska is a challenge. There are 30 boroughs or census areas within the state. Almost half of these areas are considered medically underserved areas. It is estimated that 16.1% of the population doesn’t have access to

primary care (Health Resources and Services Administration, 1999). Over 60% of the boroughs are considered a primary care Health Profession Shortage Area (HPSA). According to the Health Resources Services Administration (HRSA) state profiles database, primary care physicians per 100,000 population in a non-metropolitan area are 0%. With the past and forecasted growth in Alaska (see Figure 1), health care resources will be strained to the limit. Additional health care workers are needed to serve the growing population (HRSA, 1999). The delivery of quality health care to a population over the age of 65 will tax the health care infrastructure and the finances of the state. In 1998, Alaska ranked 47th in the number of hospital beds per 100,000 population and 49th in the number of nursing home beds for people 65 and older (HRSA, 1999).

Alaska developed the Community Health Aide Program to meet the health care needs of Alaska Natives in remote villages (Community Health Aide Program-Update 2001, 2001). This program emerged, in part, as a result of the tuberculosis epidemic and the use of village workers to distribute antibiotics in the 1950s. It became a formal, federally funded program in 1968. Today, 500 Community Health Aides/Community Health Practitioners (CHA/Ps) in 178 rural communities provide emergency and primary health care services in their villages (CHAP, 2001). CHA/Ps are the patients' first contact within the network of health professionals in the Alaska Native Health Care System. This network also includes field supervisory staff, referral physicians at regional hospitals and a tertiary care facility (CHAP, 2001). CHA/P services are a sustainable, effective, and culturally acceptable method for delivering health care. This unique program has demonstrated adaptability to advances in medicine and the

evolving health needs of the population, and it does so at comparatively low cost. The total program operating budget is \$45 million and provides emergency and primary health care to 50,000 Alaska Natives at a cost of \$900 annually per Native (CHAP, 2001).

According to the Alaska Bureau of Vital Statistics, the leading causes of death in the state are cancer, heart disease and accidents. These vary significantly with the causes in the rest of the United States.

Table 1.

Comparison of Age-Adjusted Death Rates for the Ten Leading Causes of Death in Alaska and the United States, 1998 (Percentage in Parentheses).

CAUSE OF DEATH	RANK		TOTAL		ALASKA	
	AK	U.S.	AK	U.S.	MALE	FEMALE
CANCER	1	2	120.3 (26.1)	122.9 (26.1)	134.2	108.2
HEART DISEASE	2	1	100.2 (21.7)	126.0 (26.7)	138.4	61.0
ACCIDENTS & ADVERSE EFFECTS	3	6	42.0 (9.1)	28.5 (6.1)	58.7	23.5
CEREBROVASCULAR DISEASES	4	3	26.6 (5.8)	25.0 (5.3)	22.6	29.2
SUICIDE	5	8	23.7 (5.1)	10.0 (2.1)	36.7	9.6
CHRONIC OBS. PULMONARY DIS.	6	4	21.5 (4.7)	21.6 (4.6)	21.3	22.2
DIABETES MELLITUS	7	7	12.4 (2.7)	13.6 (2.9)	11.5	13.1
PNEUMONIA & INFLUENZA	8	5	9.1 (1.9)	13.5 (2.7)	9.2	8.9
CHRONIC LIVER DIS. & CIRRHOSIS	9	10	8.2 (1.8)	7.1 (1.5)	9.7	6.4
HOMICIDE/LEGAL INTERVENTION	10	13	7.6 (1.7)	6.9 (1.5)	10.4	4.4
ALL CAUSES			460.1	470.6	549.1	366.8

Note. Source: Alaska Bureau of Vital Statistics: 1998 Annual Report, (published 1999)

When rank ordered, the top causes of death may not appear to be significant but when viewed in real numbers and percentages, the differences are dramatic. As a cause of death, heart disease represents roughly 27% of deaths in America, whereas in Alaska, it represents less than 22%. Alaska ranks 4th in the nation in heart disease deaths. Accidents and adverse affects and suicides occur at much higher rates in Alaska (Alaska Bureau of Vital Statistics, 1998). There are two negative health status

indicators that are worth mentioning: firearm deaths and tuberculosis cases. Alaska ranks 47th in firearm deaths and 49th in tuberculosis cases (HRSA, 1999).

Table 2.

Health Care Infrastructure and Health Indicators for Alaska

Health Care Infrastructure			
Infrastructure Indicators	Alaska	U.S.	AK Rank
Health care expenditures per capita, 1994	\$3,648	\$3,053	3/50
Hospital beds per 100,000 population, 1998	201.6	310.8	47/50
Hospital Inpatient days per capita, 1998	0.6	0.7	36/50
Nursing home beds per 1,000 population 65+, 1998	24.2	52.7	49/50
Medicaid recipients (pct. Of population), 1998	12.1%	14.7%	28/50
Medicare enrollees (pct. Of population), 1998	6.2%	14.1%	50/50
Percentage of population uninsured, 1998	17.3%	16.3%	36/50
Vaccination coverage for children 19-35 mos. (pct.), 1997	77.0%	77.9%	29/50
Pct. of total employment in health services sector, 1998	6.1%	9.0%	49/50

Note. Source: HRSA-State Health Workforce Profiles: Alaska, (2000)

To fully appreciate the status of health care in Alaska, a good look at the health care infrastructure is warranted. One of the most telltale indicators of health status in a state is the employment figure in the health services sector. In 1998, Alaska fell well below the national average and ranked second to last with 16,200 employed in health services, a ratio of 2,632 people per 100,000. This clearly places Alaska in the 50th place. Even more alarming is the fact that these figures represent a 48% growth in health services employment across the state from 1988 to 1998. This exceeds the national figure by 12%.

There were more than 750 people employed in nursing home and personal care facilities in Alaska in 1998. This figure represents 4.7% of Alaska's health service workers, substantially below the national average of 16.6% (HRSA, 2000). In 1998,

Alaska ranked last among states in percent of health services employment in nursing home and personal care facilities and 48th among states in nursing and personal care employment per 1,000 population over 65 (HRSA, 2000). As previously stated, Alaska has less than half the national average of hospital beds per 1,000 population. Nursing home and personal care facility employment per 100,000 population over 65 in Alaska declined by 14% between 1988 and 1998, while the national average increased 23% (HRSA, 2000). Alaska ranks clearly at the bottom of the states in nursing home and personal care employment.

Nursing shortages are a hot topic around the nation and Alaska is not exempt. There were 6,651 licensed registered nurses (RNs) in Alaska in 1996; 5,913 of these RNs were employed in nursing. There were 962.8 RNs per 100,000 population in Alaska in 1996, more than the national average of 798. The number of RNs in Alaska increased 76% between 1988 and 1996 while the state's population only grew 13%. The result was a 56% growth in RNs per capita, compared to a 20% growth nationwide. These statistics seem to indicate a good situation in Alaska. However, the number of full-time equivalent RNs working in hospitals increased 5% between 1992 and 1998 while the number of inpatient days increased 51%, resulting in a 30% decline in the ratio of full-time equivalent RNs to inpatient days, compared to a 26% increase in the ratio nationwide (HRSA, 2000).

There were nearly 8,000 people employed in hospitals in Alaska in 1998, 47.4% of Alaska's health service workers. This figure does not include military hospitals within the state. This is slightly higher than the national average of 44.6%, for employment of health service workers by hospital. In the category of hospital employment, Alaska

ranks 50th across the nation (HRSA, 2000). With 202 hospital beds per 100,000 population in 1998, Alaska fell far below the national average of 311. Community hospital beds per capita in Alaska declined by 11% from 1980 to 1997, less than the national decline of 29%. The number of full-time equivalent hospital workers per capita in Alaska grew by 32% from 1992 to 1998, substantially more than the country as a whole (HRSA, 2000). According to 1997 data provided by the U.S. Census Bureau, there were 27 hospitals in Alaska, 3 taxable and 24 tax-exempt. Of the 27 hospitals, 23 were categorized as general medical and surgical hospitals (13 government hospitals and 10 civilian hospitals). According to the Census Bureau data, 9 of the 10 civilian hospitals were not-for-profit hospitals. There were three hospitals in the state that were considered psychiatric and substance abuse hospitals and one specialty hospital. Total employment figures for all hospitals within the state are placed at more than 11,000 people (U.S. Census Bureau, 1999).

There were nearly 7,000 people employed in physician offices and clinics in Alaska in 1998, 43.1% of Alaska's health services workers, substantially higher than the national average of 26.6%. Alaska ranked 1st among states in percentage of health services employment in offices and clinics and 18th in employment in offices and clinics per capita in 1998. In 1997, the U.S. Census Bureau counted 369 physician offices, 292 dentist offices and 232 other health practitioner's offices in Alaska (Census, 1999). The employment figures break down into 4,161 people in physician offices and clinics, 1,686 people in dentist's offices and clinics and 1,130 people in other offices and clinics. There were nearly 1,000 active patient care physicians in Alaska in 1998 (HRSA, 2000). With 155 physicians per 100,000 population, Alaska fell below the national ratio of 198

physicians per 100,000. Alaska ranked 46th among states in physicians per capita. Alaska had 55 active primary care physicians per 100,000 population in 1998, compared to 59 per 100,000 for the entire country (HRSA, 2000). The number of physicians in Alaska grew 37% between 1989 and 1998, while the population grew 12% over this period, leading to a net per capita growth of 22%, compared to the national per capita increase of 16%. There is no medical school in Alaska. Ninety-four percent of the active allopathic patient care physicians in Alaska in 1998 graduated from U.S. medical schools and 6% graduated from foreign medical schools. This compares with the national average of 44% from out-of-state medical schools; 32% from home state medical schools; and 24% from foreign medical schools (HRSA, 2000). The physician workforce in Alaska is relatively young with 71% of the physicians younger than 55 years old (HRSA, 2000).

The Alaskan environment is harsh and unforgiving. It is a challenge to provide even minimum health care services to many regions of the state. Services and delivery systems taken for granted in the rest of the United States, are virtually non-existent in Alaska. Federal agencies are not exempt from the challenges and must develop and apply flexible solutions to meet the needs of beneficiaries. Federal agencies are at a distinct disadvantage because a large number of beneficiaries live in rural, non-metropolitan areas. Access to timely, quality health care is the biggest health care challenge facing Federal agencies in Alaska. The purpose of this paper is to examine an innovative solution, the AFHCP, by Federal agencies to improve access to timely, quality health care using existing systems and resources.

Literature Review

Health services analysts frequently assess access to care, cost of care and expenditures for care. (Barton, 1999). In a country that values social justice but provides neither uniform nor universal coverage, access is a particularly important consideration (Barton, 1999). The term *access* connotes different things to analysts of health services. Access may describe the entry into or use of services. Access may also be defined by factors influencing entry of use of services (Barton, 1999). Access to care has a direct bearing on two other important dimensions of the system: cost and expenditures, and quality (Barton, 1999). Increasing access to health services can actually decrease unit costs, but it inevitably increases expenditures. Limited or no access to care can decrease a person's health status and quality of life, but excessive access can also be detrimental to health status and quality of life (Barton, 1999).

Access to care has many dimensions: geographic, physical, temporal, sociocultural, and financial. Geographic access is influenced by the care seeker's residence in relationship to where the provider practices (Barton, 1999). A full range of medical services is unlikely to be available in a coastal village in Alaska, a mountain mining town in Nevada, or a rural farming community in the Midwest, even though physician-to-patient ratios suggest that physician supply is adequate to serve the population (Barton, 1999). Medical care is most likely found near a population base and related services. Those who live outside such areas may have to travel considerable distances, often over difficult terrain for care. Transportation is a factor in geographic access. Public transportation systems do not serve all areas where people live and private transportation may not be available to the care seeker (Barton, 1999).

Physical access to care is influenced by the care seeker's mobility, mental competence and ease of access to the provider's facility. Today's system of care usually requires that the care seeker present to the provider (Barton, 1999).

Temporal access may be inhibited when a care seeker is unable to obtain care during the hours it is provided because of an inflexible work schedule, the unavailability of care for young and old beneficiaries, or other time constraints. Temporal barriers may also include waiting or time costs between the request for an appointment and the provider's availability (Barton, 1999).

Some societies experience sociocultural barriers to access. The provider and care seeker may speak different languages, come from differing cultures that value health services in different ways, and employ customs and beliefs that are conflicting. These differences may inhibit an individual from seeking needed care because of the frustrations inherent in communicating, or may prevent the care seeker from obtaining the full benefits of the recommended treatment because of misunderstandings (Barton, 1999).

Financial access to health services in the United States is largely governed by the individual's access to private, public or social health insurance. Health insurance has become the dominant payment mechanism for health services in the last half of the twentieth century. In addition to private and public health insurance, financial access to health services is attained by private payment, by qualifying for government-sponsored programs, or through the provision of charity care (Barton, 1999).

Access to health care is directly affected by the delivery system. The major policy concerns regarding the availability of health care personnel and resources in an

area have shifted over the past three decades from the number of providers to the location of providers and the population being served. The distribution of providers and, more importantly, the effect of service availability on the decision to seek care have been and continue to be a focus of health policy efforts regarding access (Aday, Begley, Lairson, and Slater, 1998).

A related issue of availability is the willingness of providers to see patients who are publicly insured or uninsured. Reluctance of providers to accept patients that are publicly insured or insured by a Federal entity may create a defacto source of power for the providers and force the Federal agencies to develop unique solutions for delivery of health care. Critical to developing solutions is understanding the role of resources and which resources are critical to the solution. Resources are the stocks of human and nonhuman factors that are available for use in producing goods and services (Ginter, Swayne, and Duncan, 1998). Resources may be tangible as in the case of land, labor, or capital; or they may be intangible as in the case of intellectual property, reputation, and goodwill (Barney and Hansen, 1994; Barney, 1991). Resources create worth because of one or more interrelated reasons. First, they may be valuable or not valuable, in and of themselves. Second, rare resources are worth more than abundant resources. Third, resources that are difficult to imitate are worth more than those that are easily copied. Finally, resources that have no available substitute take on a particular worth (Brumagim, 1994).

Resources that serve as a basis of power must be critical for the organization. That is, the resource must be essential to the functioning of the organization, in short supply (or concentrated in terms of the number of people who possess it), and

nonsubstitutable. These three attributes make the resource critical and thus create organizational dependency on those individuals or groups who control its availability and use. Power is created by the dependence of others, and that dependence is a function of how much others need what we control, as well as how many alternative sources for that resource exist (Blau, 1964; Jacobs, 1974; Pfeffer and Davis-Blake, 1987). The acquisition of power through access to and discretionary control over resources is often accomplished through the formation of alliances and coalitions (Gamson, 1961; McNeil, 1978).

The literature attaches considerable significance to the importance of finding others with common interests and building long-term relationships with them. Such coalitions differ from ad hoc arrangements insofar as they imply future as well as present commitment (Shortell and Kaluzny, 2000).

The basic endowment of resources in a health care organization and the way these resources are allocated are critical determinants of the organization's ability to effectively compete. Effective competition with all forces surrounding health care organizations required a legitimate strategic plan. An essential character of strategic thinking is a long range goal that creates by design, a gap, between the goal and resources (Ginter et al., 1998). Covering the gap between the plan and available resources is accomplished through resource leveraging or systematically getting the most possible from the available resources. Leveraging can be accomplished by concentrating, accumulating, complementing, conserving, and recovering resources (Hamel and Prahalad, 1994). Resources are more effectively directed toward strategic goals when they are concentrated. Prioritizing goals and focusing on relatively few

things at one time aids the concentration of limited resources. Finally, successful concentration of resources requires not only focusing on relatively few things but focusing on the right things, those activities that make the greatest impact on patients' perceived value (Ginter et al., 1998). Interestingly, a great deal of resource leveraging is a matter of attitude and willingness to take reasonable risks, do things in new and innovative ways, learn from the experiences of others, and generally pursue excellence in all aspects of organizational performance (Ginter et al., 1998).

There are three main factors affecting potential access to health services; predisposing, need, and enabling factors (Barton, 1999). Predisposing factors are an individual's demographic characteristics: age, gender, education, occupation, and race and ethnicity. A range of need factors includes perceived health, interpretation of illness, and other health status measures (McCall, Rice, Boismier, 1991; Short and Lair, 1995). A patient's understanding and interpretation of his or her illness affects access. Health status measures such as levels of disability and functioning also affect access to care. The third category of factors affecting potential access, the enabling factors, include convenience, income, insurance coverage, and system characteristics (Barton, 1999).

Convenience embodies temporal, geographic, and physical dimensions of access, as discussed above. An individual's income directly affects his or her financial access and frequency of access to health services, and also influences whether he or she has private health insurance coverage. Private and public insurance coverage is the major route of financial access to health services in the United States (Barton, 1999). Private health insurance is the greatest source of health insurance coverage for

people under age 65. Medicare provides public insurance for the majority of people who are age 65 and older as well as for people with certain types of disabilities, including end-stage renal disease (ESRD) (Barton, 1999).

Two types of private health insurance are available in the United States: individually purchased policies, which are usually limited in coverage and relatively expensive to purchase, and insurance provided as one of the benefits of employment. Employer-sponsored insurance is generally more comprehensive in scope because the risk is spread over a group of employees, and those in the work force are generally healthier than those of working age who are not in the work force (Barton, 1999). Individual policies are purchased by people who can afford them, who may be self-employed, who work in industries such as mining or fishing in which insurance is difficult to obtain or who do not have access to a group health insurance policy (Barton, 1999).

Medicare and Medicaid are two government-supported entitlement programs initiated as amendments to the Social Security Act (titles XVIII and XIX, respectively) in 1965 and implemented the following year. Eligible individuals have a legislative entitlement to all the covered services provided by the programs. Only the Medicare program really fits an insurance model and was designed to conform to the structure of private health insurance (Barton, 1999). There are other government-supported health programs that provide direct access to health services for special populations. Only those participating in the Alaska Federal Health Care Partnership are covered in the next few paragraphs.

The U.S. Department of Veterans Affairs (VA) health services system was established in 1921 as the United States Veteran's Bureau (Shonick, 1995) to provide

inpatient, outpatient, and long-term care services to veterans with military service connected conditions. The VA provides care through a system of nationwide hospitals and outpatient clinics (Barton, 1999). VA health services facilities provide care to a large segment of the U.S. population and serve as training sites for medical students and residents. Congress, given the declining number of eligible veterans and the unused capacity at many VA hospital facilities, periodically challenges the future of the VA system. Proposals to expand VA services to include dependents of veterans or to serve other community members, or to dismantle the VA system have been discussed at the congressional level, but have not yet reached legislative status (Barton, 1999). Veterans' organizations have provided the most resistance to any movements to reduce or eliminate health care to Veterans. The Veterans Affairs and its role in Alaska are discussed in greater detail in Appendix A.

The Department of Defense (DoD) is an important provider of health services to active duty military members and their dependents. The Army, Navy, Air Force, and Coast Guard each operates its own medical services, and the DoD operates numerous "tri-service" joint medical facilities that serve the Army, Air Force, and Navy. In the mid-1980's, the military health services system supported more than 160 hospitals and 300 clinics around the world (Shonick, 1995). Contractual services are negotiated with the private sector in places where no military facilities exist. A medical school to train military physicians for military service, the Uniformed Services University of the Health Sciences, was established in 1976. Military dependents and retirees, and their dependents and survivors, receive health services through TRICARE, an insurance program comprised of many service assets and contracts. The DoD is increasing the

role of managed care in its TRICARE program as one way to project and better manage expenditures for military dependents and retirees (Barton, 1999). The DoD and its health care role in Alaska are discussed in greater detail in Appendix B. Although the Coast Guard is a part of the Department of Transportation, they are part of the TRICARE system and are discussed in Appendix C.

The Indian Health Service (IHS), first established as a unit of the War Department in 1802 (Shonick, 1995) and now a part of the U.S. Department of Health and Human Services (DHHS), provides health services to an estimated 1.34 million American Indians and Alaska Natives enrolled in more than 500 tribes, villages, bands, and pueblos throughout the United States (Barton, 1999). The IHS maintains over 50 hospitals and clinics in a number of states but may also contract with the private sector for provision of services to beneficiaries who live outside the service areas of these facilities. Through the Indian Self-Determination Act of 1975, many tribal authorities have assumed responsibility for the provision of health services, contracting with IHS for funds to support the development and implementation of tribal-specific health plans (Barton, 1999). Over the last 25 years, this has resulted in no universal health plan with defined benefits and decentralized access for Alaska Natives. Until recently, a uniformed Public Health Service flag officer was in charge of IHS health assets and resources in Alaska. The decentralized access and competing demands between the various tribes have significantly impacted on projects like the Alaska Federal Health Care Access Network (AFHCAN). The tribal entities place their own expectations and demands, which may not be consistent with other tribes, on initiatives and projects. The IHS and its health care role in Alaska are discussed in greater detail in Appendix D.

Quality improvement is an integral part of delivering health care. Quality improvement projects proliferate the marketplace. These activities sometimes become the most important determinants of the resources and services available in a community. In fact, consumers and payers have become instrumental in shaping the health care environment based on quality improvement activities that identify effective intervention (Lighter and Fair, 2000). Quality improvement has many titles to include: Continuous Quality Improvement (CQI), Total Quality Management (TQM) and Business Process Reengineering (BPR). The Federal Government has been in the forefront of many projects to improve access to care and quality of care for eligible beneficiaries. These efforts are widespread throughout the Federal sector and are not standardized among agencies. There are published laws, regulations, and guidelines agencies can use to facilitate their reengineering efforts. These publications include the following: The Government Performance and Results Act (GPRA) of 1993, The Clinger-Cohen Act of 1996, the General Accounting Office (GAO) Business Process Reengineering Assessment Guide, The National Performance Review (NPR) Benchmarking Study Report, and each agency's own regulations and guidelines (Alaska Federal Health Care Partnership Agreement, 1997).

The main force behind the ongoing BPR efforts in the Federal Sector is GPRA. This act requires Federal agencies to develop strategic plans for delivering high quality products and services to the American People. A significant result of this act was the establishment of the NPR to reinvent government under the Office of the Vice President of the United States (AFHCP Agreement, 1997). The Alaska Federal Health Care Partnership (AFHCP) is an example of reinventing government. This is qualified by

viewing the way business was conducting by the Partners in 1995, prior to the Partnership. The AFHCP represents the initiative of multiple Federal agencies to build a framework of quality health care services that would increase access for their respective beneficiaries. One of the principle factors behind the AFHCP (a.k.a. the Partnership) is the resource sharing arrangement between the Partners.

Partnership Background

The Partnership

What prompted the Partnership? What is the Partnership? Who's involved in the Partnership? These are all legitimate questions that will be addressed. A spirit of cooperation has always existed in Alaska. It is necessary to cooperate to survive and thrive in a geographically isolated community. The need to formally develop resource sharing and cooperation among government health care partners was a logical step.

Between the 1940's and 1970's, an informal cooperation between Federal agencies existed in Alaska. This was necessitated by the state/territory's tremendous size, few providers, and the lack of lines of communication. In the 1980's, the VA and U.S. Air Force formed a joint venture to build a new hospital in Anchorage at Elmendorf Air Force Base (AFB). This was prompted by the frequent sight of DoD, VA and IHS medical staff in Alaska, working side-by-side through informal resource sharing arrangements. This cooperative alliance may have influenced the decision not to build a VA hospital in Anchorage but rather enter into a DoD/VA Joint Venture in which the VA would occupy part of the new 3rd MDG/Elmendorf AFB hospital completed in 1998 (Alaska Federal Health Care Partnership, 1995). This was a sign of things to come as the VA and DOD explored other joint opportunities around the nation. With the advent

and implementation of TRICARE in 1993-1994, after the health care reform movement, the Alaska military medical facilities formed a partnership to pursue the TRICARE objectives. This led to the formation and implementation of the Alaska Region Health Care Plan in October 1994. The Alaska Region Health Care Plan is considered the precursor to the current Partnership (AFHCP, 1995).

The next step in the evolution of the Partnership was in 1994-1995, when the DoD, VA and IHS in Anchorage and Fairbanks joined through a series of initiatives to form a large Federal alliance. Eventually, in August 1995, this alliance coalesced and was formally named the Alaska Federal Health Care Partnership. Capitalizing upon already strong inter-agency relationships, the military, IHS, and VA facilities formalized many previously informal agreements. By working together, they lowered the cost of care, but that was only the first step. The next step was to work together to acquire cost-effective health care from civilian sources (AFHCP, 1995). Individually, each facility represented a small beneficiary population that lacked the power to obtain discounted prices for health care from civilian sources. When combined, the beneficiary populations accounted for 40 percent of the state's population. This gave Federal agencies leverage to be a major player in the state's health care environment, and allowed them to share each other's talents and experiences to improve patient care (AFHCP, 1995).

At first, an alliance was composed of the VA, the IHS's Alaska Native Medical Center (ANMC), and the 3rd Medical Group (3MDG) at Elmendorf AFB. These three agencies formed the *Anchorage Federal Health Care Provider Network*. In the Fairbanks area, Bassett Army Community Hospital (BACH) at Fort Wainwright, the 354th

Medical Group (354MDG) at Eielson AFB, the VA, and the Tannana Chief's Conference (IHS) formed a separate Federal coalition to consolidate their bargaining power with local civilian medical facilities in their geographic area (AFHCP, 1995). In 1994, Dr. Stephen Joseph (Assistant Secretary of Defense for Health Affairs), visited numerous Federal facilities in Alaska. He reviewed the *Alaska Region Health Care Plan* and expressed enthusiasm for joint agency initiatives. In December of the same year, Dr. Joseph met with representatives from the VA, Department of Health and Human Services and U.S. Coast Guard. They agreed to allow Alaskan agencies to continue developing successful grass-roots initiatives. They viewed the developing Alaskan plan as the best way to benefit patients, acquire cost effective care, increase access, and perhaps provide national health care reform initiatives with an effective model (AFHCP, 1995).

In January 1995, leaders from the USCG, DoD, VA, and IHS met to determine the best structure for further addressing Tri-Agency initiatives. After much discussion, in August 1995, they formalized a statewide, inter-agency organization calling it the *Alaska Federal Health Care Partnership* (AFHCP, 1995). In January 1999, the Partnership expanded and admitted another member, Alaska Native Tribal Health Consortium. The formal members of the Partnership are the Army, Air Force, Coast Guard, Veterans Affairs, Indian Health Service and the Alaska Native Tribal Health Consortium.

Mission Statement

"We, the members of the Alaska Federal Health Care Partnership, are dedicated to providing our beneficiaries ready access to quality, customer-oriented, compassionate, comprehensive, and cost-effective health care" (AFHCP, 1995).

Goals

At the beginning of the Partnership, the founding members developed eight goals with corresponding objectives. These goals were delineated in the first Alaska Federal Health Care Partnership information booklet. In this information booklet, each goal had specific objectives. The goals and objectives were flexible enough to allow leeway based on agency nuances but rigid enough to show tangible, objective results. The primary methods identified to assess progress were financial reports, numbers and types of joint contracts/agreements and increased access. The initial eight goals and objectives are found in Appendix E. The eight initial goals were modified the following year and reduced to five. The five goals were:

1. Ensure patients have access to the right care, at the right time, in the right place.
2. Create a better business environment.
3. Maintain medical preparedness.
4. Optimize use of technology.
5. Promote patient wellness.

About The Partnership

To fully appreciate the Partnership, a good understanding of what the plan provides is warranted. The founding members of the plan desired to create a joint-sharing health care system through which their beneficiaries could receive timely, quality care anywhere and at anytime. The plan was intended as a map for Alaska's Federal agencies to develop initiatives to achieve a system using the framework Partnership organization to undertake joint utilization management, maximize Alaska-

wide capabilities, establish joint review process for purchasing equipment and services and maximize buying power. Equally important is the need to understand what the plan doesn't provide. The plan was cooperatively developed in a "grass roots" environment. It is suggestive and not specifically directive in nature, which means that reports on activities will be provided when such activities occur. It does not supersede any agency responsibility or obligation to its parent authority. Military chain of command relationships remain unchanged. Agencies may be required to develop their own health care plans, and if so, this plan will be the foundation of their efforts (AFHCP, 1995).

Partnership Demographics

At the time of the initial partnership agreement, the population of Alaska was estimated at 570,000 people. The Alaska Federal Health Care Partnership managed the care of nearly 240,000 residents of the state. This equated to over 40 percent of the entire state's population.

Initial Partnership Breakdown

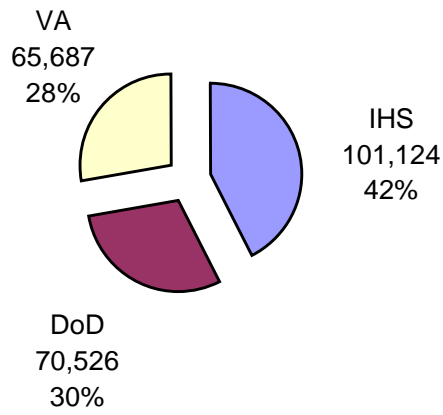


Figure 2. Initial Partnership population beneficiaries (AFHCP, 1995)

Age Breakdown

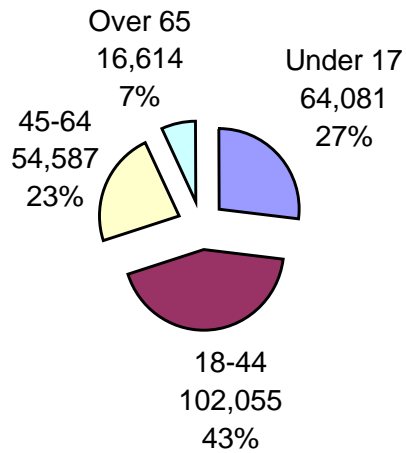


Figure 3. Initial Partnership breakdown by age (AFHCP, 1995)

Initially figures showed the Partnership cared for a significantly larger number of male beneficiaries, 62% compared to 38% female. This figure was misleading because the IHS and DoD beneficiary by gender breakdown is roughly equal. The VA had a disproportionate number of male beneficiaries compared to female beneficiaries (AFHCP, 1995). The under 17 age group only includes DoD dependents and IHS beneficiaries.

Current Beneficiary Population
250,950

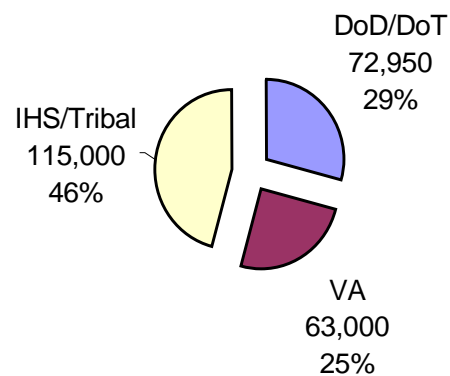


Figure 4. Current Federal beneficiary population.

The current population of Alaska is roughly 627,000 according to year 2000 census figures. The current number of Federal beneficiaries is thought to be around 250,950. This population figure is not exact because it includes both dual and triple eligible beneficiaries. Dual and triple eligible beneficiaries are entitled to health care under more than one program.

The Formal Agreement

This Agreement, hereinafter known as the Alaska Federal Health Care Partnership Agreement (AFHCPA) is entered into by the Alaska-based elements of the Department of Defense (DoD); United States Air Force (EAFB), Third Medical Group, hereinafter referred to as “3MDG”, United States Air Force (Eielson AFB), 354th Medical Group hereinafter referred to as “354th MDG”, the United States Army, Ft. Wainwright Army Base, hereinafter referred to as “BACH”; the Alaska-based elements of the United States Coast Guard hereinafter referred to as “USCG”; the Alaska VA Healthcare System and Regional Office, hereinafter referred to as “VA”; the Alaska Native Medical Center hereinafter referred to as “ANMC”, a facility of the Alaska Native Tribal Health Consortium (ANTHC); and the Indian Health Service (IHS), hereinafter referred to as “IHS”. This is a mutual agreement, which will govern individual operating agreements for professional health care services and resource sharing between those agencies and/or facilities described above. The intent of this Agreement will be to improve access and to provide high quality health care that is sensitive to the needs of our patients.

The terminology in the initial purpose paragraph is straightforward and simple. It spells out the members of the Partnership and their intent. The intent statement is simple enough to allow the Partnership flexibility to set and accomplish mutual goals. The agreement is a legal binding agreement and is entered into by the parties under provisions of the Economy Act of 1932 (31 U.S.C. 1535) and Veterans Administration

and Department of Defense Health Resources Sharing and Emergency Operations Act, Public Law 97-174, May 4, 1982 (38 U.S.C. 8111) (AFHCP, 1995)

Purpose and Research Objective

The purpose of this study is to investigate and analyze the Alaska Federal Health Care Partnership and determine if it has achieved the stated goals and analyze the participation of Bassett Army Community Hospital from a financial and access perspective. The primary research objective of this study is to analyze the AFHCP and determine if it has achieved the stated goals. The goals will be examined using the qualitative and quantitative measures and objectives identified by the Partners for each goal. Primarily, the goals are written with the ultimate goal of increasing access for Federal beneficiaries, consolidating contracting efforts to save money and leveraging technology to improve care to beneficiaries. The overarching goal identified in the Partnership mission statement was to increase access for beneficiaries. This will be assessed by analyzing the access numbers, by specialty, and also by examining the numbers and types of initiatives attributed to the Partnership. A second objective is a financial cost-benefit analysis of the role of Bassett Army Community Hospital.

This project will provide a qualitative analysis on the costs and benefits of the Partnership and in particular Bassett Army Community Hospital's participation in the Partnership. The information provided in the project may be used to support future decisions regarding the Partnership and Bassett's role in the Partnership. The results of this project will determine whether access for eligible beneficiaries has changed. An increase in access will be whether there has been an increase in the number of Federal beneficiaries seen in state, by Partnership facilities for certain specialties and services

that were previously unavailable in the individual facilities. In particular, did the Partnership improve access to areas like lab services, radiology, urology, etc. that were previously available to beneficiaries of one Partner but unavailable to other Partners. This can be quantified by the increased number of visits for particular services above FY 1995 figures or by the number of services provided by one Partner for another Partner. The underlying assumption is that extensive cooperation and sharing was not performed between Partners prior to the Partnership. Additionally, the report will identify other areas where access has changed. The contents and results of this project may be used by Partnership members to help make decisions regarding the future course of the Partnership and any new initiatives by the Partnership. It may also have implications for other states and Federal agencies.

Chapter Two: Methods and Procedures

Participants

The participants in this study were the Partners in the Alaska Federal Health Care Partnership (AFHCP).

Assumptions

This research effort depended on the assumption that relevant data could be found to analyze the goals of the Partnership and that sufficient financial and access records existed. Additionally, another assumption was that the majority of the data would be retrievable in a common format for all Partners. It was also assumed that some of the data might be skewed because of a reluctance to present unfavorable information by not fully disclosing the true costs and benefits of the Partnership by any of the Partners.

Materials

The primary sources of data used in this study were the staff and documents of the Alaska Federal Health Care Partnership – Partnership Support Office. The data collected from the Partnership Support Office (PSO) included annual reports, strategic plans, demographic figures, contracts and personal interviews. The data included cost avoidance figures and utilization numbers. The period covered is Fiscal Year 1995 through Fiscal Year 2001. This period was chosen because it covered the Partnership from the beginning to the most recent fiscal year. There were some limitations in analyzing the data from FY 95 to FY97. During these years, the Partnership did not keep very detailed records because of the small-scale, grass-roots approach. As the Partnership grew and the PSO matured, record keeping and data-quality improved.

Design and Procedure

This project will be a retrospective, qualitative analysis. The study will start at the beginning of the Partnership and examine each facet of the Partnership up to the present time. It will be examined from the perspective of the Partners and their respective roles. Additionally, the project will address each of the stated Partnership goals and whether or not they achieved those goals. Using annual Partnership financial documents and records, contracting records and technology files, it will be determined whether the Partnership has saved money, increased access, and leveraged technology. In essence, has the Partnership saved money based on what it would cost for the same number and type of services if the initiatives did not exist? The documents and files used in this study are primarily consolidated at the Partnership Support Office. Information contained in the documents is based on full disclosure of access numbers by specialty, as well as financial savings/costs by each Partner. The costs of the Partnership, to include the contributions of each Partner will be examined. The major initiatives undertaken by the Partnership to achieve stated goals will be examined.

The first step in the analysis was to gather all the relevant data and identify the AFHCP initiatives that affected access for beneficiaries, contributed to a cost savings or contributed to the successful accomplishment of the stated goals of the Partnership. The information was obtained by pulling data from annual reports, historical files, spreadsheets, utilization data, site visits, financial reports and personal interviews with key Partnership figures. The financial figures reported by the PSO were published in the same format and calculated the same way every year since inception. The information reported was collected directly from the financial reports of the respective

agencies and validated against those reports. Within the agencies, the financial data is audited internally and then externally by the next higher headquarters. The financial figures reported in the consolidated PSO financial reports were reproducible by calculating personnel costs, cost avoidance/cost savings figures and increased access numbers from balance sheets, census reports and contract documents.

The goals identified by the founding members of the Partnership in 1995, were broken down into qualitative and quantitative objectives. This study examined the overarching objectives of each goal to determine if the goal was achieved. The stated goals were part of the initial AFHCP strategic plan and were updated yearly. Special consideration was given to the fact that the initial eight goals were eventually reduced to five. Each of the five remaining and current goals was examined. The five remaining and current goals were:

1. Ensure patients have access to the right care, at the right time, in the right place.
2. Create a better business environment.
3. Maintain medical preparedness.
4. Optimize use of technology.
5. Promote patient wellness.

In addition to analyzing the stated goals, this study also analyzed the participation of Bassett Army Community Hospital. In particular, the focuses were the financial costs and benefits of Bassett's participation in the Partnership.

Limitations of the Study

One of the limitations of this study is that each agency does not capture cost savings in the same way. Another limitation of the study is that each Partner does not necessarily have the same access standards. Since each Partner may have a different definition of success, the overall perception of success by the Partners may be affected by sociocultural factors. Additionally, there is no mechanism for capturing the intangible benefit of networking and cooperation among Federal health care agencies and executives in a remote geographic region. In the future this may be assessed by using some form of survey tool that addresses patient and executive perceptions on care rendered, quality of care, pain management, impression of agency providing care and others.

Chapter 3: Results

Objective 1. Achievement of Stated Partnership Goals

Ensure patients have access to the right care, at the right time, in the right place.

The most pronounced area of success for the Partnership has been in the area of joint contracting, agreements, memorandums of agreement (MOAs) and letters of agreement (LOAs). Ultimately, these formal and informal arrangements have been the vehicles for increasing access for beneficiaries.

Partnership hospitals and clinics do a great job of providing medical care to their beneficiaries, but they don't always have the medical specialist a patient needs. In 1995, AFHCP initiatives primarily included sharing agreements for oncology, OB/GYN and orthopedic services. Additionally, they shared equipment and contracts. The philosophy of sharing staff, equipment and contracts sounds simple, but considering the difficulties of negotiating Federal bureaucracies, it becomes extremely difficult.

Table 3

1995 Potential Increased Access Numbers Based on Staff Sharing

Service	Sponsor	Beneficiaries	Increased Access
Oncologist	IHS (ANMC)*	VA, DoD, USCG	136,249
OB/GYN	IHS (ANMC)	DoD	41,712
Pediatric	DoD (Army)	DoD, USCG, IHS	175,508
Orthopedist	DoD (USAF)	VA, ANMC, USCG	166,811

Note. Source: Alaska Federal Health Care Partnership 1995 Annual Report

*IHS Figures represent IHS, ANTHC and ANMC figures.

In addition to the shared services listed in Table 3, the Partnership also shared other services on a much smaller, isolated scale. Some of the other services included the use of a vascular surgeon, neurologist, clinical pathologist, ultrasound technicians and operating room nurses (AFHCP-Annual, 1995).

In 1995, the AFHCP increased access for patients to modern technology by sharing medical equipment. The VA clinic in Anchorage allowed joint use of the ophthalmic surgical laser. The VA boasted the only specialty laser of this type in the Partnership. In another example, the Partnership shared the use of the Army's C-12 aircraft to transport VA patients between Fairbanks and Anchorage. Although the C-12 wasn't a dedicated evacuation aircraft, the use of it on a space available basis saved the VA the \$200 round trip commercial air fare each time it was used (AFHCP-Annual, 1995). The Partnership also shared its nuclear medicine equipment. The equipment was owned by the Air Force (DoD) in Anchorage. The DoD offered Partnership members access to their complete nuclear medicine services. This venture saved Partnership members over \$750,000. The Air Force also leased a magnetic resonance imaging (MRI) machine. Individually, the Partnership members could not justify the leasing of such an expensive piece of medical diagnostic equipment, but collectively, the Partnership could justify the venture.

Table 4

Significant AFHCP Contracts with Savings for Fiscal Year 1995

Contract	Beneficiary	Sub-Beneficiary	Savings
Lab Tests w/ Medpath	Partnership		\$250,000
Aeromed Evac	DoD		\$183,000
		Army	\$73,000
		Air Force	\$41,000
		Coast Guard	\$69,000
Air Guard C-26	Partnership		\$200,000

Note. Source: Alaska Federal Health Care Partnership 1995 Annual Report

In addition to the contracts listed in Table 4, Bassett Army Community Hospital, Chief Andrew Isaac Clinic, Eielson AFB's 354th Medical Group Clinic, and the VA Clinic in Fairbanks teamed up in search of more cost efficient outpatient clinics in Fairbanks. They negotiated an outpatient care agreement with a local clinic to provide health care services to beneficiaries at a lower price. According to AFHCP documents, total estimated cost avoidance, as a result of initiatives, for 1995 was approximately \$1,000,000.

In 1996, the Partnership continued to search for ways to improve access for beneficiaries while trying to reduce costs. The success of the Partnership in 1995, proved that Federal cooperation was a viable way to conduct business. Many of the existing contracts and sharing agreements established in 1995, continue to be utilized today. The Partnership evolved, grew, and formed a Business Office located at the Alaska Native Medical Center (Alaska Federal Health Care Partnership – Annual Report, 1996). The small, shared staff, devoted themselves to creating and monitoring the Partnership's hundred or so initiatives (AFHCP Annual, 1996).

Table 5

Shared Staff and Equipment Ventures With Access Numbers and Savings for FY 1996

Shared		Benefit	
Staff	Equipment	Beneficiary	Improved Access*
Urology		VA, DoD	94,401
OB/GYN		VA, IHS***, DoD	**
Pediatrics		IHS, DoD	**
Optometry		VA	65,687
Orthopedics		VA	65,687
Ophthalmology		VA, DoD	94,401
Nurse Case Managers		VA, IHS	166,811
Med Equip Repair Techs		VA, IHS	166,811
Cardiologist		VA, IHS, DoD	217,084
Pediatric Endocrinologist		IHS, DoD	151,397
Vascular Surgeon		VA, DoD	136,249
Plastic Surgeon		VA, DoD, IHS	**
Neurologist		VA, DoD	94,401
Pathologist		VA	65,687
Ultrasound		VA, DoD, IHS	**
OR Nurses		VA, DoD, IHS	**
Allergy		VA, IHS, DoD	195,661
	MRI	VA, IHS, DoD	195,661
	ABTOX Gas	VA, IHS	166,811
	Ophthalmic Laser	VA, DoD	136,249

Note. Source: Alaska Federal Health Care Partnership – Annual Report 1996.

*The figures in the table are estimates based on gross Federal agency populations.

**Exact figures unknown. Potential numbers include entire Partnership population.

***IHS represents IHS, ANTHC and ANMC figures.

In 1996, shared contracts continued to be a high profile, high payoff area for the Partnership. From a financial perspective, joint contracting provided the biggest impact on the Partnership. In 1996, the Partnership saved nearly \$700,000 just through joint contracting (AFHCP-Annual, 1996). The ongoing Life Guard Medevac contract continued to save Partnership members hundreds of thousands of dollars annually (AFHCP-Annual, 1996). By the end of fiscal year 1996, the Partnership saved a cumulative total of \$513,655 through this contract alone. The Partners also joined together in a Medical Transcription Contract, in which private transcribers assisted Partners when they were understaffed in their transcription departments. This contract resulted in a \$25,000 savings. Partners also shared laundry and linen contracts which resulted in a \$35,000 savings (AFHCP-Annual, 1996).

As a result of staff sharing, equipment sharing and joint contracting, the total estimated cost avoidance figure for fiscal year 1996 was \$1,650,000. Combined with savings from 1995, the total savings to the government in less than two years was over \$2,200,000.

The Partnership continued its success in fiscal year 1997 and really gained momentum. One of the highlights of the year was a sharing agreement between the VA and Bassett Army Community Hospital in Fairbanks. Prior to this agreement, Veterans could purchase a short-term supply of needed medications at a local pharmacy but the majority of their medication needs were met through the mail-out program offered through the Anchorage VA. Because of the sharing agreement, Veterans could access a local pharmacy and gain better, easier and more timely access to needed medications. In another example of improving access for beneficiaries, the Partnership

negotiated a contract for professional cardiology services. These two new agreements were in addition to existing agreements that had already netted cumulative savings of over \$2,000,000 in the first two years. By the end of fiscal year 1997, the efforts of the AFHCP had saved taxpayers an estimated \$6,900,000. Approximately \$4,300,000 in expenditures were avoided in 1997 (Alaska Federal Health Care Partnership – Annual Report 1997). In 1997, recaptured revenue, money that changed hands between the Federal agencies totaled \$1,162,287. As the Partnership matured and staff gained experience, the savings continued to increase (AFHCP-Annual, 1997).

The increased access and cost savings trend continued in 1998. Prior contracts, agreements, and sharing arrangements, in addition to new initiatives, netted a fiscal year cost avoidance of \$5,050,230.

Table 6

1998 AFHCP Agreements with Cost-Savings*

Agreement	Beneficiary	# of Procedures	Total-Cost Savings
GYN Clinic	VA	104 Outpatient	\$12,803
Urology Clinic by ANMC	VA	764 Outpatient	\$69,122
Lifeguard Medevac	VA, IHS, DoD	26 Flights	\$290,299
Quest Reference Lab	VA, DoD	11,410	\$80,997
DoD(USAF)/VA Operating Agreement	DoD, VA	1,176 Outpatient 1,197 Labs 115 X-ray exams 36 Surgeries 102 Admissions	\$1,160,883
BACH/VA Operating Agreement	VA	495 Outpatient 1411 Labs 82 X-ray exams 6,700 Prescriptions 3 Surgeries 19 Admissions	\$210,099
Alaska Regional PPO	VA, IHS, DoD	613 Outpatient 920 Admissions	\$1,741,770
Alaska Cardiovascular Consultants Contract	VA, DoD, IHS	2768 Outpatient	\$376,304
DoD (USAF) Ambulatory Surgery Room Rental at VA	DoD	75 Surgeries	\$128,142
Ophthalmology Services	VA, ANMC	1,044 Outpatient	\$681,560

Note. Source: AFHCP - 1998 Management Analyst Report

*The initiatives listed in Table 6 are not all inclusive of the AFHCP initiatives for 1998.

In addition to cost-savings, the Partnership also exhibited recaptured revenue of \$976,762. Through the end of fiscal year 1998, the combined efforts of the Alaska Federal Health Care Partners saved taxpayers \$11,990,000.

The AFHCP continued to march forward in fiscal years 1999, 2000 and 2001 achieving huge dividends and saving Partnership members in excess of \$3,000,000 each year. Since the beginning of the Partnership, the total savings to taxpayers is over \$23,121,092. As in earlier years, large savings were realized through joint contracts.

Table 7 highlights some of the more prominent contracts that produced significant savings in the last couple of years. The savings realized through the Partnership are ongoing savings. If the Partnership dissolved, the collective bargaining power and agreements would likely disappear and the savings also. The savings are based on the cost of purchasing the service or providing the service if the initiatives were not in place. If another Federal Partner did not provide the service, then the service may be purchased on the economy or the patient may be sent to the lower 48 for the service.

Table 7

Significant Cost-Saving AFHCP Contracts for Fiscal Years 2000, 2001

Agreement	Beneficiary	Cost-Savings	
		FY 2000	FY 2001
BACH/VA	VA	\$182,748	\$93,451
AK Urological Associates	VA	\$195,752	\$74,138
AK Regional Hospital	VA, IHS, DoD	\$1,298,656	
AK Providence Hospital	VA, IHS, DoD	\$128,814	\$2,060,024
Ophthalmology Services	VA	\$227,814	\$144,930
Aeromed Intern'l	VA, IHS, DoD	\$584,664	\$1,418,057
Quest Lab Services	VA, DoD	\$412,234	
J&J Contract	VA, IHS, DoD	\$39,010	\$26,012

Note. Source: AFHCP Cost Avoidance Reports for Fiscal Years 2000, 2001.

Cost-savings are a great incentive for many health care organizations, but within the auspices of the Partnership, the primary intent of the Partners was to increase access for their beneficiaries. In addition to the huge savings generated by the Partnership, there were significant gains in access in many areas. Table 8 highlights some of the more prominent initiatives and their impact on access to care. The table is

only a sample representation of the some of the AFHCP initiatives that increased access for eligible beneficiaries. Appendix G contains a more complete list of AFHCP initiatives.

Table 8

Significant AFHCP Initiatives with Increased Access Numbers for FY 2000, 2001

Agreement	Beneficiary	Increased Access Numbers	
		FY 2000	FY 2001
BACH/VA	VA	264 Outpatient visits 1854 Labs 333 X-rays 5 Surgeries 2 Admissions	439 Outpatient visits 15 Surgeries 14 Admissions
AK Urological Associates	VA	1741 Outpatient visits	657 Outpatient visits
AK Regional Hospital	VA, IHS, DoD	4678 Outpatient visits 328 Admissions	
AK Providence Hospital	VA, IHS, DoD	850 Outpatient visits 45 Admissions	2788 Outpatient visits 628 Admissions
Ophthalmology Services	VA	1024 Outpatient visits	1742 Outpatient visits
Aeromed Intern'l	VA, IHS, DoD	101 Flights	336 Flights
Quest Lab Services	VA, DoD	13,169 Tests	
Hepatology Clinic at VA (ANMC Physicians)	VA	96 Visits	24 Visits
Podiatry Contract	DoD	106 Outpatient visits	625 Outpatient visits 15 Surgical visits

Note. Source: AFHCP Cost Avoidance Reports for Fiscal Years 2000, 2001.

Based on the information analyzed, the Partnership has successfully accomplished the first goal of ensuring patients have access to the right care, at the right time, in the right place. Not all Partners have benefited equally but all partners have benefited. The most significant accomplishment was the continued cooperation between Partners to identify excess capacity and then work to integrate the excess capacity into agreements that recaptured revenue.

Create a better business environment.

The Federal Partnership has taken full advantage of the principle of pooling beneficiaries to demand volume discounts. The majority of successful initiatives that increased access, were the result of collective bargaining power. By contracting together, the Partnership was able to achieve better discounts than any single Partner could have achieved on their own (Refer to Tables 4, 6, 7, 8 and Appendix G for examples of successful initiatives that used the Partnership to demand discounts for services). The Federal Partnership also helped foster a better business environment by coordinating some administrative functions (AFHCP-Annual, 1997). In June 1997, a memorandum of agreement was signed to establish a standardized joint credentialing process. The purpose was to facilitate the sharing of Federal health care licensed independent practitioners among Partners. This was only one example of creating a better business environment. A definite indicator of the success of better business initiatives is the cost avoidance savings attributed to the Partnership.

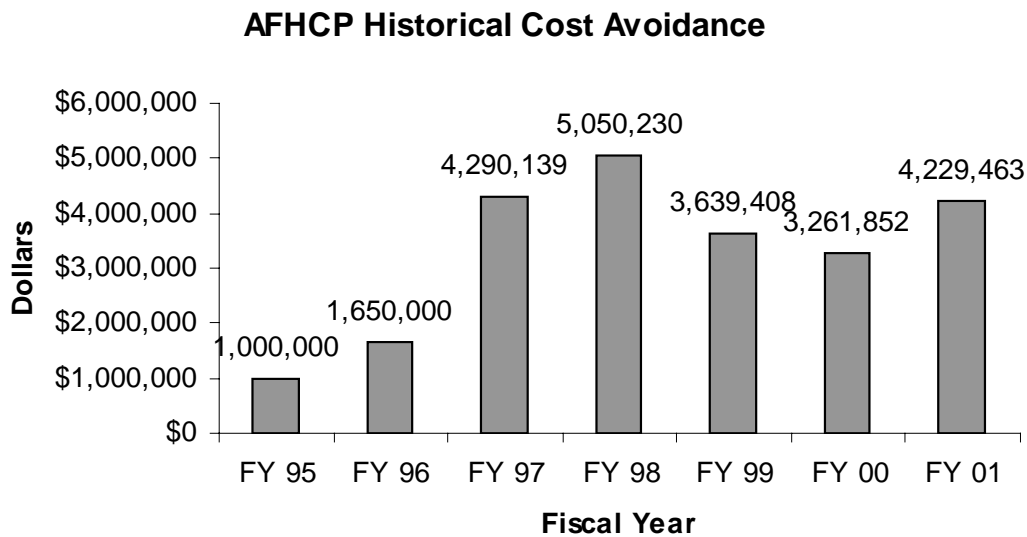


Figure 5 Historical Cost Avoidance Figures Attributed to AFHCP Initiatives

A recent initiative sponsored by the Partnership is the Federal Education Sharing Group (FESG). FESG is an initiative committed to providing staff with quality, cost effective, and multi-disciplinary educational opportunities that support the mission, vision, and goals of the AFHCP. The FESG coordinates resources where the strengths and needs of individual agencies are integrated for the provision of quality educational opportunities. Utilizing the FESG, the Partnership can organize health education programs that meet a large number of continuing medical education needs across many disciplines. By leveraging the power of the Partnership and sponsoring select educational opportunities, the FESG saved the Partnership \$306,000 in FY 2001. This was primarily accomplished by providing educational offerings in state, instead of sending staff out of state.

The benefits reaped by the Partnership did not come without an associated cost. The greatest cost is the Partnership Support Office (PSO). Dedicated funding for the operation of the PSO began in 1997. The roles of the PSO are:

1. Facilitate the Partnership
2. Focus on Partnership endeavors
3. Liaison between Partners and organizational elements
4. Operationalize new initiatives
5. Provide feedback on outcomes
6. Clearing house for Partnership information

By all accounts, the true test of whether the PSO is a success is whether it saved the Partners money over operating costs. This is examined in Table 9. The figures in Table 9 only take into account the cost avoidance figures and PSO operations costs.

Table 9

Partnership Support Office Cost-Benefit Analysis

	Year				
	1997	1998	1999	2000	2001
Operating Costs	(\$233,803)	(\$387,914)	(\$431,277)	(\$345,186)	(\$381,902)
Cost Avoidance	\$4,290,139	\$5,050,230	\$3,639,408	\$3,261,852	\$4,229,463
Net gain/loss	\$4,056,336	\$4,662,316	\$3,208,131	\$2,916,666	\$3,847,561
ROI	5.8%	8.3%	13.4%	11.8%	9.9%

Note. Source: Data used to make Table 9 was gathered from AFHCP historical financial documents and Executive briefings.

The financial debit amount to the Partners does not include telemedicine and teleradiology funding or recaptured revenue streams. Because of AFHCP efforts and initiatives that leverage technology and telehealth programs, telemedicine and teleradiology funding streams have become a major source of additional funding for the Partnership. These funding streams are from sources other than Partnership members but are routed through the members to support telehealth programs that are being implemented or have already been implemented. For example, in fiscal year 2000, additional telemedicine funding to the Partnership amounted to \$9,705,000. The teleradiology funding amounted to \$2,000,000. The incorporation of all funding streams to include the telehealth fundings streams is incorporated into the net financial outcomes for the Partnership. Figure 6 illustrates the total net financial outcomes for the last four fiscal years.

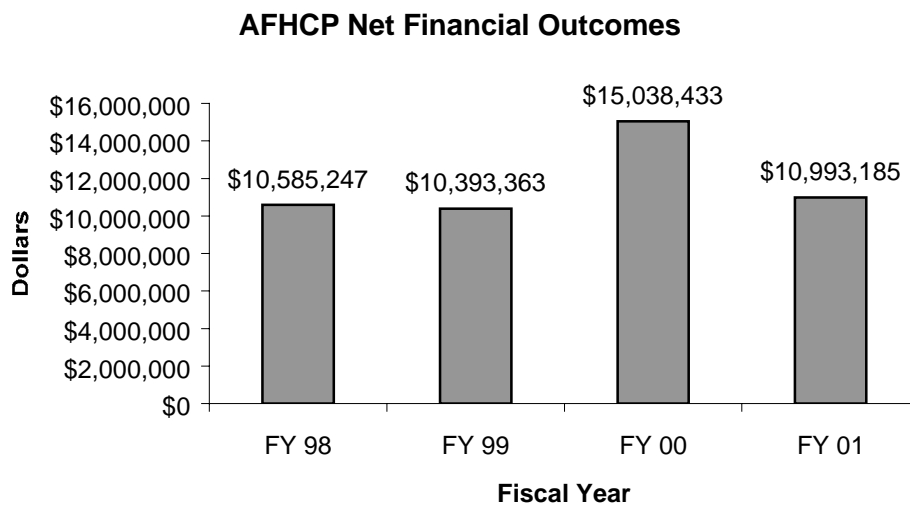


Figure 6. Historical Net Financial Outcomes for the AFHCP

Maintain medical preparedness.

Achievement of this Partnership goal is less obvious. The Partners have been sharing professionals across agency lines since inception. Outside of joint contracting efforts, the Partnership has experienced the most success in increasing medical preparedness by sharing specialty providers. This was accomplished by operating joint clinics and opening up appointments in respective facilities. See Tables 3, 5, 6, 7, 8 and Appendix G for examples of sharing initiatives and joint clinics.

Above and beyond the efforts of the clinics and facilities, other medical preparedness efforts are worth mentioning. These efforts are often executed in rural communities around Alaska. In 1996, the U.S. Coast Guard (USCG) spearheaded an effort to increase health care to remote native villages during a “goodwill” mission. The USCG Cutter *Storis* transported a U.S. Navy Chaplain, a U.S. Air Force physician, a dentist and an optometrist to the village of Old Harbor on Kodiak Island, to care for IHS beneficiaries (AFHCP Annual, 1996). In 1997, the USCG Cutter *Storis* transported a U.S. Public Health Service Physician, dentist, and USCG health services technician to the remote Alaskan villages of Atka, St. Paul, and St. George (AFHCP Annual, 1997). In cases like these, the AFHCP spearheaded efforts to bring medical care to beneficiaries while practicing medical preparedness.

Optimize the use of technology.

Sharing medical technology among Federal partners benefits all beneficiaries by allowing greater access to more high tech equipment at a lower cost. The Partnership helped achieve this kind of optimization through several initiatives, including the Elmendorf/ANMC sharing agreement for radiology/nuclear medicine services, and the

Elmendorf/VA operating room agreement (AFHCP Annual, 1997). As the result of the agreement between Elmendorf and ANMC, Alaska Native beneficiaries received 200 radiology and nuclear medicine services during FY 97 that were unavailable to them at the ANMC facility. Almost all of these were for MRI's, bone scans, and other expensive diagnostic tests (AFHCP Annual, 1997). Likewise, as a result of Elmendorf's agreement to rent the VA's excess capacity operating room space, Air Force physicians were able to perform 42 surgeries at the VA. The use of operating room technology was maximized to its fullest. DoD beneficiaries were able to receive services more quickly, and some Veterans were able to receive services which would have been otherwise unavailable at the VA from the visiting DoD specialists (AFHCP Annual, 1997).

The most visible initiative under this goal is the Alaska Federal Health Care Access Network (AFHCAN) Project. The AFHCAN Project is a high-visibility, high-cost initiative intended to link Federal health care beneficiaries through a telehealth program. Because of the magnitude of the project, it is discussed in detail in Appendix F.

Promote patient wellness.

The Partnership helps promote this goal by building agreements that allow Federal facilities to share the skills and expertise of their medical specialists (AFHCP Annual, 1997). Often, these agreements allow for medical specialists from one Federal facility to set up clinics at another Federal facility, bringing the specialist directly to the patient. During FY 97, one of DoD's ophthalmologists provided 87 procedures to Veterans at the VA Medical Center over a two month period. In addition, ANMC physicians provided 132 OB/GYN services to female Veterans and 251 Urological

services at the VA. Patients received more specialized care within their own facility as a result of these Partnership agreements (AFHCP Annual, 1997).

Promoting patient wellness by providing services close to the patient is fully maximizing the 'Alaska First Policy' of the Partnership. This means, when care is not available within any of the Federal facilities, contracts are created with local private providers. In this way, patients are cared for close to home and health care dollars are reinvested in the local community. This is a policy that is good for patients, good for the Partnership, and good for Alaska's private physicians and economy.

An example of keeping health care providers and assets close to the patient and where they live is a local resource sharing agreement between Bassett Army Community Hospital (BACH) and Fairbanks Memorial Hospital. The agreement allows military specialists to use Fairbanks Memorial Hospital inpatient facilities and intensive care unit to treat military patients from the Fairbanks catchment area (AFHCP Annual, 1997). Because of this initiative, BACH physicians are able to continue the care of seriously ill patients even if they require resources beyond the capability of BACH. When military physicians are allowed to provide care in local institutions, professional fees are eliminated. This led to a 20% reduction of inpatient costs at Fairbanks Memorial Hospital by DoD beneficiaries (AFHCP Annual, 1997). It is important to note that Fairbanks Memorial is not part of the Partnership and a strong argument can be made that this agreement could be classified as a non-Partnership sharing agreement.

Other patient wellness benefits are derived from opening new lines of communication between local physicians and military providers. By working side-by-side and sharing their insights and concerns, all parties become involved in health care

planning and the entire community benefits. This agreement was the result of negotiations spanning many months and the first major step toward a cooperative relationship with the civilian medical community in Fairbanks (AFHCP Annual, 1997).

Objective 2. Costs and benefits of Bassett's participation in the Partnership.

The primary and most obvious cost of Bassett's participation in the Partnership is a share of the Partnership Support Office (PSO) costs. The costs associated with staffing and supporting the PSO are divided among the Partners. Each year a budget is proposed and ratified by the Partners for the PSO. The operating funds for the PSO are centralized at the Alaska Area Native Health Service Office (AANHS) and are used to support Partnership activities and mission requirements.

The PSO is staffed by two military and four civil service personnel. The associated personnel cost for the PSO office is the biggest expense for the PSO. Figure 6 illustrates the organizational structure of the PSO.

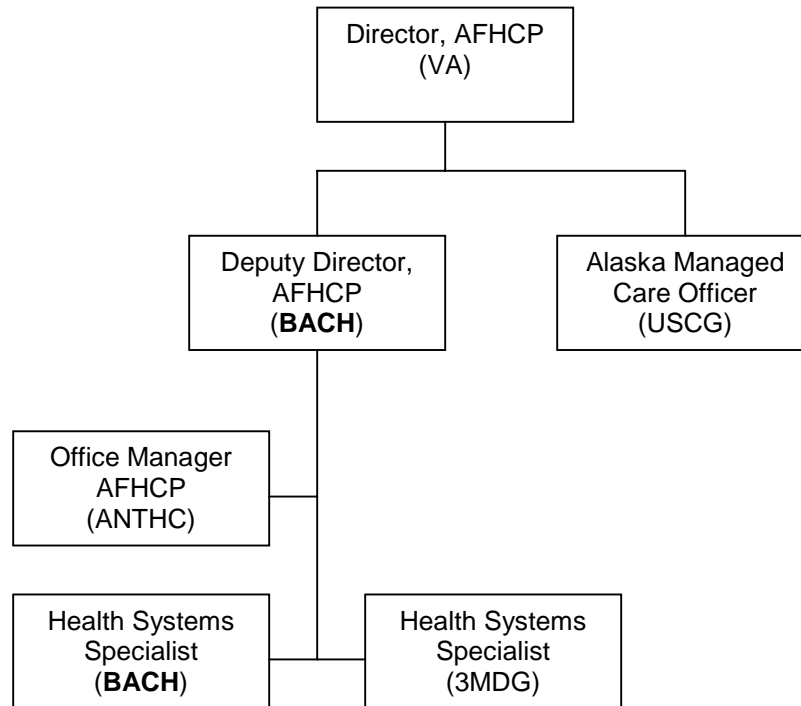


Figure 6. PSO Organizational Structure with Sponsor

Table 10 breaks down the personnel composition of the PSO and identifies the Partner responsible for paying the personnel cost. Of particular note is that BACH is paying for two staff personnel in the PSO. The Deputy Director position is currently staffed by an Army officer. Although the direct cost of the officer's salary doesn't come out of BACH's budget, it is still an attributable cost because the officer is taken directly from the staffing pool of BACH. The Health Systems Specialist is a direct cost to BACH's budget.

Table 10

Fiscal Year 2002 PSO Personnel Budget with Facility Contribution

Facility Sponsor	Personnel	Grade/Rank	Cost	Facility Total
VA	Director	GS-13 (Step 10)	\$117,550	\$117,500
BACH*	Health Care Administrator	MAJ/O-4**	\$82,595	\$144,541
BACH*	Health System Specialist	GS-9	\$61,946	
3 rd MDG	Health System Specialist	GS-9	\$68,157	\$68,157
ANMC	Administrative Assistant	GS-5	\$35,000	\$35,000
USCG***	Health Care Administrator	CW2/WO-2	\$21,594	\$21,594
		Total	\$386,842	

Note. Source: PSO Fiscal Year 2002 Funding Request & Recommended Facility Contribution Report to Executive Committee.

*Bolded rows represent Bassett Army Community Hospital obligations.

**The position is graded by the Army as an O-4/MAJ. Currently the position is filled by an O-3/CPT.

***This position is only a half FTE position and is indicated as such in the salary cost.

The remainder of the time the person works for TRICARE-Alaska.

Table 11

Fiscal Year 2002 PSO Operating Costs

Operating Expense	Cost
Office supplies	\$4,000
Printing	\$1,000
Services	\$3,000
AFHCP Brochure	\$500
Travel	\$10,000
Training	\$8,000
Equipment	\$3,500
Total	\$30,000

Note. Source: PSO Fiscal Year 2002 Funding Request & Recommended Facility Contribution Report to Executive Committee

The complete cost of operating the PSO includes the personnel costs and the operating costs. Table 11 shows the unadjusted operating costs for the Partnership. The total operating costs are then divided among the Partners. These costs are added to the personnel costs attributed to each Partner for a complete contribution requirement for each Partner. See Table 12 for a breakdown of the total contribution requirement for Partners during Fiscal Year 2002.

Table 12

Recommended Facility Contribution for FY 2002 PSO Expenses

Facility	Personnel Costs	Operating Cost	Total
VA	\$117,550	\$7,000	\$124,550
ANMC	\$35,000	\$7,000	\$42,000
3MDG	\$68,157	\$7,000	\$75,157
USCG	\$21,594	\$1,000	\$22,594
354MDG		\$1,000	\$1,000
BACH	\$144,541	\$7,000	\$151,541
Total	\$386,842	\$30,000	\$416,842

Note. Source: PSO Fiscal Year 2002 Funding Request & Recommended Facility Contribution Report to Executive Committee

Table 13

Cost Benefit Comparison for Bassett Army Community Hospital

	FY 1998	FY 1999	FY 2000	FY 2001
Cost Avoidance	\$44,350	\$61,183	\$134,140	\$16,357
Recaptured Revenue	\$156,336	\$214,721	\$210,627	\$464,201
PSO Contribution	(\$110,726)	(\$110,726)	(\$78,611)	(\$151,541)
Gain/Loss	\$89,960	\$165,178	\$266,156	\$329,017

Note. Sources: FY 98 thru 01 AFHCP Executive Committee Financial Reports.

BACH Costs and Benefits

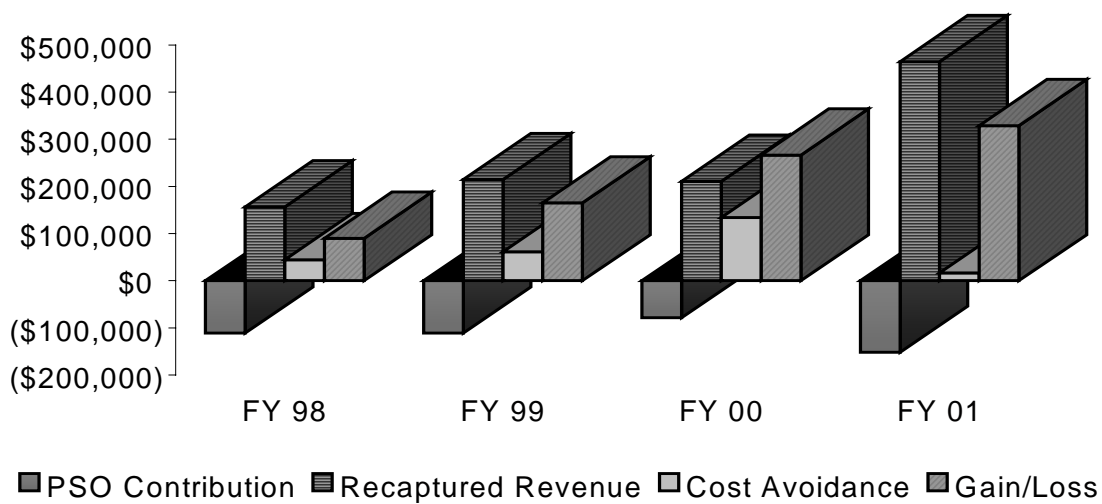


Figure 8. BACH costs and financial benefits for FY 1998-2001

An evaluation of the last four years shows a considerable benefit to BACH for participating in the Partnership. BACH pays a large portion of the PSO costs but also receives a large portion of the realized benefits. The breakdown of savings and cost avoidance among the Partners, including TRICARE, for fiscal years 1998 through 2001 is shown in Figures 9 through 12. TRICARE is not a signatory Partner but is the DoD/DoT health insurance program. TRICARE savings through Partnership initiatives are ultimately realized by DoD/DoT and not to any one facility or beneficiary.

FY 98 Partnership Financial Savings

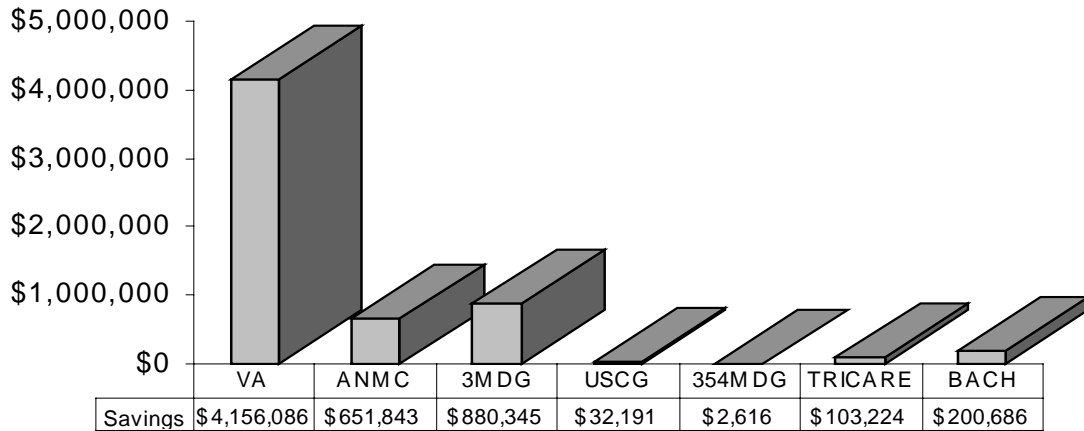


Figure 9. FY 1998 AFHCP realized financial savings and cost avoidance by Partner.

FY 99 Partnership Financial Savings

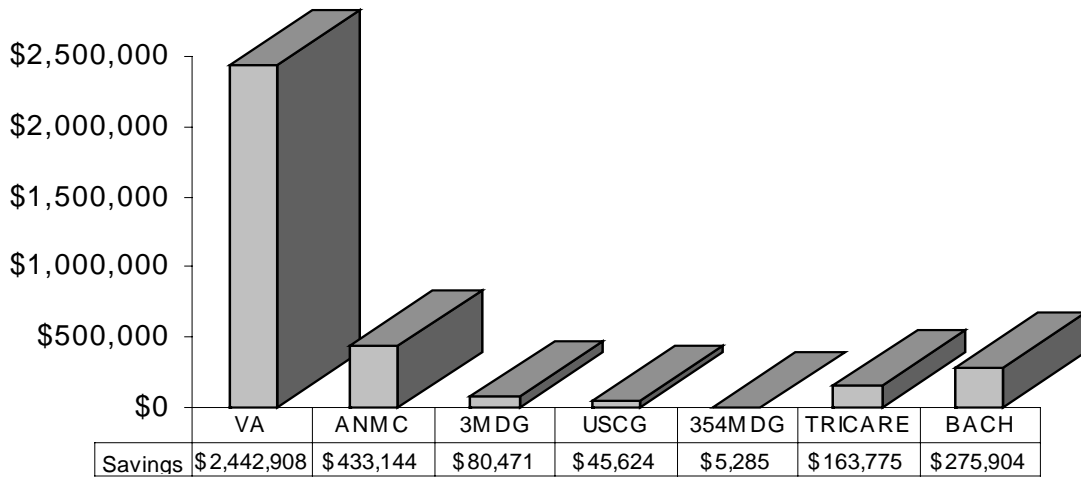


Figure 10. FY 1999 AFHCP realized financial savings and cost avoidance by Partner.

FY 00 Partnership Financial Savings

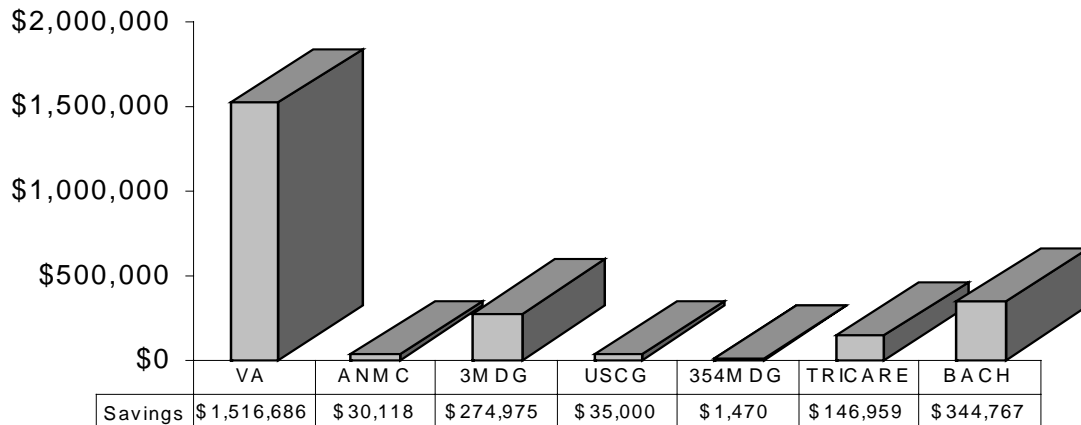


Figure 11. FY 2000 AFHCP realized financial savings and cost avoidance by Partner.

FY 01 Partnership Financial Savings

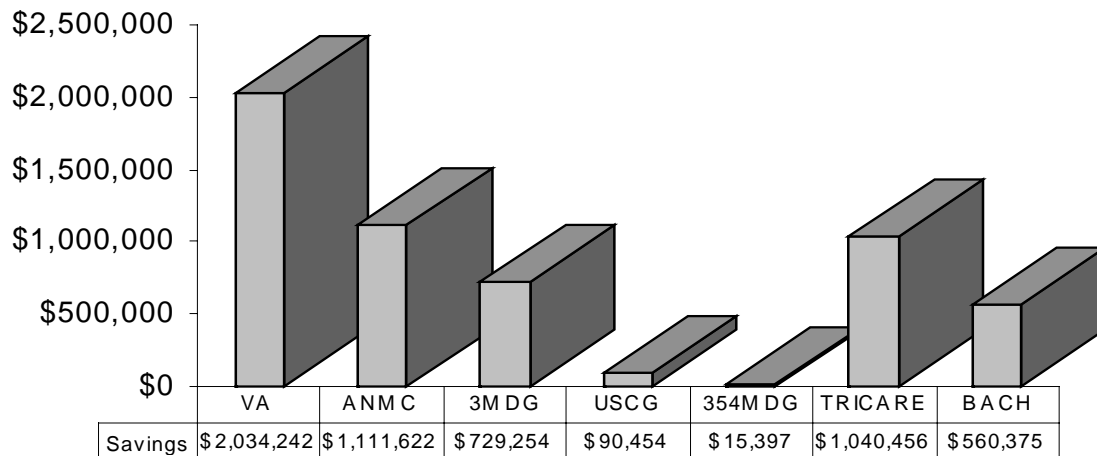


Figure 12. FY 2001 AFHCP realized financial savings and cost avoidance by Partner.

Chapter 4: Discussion

Objective 1 Achievement of Stated Partnership Goals

From its humble beginnings as a grass-roots movement, the Partnership has come a long way. It is this ground-breaking, humble beginning that led the initial Partners to identify common goals for the Partnership. It was these goals that the Partners deemed essential to the success of the Partnership. In essence, the successful accomplishment of these goals meant the success of the Partnership. Initially, there were eight goals but later the number was reduced to five. The five goals have remained constant for the last five years. Essentially, the goals, and the objectives contained in each goal, were meant to increase access for the Federal beneficiary population.

After analyzing the goals and the results of the Partnership for the past seven years, it is clear that the Partnership achieved the goals and continues to do so. Based on the analysis of the data, the initiatives sponsored by the Partnership have increased access for Federal beneficiaries. To fulfill health care requirements, Partners first look internally, then to the Partnership and finally to the civilian community. This enables Federal Partners to maximize the existing specialty services in the Federal sector before sending patients and Federal dollars to civilian providers. If each Partner is viewed as a market, then the collaboration between the Partners has led to the opening of seven new markets. In addition to opening seven new markets, the Partnership facilitated the creation of a much larger single Federal market capable of competing on a much larger scale. This larger Federal market is the driving force behind the significant savings and cost-avoidance attributed to the Partnership. Speaking with a

collective voice, the Partnership has negotiated better prices for services that were being purchased, individually, by each Partner. Furthermore, because of differences in reimbursement rates between Partners, some of the Partners did not have access to certain specialty care services. Because of the volume of business the Partnership generated as a whole, the Partnership was able to alleviate some of the reimbursement rate differences by negotiating contracts with better rates with civilian agencies. This in turn improved access for Federal beneficiaries because civilian specialties were now contractually obligated to see Federal patients, regardless of reimbursement rates.

A perception among many involved with the Partnership in the beginning, is that the Partnership has successfully “picked the low-hanging fruit” and must now concentrate efforts on breaking down more resilient bureaucratic and agency barriers and hindrances. One of the founding members of the Partnership, K. Lee Hardcastle, said, “In theory the Partnership should and would continue to work, however, it doesn’t work to it’s fullest potential because of bureaucratic barriers in place by each agency and their rules.” Although the Partners have committed to seeing each other’s patients, it is often on a space available basis and not on a needs based basis. Within the charter of each agency, their guidelines reflect that their beneficiaries have priority for services. The bureaucratic barriers and agency specific restrictions are constantly being challenged by the Partnership executives. The executives meet quarterly to discuss happenings within the Partnership and issues requiring attention. Equally important, it provides an excellent opportunity for the executives to learn and become sensitized to the organizational cultures of the other Partners.

One measure of success for the Partnership is the number of awards the Partnership has received. The chronological list of awards include:

1. 1996 – Federal Employee of the Year Team Award. The Federal Executive Association for outstanding performance presents this award to teams of Federal employees in Alaska. The AFHCP Planning Committee was awarded the citation for exceptional teamwork, collaboration, and accomplishment in 1996.

2. 1997 – The Vice-Presidential Hammer Award. The Hammer Award was Vice-President Gore's special recognition of teams making significant contributions in support of the President's National Performance Review principles. The AFHCP was cited in recognition of surmounting bureaucratic barriers between four Federal agencies in order to improve services to Federal beneficiaries and create a more efficient Federal government. A team from Washington D.C. conducted a local ceremony and presented pins, certificates and a ceremonial hammer to the group.

3. 1997 – Under Secretary for Health's Award for Strategic Alliance. This award is presented by the Under Secretary of the Department of Veterans Affairs in recognition of programs that promote improved teamwork and collaboration that result in cooperative relationships with community partners. AFHCP was presented the award in 1997 for its efforts to create a strategic alliance between four Federal agencies in Alaska that can improve efficiencies and provide better health services to Federal beneficiaries.

4. 1998 – U.S. Department of Health and Human Services Secretary Award. The DHHS Secretary Award was presented to the AFHCP for the creation of the first Women Veteran's Health Clinic at the Alaska VA Medical Center. The Secretary Award

noted veteran's improved access to care for women's health services, the cost savings generated by using other Federal OB/GYN providers, the greater continuity of care for veterans, and the improved training in women's health issues for the VA's RN staff.

5. 2002 AstraZeneca – National Managed Health Care Congress (NMHCC) Partnership Award. The Partnership won the award for “Successful Partnerships between Military Treatment Facilities and Integrated Delivery Systems.” The award recognizes partnerships that demonstrate measurable improvements in health care cost, quality management and impact on community.

In addition to awards, the Partnership received recognition through numerous published articles. In March 1996, an article about the Partnership was published in *Modern Healthcare*. Two more articles about the Partnership were published in 1997 in *US Medicine*. A fourth article was published in 1999 in *Veterans Health System Journal*.

There are some valuable lessons learned from the Partnership. One of the biggest lessons learned is that although an endeavor may start out as a small “grass roots” movement, it may gain momentum and require a dedicated full time staff to manage the initiatives and projects. This dedicated staff should perform the role of a support office like that of the AFHCP Partnership Support Office. The name should accurately describe what the office does. More recommendations based on lessons learned are:

1. Be careful of the incentives you write into agreements, for they will shape the outcomes. Ensure adequate pre-planning to make sure that incentives will achieve the desired outcomes and that the incentives are feasible and practical.

2. Implementation is critical for a successful agreement. Utilize the support office to help transition projects by aiding agencies with implementation plans and having transition team meetings with the people in the agency who will be involved with the agreement.

3. Clarify the role of the support office and planning board. The support office will become invaluable, providing expertise in contracting, utilization management/utilization review, and data analysis to each agency. They will understand the systems of the Federal agencies as well as industry standards. The planning board will be responsible for facility-level implementation and coordination.

4. Liaison within organizations is essential. Ensure appropriate contact for each agency.

5. Small agreements take as much time as large agreements. Be extra careful in prioritizing projects so that the biggest “bang for the buck” can be achieved.

6. Be careful that reimbursement mechanisms are practical and desirable. Learn about the internal capabilities of each of the agencies so that agreements that are more practical to implement in the future are written.

7. Partnership organizational charts with standing sub-committees do not always accurately reflect reality. Be very cautious about adding sub-committees to organizational charts.

8. Communication is essential and must flow through all levels of the organization and agencies must feel comfortable working with each other. Create formal and informal opportunities for agencies to communicate and build a working relationship.

Objective 2 Costs and Benefits of Bassett's Participation

Based on a financial analysis and access to care assessment, Bassett Army Community Hospital has benefited from the Partnership. A cost-benefit analysis of Bassett's participation clearly shows the financial incentive for continued participation. The cost for Bassett's participation is high compared to other Partners, but beneficial. Bassett provides two staff members for the PSO. On average, this cost, combined with a share of the operational cost, amounts to over \$100,000 annually (see Tables 10 and 13). This cost is significantly outweighed by the amount of recaptured revenue and cost avoidance for the hospital.

AFHCP Discussion

Federal agencies are under constant pressure to improve access for beneficiaries and reduce costs to the organization. The AFHCP is an example of a creative way to achieve both objectives. The AFHCP is not a 'one size fits all' solution. Every partnership effort must be tailored to the local health care environment. It is very important that partnership members understand that not all members will reap the same rewards. The AFHCP is a prime example of an organization that has demonstrated significant, yet unequal rewards for the Partners.

The future success of the AFHCP depends on the evolution of the Partnership and the ability to address larger, more complex issues. For example should agencies fund and staff partner organizations based on their collective workload and mission and not according to parochial lines? From a DoD perspective, joint staffing would greatly affect the way the Army and Air Force fund and staff BACH and Elmendorf AFB Hospital because they would take into consideration the entire potential workload for the

entire catchment area which would include DoD, DoT, IHS and VA personnel. By funding and staffing according to total partnership population and not just by agency population, the organizations may warrant additional specialty staff and increase access for all beneficiaries. Since agencies offer different reimbursement rates for similar services, should agencies negotiate a common reimbursement rate for services? This would significantly differ from the way agencies pay for services in the civilian sector now. Because of different reimbursement rates, agencies experience different access rates among civilian providers. Additionally, more research needs to be conducted into other resource sharing initiatives that may require joint purchasing of high-dollar value medical equipment and joint ventures that might require construction or alteration of facilities.

To completely reinvent government and propel the AFHCP to the next level, concepts of joint command, joint information systems and seamless-integrated joint access must be addressed. To date, the Partners have been reluctant to address and work toward achieving these concepts. These higher-hanging fruit would be much harder to get but would offer the most return on investment for the government and beneficiaries. The hard projects would require long-range commitments, lobbying and shifts in parochial thinking. Furthermore, laws and regulations would have to be changed or amended to allow complete integration of beneficiaries and assets from four Federal agencies: DoD, DoT, VA and IHS (Tribal Entities). It can be done but it would require the Partners to strive to achieve more than just picking the low-hanging fruits that were made possible and realized through mainly joint contracts and leveraged buying power.

Chapter 5: Conclusion and Recommendations

Conclusion

This study addressed two objectives. The first is whether the Alaska Federal Health Care Partnership achieved its stated goals. The answer is yes. Since the Partnership is an ongoing effort, there is ample opportunity for continued success. Many of the successes have been common sense solutions to logistics, delivery system and access issues. The solutions were so successful because of the unprecedented spirit of cooperation between the senior Federal health care executives. The executives shared a strategic vision for Alaskan Federal beneficiaries. Based on the joint vision, they formulated and implemented a strategic plan that facilitated this vision. Their willingness to compromise and work together set the tone for the organization. Their overarching goal to increase access for beneficiaries was achieved. More importantly, AFHCP initiatives continue to improve access for beneficiaries. The AFHCP should continue its efforts and start examining the more challenging areas of success such as: staffing changes based on collective workload and a seamless, integrated Federal patient referral system based on need.

The second objective addressed the costs and benefits of participation in the Partnership by Bassett Army Community Hospital (BACH). BACH pays a significant price to participate in the Partnership but gains a significant benefit. Financially, BACH has saved a great deal of money. The amount saved varied over the years but always exceeded the cost of participation. After considering past efforts and initiatives and reviewing current projects and initiatives, it is in BACH's best interest to continue participation in the Partnership.

Recommendations

Initiatives undertaken by a partnership may be detrimental to one or more partners but good for the majority of partners. It is essential that a partnership speak with the pronoun “we.”

It is highly recommended that communities around the nation with large Federal beneficiary populations conduct an assessment to determine if adequate Federal infrastructure exists to form a partnership. If sufficient resources exist, then the Federal entities should at least explore partnership possibilities.

Future studies should examine: funding changes for organizations in partnerships, reimbursement changes for partnerships and staffing changes based on partnership obligations. After implementation and installation of the AFHCAN Project, a time phased study should assess how much the AFHCAN Project has affected time away from home, care at the local facilities, and impact on continuing medical training.

References

Aday, L.A., Begley, C.E., Lairson, D.R., & Slater, C.H. (1998). Evaluating The Health Care System: Effectiveness, Efficiency, and Equity. (2nd ed.). Chicago, IL: Health Administration Press

Alaska Bureau of Vital Statistics. (1998). 1998 Annual Report. Juneau, AK: Alaska Department of Health and Social Services. Retrieved November 6, 2001 from the World Wide Web:

http://www.hss.state.ak.us/dph/bvs/annrpt/ar1998/1998_annual_report.pdf

Alaska Federal Healthcare Access Network. (2001). Steering Board Meeting: July 27, 2001. Anchorage, AK: AFHCP Support Office

Alaska Federal Health Care Partnership. (1995). Alaska Federal Health Care Partnership. (Initial Info Booklet). Anchorage, AK: AFHCP Support Office

Alaska Federal Health Care Partnership. (1997). Alaska Federal Health Care Partnership Agreement. Anchorage, AK: AFHCP Support Office

Alaska Federal Health Care Partnership. (1998, March). Alaska Federal Health Care Access Network: A Comprehensive Alaska Telemedicine Solution. Anchorage, Alaska: Susan Yeager

Alaska Native Tribal Health Consortium. (2001, October). Alaska Federal Health Care Access Network: Master Operating Plan (Version 7.1a, October 26, 2001). Anchorage, Alaska: ANTHC.

Alaska Visitor Information – Economy. (2001). Juneau, AK: Department of Community and Economic Development. Retrieved October 30, 2001, from the World Wide Web: <http://www.dced.state.ak.us/tourism/learn/learn6.htm>

Alaska Visitor Information – Factoids. (2001). Juneau, AK: Department of Community and Economic Development. Retrieved October 30, 2001, from the World Wide Web: <http://www.dced.state.ak.us/tourism/learn/learn17.htm>

Alaska Visitor Information – Geography of Alaska. (2001). Juneau, AK: Department of Community and Economic Development. Retrieved October 30, 2001, from the World Wide Web: <http://www.dced.state.ak.us/tourism/learn/learn22.htm>

Alaska Visitor Information – Population and Size. (2001). Juneau, AK: Department of Community and Economic Development. Retrieved October 30, 2001, from the World Wide Web: <http://www.dced.state.ak.us/tourism/learn/learn7.htm>

Barney, J. B. (1991). Firm Resources and Sustained Competitive Advantage. Journal of Management, 17, (1), 99-120.

Barney, J. B. & Hansen, M. H. (1994). Trustworthiness As a Source of Competitive Advantage. Strategic Management Journal, 15, (3), 175-190.

Barton, P. L. (1999). Understanding the U.S. Health Services System. Chicago, IL: Health Administration Press.

Blau, P. M. (1964). *Exchange and power in social life*. New York: John Wiley

Brule, L. (2001, December). AFHCP Office: Current Contracts/Agreements/MOUs/LOAs Listing. (Available from the AFHCP Office, Anchorage, AK).

Brumagim, A. L. (1994). A Hierarchy of Corporate Resources. In P. Shrivastava, A. S. Huff, & J. E. Dutton (Eds.), Advances in Strategic Management: Resource-Based View of the Firm: Vol. 10. Part A. (pp. 81-112). Greenwich, Connecticut: JAI Press.

Bureau of Economic Analysis. (2001, September). *Total full-time and part-time employment by industry – Alaska*. Washington, D.C.: U.S. Department of Commerce: Bureau of Economic Analysis. Retrieved from Regional Accounts Data: Annual State Personal Income Database. Retrieved November 6, 2001 from the World Wide Web: <http://www.bea.doc.gov/bea/regional/spi/action.cfm>

Community Health Aide Program (CHAP) Directors' Association. (2001, May). Community Health Aide Program – Update 2001: Alaska's Rural Health Care at Risk. Anchorage, AK: Alaska-Community Health Aide Program / Alaska Area Native Health Service Office.

Fried, N., & Windisch-Cole, B. (2001). The Cost of Living in Alaska. Alaska Economic Trends, 21(6), 3-17. Retrieved November 6, 2001 from the World Wide Web: <http://www.labor.state.ak.us/trends/jun01.pdf>

Gamson, W. A. (1961). A Theory of Coalition Formation. American Surgical Review, 26 (3), 373-382.

Ginter, P.M., Swayne, L.E., & Duncan, W.J. (1998). Strategic Management of Health Care Organizations. (3rd ed.). Malden, MA: Blackwell Publishers

Hamel, G & Prahalad, C. K. (1994). Competing for the Future. Ch. 7. Boston: Harvard Business School Press.

Health Resources and Services Administration. (2000, December). *HRSA State Health Workforce Profiles – Alaska*. Rockville, MD: U.S. Department of Health and Human Services, Bureau of Health Professions. Retrieved from HRSA State Health Workforce Profile Database. Retrieved November 6, 2001 from the World Wide Web: <http://bhpr.hrsa.gov/healthworkforce/profiles/default.htm>

Health Resources and Services Administration. (1999). *State Profile for Alaska*. Rockville, MD: U.S. Department of Health and Human Services. Retrieved from HRSA State Profile Database. Retrieved November 6, 2001 from the World Wide Web: <http://stateprofiles.hrsa.gov/CreateQueryIndex.html>

Jacobs, D. (1974). Dependency and vulnerability: An exchange approach to the control of organizations. *Administrative Science Quarterly*: 19, (1), 45-49

Lighter, D.E., & Fair, D.C. (2000). *Principles and Methods of Quality Management in Health Care*. Gaithersburg, MD: Aspen Publishers.

McCall, N., Rice, T. & Boismier, J. (1991). Private Health Insurance and Medical Care Utilization: Evidence from the Medicare Population. *Inquiry*: 28, (3), 276-287.

McNeil, K. (1978). Understanding Organizational Power: Building on the Weberian Legacy. *Administrative Science Quarterly*: 23 (1), 65-90.

Morgan, P., Muttitt, S., Allen, D., Anderson, C., & Weaver, L. (2001). *Draft Inventory and Assessment Report for the Alaska Federal Health Care Access Network Project*. Toronto, Ontario: Tecknowledge Professional Services.

Muttitt, S., Morgan, P., Allen, D., Anderson, C., & Weaver, L. (2001). *Sustainability Plan*. Toronto, Ontario: Tecknowledge Professional Services.

Pfeffer, J., & Davis-Blake, A. (1987). Understanding organizational wage structures: A resource dependence approach. *Academy of Management Journal*, 30, 437-455

Rogers, G (1990). *Alaska*. *Collier's Encyclopedia* (41st ed., Volume 1). New York, NY: Macmillan Educational Company.

Shonick, W. (1995). Government and Health Services. New York: Oxford Press.

Short, P. F. & Lair, T. J. (1995). Health Insurance and Health Status: Implications for Financing Health Care Reform. Inquiry: 31. (4), 425-437.

Shortell, S.M., & Kaluzny, A.D. (2000). Health Care Management: Organizational Design and Behavior. (4th ed.). Albany, N.Y.: Delmar

U.S. Census Bureau. (1999, September). *1997 Economic Census: Health Care and Social Assistance Alaska*. Washington, D.C.: Census Bureau. Retrieved from the U.S. Census Bureau, Economic Census 1997 Database. Retrieved on November 12 2001 from the World Wide Web: http://www.census.gov/epcd/ec97/ak/AK000_62.HTM

U.S. Census Bureau. (2001, July). *Profile of General Demographic Characteristics: 2000, Alaska*. Washington, D.C.: Census Bureau. Retrieved from Census 2000 Summary File Database. Retrieved November 6, 2001 from the World Wide Web:
http://factfinder.census.gov/servlet/QTTable?ds_name=DEC_2000_SF1_U&geo_id=04000US02&qr_name=DEC_2000_SF1_U_DP1

Appendix A

Veterans Affairs

The VA's mission is to serve America's veterans and their families with dignity and compassion and to be their principle advocate in ensuring they receive medical care, benefits, social support, and lasting memorials. Additionally, the VA is concerned with promoting the health, welfare, and dignity of all veterans in recognition of their service to this nation. The Department of Veterans Affairs administers 172 VA medical centers, making it one of the largest health systems in the country (Morgan, Muttitt, Allen, Anderson & Weaver, 2001).

The VA's presence in Alaska is quite unique and mirrors in many ways the influence and importance the military has in the state. About 63,000 veterans live in Alaska (Morgan et al., 2001). The state has a high veteran population, with many service personnel having lived and worked in the state, and then returned and taken up residence. The Alaska VA population, at an average age of 49, is younger than the national VA average. As the VA's role in Alaska grows to meet demand it has to deliver more and more services to meet client needs (Morgan et al., 2001).

The mission of the Alaska VA Healthcare System and Regional Office is to improve the quality of life of eligible veterans and dependents living in Alaska through health care, benefits and services. Within Alaska, the department operates three health care facilities with a fourth planned to open soon. The largest facility is operated as a VA/DoD Joint Venture Hospital with the 3rd Medical Group, Elmendorf Air Force Base. As part of the joint venture, the VA is responsible for dual operation of some of the hospital services, staffing the intensive care unit with 7 beds and a medical services unit

with 20 beds (Morgan et al., 2001). VA staff also compliments Air Force staff in the emergency department. Other VA staffing includes specialist physicians staffing the intensive care unit, registered nursing staff and nurse practitioners as well as a physician assistant, all supported by administration staff. Services are purchased for beneficiaries when needed in a sharing agreement with the Air Force or if out of state specialist services are required, patients are transferred to a VA run facility in the lower 48 states. Outpatient services are offered in Anchorage through the VA operated outpatient clinic. This facility provides specialty services to clients including internal medicine and general surgery.

Services are offered in Fairbanks through Bassett Army Community Hospital, with outpatient clinic services being offered from rented space within the hospital. The relationship is quite different and the clinic runs quite independently. Staffing includes a nurse clinic manager, nurse case manager, registered nurse, nurse practitioner, internal medicine specialist and administration staff. The VA plans to open a clinic at Kenai in the near future. The clinic will offer outpatient services and will be staffed by a physician, nurse case manager, registered nurse and licensed practical nurse (Morgan et al., 2001).

The VA is responsible for providing health care services to clients based on the individual's coverage, ranging from full coverage to co-pay agreements. If a VA beneficiary decides to seek treatment at another facility and the treatment has been pre-authorized or if the treatment is for a service related condition, the VA is responsible to pay for those services. When describing the typical populations served, it is important to note that individuals eligible for health care services provided by Veterans Affairs live

and work in communities throughout Alaska, from the most isolated to the urban areas. Service centers are located in Anchorage and Fairbanks. For clients who need to receive care outside one of these areas, they often rely on local health care services offered in the community (Morgan et al., 2001).

Appendix B

Department of Defense

Background

Alaska has historically been a focus of military attention due to its strategic location. The Department of Defense has approximately 70,000 active military personnel, dependents and retirees in the tri-services forces (Army/Navy/Air Force) living and working in the state (Morgan et.al., 2001).

Table 14

TRICARE Pacific Population and Enrollment for Alaska as of June 2001

Service	Active Duty (AD)	AD, Dependents & Retirees
US Army	6,799	25,292
US Air Force	10,023	37,507
US Navy	83	205
USMC	28	492
US Coast Guard	1,933	6,390
Other (Public Health Officers)	345	1,264
TOTAL	19,211	71,150

Note. Source: Draft Inventory and Assessment Report for the AFHCAN Project, 2001)

The United States Army and United States Air Force have the largest number of personnel. Elmendorf Air Force Base in Anchorage supports approximately 5,000 Air Force personnel and Eielson Air Force Base in Fairbanks, Alaska, supports approximately 5,000 personnel. The Army presence is concentrated at Fort Richardson in Anchorage, with approximately 1,500 personnel and Fort Wainwright in Fairbanks, with approximately 5,500 active duty personnel (Morgan et al., 2001). In addition to

these bases, there are numerous small bases located throughout the state operated by armed forces. As part of the mission in Alaska, there are multiple deployments throughout the state involving large numbers of personnel from both services for training and exercise purposes. These deployments are usually to isolated areas. The armed forces population can therefore be very mobile, providing unique support challenges (Morgan et.al., 2001).

Health Care Issues

The DoD is also responsible for providing a full range of health services to active duty personnel and dependents. Active duty personnel are for the most part, fit and healthy with most service men and women being between the ages of 18-45, and the majority being in the younger age range. Dependents, to include spouses and children are usually a younger population requiring wellness and pediatric services. Common problems encountered are trauma injuries, dermatology and orthopedics as well as family practice related care needs in the areas of pediatrics, gynecology and obstetrics (Morgan et.al., 2001).

Both the Army and Air Force provide health care services in Alaska. Air Force resources are concentrated at Elmendorf Air Force Base and the 3rd Medical Group. As mentioned previously, the hospital is operated as a VA/DoD Joint Venture Hospital. The hospital offers inpatient, outpatient, diagnostic, emergency and operating room services. Specialist outpatient clinics are offered in many areas including allergy, immunology, cardiopulmonary, dental, dermatology, flight medicine, internal medicine, neurology, orthopedic and pediatrics, etc. as well as rehabilitation services. The hospital has a total of 35 in-patient beds, expandable to 150 beds, with 7 operating

rooms and a corresponding personnel staff that includes professional and non-professional staff (Morgan et.al., 2001). The Air Force also has an outpatient clinic operated by the 354th Medical Group at Eielson Air Force Base. The outpatient clinic offers limited specialist care services as well as Primary Care Management Teams (Morgan et.al., 2001).

Army health care services are concentrated in Fort Wainwright at Bassett Army Community Hospital. The 43-bed facility provides inpatient, outpatient, and emergency and operating room services all supported by ancillary and administration staff. Specialist outpatient services are provided in areas such as obstetrics, orthopedics, internal medicine, pediatrics, family practice and ENT. The Kamish Clinic, also situated on Fort Wainwright, offers family practice services. The Army also operates a Troop Medical Clinic at Fort Richardson for active duty personnel only and staffing includes physicians, physician assistants, nurses and medics (Morgan et.al., 2001).

Military physician specialists also have a shared responsibility as part of the Partnership to provide services to non-military health care clients within the Federal system. Close ties exist between the Army and Air Force. Health care services are often shared, especially specialist and high care services (Morgan et.al., 2001). Most DoD personnel are stationed on bases near health care services. There are however, personnel located in more isolated areas in Alaska, primarily Air Force personnel.

Population Based Facility Types

The first type of facility is the isolated site. There are numerous isolated sites operated throughout Alaska by the armed forces. Radar bases, airfields, and exercise areas represent these sites. The populations of these sites, although usually small, can

fluctuate dramatically due to deployments, exercises and mission requirements. For example, a site that normally has a resident population of 5-10 personnel can fluctuate to over 1,000 personnel with a range of services brought in as the mission requires, including comprehensive health care services often provided by field hospitals. Due to the need for mobility of all of the armed forces, there are many options to transport personnel out of these isolated sites for health care services, if necessary (Morgan et.al., 2001).

Mid level health care facilities serve active duty personnel and dependents through clinics situated on Army and Air Force bases. Example are the Army Troop Medical Clinic at Fort. Richardson, the Kamish Clinic at Fort Wainwright and the 345th Medical Group, situated at Eielson Air Force Base. These mid level clinics provide outpatient services and specialist services. In the case of the Troop Medical Clinics, services are provided to active duty personnel only. They often act as referral centers to the DoD hospitals close by (Morgan et.al., 2001).

DoD hospitals such as Bassett Army Community Hospital and Elmendorf Hospital service populations on bases. These health care facilities offer a range of services. Due to the high level of cooperation between the armed forces, services are very often shared; a specialist working for the Air Force will see active duty personnel or dependents from other armed forces. These high-level care facilities are not able to offer every service and do refer if needed. If referral is required, it is often to a DoD facility in the lower 48 states. The Air Force, for example, runs a regular weekly scheduled air service to transport clients to Madigan Army Medical Center and civilian specialty care in the Seattle area (Morgan et.al., 2001).

Appendix C

U. S. Coast Guard

The U.S. Coast Guard (USCG) is a military, multi-mission, maritime service, operating within the Department of Transportation. The Coast Guard is a unique Federal agency. In addition to its national defense role as one of the five U.S. Armed Services, the Coast Guard is charged with a broad scope of regulatory, law-enforcement, humanitarian, and emergency-response duties. The USCG mission in Alaska concentrates on search and rescue and marine safety. There are approximately 2,000 active members serving within bases and on board ships in Alaska, making up the 17th District in the Pacific Area. Although services are designed to primarily meet the needs of active duty personnel, the USCG is also responsible for providing health care services to dependents and retirees (Morgan et al., 2001).

Health Care Issues

Most active duty USCG individuals are between the ages of 18-45 years, physically fit and healthy. Dependents also constitute a predominantly younger, healthy population. There are a small number of retirees who are typically in good health. Health issues include allergy-related conditions, dermatology problems and orthopedics (Morgan et al., 2001). Health care funding for USCG health services is provided as part of the total Federal USCG funding. The USCG is responsible to provide a complete range of health care services to its active duty staff and when able, to dependents and retirees living on or near bases. Active duty and dependents are eligible for TRICARE (Morgan et al., 2001).

Health Care Services, Facilities and Providers

The U.S. Coast Guard in Alaska is comprised of four bases and a number of vessels. The largest of the bases is located on Kodiak Island, operating as a center for the USCG in Alaska. The base has a clinic with three physicians, one physician assistant and two RN's. A dentist and dental hygienist also provide service. The clinic has its own x-ray equipment, although the x-rays are sent out for reading since the clinic doesn't have a staff radiologist. Lab services are provided although more complicated laboratory tests are also sent out for processing. There are no inpatient facilities. Patients requiring inpatient services are sent to inpatient DoD facilities off island (Morgan et al., 2001).

Three smaller bases are located in Sitka, Juneau and Ketchikan, in the southeast corner of Alaska. They support between 800-1000 active duty, dependents and retirees working and living on or near the bases. Only Ketchikan has x-ray facilities and like Kodiak, all x-rays are sent out for interpretation. Each base has a small clinic with a dentist, a dental assistant on contract and a resident physician. The physician in Sitka also acts as the USCG area flight surgeon. A physician assistant or nurse practitioner and 5 corpsmen support the physician. For those service personnel and dependents requiring inpatient services, local civilian health care facilities are used. However, if an inpatient stay of a couple of days or more is expected, arrangements are made to have the individual transferred to a DoD facility such as Elmendorf AFB Hospital or Madigan Army Medical Center in Washington State. Due to USCG transport resources, there are many options and processes in place to transfer personnel to facilities able to offer higher levels of care (Morgan et al., 2001).

Health services are also provided on Coast Guard vessels. The USCG has three law enforcement ships and a number of buoy tenders. Health care services are provided by corpsmen. Corpsmen are trained through Navy or Air Force training programs. Qualified corpsmen may obtain licensure as a licensed practical nurse and are able to provide health care in any number of situations. Corpsmen work directly with an overseeing physician and report directly to that physician when providing care on a ship (Morgan et al., 2001).

Appendix D

IHS/Tribal Entities

Overview

The Indian Health Service (IHS) is an agency within the U.S. Department of Health and Human Services and is responsible for providing Federal support and oversight for the federally funded native health programs in Alaska. Its goals are to ensure that provisions of PL-638 Native Self-Determination Act are carried out. The IHS office in Alaska is called the Alaska Area Native Health Service and works to provide comprehensive health service to approximately 115,000 Alaska Natives, Eskimos, Aleuts, and Indians (Morgan et al., 2001). Although it is simplifying a very complex arrangement, essentially, the IHS provides Federal funds that are then provided to the tribal entities through a contract or compact that is negotiated on an annual basis (Morgan et al., 2001).

There are 32 Tribal Entities in Alaska. Each entity represents at least one and often many communities. Each entity has a corporate organization. Each Tribal Entity belongs to the Alaska Native Tribal Health Consortium (ANTHC). ANTHC is a jointly owned and managed organization that provides oversight for the operation of the Alaska Native Medical Center in Anchorage as well as state-wide tribal support services. ANTHC ensures participation with other Alaska native tribal health organizations in the Alaska Tribal Health Compact, a self-governance agreement with the Indian Health Service (Morgan et al., 2001).

Health Care Services, Facilities and Providers

The Alaska Native Tribal Health Consortium has responsibility for essential state-wide services. Tribal hospitals located in the six rural communities of Barrow, Bethel, Dillingham, Kotzebue, Nome and Sitka provide primary and secondary health care services to natives living in those regions. Additionally, there are 24 tribal health centers and 176 tribal community health aid clinics operated throughout the state. The centers and clinics are operated by their respective regional health corporations or tribal organizations (Morgan et al., 2001). The Consortium has approximately 1,200 staff and an annual operating budget of approximately \$200 million. Departments within the Consortium are Alaska Native Medical Center (ANMC), Community Health Services, Tribal Support Services and Environmental Health. The Alaska Native Medical Center (ANMC) in Anchorage serves as the area's referral center and gatekeeper for specialty care (Morgan et al., 2001).

During the fiscal year 2000, the ANMC admitted more than 6,600 patients and provided more than 320,000 outpatient clinic visits. As well as inpatient services and outpatient services, a full range of acute care services are provided at the center, including trauma services. There are 150 beds and 6 operating rooms with services provided through a range of specialties. The ANMC is managed in cooperation with the Southcentral Foundation (Morgan et al., 2001).

The organization of Native Alaskan health care resources can be categorized into four population examples:

1. Communities with less than 700 people are categorized as very isolated populations. There are approximately 176 communities/sites throughout Alaska

categorized as very isolated populations. Transport in and out of these communities is often by air only. Small planes or floatplanes are used as there are either no landing strips or the landing strip is seasonal. Coastal communities often have a ferry service but the service is typically infrequent and may only be used to transport goods and supplies. The people are typically younger with pronounced health problems due to the isolated location and lack of services (Morgan et al., 2001).

Health services are provided by one or more Community Health Aide's (CHAs) living and working in the community. CHAs provide care that is ultimately under the supervision of a physician. Tribal Community Health Centers (village clinics) provide limited primary health services in the form of outpatient clinic services only. Equipment in the clinics vary in age and quantity. Although a few clinics do not have running water, most communities have both running water and electricity provided by a community generator. Clinics have a stocked pharmacy and the CHAs dispense drugs based on physician's orders. Physicians visit these communities, on average, quarterly (Morgan et al., 2001). The most consistent visiting health professionals are either Public Health Nurses or nurses from the individual Indian Health Corporations responsible for health care for that population. Clients requiring a higher level of care are transferred to the nearest hospital. At certain times of the year, weather and daylight hours can be a major factor restricting travel. Depending on the size of the community, there are 1-10 transfers or medevacs per month (Morgan et al., 2001).

2. Communities with populations from 700 to 3000 people are characterized as typical isolated communities. Some have road or ferry access but many are accessible only by air. Transport in and out of the community is often improved with airfields able

to support larger aircraft that have greater flexibility for landing and takeoff (Morgan et al., 2001).

Health services are provided by Tribal Health Centers with CHAs living and working in the community. Depending upon the size of the population, resident professional staff may also provide service from the Tribal Health Center e.g. nurse practitioners (Morgan et al., 2001). Outpatient services are offered by the clinic. Equipment is usually more modern and more services are provided. There are a total of 24 Tribal Health Centers throughout Alaska. Populations are usually younger with health problems similar to those of the Very Isolated Communities (Morgan et al., 2001).

3. Communities with populations from 3000 to 40,000 people are considered mid-level communities. The population in these communities is predominantly younger, although they also have a greater than average older population due to the more readily available health services. Health status is also improved through access to preventive and other health services (Morgan et al., 2001).

The mid-level community hospital or Tribal Hospital provides both inpatient and outpatient services including dental and rehabilitation but no operating room services are offered. Physicians and other professional staff, staff the hospital. Tribal Hospitals provide an important service and are referral centers for Very Isolated and Isolated populations. Clients usually receive care at these centers prior to transfer to Anchorage for tertiary level care. Mid-level communities often have scheduled jet service as well as resident emergency medical services (Morgan et al., 2001).

4. Anchorage is the largest center in Alaska with a population of 250,000 people, almost half the population of the state. The Alaska Native Medical Health Center in

Anchorage is the main referral center for Alaska Natives. As mentioned before, the Alaska Native Tribal Health Consortium in collaboration with the Southcentral Foundation operates this center. In fiscal year 2000, ANMC earned \$61 million from Medicaid, Medicare and other insurance payers and receives referrals from throughout the state (Morgan et al., 2001).

Referral Patterns

Within the Tribal Health Care System, the normal process for a patient to receive service at a Very Isolated or Isolated site is to first visit the health clinic and see the CHA or other resident health care provider. If needed, the CHA will refer the patient to a supervising nurse and/or physician. Under direction of the nurse or physician, which is often given over the telephone, treatment is provided. If the physician feels a higher level of care is required, arrangements are made to transfer the patient to a tribal hospital or ANMC (Morgan et al., 2001). For a patient to see a specialist, a referral is made by the local physician. With the implementation of the Alaska Federal Health Care Access Network (AFHCAN), referral patterns may change. The telemedicine solution has the potential to enhance the close working relationship between the CHA and physician. Although, the traditional referral pattern will likely remain, the amount of information that can be shared about the patient's condition will change. This will provide opportunities to enhance care outcomes and avoid unnecessary transfers. In the case of specialist referrals, a virtual consultation is possible without the patient having to travel out of the community (Morgan et al., 2001).

Appendix E

Initial Eight Partnership Goals With Objectives

The first goal of the Partnership is to *Maximize the Efficiency of Federal Health Care Resources* (Alaska Federal Health Care Partnership (AFHCP), 1995). To achieve this goal, the partnership members would strive to effectively use Federal resources through coordination, communication, and cooperation among the agencies. They would establish and support regional referral guidelines and analyze high cost areas for alternatives of care. Additionally, they would explore joint contracting of specialists and capitalize on assistance from Federal agencies outside the Partnership. The partners would standardize treatment protocols for certain services. Of particular importance to DoD is the responsibility to ensure readiness and facility viability under all contingencies. Each partner would conduct an internal assessment and identify ways to maximize bargaining leverage for ancillary services in civilian procurement initiatives. They would do this by analyzing their workflow and identifying excess capacity, utilization and limiting criteria. Furthermore, they would review cost standardization across agencies paying special attention to ordering practices and special programs such as blood. Maximizing bargaining leverage for all contracted services was another objective and included the areas of biomedical equipment, laundry/linen services, prime vendor for subsistence and med/surg supplies, transcription services and pharmaceutical purchases. Finally, the partners would integrate Federal information systems. There were numerous subcategories under this objective that ultimately resulted in an information network that all partners could share and utilize (AFHCP, 1985).

The second goal was *Eliminate Bureaucratic Barriers* (AFHCP, 1995). There were three objectives for this goal. The first objective was to optimize use of Federal authority to prevent duplication in contracting services. The second objective was to develop a plan for resourcing of physicians and providers of care considering Federal instead of individual facility needs. The last objective was to develop a plan for resourcing of (high dollar) equipment relevant to Partnership needs instead of individual facility needs.

The third goal was *Integrate Federal Medical Care* (AFHCP, 1995). There were five objectives identified for successful accomplishment of this goal. The first objective was to integrate CHAMPUS beneficiaries in agency sharing for maximum utilization of resources. The second objective was the management of CHAMPUS patients to achieve cost containment, and/or cost savings. The third objective was to implement clinical protocols to standardize medical practices among the agencies. The fourth objective was to integrate risk management programs among the agencies to look at opportunities to improve medical care. Finally, the fifth objective was to streamline provider credentialing and privileging among the agencies to maximize referral resources.

The fourth goal was *Create a Better Business Environment* (AFHCP, 1995). There were three objectives under this goal. The first objective was address planning, program development, resource management, program evaluation, and other issues pertinent to functions in all Federal initiatives. The second objective was to streamline business functions among the agencies for obtaining services and financial

reimbursements. Finally, the third objective was to utilize combined Federal agency strength in all business transactions with civilian facilities and providers of care.

The fifth goal was *Assign Beneficiary Group Advocates* (AFHCP, 1995). This goal had two performance objectives. The first objective was to implement a marketing plan for the Partnership by ensuring maximum dissemination of information pertaining to Partnership initiatives to allow for maximum exposure. The other objective was to establish agency collaboration for joint planning, development, studies, analysis, and recommendations for managed care programs.

The sixth goal was *Optimize Technology* (AFHCP, 1995). This goal had four objectives. The first objective was to maximize telemedicine linkage with Federal agencies by establishing a “hub” that will branch off into spokes of other agencies. The second objective was to investigate the establishment of teleradiology linkage with Federal agencies. The third objective was to investigate an on-line medical information system for Federal agency use in improved patient care and research information. The fourth objective was to establish a Federal library of video reference tapes for agency use.

The seventh goal was to *Facilitate Patient's Access to the Right Care, at the Right Time, at the Right Place* (AFHCP, 1995). The first objective in this goal was to maximize use of Federal referral system by evaluating services available from all agencies and establishing a referral listing with respective methods for accessing other agency services (appointments, clinics, ancillary services). The second objective was to fully integrate intra-state movement of patients to achieve optimal patient access, and quality care at the lowest cost. The third and final objective was to maximize use of

patient transport programs and contracts. In particular, this meant maximizing the use of Life Guard Transport and C-12/C-26 aircraft.

The eighth goal was to *Create Centers of Excellence* (AFHCP, 1995). To achieve this goal, there were four objectives identified. The first objective was to maximize utilization of clinical preventive services, wellness programs, and health promotions programs. The second objective was to establish a cost-effective mental health intervention program. The third objective was to investigate benefits of self-care books. The final objective was to develop a Federal patient satisfaction survey.

Appendix F

AFHCAN Project

Overview

Perhaps the most aggressive venture by the Partnership is the Alaska Federal Health Care Access Network (AFHCAN). AFHCAN is a telehealth initiative sponsored by the AFHCP. The goal of AFHCAN is to improve access to health care for Federal beneficiaries through the development of a sustainable telehealth network of 235 sites throughout Alaska (Muttitt, Morgan, Allen, Anderson, and Weaver, 2001). The Executive Committee of the AFHCP provides oversight to AFHCAN. Implementation of the project is guided by the AFHCAN Steering Board. The purpose of the Steering Board is to ensure compliance with the stated mission and goals of the project.

AFHCAN Mandate

The AFHCAN project has the mandate to coordinate the development of a state-wide telecommunications network to serve the 37 member organizations with over 250,000 Federal beneficiaries throughout Alaska (approximately 40% of the population). This includes:

- 32 Tribal Entities with 195 sites and 115,000 beneficiaries, in conjunction with Indian Health Service (IHS)
- Department of Defense (DoD) representing 2 member organizations with 9 sites and 65,000 beneficiaries
- Department of Veteran Affairs (VA) with 1 site and 63,000 beneficiaries
- U.S. Coast Guard (USCG) with 4 sites and 6,400 beneficiaries,
- Alaska Department of Public Health Nursing with 26 sites (Morgan, et.al., 2001).

Each site will be provided telemedicine workstations and telehealth information kiosks to augment and support existing provider relationships. Equipment and installation costs are estimated at \$15 million with an equal amount for administration, systems development, training, support, and evaluation (Alaska Federal Health Care Partnership, 1998). The cost of individual workstations and kiosks range between \$4,300 and \$49,200, depending on equipment in the package. The costs for a facility are aggregated based on the number of workstations required for the facility size. Current estimates place workstation costs at facilities between \$24,500 and \$856,400.

The genesis of the AFHCAN project was to address the Alaska Federal health care challenges by providing beneficiaries with better access to critical health care services through telehealth. The Partnership saw an opportunity to improve the efficiency of the Federal health care system in Alaska by decreasing duplication of service, maximizing limited financial and human resources, and working together to overcome the inherent high costs of delivering health care. They further saw that vital factors such as inadequate facilities and equipment, professional isolation and beneficiary isolation could be better addressed with the use of telehealth (Muttitt et.al., 2001).

Recent advances in telemedicine technologies and in-state support for advanced telehealth network systems have opened the door for a dramatic improvement in the delivery of health care and health education to remote and rural environments. The AFHCP saw these technology advances as a unique opportunity to reduce certain costs and greatly improve health services to all Federal health care beneficiaries in Alaska (AFHCP, 1998). As briefly mentioned, the original proposal for the AFHCAN Project

focused on providing telehealth solutions to Federal agencies in Alaska. These solutions were based on the use of store and forward imaging, interactive video conferencing, and telehealth kiosks as mechanisms to improve health care and health care education (Alaska Native Tribal Health Consortium (ANTHC), 2001) . More recently, the scope of the project has broadened to include the development of a statewide telehealth network, and support for the teleradiology plan (ANTHC, 2001). Alaska has engaged in numerous projects dealing with telemedicine, distance health and distance learning over the last 25 years. Using research and information gathered from other telemedicine projects, AFHCP partners have designed a telemedicine and telehealth system that will dramatically decrease the necessity of travel and at the same time extend the reach of VA, DoD, and IHS specialty and support services to more remote areas of Alaska (AFHCP, 1998).

As with any major project, the primary issue that surfaces is financing. The finances of the AFHCAN Project are centralized through the project office. AFHCAN member organizations have implemented an operating agreement, which defines the authorization and process for centralized funding by each of the project member organizations to ANTHC. Funds are centralized at ANTHC to provide administrative support for project implementation. Site specific funds are decentralized to each facility for locally identified training, travel, and staffing activities, with specific amounts specified in a subaward, contract or memorandum of agreement (MOA) developed between AFHCAN and each participating facility (ANTHC, 2001). AFHCAN funds centralized at ANTHC remain available until expended and carry over into future project years if unexpended by the end of the fiscal year. This is a benefit of centralizing funds

at ANTHC, as most Federal appropriations require that funds be expended by the end of each fiscal year. The carry-over of funding allows for efficient and appropriate spending of project resources (ANTHC, 2001).

Project Milestones

The AFHCAN implementation plan called for using standard phone lines, off the shelf computer hardware, telecommunications support from the Universal Services Fund, and proven telemedicine technologies (AFHCP, 1998). The strategy was to build upon the existing capabilities of all AFHCAN sites beginning with the largest sites and completing the project at the smallest village sites in four years (AFHCP, 1998). FY 1999 will include protocol standards and procedures development, user group establishment, training development, evaluation plan development, kiosk software development, and installation of 20% of the workstations. FY 2000 and 2001 will continue workstation installation, development of protocols, procedures and training, and begin kiosk installation. FY 2002 includes support of village sites and completion of project evaluation (AFHCP, 1998).

Because of the magnitude of the AFHCAN project, the AFHCAN Project Office (APO) developed a matrix to identify major milestones for each project member organization. This information is used for scheduling, monitoring and projection of work activities. The major milestones and project stages for each member organization are as follows:

1. First Contact: The organization has identified its telehealth team and statewide committee members, and a designated point of contact for subaward/contract/MOA negotiations.

2. Contract: There is a signed subaward/contract/MOA between the APO and the organization to begin planning and assessment and other activities as agreed upon.

3. Sustainability Plan: The organization has completed assessment and planning and developed a telehealth sustainability plan for implementation and long-term sustainability, including hiring and/or designating an on-site telehealth coordinator.

4. Operations Contract: There is a document modification for implementation and operations of telehealth solutions.

5. Stage 1 Operations: Initial installation of AFHCAN equipment is complete. This includes the deployment and installation of the equipment at the site, training of end users, and ongoing support and quality control.

6. Stage 2 Operations: Installation of AFHCAN equipment and telehealth software is complete. Essentially, the same as Stage 1 Operations with the addition of software to permit the transmission of telehealth data to remote locations. This includes the deployment and installation of the software at the site, training of end users, and ongoing support and quality control. This does not include the installation of all software and hardware for the site, since it is recognized that some sites may choose to wait for later arrival of equipment and software (e.g. wait for improved telecommunications prior to accepting video conferencing equipment).

7. Stage 3 Operations: Final installation of all equipment and software at the site is complete. All contracted equipment and software has been installed and tested at the site, and all users have received final training. Ongoing evaluation and quality control processes will still occur.

8. Teleradiology: Teleradiology has been installed and implemented at the site. (ANTHC, 2001)

The project member milestones matrix provides a summary of the status of each project member organization. Utilizing the matrix, the member organizations are able to quickly view the status of installation and implementation at all sites. The matrix is updated and submitted for review monthly, in conjunction with the master project schedule (ANTHC, 2001).

AFHCAN Benefits

Telemedicine offers many opportunities for extending unique benefits to health care users. Telemedicine applications have been widely touted for their ability to improve the access and quality of health services while decreasing costs for unnecessary care and transportation (AFHCP, 1998). However, it is difficult to assess the precise magnitude of these benefits with the AFHCAN Project prior to complete implementation and precise cost savings are difficult to determine early in the project. Evaluations of telemedicine projects in other parts of the nation have shown that cost savings have varied widely between different projects and sites based on the clinical applications used, patient demand for services, patient acuity level, level of health resources available at the telemedicine site, and other factors (AFHCP, 1998). While it may be difficult to estimate an actual dollar amount that AFHCAN expects to save, project leaders expect this new model of health care to provide many benefits (AFHCP, 1998). Many of the benefits are listed and discussed below:

- Duplication of Services to Collaborative Services: As a result of joint operating agreements and cooperatively managed services, the AFHCP

would eliminate the avoidable overlap and redundancy of services to their beneficiaries, thus solving problems of duplication and maldistribution of services (AFHCP, 1998).

- Limited Financial and Human Resources to Managed Resources: More efficient utilization of resources and cooperative planning would allow the Partnership to provide more services and extend existing services improving access over their joint network, thus satisfying the demand for their services and, at the same time, improving the quality of these services.
- High Costs of Health Care to Cost-Effective Service Delivery: In addition to the efficiencies mentioned above, AFHCAN requires a paradigm shift from transporting patients to specialists to transporting information from specialists to the local providers and patients; i.e. to the point of need. While transportation costs and associated expenses like lodging and follow-up will be reduced, no telemedicine or telehealth model yet has shown reduced overall costs. Instead, these savings are shifted into retooling the old infrastructure and enhancing the volume and quality of services provided. It is anticipated that costs for unnecessary travel will be curtailed, leaving more resources for higher acuity cases requiring such services. Federal agencies within Alaska currently spend millions of dollars a year on private emergency medical evacuation (Medevac) services. In addition to savings in emergency transportation services, AFHCAN predicts that Federal agencies will be able to achieve cost savings in other forms of patient travel. For example, patients in a stable enough condition for commercial transport require per diem

reimbursement for hotel and meal expenses associated with the visit. Often, the agency must help support not only the patient's travel, but also the travel of a parent, guardian, or companion. By avoiding unnecessary transport, agencies should see tangible cost savings in both commercial airline travel and per diem expenses (AFHCP, 1998)

- **Inadequate Facilities to Re-tooled Network:** A large portion of the budget for the AFHCAN network is directed at re-tooling the diagnostic, communication, and record archival technologies around Alaska. Thus the current 'fax and phone' telecommunications system would be updated to a modern high technology and high capacity system that will serve needs far into the future (AFHCP, 1998).
- **Professional Isolation to a Virtual Community:** AFHCAN will bring Alaska's widely distributed health care community 'on-line.' Simple and quick access to consultants, medical information and continuing medical education will eliminate the agonizing uncertainties and solitude that have long plagued the system, thus enhancing the prospects for recruitment and retention of rural health care providers.
- **Beneficiary Isolation to Healthcare Partner:** Beneficiaries all around Alaska will enjoy enhanced access to high-quality, distance-insensitive services and providers through AFHCAN. The ability to contact service representatives, learn about their health problems, and join in virtual communities will foster personal autonomy and self-care responsibility. Rapid consults with specialists 'looking over the shoulder' of their local health care provider, will

promote satisfaction and a team approach to service provision. With expanded telemedicine sites, patients should find it easier to get the medical help they need within their own community, often avoiding the need for travel. Staying within the community for treatment also minimizes the amount of time a patient will need to take from work and family duties to obtain needed medical care (AFHCP, 1998).

- **Improved Quality of Care:** As noted earlier, it is difficult to assess the precise magnitude of the improved quality of care expected as a result of the AFHCAN project. Likely, the improvement in quality will be dependent on the current state of care at individual sites, as well as the specific clinical applications that sites choose to utilize most frequently. Still it is expected that expanded telemedicine capabilities will improve the quality of care available for remote patients. Patients who previously would not have access to a specialist will benefit from care plans created by a provider within the specialty that the patient requires (AFHCP, 1998).

Furthermore, another benefit of the AFHCAN Project is the long-term feedback from such a large scale project. There are numerous telemedicine projects nationwide but none that appear to be on the scale of the AFHCAN project. The evaluation of the project will provide information on the efficacy of telemedicine as a clinical tool and resource-saving method (AFHCP, 1998).

Stakeholders

Clearly, the benefits of the AFHCAN Project will be accrued by three distinct stakeholder groups: (a) patients; (b) physicians and other health care providers, and (c)

the health care system. Although it may seem redundant, it is necessary to identify many of the benefits as they pertain to the different stakeholders. The underlying premise is that improved access for patients is at the core of the AFHCAN implementation.

The first stakeholder is the Patient. The identified benefits are:

- Access to a broader range of comprehensive primary, secondary and tertiary health care services, including health promotion and disease prevention
- Reduced waiting time for 'visiting' specialist
- More timely advice and intervention in emergency situations
- Ability to remain in familiar surroundings of their home community surrounded by the support of family and friends
- Reduced loss of work time
- Savings on cost of travel, lodging and food
- Savings on cost of ambulance transport in non-emergency situations
- Less aggravation to existing medical conditions as a result of traveling long distances for care
- Eliminated need to make arrangements for alternate caregivers at home
- Access to a second opinion for diagnosis without the need to travel to another community
- Improved continuity and coordination of primary care with other level of health care services (Muttitt, et al., 2001)

The second major stakeholder is the Health Care Provider. For the rural physician, telehealth means being able to provide better care for their patients.

Physicians will be able to follow their patients' care within the home community with the assistance of specialist consultation via telehealth. For specialists in the tertiary centers, it will reduce travel time and costs and allow greater productivity (Muttitt, 2001). The AFHCAN Project may also mean easier access to continuing medical education for physicians and other health care professionals. Physicians from urban and semi-urban sites have traditionally spent more time in formal CME activities than those from rural sites mainly due to the rural physician's lack of access and distance.

Videoconferencing CME allows rural physicians and others to take part in more CME sessions and greatly reduces time away from their clinical duties, therefore, decreasing their costs (Muttitt, 2001). Specific health care provider benefits may include:

- Reduced isolation for practitioners in rural and remote communities
- Improved professional environment that supports clinical practice in the community
- Increased contact with peers for support, advice, consultations and continuing education
- Increased recognition and respect for roles of all primary health care providers
- Health care providers will be better supported to work to the full extent of their scope of practice through the availability of enhanced skills training and education
- Specialist assistance will allow local primary care providers to provide more complex care closer to home

- Information on care and outcomes obtained during a referral are communicated directly back to the primary care provider, resulting in better continuity of care (Muttitt, 2001)

The third major stakeholder is the Health Care System. Primary health care is the foundation of a genuinely integrated system of health care services and is the most essential component for improving continuity of care. It plays a pivotal role in helping people stay healthy and connects patients to the rest of the health care system when they need other health-related services (Muttitt, 2001). Although there are many dedicated primary care providers who serve the population, health care is fragmented, unstructured, and not part of an integrated and coordinated health care system. The aging population, the increased prevalence of chronic diseases, increased empowerment of consumers in decision-making about their health care and hospital restructuring are some of the factors that are placing greater demands on primary care (Muttitt, 2001). Specific health care system benefits include:

- Meeting the equity goal of ensuring that all beneficiaries have access to high quality health care services
- Maximizing the use and skills of primary health care providers
- Improved efficiency with which specialized health care is delivered
- Greater coordination of all levels of health care, leading to more effective use of health care resources
- Increased potential to link together and coordinate all aspects of health care including services provided by specialists, hospitals, home care, and long-term care

- Potential cost savings through reduced transfers and early repatriation of patients
- Cost savings associated with transfer of medical records and radiology data (real-time transmission)
- Increased efficiency in administration and reduced travel time, cost, and risk for administrative staff
- Patient and physician satisfaction (Muttitt, 2001)

Telehealth solutions are intended to provide better access to services, especially outside urban areas. The potential cost savings to the health care system means that resources can be more effectively used to achieve improved health care services for patients (Muttitt, 2001).

AFHCAN Conclusion

As the largest project undertaken by the Partnership, AFHCAN has a lot of visibility. A lot of time, effort and money has been spent developing AFHCAN. It has great potential for improving access to care to the large number of Federal beneficiaries in Alaska. The project has many benefits, tangible and intangible. As briefly mentioned above, the primary intent of the project is to improve access to care. Currently, the project is still in the implementation and installation phase and it may be many years before any significant improvement in access is identified.

Annex G

AFHCP Current Contracts/Agreements/MOUs/LOAs

AFHCP Agreements

1. AK-IA-00-0004 Umbrella Agreement (All AFHCP) 01 Oct 01 to 30 Sep 06

Elements of the DoD, 3rd MDG, 354th MDG, BACH, USCG, VA and ANTHC. This is a mutual agreement that will govern individual operating agreements for professional health care services and resource sharing between those agencies and/or facilities described above. The intent of this agreement is to improve access and provide a high quality health care that is sensitive to the needs of our patients.

2. AK-IA-97-0004B CWT – File Room (VA/ANMC) 01 Oct 99 to Indef

This is a mutual agreement for professional Medical Records Technician services and resource sharing between Veterans Affairs Industries and the Alaska Native Medical Center. The intent of the Agreement will be for the VA to provide services for Medical Records Technician and Clerk duties at ANMC. These services will be for the purpose of meeting JCAHO standards and maintaining the daily routine of filing Medical Records.

3. AK-IA-97-0004F Hepatology (VA/ANMC) 01 Oct 01 to 30 Sep 04

Under this agreement, the Alaska Native Medical Center will provide Hepatology Services for the VA. Both inpatient and outpatient services will be provided for the VA on an excess capacity basis.

4. AK-IA-97-0004I Internal Medicine (VA/ANMC) 01 Oct 01 to 28 Feb 02

This operating agreement is entered into between the VA and the AANHS/ANMC. Under this agreement, the VA will provide one half-time VA physician specializing in internal medicine to the Alaska Native Medical Center.

5. AK-IA-97-0004L Medical Training Svcs (ANTHC/Army) 01 Apr 00 to 31 Mar 03

This operating agreement is entered into between the ANTHC and 1984th USAH. The intent of this agreement is for the ANTHC to provide its clinical facility, work areas, and equipment, for the purpose of providing on-the-job training to the 1984th USAH personnel as part of their inactive duty training and annual training at no cost to patients at ANTHC utilizing personnel from the 1984th USAH Army Reserve Unit.

6. AK-IA-97-0004M Clinical Services (VA/USCG) 01 Feb 99 to indef

This operating agreement is entered into between the USCG and the VA. Under this agreement, VA staff providers will provide clinical services to USCG and AFHCP beneficiaries in Alaska. In return the USCG will make its clinic facilities in Alaska available for this purpose.

7. AK-IA-97-0004N AFHCAN Implementation (All AFHCP) 14 May 99 to indef

This operating agreement is entered into between all members of the AFHCP. The purpose of this agreement is to define the relationship between the Partners for the joint implementation and maintenance of the AFHCAN Project.

8. AK-IA-97-0004Q In/Outpatient Services (VA/BACH) 30 May 01 to 30 Sep 04

This operating agreement is entered into between the VA in Fairbanks and Bassett Army Community Hospital. Under this agreement BACH will provide

health care services to VA beneficiaries on a space available basis; this service to include inpatient/outpatient, radiology, laboratory, pharmacy, and clinical/admin space to VA.

9. AK-IA-97-0004R Teleradiology Services (DoD/DoT) 01 Jan 00 to 30 Dec 03

This operating agreement is entered into between the USCG Maintenance and Logistics Command Pacific, Alameda, CA and the 3MDG. Under this agreement, the 3rd MDG will provide teleradiology support services to U.S. Coast Guard clinics at Ketchikan and Kodiak.

10. AK-IA-97-0004S Ophthalmology (ANTHC/VA) 01 Apr 01 to 31 Mar 05

This operating agreement is entered into between ANTHC and VA. Under this agreement, ANTHC will provide one part-time Ophthalmologist for regularly scheduled clinics and ambulatory surgery at the VA Clinic 2.5 days per week for 52 weeks.

11. AK-IA-97-0004T Optometry (DoD/Maniilaq) 01 Jun 00 to 31 May 05

This interagency agreement is entered into between the Alaska Native Health Service (AANHS), Indian Health Service (IHS), with the participation of the Maniilaq Association (MA), and the U.S. Air Force (USAF). The purpose of this agreement is to facilitate approval from the DoD to participate in providing optometry services for remote Alaska Native Villages in the Maniilaq catchment area. As of 21 Apr 01, a new generic agreement has been coordinated for changes in travel expense reimbursements and encompasses all medical/dental services.

12. AK-IA-97-0004U Audiology (VA/3rd MDG) 01 Jun 01 to 01 Jun 06

This operating agreement is between 3rd MDG and the VA. The purpose of this agreement is to provide audiology medical record peer review through the AVAHSRO and 3rd MDG Audiology Departments.

(Brule, 2001)

13. AK-IA-02-0002B Perinatology (ANMC/TRICARE) 01 Feb 02 to 31 Jan 03

This interagency agreement is between ANMC, 3rd MDG and TRICARE. The purpose of the agreement is to outline operating procedures for ANMC to provide routine non-emergent perinatology services to TRICARE beneficiaries. The care will be preauthorized and referred through the approved TRICARE/ANMC MOU.

Sharing Agreements

VA (Seattle)/ANMC Interagency Cross-servicing Spt Agreement 01 Jul 97 to 30 Jun 02.

(Brule, 2001)

MOUs

1. AFHCP Establishment	VA/DoD/DoT/ANMC	10 May 95 to indef
2. Project Support Office	VA/DoD/DoT/ANMC	08 Nov 01 (annual review)
3. Credentialing	VA/DoD/DoT/ANMC	08 Nov 01 to 08 Nov 04
4. Network Preferred Provider	ANMC/TRICARE	06 Nov 01 (annual review)
5. Network Preferred Provider	VA/TRICARE	25 Oct 01 to indef
6. Network Preferred Provider	Providence/TRICARE	27 Nov 00 to 27 Nov 02

(Brule, 2001)

LOAs

USCG Detached Alaska Managed Care Officer. AFHCP, PSO/TRICARE Alaska Pacific Support Office/USCG 7 Apr 00 to indef. (Brule, 2001)

Competitive Contracts

1. In/Outpatient Svcs VA/DoD/DoT/TRICARE 01 Sep 00 to 01 Sep 02

Prime Provider – Contractor: Providence Alaska Medical Center. Provides full spectrum inpatient/outpatient services for VA, DoD, TRICARE, DoT and potentially other Federal/tribal agency beneficiaries who are referred or subsequently authorized. Providence Accounting Committee will provide a cost avoidance statement for each referral agency.

2. Medevac ANTHC/VA/DoD 01 Jun 99 to 31 May 02

Contractor: Aeromed International. Provide for the urgent and emergent air medical evacuation for adult and pediatric beneficiaries of the ANMC and persons entitled under Federal programs: ANTHC, VA, 3rd MDG, BACH, 354th MDG, USCG.

3. Urology Professional Svcs VA/DoD 01 Aug 98 to 01 Oct 04

Contractor: Alaska Urological Associates. Provide for full spectrum inpatient/outpatient hospital services for VA, DoD, TRICARE, Alaska Native Tribal Health Consortium, USCG and potentially other Federal/tribal agency beneficiaries who are referred or subsequently authorized; there will be 2 half-day clinics at VA Clinic-Anchorage.

4. Podiatry Professional Services VA/DoD 01 Feb 00 to 01 Feb 03

Contractor: Private Podiatrist. Dr. Tony Quinton presently works at 3rd MDG, providing podiatry services for VA, active duty DoD, and TRICARE beneficiaries and potentially other Federal/tribal health care agencies' beneficiaries who are referred or subsequently authorized.

5. On Call Professional Services ANTHC/AFHCP 01 Oct 01 to 30 Sep 03

Contractor: Healthcorps Associates. This contract is for RN's, LPN's and Nurse Practitioners. The contract gives each AFHCP member access to on-call civilian nursing professionals on an as needed basis and at an arbitrated cost. Billings go directly to utilizing MTF. (Brule, 2001)

Annex H

Acronyms

AANHS – Alaska Area Native Health Service

AFHCAN – Alaska Federal Health Care Access Network

AFHCP – Alaska Federal Health Care Partnership

AFHCPA – Alaska Federal Health Care Partnership Agreement

AK - Alaska

ANMC – Alaska Native Medical Center

ANTHC – Alaska Native Tribal Health Consortium

BACH – Bassett Army Community Hospital

BPR – Business Process Reengineering

CHAMPUS – Civilian Health and Medical Program of the Uniformed Service

CHA – Community Health Aide

CHA/P – Community Health Aide Practitioners

CMAC – CHAMPUS Maximum Allowable Charge

CME – Continuing Medical Education

CPI – Consumer Price Index

DHHS – Department of Health and Human Services

DoD – Department of Defense

DoT – Department of Transportation

DVA – Department of Veterans Affairs

ESRD – End Stage Renal Disease

GPRA – Government Performance and Results Act

HCFA – Health Care Financing Administration

HPSA – Health Profession Shortage Area

HRSA – Health Resources and Services Administration

IHS – Indian Health Service

LOA – Letter of Agreement

MEDDAC – Medical Department Activity

MOA – Memorandum of Agreement

MTF – Military Treatment Facility

NPR – National Performance Review

PSO – Project Support Office

TRICARE – The DoD's health care system

USA – United States Army

USAF – United States Air Force

USCB – United States Census Bureau

USCG – United States Coast Guard

VA – Veterans Affairs