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ENLISTED OPHTHALMIC TECHNICIANS  
OF THE  
UNITED STATES AIR FORCE

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Class 97-C, 7 May 1997

## Forward and Acknowledgement

In this paper I have endeavored to begin to record the history of the enlisted ophthalmic technicians that have served and continue serve in the United States Air Force. This has been an extremely gratifying task that could not have been completed without the help of several individuals. Special thanks to Dr Fred Hudson, of the Armed Forces Optometric Society for allowing me time to interview him. I also wish to thank Lt Col George Nicolas and TSgt Patrick Coleman of the 382 TRS for their assistance. The information provided by CMSgt Tesitor and SMSgt Ivory were invaluable in documenting the history and future roles of this career field. SMSgt Gloria McNeil also provided valuable insight into the ophthalmology “shred” of the 4V0X1 career field. Lastly, MSgt Connie LaPage was extremely helpful in providing information about the Ophthalmology Consulting and Research section at Brooks AFB.

*Italics in this paper are the author’s additions.*

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ENLISTED OPHTHALMIC TECHNICIANS  
OF THE  
UNITED STATES AIR FORCE

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ENLISTED OPHTHALMIC TECHNICIANS  
OF THE  
UNITED STATES AIR FORCE

Fighter pilots, transportation drivers, security police personnel, medical technicians, and inflight refueling boom operators all have one significant need in common. While this is not an all inclusive list, all of the above personnel have the need for sharp, detailed vision. Without clear vision there exists the increased potential for aircraft accidents, vehicle mishaps, poor medical treatment, and accidental shootings. As professional military personnel it is vital that we understand exactly how different career fields interface into the Air Force mission. Knowledge of career fields other than our own serves to broaden our perspectives on accomplishing our individual job. Because of this need for knowledge about other career fields, this paper will examine the career field of the enlisted Air Force Ophthalmic Technician. While an extremely small career field, it fulfills a critical need for the Air Force.

In this paper we will examine five different areas of the enlisted ophthalmic career field. First of all we will briefly explore the history of enlisted ophthalmic care before 1971. Then we will discuss both residence and correspondence enlisted ophthalmic training programs. Following this we will cover the clinical and research duties of enlisted ophthalmic technicians. Lastly, we will look ahead to future roles of enlisted ophthalmic technicians. Let's begin our look at enlisted ophthalmic care by journeying back to WWII.

## EARLY ENLISTED OPHTHALMIC CARE

During World War II (WWII) era all optometrists performing eye examinations were enlisted personnel. During a personal interview with the author, Dr Fred Hudson, a retired Army optometrist, shared that “enlisted optometrist did all the exams in WWII.” (19:--)

The enlisted optometrists during WWII were considered invaluable to the war effort. Dr Hudson went on to share that (*the army*) “could not have gotten by without the enlisted optometrist.” (19:--)

Oddly enough the optometrist that were commissioned during WWII did not practice optometry, only the enlisted optometrist performed eye examinations. Through the mid-1950s the Army continued to draft enlisted optometrists, however they did not perform eye exams. Generally they provided ophthalmic technical support much like today’s ophthalmic technicians. (19:--)

In many cases there were optometrist (enlisted) working for optometrists (commissioned).

After the inception of the Air Force in 1947 the enlisted optometrist transitioned to a commissioned officer status. This was directly related to the educational requirements for licensure as an optometrist. (19:--)

As the civilian environment began to require and recognize increasing professional certification it was inevitable that the primary refraction provider would become a commissioned officer. However, this does not mean that there was no longer a need for enlisted ophthalmic care.

As early as 1951, Lt Col Hamilton B. Webb begins a dialogue in a letter to the Chief, Aviation Medicine Services. He states in this letter that “60 percent of the men rejected (*for pilot training*) for defective visual acuity probably contains almost as high a percentage of “high stanine” boys as does the medically qualified 40 percent.” (1:1)

He also goes to expound on the fact that allowing applicants with defective visual acuity

(correctable to 20/20) to be considered for pilot training greatly increased the size of the applicant pool. This would allow the potential applicant pool to increase from 40 percent of the eligible population to 75 percent of the eligible population. (1:1) While this letter does not appear to have an immediate bearing on the need for enlisted ophthalmic technicians, it does illustrate that the medical authorities involved with the Air Force's primary mission, "fly and fight", were concerned with visual issues early in the development of the Air Force. If previously "visual rejects" were considered for training, the next logical step is obtaining the technical help needed to assist in caring for these new applicants. Lt Col William Marett further supports this logical step in a letter dated 15 February 1955 sent to Lt Col Webb. In this letter he discusses an item from the 2 February 1955 "Aircrew Effectiveness Report of Air Training Command." The item discussed states that "the Armed Forces Vision Tester used on 100 Air Cadet applicants... showed a much higher rate of disqualifications than when they were tested by the optometrist in the eye lane." (2:1) Again, we see preliminary discussion focusing on the need for strong ophthalmic support. Since eye lane visual acuity testing does not require a credentialed provider, this was a test that could easily be performed by an enlisted ophthalmic technician. What then, if any, action was taken to provide enlisted technical assistance to the optometrist working in the military health care environment?

Chief Master Sergeant (CMSgt) Gregory Tesitor, former Career Field Manager (CFM) for enlisted optometry and current Superintendent of Ophthalmology, Wilford Hall Medical Center, explains that prior to 1971 enlisted optometry functions were performed by Air Force Specialty Code (AFSC) 902X0 and AFSC 901X0. (16:--)

These were general medical technicians and flight medicine technicians respectively and



worked in Optometry Clinics on an “as needed basis.” There was no formal training in ophthalmic technical skills and training varied greatly between medical facilities. The only training available is whatever the optometrist could provide as on-the-job (OJT) training. (16:--)

While this approach to enlisted ophthalmic support had the benefits of a large manpower pool to pull from, it also had some significant problems. The 1972 Unit History of the Sheppard Technical Training Center (STTC) contains the statement that “after this assignment they (*the “as needed medical technician”*) usually returned to their specialty, and the training was lost both to the Air Force and the individual.” (9:125)

This situation led Air Force leadership to realize that the creation of a new enlisted career field would provide the “much needed support for the optometrist resulting in an increased efficiency and productivity in the area of ophthalmic services.”(7:170) Let’s now look at the formal development of the enlisted optometry technician career field and the training programs used to support the career field.

In the Office of the Surgeon General (OSG) report for 1 July 1969 - 31 December 1969, it is documented that a “a request was submitted to establish a new career field for optometry technicians.” (5:247) This request began the long process of establishing a new career field and the training programs needed for training these new optometry technicians. Now that the request had been submitted, what exactly happened next?

By following a chronological progression in Air Force documentation we find that the formal establishment of the new AFSC took place almost immediately. The next formal OSG report dated 1 January 1970 - 30 June 1970 confirms that “a new career field for Optometry Technicians (AFSC 912X5) has been approved for the Air Force effective Jan 1971” (6:214) and that the “Air Training Command was directed to develop a three-

level course to train optometry technicians.” (6:113) Complete descriptions of the new AFSC 912X5 were then scheduled to be published in the next revision of Air Force Manual (AFM) 39-1. (6:113) The OSG report also provides information concerning the initial make-up of the AFSC. The report states that initially there would be a manning authorization of 180-200 technicians. (6:214) It also stated that the primary source for new optometry technicians would be the 902X0 and 901X0 personnel that were currently working in optometry. Initially these AFSCs (902X0 and 901X0) would be converted to the new AFSC (912X5) followed by non-prior service accessions through the pipeline student route. (6:113) This conversion of AFSCs is significant, in that it established an immediate presence of experienced optometry technical personnel without having to wait for the 2 or 3 year process of accessing and training new technicians to a fully capable technician. The OSG from the first six months of 1972 provides interesting information concerning the addition of the Air National Guard and Air Force Reserve components. It states that “the requirement for one optometry manpower space (AFSC 9256) and one optometry technician (AFSC 912X5) for each group attached to the Air National Guard and Air Force Reserve flying wings was deemed valid.” (8:140) It is also interesting that one of the initial “feeder” AFSCs for optometry was the flight medicine career field. Increased taskings in the field of aerospace medicine (such as the aircrew contact lens program) is now bringing today’s optometry technician back toward this area of expertise.

The OSG report covering the first six months of 1970 also provides clarification of the technical responsibilities the new AFSC. The report relates that the new AFSC would be responsible for assisting with eye examinations, fitting spectacles, assist in

treatment, perform routine screening tests, and prescription (*glasses*) ordering. (6:214)

This would, in turn, allow the optometrist greater time to use in actual examination of patients. (6:214) Now that we have discussed the initial development of the AFSC let's look at the development of the Ophthalmic Training Programs

#### ENLISTED OPHTHALMIC TRAINING PROGRAMS

The Unit History of the 382 Training Squadron, then Department of Biomedical Sciences, School of Health Care Sciences (SHCS), tells us that Captain Louis V. Genco, an optometrist, was assigned to the department on 15 September 1970. (10:117) He was specifically assigned for the purpose of developing all source documents and training materials for the new Optometry Specialist Course. (10:117) Over the next year Captain Genco developed the first Specialty Training Standard (STS) for Optometry Specialist/Technician and training plan for Course 3ABR91235 Optometry Specialist. (10:117) The first tentative STS was approved by the SCHS on 1 April 1971 and the final STS was approved by Air Training Command (ATC) on 4 October 1971. The training plan for the course was approved on 22 April 1971. Following this, the Plan of Instruction (POI) and Course Chart were approved on 10 June 1971 and also received final approval by ATC on 4 October 1971. (20:MSO atch 10,11) MSgt Edward Wintermeyer states in an article for the May 1974 issue of Medical Service Digest that the "lesson plans, student study guides, and workbooks were prepared" using the POI as guidance. (12:1) Once the training plan was in place, the stage was set to begin training in this new AFSC.

"On 7 July 1971, the first optometry technician course began at the School of Health Care Sciences, Sheppard AFB, Texas." (7:170) This group of 12 individuals was

comprised of new airmen and seasoned NCOs. Armed with a wealth of comprehensive knowledge in “basic ocular anatomy and physiology, basic optics, use and maintenance of optometric testing equipment, visual therapy, medical ethics,...” (4:4) these 12 individuals represented the dawning of an exciting new career opportunity in the Air Force. Two of the 12 provide us an example of what was achieved by those airmen. Looking back to his graduation day, Captain Larry Whetstine (then Airman) states that he “felt confident my training was the best in the country and I knew I was prepared to do my job.” (13:1) Captain Whetstine served as an optometry technician until honorably discharged in March 1979. At that time he began college studies that resulted in completion of his Doctor of Optometry degree in May 1990. He now serves as an optometrist for the United States Army. (13:2,4) Another graduate on that day was Master Sergeant Edward Williamson. MSgt Williamson entered the Air Force in May 1971 and went on to a successful career as an optometry technician in the Air Force. In a letter addressed to the October 1991 Optometry Technician Graduating Class (Twentieth Anniversary) he details his contributions to the Air Force and the career field. He was instrumental in establishing vision screenings for military dependent schools in the Upper Heyford area and instituted multiple innovative programs at Scott AFB in the late eighties. His assignments included Barksdale AFB, Elmendorf AFB, Upper Heyford in England, Grissom AFB, and Scott AFB. (14:1)

The three-level course has been revised periodically throughout the last 26 years and most recently underwent significant revision following the May 1994 Utilization and Training Workshop (U&TW) conducted for the enlisted optometry career field. This U&TW identified many new training areas and saw the adoption of the term ophthalmic

technician. (21:1) The three-level course now lays a solid foundation for advanced training conducted in the five and seven-level optometry advanced training programs.

The five-level Career Development Course (CDC) for optometry was developed during the early 1980s. According to Chief Tesitor, the five-level CDC was managed as an additional duty for the three-level course instructors until a manpower slot was authorized in 1985. (16:--) He relates that a Sergeant Keller, a 91235 instructor, was responsible for much of the early work on the five-level CDC. (16:--) This course was a four volume course containing advanced training in all areas of optometry curriculum. It included material specifically addressed toward clinic management and expanded the technician's knowledge in many technical areas. I personally remember studying the five-level CDCs in late 1982 and early 1983. The information provided by that course served to prepare me for my assignment to a "one doctor, one technician" clinic overseas. In 1985, Chief Tesitor (then TSgt) was assigned to the first CDC writer "slot". (16:--) He filled this position for 10 years, leaving for Wilford Medical Center in July 1995. Upon assignment as CDC writer, he oversaw revision of the five-level CDC and was in the process of a major revision when he was assigned to Wilford Hall.

In August 1995, Technical Sergeant (TSgt) Patrick Coleman was assigned to the five-level CDC position and began the process of continuing the major revision of the five-level CDCs. This revision was also driven was by the U&TW conducted to discuss Year of Training initiatives and other career field needs. The new five-level CDC is significantly more comprehensive in scope. It added much more training in ocular disease and therapeutic treatment. It also expanded training in other areas greatly enhancing the capability of the enlisted optometry technician. This new five-level CDC

course helps to smooth the flow of training for the enlisted optometry technician by picking up where the resident three-level course leaves off and laying the groundwork for seven-level training.

Seven-level advanced training was conducted purely as On-The-Job (OJT) training until the Year Of Training initiative of General Merrill McPeak. At this time, it was decided all career fields would conduct formal resident seven-level training for their personnel. At the May 1994 U&TW conducted for the Optometry Technician Career Field it was decided to request a waiver for resident training and develop a CDC for seven-level optometry training. (21:1) This was primarily done because the small number of technicians requiring training annually made resident training cost prohibitive. With only 10 technicians requiring advanced training annually, it was much more cost effective to conduct training using the CDC format. In the summer of 1994 a seven-level developer slot was authorized for optometry training programs and I was selected to develop the CDC for seven-level training. This last level of formal optometry technician training is important because it introduces an entirely new area and depth of training to the career field.

Driven by the U&TW in May 1994, refractometry, the technical aspect of conducting a refraction, was introduced into the formal training process of the optometry technician. Introducing this new training is historically significant because it provides a link back to the "refracting optician" concept utilized in the early 1900s. It also acknowledges that enlisted technicians can provide increased support to the military optometrist in the future. While this training will not train the technician to conduct a

full eye examination, it begins to “push the envelope” of what was previously considered possible for the enlisted technician to perform.

From its inception in 1971, the family of three, five, and seven-level training programs has continued to pursue the goal of providing the best ophthalmic technician training available. The three-level course is nationally recognized for excellence in training optometry technicians and qualifies for 20 semester hours with the Community College of the Air Force. (22:1) Lt Col George Nicolas, in a 1995 self-study for the American Optometric Association (AOA), describes the accreditation history of the course. In October 1973 the course was approved by the AOA as the equivalent of a civilian one year “Optometric Assistant” program. Then in April 1974 the AOA approved the Community College of the Air Force Optometric Technician Program. This program established the Associates degree available to Air Force optometry technicians and further entrenched the enlisted optometry technician as a vital part of the Air Force medical capability. The entire program was then accredited by the AOA for a five year period. This accreditation was again awarded in 1983. The 1988 reaccreditation was approved for the maximum time possible, a full seven years. (15:13) This unprecedented seven year accreditation was repeated in 1995. Currently operating under the 1995 accreditation, the Air Force Optometry Training Programs are considered to be some of the best optometry technical training available today. This coveted accreditation is instrumental in allowing Air Force technicians to easily obtain certification by multiple civilian certification agencies. Air Force optometry technicians are currently eligible for certification in the following areas: Registered Optometric Assistants (Opt. R.A.), Registered Optometric Technicians (Opt. R.T.), Certification by the American Board of

Opticians (ABO), Contact lens fitting certification by the National Contact Lens Examiners (NCLE), Certified Ophthalmic Assistant (COA), Certified Ophthalmic Technician (COT), Certified Ophthalmic Medical Technicians (COMT). As you can see, Air Force Optometry Training Programs offer comprehensive “cradle to grave” training and civilian certification for the enlisted optometry technician and are considered to be ophthalmic professionals. Having discussed at length the training programs of the enlisted ophthalmic technician, let’s shift our focus to the duties of enlisted ophthalmic technicians.

#### ENLISTED OPHTHALMIC CLINICAL DUTIES

Before we begin our look at the specific duties of today’s enlisted ophthalmic technician, let’s clarify the AFSC progression in the last 26 years. The AFSC 912X5 was created in 1971. At that time it was an optometry specific AFSC. Ophthalmology technicians at that time were a shredout of the 902X0, a nursing services technician. In March of 1980, Colonel William Holder, commander of the USAF School of Health Care Sciences, in a letter to General Joseph Vesp, proposed restructuring the 902X0 career field. (3:1,atch 1) A specific recommendation was to combine the optometry and ophthalmology career fields. This became reality and the Unit History of the 382 TRS states that in 1986 “Course J3ABR91235 entered its first class of students with a 91235A.” (11:1)

This restructuring allowed the ophthalmology technicians to now be trained on over 85 percent of their duties in technical school, when previously, as 902X2 shredouts, they had only been trained on 10 percent in technical school. (11:1) Obviously the optometry technical school was much better prepared to train ophthalmology technicians.



Following combining of the career fields in 1986, the AFSCs were converted to 4V0X1 and 4V0X1A respectively as AFSCs were realigned and renumbered across the Air Force. (15:11)

In 1996, Chief Tesitor, then career field manager, made the decision to further integrate the two career fields by only selecting new ophthalmology technicians from the available pool of five-level optometry technicians. (16:1) Currently the ophthalmology “shred” is a lateral crosstrain career field and non-prior service airman are not offered the ophthalmology shred. (16:--)

Senior Master Sergeant (SMSgt) Gloria McNeil, 4V0X1A career field advisor to the 4V0X1 CFM, feels that this is a good move and should increase the career field unity and strength. As the last 902X2A to convert to 912X5A, she is uniquely qualified to comment on this topic. She also feels that as the Air Force continues to downsize that complete merging of the two career fields is possible. (18:--)

This would quite simple to accomplish and the “shred” AFSC would simply becoming a Special Experience Identifier (SEI) to the 4V0X1 AFSC. Having laid the foundation detailing the evolution of the 4V0X1 AFSC and the “A shred”, the clinical duties of this AFSC will now be examined.

AFSC 4V0X1, Optometry Technician is responsible for many different activities in the Optometry Clinic. Spectacle related duties occupy a large amount of the optometry technician’s daily schedule. Following an eye examination by the optometrist, the optometry technician is responsible for fitting the patient for any optical devices the patient may require. This requirement can vary widely between patients. For example, a helicopter pilot involved in special operations may require two pair clear aircrew spectacles, two pair tinted aircrew spectacles, a single pair aircrew spectacles with clear

polycarbonate lenses for use with night vision goggles, and gas mask inserts for one or two types of gas masks. On the other side of the spectrum, a NCO working in a non-mobility position at the Finance Office may only need a single pair of clear issue spectacles.

It is the technician's job to measure the patient, determine the appropriate size of frame to order, insure there are no special requirements in delivery time or type, and place the order. The technician must take into account a number of variables such as prescription power, the patient's duties, and the physical structure of the patient's skull to obtain the best possible frame and lens combination for that patient. Once the order is placed, the technician must insure the fabricating laboratory returns the order promptly and accurately. Upon receipt, the technician will inspect the spectacles and insure the order was filled properly. Only after the patient has received their spectacles and is happy with their performance is the spectacle ordering process complete. This procedure of spectacle ordering can be repeated up to 25 times daily for one doctor's patients. If the clinic has more than one doctor, it is done many more times. The technician's job is not over though, because spectacle ordering is not all the technician is responsible for during performance of their duties. They also contribute to the contact lens program in an optometry clinic.

Contact lens related duties are a significant part of an optometry technician's job. In 1989 the Air Force started to provide contact lenses to aircrew members required to wear corrective lenses while performing flight duties. While many technicians were involved with therapeutic contact lens work prior to this new program, providing contact lenses to aircrew members established a firm need for contact lens related skills at all

optometry clinics. The optometry technician will prepare lenses for the optometrist to use during a contact lens fitting. Additionally, the technician will order the lenses and monitor the status of the order. When the contact lenses arrive the technician will schedule the patient, therapeutic or aircrew, for a contact lens dispensing. When the patient arrives for the dispensing appointment, the technician will insert the lens in the patient's eye and conduct preliminary visual testing. Following examination by the optometrist to verify proper fit, the technician will then spend about an hour instructing the patient on insertion, removal, and care of the contact lenses. After this the technician will need to schedule the patient for any needed follow-up. The Aircrew Contact Lens Program has very specific follow-up instructions and the optometry technician must work with the flight surgeon's office and the patient to insure that all necessary follow-up is not only completed, but also documented in the flyer's medical records. The optometry technician serves as a vital component of the flying mission through their involvement with the aircrew contact lens program. Before we go on to look at the research duties that optometry technicians are involved in, let's quickly look at two other areas an optometry technician may be responsible for on a daily basis.

Enlisted ophthalmic technicians also perform and assist with many therapeutic and diagnostic procedures. Therapeutic duties of an ophthalmic technician generally consist of assisting the optometrist or ophthalmologist in examining and treating eye injuries. Following examination of an injured eye by the optometrist, the technician will complete the treatment by either instilling antibiotic eye drops, cycloplegic eye drops, or both to the injured eye. The technician will also be responsible for patching an injured eye if necessary.

The "A" shredout of the 4V0X1 career field is much more involved in treating eye disease and injuries. In this instance the ophthalmic technician assists the ophthalmologist in surgery such as cataract surgery and extraocular muscle surgery. The ophthalmic technician involved in surgical assisting works hand-in-hand with the ophthalmologist during surgery and is a vital part of medical eye care.

Both 4V0X1 and 4V0X1A perform indispensable diagnostic testing. The ophthalmic technician conducts visual field testing and will perform ultrasound scans in and around the eye. They are also trained to conduct comprehensive visual screenings designed to isolate specific visual problems such as muscle imbalances, uncorrectable defective vision (amblyopia), correctable defective vision (refractive error), color vision deficiency, pupillary defects, and increased intraocular tension. Ophthalmic technicians working in an ophthalmology clinic will also assist in conducting fluorescein angiography by injecting and fluorescent dye into a patient's veins and then photographing the internal portion of the eye. Ophthalmic personnel perform many photographic tasks in an eye clinic. They photodocument external and internal disorders using specially made 35mm and polaroid cameras.

This listing of ophthalmic technician duties is by no means 100 percent comprehensive but serves to illustrate the main duties of an ophthalmic technician working in the clinic environment. However, despite the fact that clinical duties comprise a large percentage of the technician's duties, ophthalmic technicians also contribute to Air Force ophthalmic research in many ways.

## ENLISTED OPHTHALMIC RESEARCH DUTIES

Enlisted ophthalmic technicians serving as research assistants work for the Ophthalmology Consulting Service at Brooks AFB located in San Antonio, Texas. According to MSgt Connie LaPage, Superintendent of the Ophthalmology Consulting Service, ophthalmic technicians work in four different areas at Brooks AFB. These are: the Optical Radiation Division, the Optical Fabrication Laboratory, the Visual Electro-Diagnostics Lab, and the Applied Optics Division. (23:-- ) Let's begin by looking at the Optical Radiation Division.

The ophthalmic technicians at the Optical Radiation Division assist in human factor research and aircrew vision protection. This division researches and studies the effect of optical radiations (lasers) on humans. Using this information they also conduct research into lenses that can help protect aircrew members from accidental or deliberate enemy exposure to rangefinding lasers. (23:-- ) Let's now look at the Optical Fabrication Laboratory.

This laboratory is the only spectacle fabrication facility in the Air Force. Routine spectacle fabrication handled by Army and Navy fabrication laboratories. The only function of this lab is to manufacture special purpose lenses and spectacles for use in research. This facility will also manufacture unusual prescriptions for patients elsewhere. As a technician working at an Air Force facility, if I needed a lens that the Army or Navy fabrication labs could not provide for me, I would turn to the fabrication laboratory at Brooks AFB. (23:-- ) Another area of research for ophthalmic technicians is the Visual Electro-Diagnostic Lab.

In the VED Lab technicians are involved with color vision and visually evoked potential research. The color vision lab provides evaluation of any color vision defects found in the active flying population. The visually evoked potential section researches the physiological process of vision using electro-oculograms and electro-retinograms. (23:--)

The last research area we will discuss is the Applied Optics Section.

The Applied Optics Section conducts research in night vision, coordinates the contact lens surveillance program, and serves as the primary aircrew vision consultant division. In night vision research the technicians are involved with testing visual performance while wearing night vision goggles. This is done using contrast sensitivity testing rather than conventional "eye chart" vision checks. Contrast sensitivity testing allows for night vision testing that more closely relates to field performance rather than a controlled "visual acuity" check during an eye exam. It is also the facility that conducted the years of testing that resulted in providing aircrew members contact lenses. It is here that all facets of the aircrew contact lens program is managed. All contact lens problems related to the flight environment are handled by this facility. (23:--)

While stationed at Kadena Air Base I was privileged to learn first hand about this service through one of my patients. An active duty F-15 pilot had been injured at some previous time and the only optical device that would correction his vision to 20/20 was a rigid gas permeable (RGP) lens. Since this was essentially a "hard" lens, it was considered to be incompatible with continued flying duties. However, this facility undertook the experimental fitting of a RGP lens and monitored the lens performance in high performance fighter aircraft by fitting this patient with a RGP lens. He remained on flying status and the Air Force gained valuable data concerning RGP performance. The downside was that all care had

to done at Brooks AFB. On a regular basis the pilot would return to Brooks AFB for follow-up and evaluation. MSgt LaPage also provided insight into a new research project that will be starting soon. Ophthalmic technicians are about to become involved in a study of Photo-Refractive Keratotomy (PRK). This is the new "laser" surgery for nearsighted correction. Wilford Hall Medical Center will be working with the research personnel at Brooks throughout the study. (23:--)

Enlisted ophthalmic technicians are extremely important to the Air Force's research concerning the visual system and use in modern warfare. Looking back through this paper we have provided a view of where the enlisted ophthalmic technician came from, the development of ophthalmic training programs in the Air Force, clinical duties of ophthalmic technicians, and some research duties of the enlisted ophthalmic technician. This is what has already taken place for the enlisted ophthalmic technician. What then, does the future hold for enlisted ophthalmic technicians?

#### FUTURE ROLES OF ENLISTED OPHTHALMIC TECHNICIANS

CMSgt Lankla Ivory, Chief of Training Quality at Keesler AFB and current 4V0X1 CFM, is confident that the enlisted ophthalmic technician will continue to provide vital ophthalmic support to the Air Force. In a recent telephone interview CMSgt Ivory explained that he sees vision care becoming of critical importance to both fixed base medical facilities and deployed units. (17:--)

He would like to see more ophthalmic technicians seek civilian certification and receive the recognition that accompanies that certification. CMSgt Ivory feels that the ophthalmic technician of today's Air Force is an extremely talented and capable technician. With only 250 technicians worldwide, ophthalmic technicians are required to

“step up to the plate” and serve as the “airman in charge” at many locations. While this is not the preferred method of managing clinics, the “sink or swim” environment quickly weeds ineffective technicians. He also feels that enlisted ophthalmic personnel should be deployed alongside their non-medical peers. As the Air Force continues to provide their personnel either contact lenses or spectacles for the purpose of enhancing duty performance there could be great benefit to having ophthalmic care immediately available to a deployed unit. His goal, as CFM, is to insure that ophthalmic technicians continue to provide their vital services to the Air Force as we enter the 21<sup>st</sup> century. (17:-- ) Reflecting back on the different topics covered in this paper, let’s summarize exactly what was covered.

In this paper we examined five different areas of the enlisted ophthalmic career field. First of all we briefly explored the history of enlisted ophthalmic care before 1971. Then we will discussed both residence and correspondence enlisted ophthalmic training programs. Following this we will covered the clinical and research duties of enlisted ophthalmic technicians. Lastly, we will looked ahead to future roles of enlisted optometry technicians. As professional military personnel it is vital that we understand exactly how different career fields interface into the Air Force mission. Knowledge of career fields other than our own serves to broaden our perspectives on accomplishing our individual job. This paper has provided information concerning the enlisted ophthalmic technician and this knowledge will help you to understand the Air Force’s warfighting capability just a little bit better. The 12 technicians that graduated in October, 1971 established an enlisted career field that is now 250 strong throughout the Air Force. This career field is an invaluable part of the Air Force mission. An “unofficial motto” of



AFSC 4V0X1 puts this concept into sharp focus. Simply put, it states, “if you can’t see ‘em, you can’t shoot’em.”

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