

FEBRUARY/1963

# ARMY AVIATION



The Grumman OV-1A "Mohawk" is powered by twin Lycoming T53-L-3 turboprop engines, rated 960 hp. each.

# Lycoming

Division—Avco Corporation  
Stratford, Connecticut

# chipook

## PROGRESS

### Fort Rucker

During January 1963, the number of CH-47A Chinooks assigned to units at the United States Army Aviation Center, Fort Rucker, Alabama, was increased to five. Three Chinooks are now assigned to the U. S. Army Aviation Test and Evaluation Command and two to the U. S. Army Aviation School. As of the end of January, these helicopters had accumulated a total of approximately 120 flight hours since their arrival at Fort Rucker. High time for one aircraft in a single day was 5 hours 55 minutes. The Army Aviation School and the Transportation School are scheduled to receive the balance of their Chinooks in February and March, and deliveries starting in April are allocated to TOE units.



# SUMMARY

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February, 1963

## User Test and Pilot Training Activity



**VERTOL**

*DIVISION*

MORTON

PENNSYLVANIA

**BOEING**

# SCHOOL OF HARD KNOCKS

...with unparalleled success. Note well the achievements of the Army and Southern Airways professionals at Camp Wolters, Texas, largest helicopter operation in the world. Here, at the U.S. Army Primary Helicopter School, 518,000 flight hours have been logged on its Hiller fleet since 1956 and new standards of maintenance, safety and aircraft availability are established and surpassed with enviable regularity. Examples: 73% aircraft availability, compared with an overall military average of 55%. Safety record superior to average despite student pilots. 1,400,000 student touchdown autorotations; 36,119 in just one recent month, assuring that Camp Wolter's 4,600 pilots graduated to date are the world's most capable, fully prepared for field operations.

These records are the product of a 3-element team—the Army, civilian professionals and some 200 Hiller OH-23 helicopters. As Camp Wolters instructors will testify, primary trainers take many hard knocks every day. They must be tough, safe, dependable and available at minimum cost *commensurate with the mission.*

Hillers are.

**HILLER**   
AIRCRAFT COMPANY  
PALO ALTO, CALIFORNIA • WASHINGTON, D.C.  
DIVISION OF THE ELECTRIC AUTOLITE COMPANY





# RADAR EQUIPMENT IN USE

**A**FTER almost a year of indecisions, we are getting weather radar equipment for some of our L-23F aircraft. This will provide our senior commanders the all weather capability they require today.

Distribution of the Collins WP-103 will commence in the near future and will be made as follows:

USCONARC (including 6 Army Commanders .....	11
STRICOM .....	3
ARADCOM .....	3
MDW .....	7

This, regrettably, does not fill all of our requirements, but I consider

it a large step in the proper direction.

## JEP KITS

At long last holders of three volume Jep Kits are to receive relief from the overcrowded condition of Volume I by a decrease and realignment of content. A revision letter will contain instructions for the elimination of some 200 pages of reference material plus all approach plates. Enclosed with the revision letter will be a set of approach plates, military integrated with civil covering the third of the country in which your duty station is located.

Although the flight kit will be

By **BRIG. GEN. DELK M. ODEN**  
**DIRECTOR OF ARMY AVIATION,**  
**ODCSOPS**

reduced to only two volumes, CONUS wide en route and area chart coverage will continue to be provided each subscriber. The new program has been designed to provide the flexibility necessary to meet all operational requirements, be they the usual or unusual ones. Approach plate coverage for adjacent areas will be available in operations on a temporary loan basis.

Those individual aviators who have continuing requirements to operate outside their immediate area may obtain the required coverage from U.S. Army Aviation Flight Information Office. Complete details will be forthcoming in Jep briefing bulletins and in the 7 February 1963 revision letter.

### **CLEARANCES**

Under our present regulations, Army aviators enjoy a wide latitude in clearance prerogatives, most of which are geared to the individual aviator's experience and capabilities (ratings). Views have been expressed on having all flights cleared by the airfield operations officer, or his representative. My feeling on the subject is simply this: Our regulations require that appropriate flight plans be filed and "cleared by appropriate clearing authority." This varies for each rating (i.e., 3-3 vs 3-2 vs 2-2 vs any -1 category).

While offering this latitude on flight clearances, the regulation is such that the local commander may impose single clearance authority, if he feels his local aviation situation require it. In view of this, I see no need at this time to change the letter or intent of AR 95-1 as it is presently written.

### **AUTOROTATIONS**

And the argument continues concerning practice autorotations. As you know, we put out a message recently restricting touch-down autorotations. The response to this has been in keeping with the best Army aviator traditions. Characteristically, quite a few aviators took exception to the directive and felt it was casting aspersions on their flying abilities.

Quite understandably, we all possess a considerable amount of self-confidence. Indeed, we could hardly be otherwise in the flying business. But the facts present themselves in a rather cold, unemotional light and, gents, let's face it; Practice autorotations to the ground cause more accidents than practice autorotations with power recoveries.

The solution may not be as simple as the direct approach I have taken in the directive; however, I consider it merits fair trial. If, in the future, this proves to be wrong, the policy will be changed. Of course one's viewpoint changes with responsibilities. When I was Assistant Commandant of the U.S. Army Aviation School, I was opposed to curtailing autorotations. As the Director of Army Aviation, I now see the entire problem.

In line with what I have said above, what kind of directive would it take to prevent this kind of embarrassment?

### **"OUT OF GAS"**

A recent survey by the Analysis and Research Division of USABAAR shows that major accidents from fuel exhaustion are on the upswing.



# MEET THE OH-13S

*... in its environment.* Air cavalry men will welcome this new helicopter to their nap-of-the-earth environment. Recently announced for procurement, this latest in the famous Sioux line features:

- Increased rotor diameter for better maneuverability
- Greater payloads for armament mission
- Constant supercharged power at high altitude and hot temperatures
- Greatly increased hovering ceilings and rates of climb
- Increased stability plus sharper control response
- Improved autorotation capability
- More rudder control

As an armed scout, the new Sioux augments the nation's limited war capability. The OH-13S plus its big brother, the heavily armed UH-1 Iroquois, form Army Aviation's most striking team in the new Air Cavalry Troop.

WORLD  
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MILITARY & COMMERCIAL HELICOPTERS



BELL HELICOPTER  
COMPANY

FORT WORTH, TEXAS

A DIVISION OF BELL AEROSPACE CORPORATION

A **textron** COMPANY

During the two year period 1959-1960, nine accidents resulted from running out of gas. Since that time, we've had seventeen accidents from the same cause. Rotary wing pilots had a giant's share, with eight of the accidents recorded in the 1959-1960 period, and thirteen of those that followed.

If every Army aviator will do two things, we can eliminate this as a cause factor for aircraft accidents. All you have to do is...

**PLAN YOUR FLIGHT  
FLY YOUR PLAN**

### CONGRATULATIONS

I am happy to note that Colonel John Norton, the Aviation Officer at Headquarters, U.S. Continental Army Command, has been nominated to receive a star. Congratulations, Jack!

### "FLEABORNE"

One last item . . . In the March-April issue of "ARMOR MAGAZINE" you will find an account of "Operation Fleaborne." It will appear on the President's page and you will find it of interest.



### HILLER OH-5A COMPLETES FIRST FLIGHT

The first flight of the U.S. Army's turbine-powered OH-5A Light Observation Helicopter (LOH) was recorded on January 26 when test pilot Larry Lape flew the new ship around the Hiller flight line at low levels during the initial 20-minute flight. Lape reported "excellent handling characteristics," and "the lowest vibration levels I've ever experienced in a helicopter" when queried upon the conclusion of the first flight. Five OH-5A prototypes are now in production, aimed at Army evaluation in 1964 in competition for one of the largest aircraft production programs in peacetime. The OH-5A is fitted with an automatically stabilized rotor system identical in concept to that being produced for the Hiller L4 piston-powered helicopter, which was unveiled two weeks earlier at Hiller's Palo Alto facility. Powered by the Allison T63 gas turbine engine, the OH-5A will be capable of speeds over 50 per cent higher than present Army helicopters.

(Hiller photo)



# THE NEED FOR A



**P**ERHAPS one of the most critical matters facing the Aviation Program is the obtainment of a suitable gunnery range to permit training of personnel in the use of armament equipment on both the helicopters and fixed wing aircraft. The latter is a significant problem as related to the Mohawk aircraft.

With the forthcoming plans to employ armament of various types mounted on the Mohawk aircraft, extensively larger ranges are required than those used for helicopter firing. Few Army training ranges can be employed effectively at present.

The dire need at present is for a permanent range exclusively available for and in the vicinity of the Aviation School. It is most difficult to impose the employment of Army aircraft for training purposes on any other service facilities since

priorities and convenience always conflict generally to the detriment of the guest unit.

Perhaps a gunnery center will eventually be required not only to accommodate rotary and fixed wing aircraft armament training, but to provide adequate realistic maneuver space for Army aircraft, particularly those employed in highly mobile tactical aviation units. And in this respect, new horizons in the west may have to be explored eventually inasmuch as real estate is becoming definitely dear in the east.

## TRAINING DIRECTIVES

Several queries have been received regarding aerial training directives. At this time, there are two training circulars published on the matter. Training Circular TC 1-19, 6 August 1962, relates to XM-1

**COLONEL  
JOHN NORTON**



# GUNNERY RANGE

machine gun armament systems and Training Circular TC 1-20, August 1962, covers the SS-11 armament system.

Until the training circular for the

XM-6 machine gun is published, some planning can be based on TC 1-19. The training circular for the 2.75 rocket system is presently in the rough draft stage and its publication is far from being just around the corner.

### **SAFETY COURSE**

The second information safety course was conducted at the University of Southern California during the period 7-11 January 1963. The twenty-six man class consisted of senior Army and Coast Guard officers and civilians from various commands throughout CONUS.

The objective of the course was to inform this senior representative group of the subject matter presented to the regular ten week safety officer course. Course scope covered several hours of aviation engineering, aviation psychology and physiology, and aircraft accident prevention.

A recommendation has been made to continue this fine course on a bi-annual basis with the next class commencing in June 1963. The importance of the subject matter and caliber of instruction certainly behooves both rated and non-rated senior officers and civilians to attend.

### **AIRCRAFT RE-DISTRIBUTION**

The expanded training base at the Aviation School to accommodate an increased student load for the remainder of FY 1963 will require considerable re-distribution of aircraft assets from other CONUS

units. If this re-distribution is not enough to make the pot boil, further aircraft assets will be withdrawn from other sources to permit implementation of the testing program for the Howze Board concepts.

The real scramble is for O-1 aircraft for the Aviation School and UH-1 aircraft for the testing program. So, the forthcoming months may be lean times for certain units, especially those in the TD area.

### **CHINOOK ALLOCATIONS**

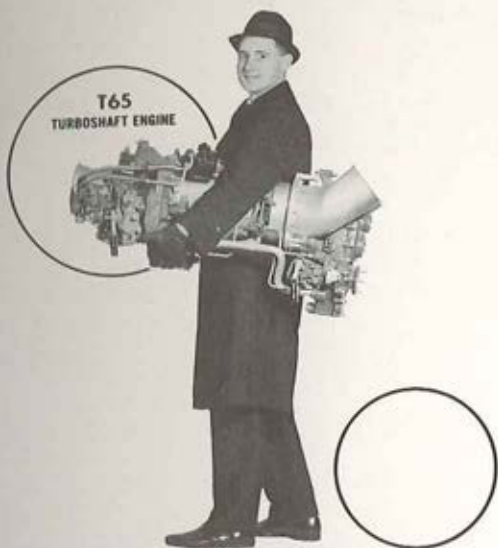
Everyone, of course, is interested in new equipment and the delivery of Chinook aircraft has been long awaited. As a matter of brief review, the Chinook Program began way back in the summer of '58. From the users' point of view, other than the increased lift capability which this aircraft will provide, significant design features provide for a reduction in maintenance requirements and the elimination of elaborate ground handling equipment normally associated with aircraft of this type.

Good news is finally forthcoming. At a recent Systems Coordinating Group meeting, Headquarters Army Materiel Command announced the distribution schedule dates. The delivery of the first aircraft to troop units will take place during April, 1963. The first unit organized to receive the Chinook is the 202d Transportation Company (Med) with home station at Fort Benning, Georgia.

The U.S. Army Aviation School at Fort Rucker, Alabama, is well on the way in its instructor pilot training and is eagerly anticipating early student (pilot and crew) input.

**CONARC REPORT**





## Man, carrying MAN-CARRYING engine ... and that's not double-talk

As a matter of fact, though, it usually works the other way 'round, with the engine carrying the man. But this emphasizes the light weight—130 pounds, ready to run—of Continental's new 250-hp T65-T-1 turboshaft engine. The engine is being developed for use in the Army light observation helicopter, and meets all Military and FAA requirements. It is compact—40 inches long by 19 wide by 18 high. Unusual design simplicity makes for maintenance ease as well as for the operating reliability for which Continental turbines are noted—reliability proved in more than 5,000 J69-series turbines in military use.



**CONTINENTAL AVIATION & ENGINEERING CORPORATION**

12700 KERCHEVAL AVENUE, DETROIT 15, MICHIGAN

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After sluggish progress, the expansion of long over-due hangar facilities and other support facilities is coming about. At Gray Army Airfield, Fort Lewis, Washington, home of the 4th Infantry Division, contracts will shortly be let to construct several new hangars and to modify utilities which will permit the accommodation for several aircraft. Lt. Colonel W.A. Hash, Aviation Officer of the 4th, estimates that all construction should be completed by January, 1964.

### **BUTTS AAF**

The same is true for Butts Army Airfield at Fort Carson, Colorado. A total of 2.1 million dollars was recently appropriated to furnish new hangars and a tower there, plus the improvement of electric and water facilities. This action has been one of the best bits of information for some time.

Major R.W. Miller, Acting Commander for the Aviation Battalion, 5th Infantry Division, figures that construction will get underway by March, 1963. Known throughout aviation circles as a locale with the most meager and miserable maintenance conditions, Butts Field now has the assurance of an improved maintenance capability. This initial appropriation, however, covers only Part I of a two phase long-range plan to improve Butts Airfield.

### **GODMAN AAF**

At Fort Knox ground has been broken to supplement the excellent runway and helicopter parking facilities with a new aircraft maintenance hangar. The addition of this hangar

space for Post Transportation Corps maintenance will make Godman Army Airfield one of the finest in CONUS.

### **INCOMING PERSONNEL**

Major Earl Hammack has joined the Aviation Division, Headquarters USCONARC and takes on the unenviable job of allocating equipment, including aircraft for aviation units throughout CONUS. With respect to aircraft, his job will be comparable to getting blood out of a turnip.

Also due in shortly is Major John M. DeMaria who joins the Aviation Division from duty with the USATCD, Sandhofen, Germany. Before that assignment, Major DeMaria was in the cloak and dagger business at Headquarters, USAREUR.

### **GENERAL POWELL RETIRES**

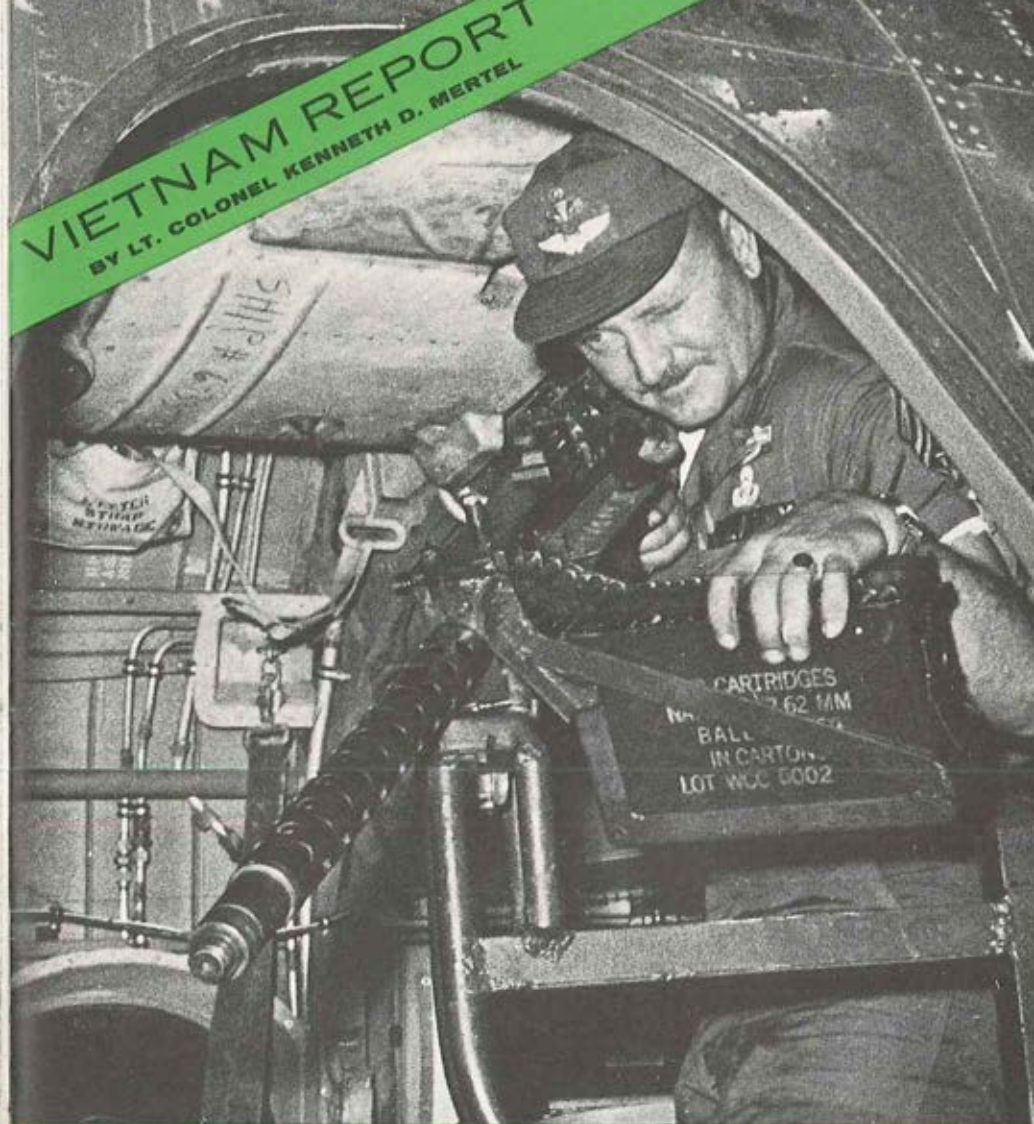
The entire staff of Headquarters, USCONARC as well as the thousands of officers and men in USCONARC units, had heavy hearts on January 30, 1963, when General Herbert B. Powell, Commanding General, CONARC, retired from active service.

General Powell was the ranking Army aviator on duty and a true friend of Army aviation. While he commanded USCONARC, Army aviation grew tremendously from companies to battalions and now to the genesis of a completely new concept in mobility, the Air Assault Division.

General Powell's assistance to the Aviation Program and his own splendid personality will be keenly missed by all Army aviators. We wish him well in his civilian pursuit and sincerely hope he will continue his interest in Army aviation and the AAAA.

# VIETNAM REPORT

BY LT. COLONEL KENNETH D. MERTEL



■ Sergeant Robert W. Blunk of the 57th Transportation Company (Lt Hel) operates the machine gun mount he designed and built for use with the UH-21 Shawnee helicopter. A career specialist, the Camas, Washington veteran has the responsibility of insuring that all unit gunners are well trained and that the chopper guns are in operating condition and ready to carry out the mission of protecting the aircraft and crews from enemy fire. (U.S. Army photo)



ONE of the most outstanding units here in Vietnam is the Utility Tactical Transport Company (UTT) commanded by Major Ivan Slavich. This fighting Army aviation unit is equipped with the armed UH-1B. Its primary mission is "Armed Escort of CH-21 Helicopters" in the execution of airmobile operations. This it accomplishes exceedingly well.

The aviators, crew chiefs, and gunners in this unit are a most competent and professional group. In action, everything is accomplished as a matter of SOP. During missions when changes or new decisions are required, a quiet word or two from the flight leader or company commander -- and then swift execution. The CH-21 types swear by UTT and the protection provided by these "Flying Tigers" of Vietnam.

#### **AIRMOBILE OPERATIONS**

Airmobile operations are conducted as a matter of routine operation on a daily basis. These may vary in size from a dozen helicopters to several units. Helicopters are stripped of all excess weight in order to facilitate a higher combat payload. One unit has removed the horizontal and vertical stabilizers without impairing the operational capability of the helicopter. It looks a bit odd at first glance, but gets the job done, particularly in the mountainous areas, and results in more troop-carrying capacity.

A very smooth airmobile operation was recently conducted by the 33rd Aviation Company (Bamuio-ba or Balm-De-Balm) commanded by Major Joseph E. Henderson, as assisted by aircraft and

aviators from two other units. The combined units, operating in flights of five aircraft, used one loading zone and two landing zones.

The CH-21's were escorted by the UTT Company enroute and protected during landing operations. The actual landing was preceded by both artillery and close air support preparation. Due to the UTT armed escort and the firepower preparation, the landing was unopposed. The individual flights were controlled from a Bird Dog flown by CWO Raymond H. Vierling. Mr. Vierling skillfully directed each low level flight to the proper landing zone. A minimum of conversation was heard on the control frequency; no more than the calm voice of Mr. Vierling and the click of transmitter buttons acknowledging instructions that were issued.

#### **MISSION DESCRIBED**

Another well planned and executed airmobile operation was recently flown by the 57th Aviation Company commanded by Major Darwin D. Beauchamp. The detailed planning for this operation was evidenced by the completeness of the briefing given on the preceding evening to all aviators, crew chiefs, and gunners participating in this operation.

The briefing began with the usual enemy situation presented by the Company S-2, Lieutenant Ralph S. Newman. The enemy situation was quite detailed, including the estimated number of enemy automatic weapons and other enemy activities to be encountered enroute, at the loading zone, and the landing zones. The friendly situation and mission



details of the plan were presented by Captain Richard S. Freeze, Mission Commander.

Loading and landing zones were depicted graphically on the blackboard. Routings, distances, times, speeds, checkpoints, altitudes, weapons release, and secure points were outlined in detail. The communication's portion included all frequencies used, UHF and FM, along with the code names and emergency signals.

The time schedule was most interesting: Breakfast, 0500; ground transportation to airfield, 0525; aircraft stations, 0535; start engines, 0610; take-off, 0620; arrive loading zone, 0715; take-off, 0720; arrive landing zone, 0730. All very smooth and fast!

The remaining lifts were flown in rapid succession with equal professional ability. Control throughout was excellent, both that exercised by the individual flight commanders and the mission commander.

By the way, this same unit's company commander furnishes a free drink to the gunner and crew chief for each hit to their aircraft, same as for the pilot and co-pilot. He also has established an "Eagle Club and Eagle Aces;" however, you can learn about this firsthand when you arrive over here.

## OUR GUNNERS

Speaking of gunners, they are one of the most important additions to an air crew in Vietnam. All CH-21's are armed with one or two machine guns for the purpose of suppressive or defensive fires. One is manned by the crew chief, the other by the gunner. The crew habitually fly to-

## BUSMAN'S HOLIDAY

■ Captain Gene T. Bragg, who has been Chief of the Aviation Section of the IAGS Project in Guatemala for the past two and a half years, chose a novel way to return to the States at the end of his assignment this month. With his wife and two sons, he took off in his own Cessna 172 and headed for Fort Rucker, Ala. This type of trip is nothing new for the Bragg family. Last June, they all flew back to visit their home in West Virginia. Mrs. Bragg reported that the boys, Donny, 10, and Bobby, 8, spent the entire flight watching the countryside. ■■

gether and consists of the pilot, co-pilot, crew chief, and gunner. They are a very close-knit, well-trained team.

Most of the gunners are privates or privates first class and must be provided from the regular spaces within the unit; gunners are not a part of the regular TO&E (and should be).

The gunners are a very dedicated group. Their courage, ability, and devotion to duty are most respected by all members of the unit. They occupy what is probably the most hazardous job of any of the air crew, for if there is going to be return fire, it is naturally directed towards the gunners and their guns.

Most units have devised a gunner's badge that qualified gunners proudly wear on their caps. One unit has accorded gunners special privileges in the unit mess by having a separate dining room for them apart from the other lower ranking grades. Perhaps CONARC and DA should

look into authorizing a regular "Gunner's Badge" somewhat commensurate with that of our sister services, and not merely take the easy out of adding a bar to the "Driver's and Mechanic's Badge."

When you arrive in Vietnam, you will find varying types of living conditions depending on where you are to be located geographically and what your particular assignment is to be. Most of the units live in semi-permanent tropical shelters, which are basically a wooden framed hut with cement or wooden floors. The walls covered with masonry or bamboo about half way up, are screened the rest of the way with regular wire screen mesh, and are roofed with asbestos-corrugated roofing.

Some units live in framed, floored tents, but these are rapidly being replaced by the semi-permanent construction described above. Most latrines have running water with cold showers being most common; however, hot water heaters are in the country and are being installed.

Field messes in the units serve fresh meat and vegetables most of the time and receive frequent issues of ice cream. Fresh vegetables are procured locally and shipped from the U.S. as well. All in all, the food

is very good and most satisfying. No complaints from the chow hounds!

If you are assigned to a MAAG headquarters or certain other headquarters in the cities, you may live in a leased hotel or apartment. These are generally quite comfortable. The larger hotels have officer and enlisted "cooperative messes" run by the occupants with each one paying a pro-rata share of the cost of food and services. Personnel not having a field mess provided and having to participate in one of these messes receive a cost-of-living allowance varying between approximately \$1 to \$2 per day to help defray the cost.

Mail service is generally very good, air mail taking about four to five days from here to the States and vice versa. Boat mail takes up to four or five weeks, so be prepared to spend a few cents for air mail.

Post exchange supplies are obtained through the Naval Exchange and small branches operated by the units. Most of the usual necessities can be purchased including socks, underwear, towels, camera film, etc. Stateside soft drinks, beer, and Class VI are also available, although some items are rationed.



#### FIRST-HAND VIEW

■ Major Ivan Slavich, right, CO of the UTT Helicopter Company in Vietnam, explains the mission of the UH-1 to Senator Roman L. Hruska of Nebraska, center, as crewchief Sp/5 William P. King, left, looks on. ■■



*A 20-year veteran in Army aviation  
provides some pertinent answers  
to the question of training . . .*



# SENIOR OFFICERS IN ARMY AVIATION

BY

**BRIGADIER GENERAL ROBERT R. WILLIAMS**

**COMMANDING GENERAL, U.S. ARMY AVIATION CENTER**

**I** KEEP hearing rumbles and background noises about the Army's program to train senior officers as aviators rather than letting time and promotion take care of the problem. The people making these noises do not understand that this is the most healthy thing for Army aviation - both from the Army's viewpoint and their own individual viewpoint.

Many Army Aviators view this program to train senior officers as Army Aviators as a new and shocking development. Many pilots who are today viewing it with alarm should take their blinders off and look back a bit.

In 1942 when what is now Army aviation was 9 months old, two majors (Robert F. Cassidy and Elmer Blaha) were entered in the course at Fort Sill, Oklahoma. At that time, the highest rank called for by any TO&E was captain. We oldtimers sent up a hue and cry of "Unfair!" We argued that these "Johnnies-come-lately" would take our jobs and that there was no room in the program for them.

In 1946 a program was instituted to train a relatively large number of field grade officers as pilots. The World War II pilots cried, "Unfair!" They argued that when these field

(Continued on the Next Page)



grade officers graduated from flying school they would not have sufficient aeronautical experience to hold down appropriate jobs in Army aviation.

As for their taking choice jobs from the oldtimers, let's consider this. Initially they did take many of the jobs that the more experienced junior officers would have liked to have had, but as time went on it was the strength that they added that permitted Army aviation to expand and create the positions of importance now held by themselves AND the oldtimers.

Right now we desperately need senior officers with broad backgrounds in organization, training, and logistical operations who are pilots. We need men with wings on their chests and eagles or stars on their shoulders to fill positions on higher staffs. These are the men now being trained. They are senior officers with outstanding records who have been carefully selected because they have the abilities and experience that we need in the Army Aviation Program.

There is one major benefit all of us enjoy from the influx of these senior officers. The mere fact that outstanding senior officers elect to become Army Aviators will raise the prestige of Army aviation in the eyes of the rest of the Army. Senior officers in the future will not be as likely to look at the man wearing wings and immediately assume that all he knows is how to fly an airplane.

Many of the officers now being trained will advance on to general rank and to key positions in the Army. They will move us closer to the day when no one will be

surprised to see an Army officer wearing wings in any job in the Army. All Army Aviators will enjoy a higher status in the eyes of all the services.

For years senior officers have advised promising young officers NOT to go into Army aviation; they have advised Regular Army field grade officers to GET OUT of Army aviation on the basis that it is a blind alley. The fact that the Department of the Army has decided to send senior officers to pilot training and the fact that these officers elect to take the training indicates a new trend.

Place yourself in the position of one of the senior officers now taking pilot training. You have an excellent record; you have already made a name for yourself in your present field; you have an excellent chance of getting a star if you just continue on your present course.

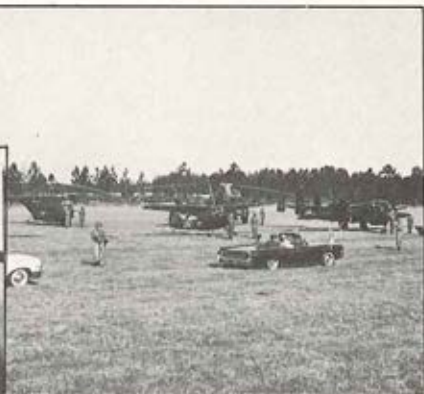
Would you gamble on taking a year out of your career to become a pilot and then serving in a new field for several years?

You wouldn't, UNLESS you had great faith in the future of Army aviation. The enthusiasm that these senior officers have for aviation is a real tonic for all of us.

The Army is on the threshold of a new and exciting air mobility program. It will take the very best professional and technical competence to successfully implement this program. I am convinced that the Army will prove to its own satisfaction and to the satisfaction of the Department of Defense that this step was eminently sound. The man wearing the Army Aviator's Badge has a bright future indeed.



LEFT: An electrical rotor blade de-icing system undergoes rigorous testing on the blades of a Boeing Vertol 107 at Canada's National Research Council facility near Ottawa, Canada. A spray-rig (left) produces a vapor cloud which condenses on the rotor blades while sub-freezing Canadian weather quickly reduces this moisture to ice. Heated strips running along the blades' leading edges cause the ice to loosen and the whirling motion of the rotor blades sheds the thawing ice. BELOW: President Kennedy's car leads an entourage of distinguished military and civilian leaders before an array of the 1st Armored Division aircraft. The review at Ft. Stewart, Ga., took place during the division's recent STRAC (Strategic Army Corps) mobility exercise. (USA photo)



ABOVE: James N. Davis (center), National President of AAAAA and Deputy Assistant Secretary of Defense for Weapons Acquisition and Industrial Readiness, is shown being greeted upon his arrival at Fort Rucker for the Feb. 8-10 AAAAA National Board meeting by Brig. Gen. Robert R. Williams (left), CG of the U.S. Army Aviation Center and Col. Alexander J. Rankin, President of the U.S. Army Aviation Test Command (Prov.) RIGHT: Gen. Bruce C. Clarke (USA-Ret.) and Brig. Gen. Delk M. Oden (second from right), Director of Army Aviation, are given a briefing on CH-21 Shawnee armament by Lt. Col. John L. Rowan (left), Test Command Deputy for Support, and Maj. Bud Wallace of the Aviation Test Command (Prov) during a recent visit of the senior officers at Ft. Rucker.





**T**MC'S mission is responsiveness to the supply requirement of the U.S. Army. This responsiveness involves such areas as Engineering, Supply Requirement Computations, Procurement, Receipt, Storage, Issue, Maintenance, and Technical and Supply Publications.

LET US CONSIDER for a moment the magnitude of TMC's workload in support of the mission. There are approximately 330,000 items on the TMC supply record. There are five major operating directorates concerned with these items. These are the Directorates of Technical Data, Cataloging and Standardization; Procurement and Production; Centralized Depot Supply Activities; Materiel Requirements; and Engineering.

### **1,650,000 BASIC FILES**

EACH DIRECTORATE must provide guidance to maintain that portion of the supply management data for which it is responsible. Since all five operating directorates must work with these 330,000 items, it establishes a workload parameter of 1,650,000 basic files to be maintained.

PAPER CONTROL of these 330,000 items requires that each one have a maximum of 259 separate pieces of management data. Under these conditions, the five operating directorates require 85,470,000 different pieces of information available on call. Therefore, it is readily apparent that maintenance of this information by the operating directorates would be virtually impossible on a manual basis. Further, TMC could not have an accurate and up-to-date record under these conditions. These were the reasons leading to TMC's decision that the only way its work could be accomplished was through the utilization of a large scale electronic computer.

**"THE FIVE TMC DIRECTORATES  
REQUIRE 85,470,000 DIFFERENT  
PIECES OF INFORMATION . . ."**

## **AUTOMATIC DATA AT THE TRANSFER**

BY MR. ROBERT

FIRST, TMC established the fact that the computer was going to be the central file for Supply Management Data. The technical data, which originates from the provisioning document, was submitted by the contractor to TMC. This data, plus additional elements generated by the operating directorates of TMC, are applied to the Master Tape File maintained by the computer.

THIS IS ACCOMPLISHED as follows: When the provisioning document is received in TMC, the Aircraft Equipment Specialists in the Directorate of Technical Data, Cataloging and Standardization screen the items contained therein for the purpose of developing or obtaining the essential data required for entry into the computer record. Such essential data consists of identification of maintenance significant items, availability of Federal Stock Numbers and such supply data as maintenance factors, time between overhaul, source code, package and preservation, weight and cube, etc.

THE CATALOGER'S SCREENING of the provisioning list uncovers any new items being introduced into the system. Since they require a Federal Stock Number, the Catalogers contact the Defense Logistics Service Center, in Washington, D.C. for the necessary number. After obtaining the Federal Stock Number, the item and its Supply Management Data are entered into the computer master tape record.

AT THE SAME TIME, personnel of the Directorate of Materiel Requirements, based upon information furnished by the Engineers and Aircraft Equipment Specialists, compute all the requirements



# DATA PROCESSING INTEGRATION PORTATION MATERIEL COMMAND

L. JAMES, DIRECTOR, AUTOMATIC DATA PROCESSING

data, such as reorder point levels, peacetime levels, production lead time, etc., and the quantities necessary to support the end item. This data is then entered into the computer master tape record.

BASED upon the quantities established by the personnel of the Directorate of Materiel Requirements, the contracting personnel of the Directorate of Procurement and Production prepare contractual documents and forward them to the contractor. This contract data is then entered into the computer master tape record to set up the necessary on-order and due-in information.

## MASTER TAPE UP-DATED

WHEN the Directorate of Centralized Depot Supply Activities, which is responsible for the control of the receipt, storage and issue of TMC's stock at the Army Depots, receives notice from one of the depots that it has received the stock from the contractor, action is taken to update the Computer Master Tape Record to record the receipt. The stage has now been set so that when stock is issued to satisfy an army requisition, the necessary fiscal accounting data for billing purposes can be generated automatically from the computer to satisfy the Comptroller requirements.

NEXT, we extract from the computer a tailored, cataloged identification deck. This deck consists of 35,000 to 40,000 cards, containing the Federal Stock Number, Unit Price, and other Supply Management Data necessary to mechanically prepare a requisition. This deck is then sent to our Army customers, so that they have

a simplified method for requisitioning from TMC. Our primary customers, such as the Depot Maintenance Shops and the CONUS Field Maintenance Shops, have either EAM or Flexowriter Equipment, which in conjunction with the deck sent to them, permits the mechanical preparation of requisitions. Cards furnished are reproduced along with the addition of the control and quantity data and electrically transmitted to TMC. Such requisitions are readily identifiable upon arrival at TMC.

THE COMPUTER edits the card requisition received and prepares either a shipping document card, which is transmitted electrically to the Army Depot, or a hard copy shipping document which is mailed to the depot for shipment to the Army customer. The by-product tapes resulting from customer demands and issues are the basis by which the computer prepares supply control studies for the Supply Management Analysts, and Requests for Purchase Actions which are forwarded to the Directorate of Procurement and Production for replenishment buys for depot stock.

## REQUEST FOR PURCHASE ACTION

THE CONTRACT resulting from the Request for Purchase Action will contain the part number originally established by the manufacturer, as well as the Federal Stock Number. By means of this method of identification, our contractor will have no difficulty in identifying the items on contract.

OUR CONCEPT is exceedingly simple and one might think that it can be accomplished with conventional equipment. However, the

# ARMY AVIATION



■ LEFT, top: Brig. Gen. Hallett D. Edson, Deputy CG of the U.S. Army Mobility Command, is shown addressing a recent AAAA-AHS meeting held in St. Louis, Mo. LEFT, bottom: The new Aero Commander, Inc. executive transport, the Jet Commander, completed its first flight ceremonies on January 27 at Bethany, Okla. OPPOSITE PAGE, TOP LEFT: Lt. Col. Arne H. Eliasson (left), Chief of the Aviation Human Research Unit at Fort Rucker for the past two years, has been ordered to Vietnam and will be replaced by Capt. Donald J. Haid, shown on his right. BOTTOM LEFT: Col. Christian Hanburger, who recently completed a tour as District Engineer in Alaska, has assumed the duties of Chief of the Aviation Division at Headquarters, Second U.S. Army, Ft. Meade, Md. BOTTOM RIGHT: Maj. Lewis E. Casner, Ret., has joined the Washington staff of Dunlap and Associates as a Senior Scientist and Systems Analyst. The former Senior Army Aviator implemented the Science Fair Awards Program pursued by AAAA. FAR RIGHT: Four more OH-4A's are shown on the production line at Bell Helicopter's Hurst, Texas plant and are expected to join the first of the turbine-powered, 4-place aircraft on flight status. The initial OH-4A has completed an additional nine flights and is now in a ground development program preparatory to the FAA's 100-hour tie-down ground run. ■■

many changes that occur in average supply procedures make the system quite complex. Our method insures that we have complete integration between TMC, the operator at the Army depot, the contractor, the Army customer, and all of the operating directorates of TMC. Each will operate on the basis of information in the Master Tape Record which will be updated as each new supply decision or supply management data change occurs.

WHEN GIVEN the Army Aviation Supply Mission, the Commanding General of TMC envisioned the use of a large-scale computer to accomplish the tremendous task of complete integration. Due to non-availability of such equipment, TMC used the building block principle. First, an IBM card-operated 650 was installed. It was replaced by two tape-operated IBM 650's, which, in turn, were replaced by an IBM 705 Model III. Finally, the IBM 7080 replaced the 705 Model III.

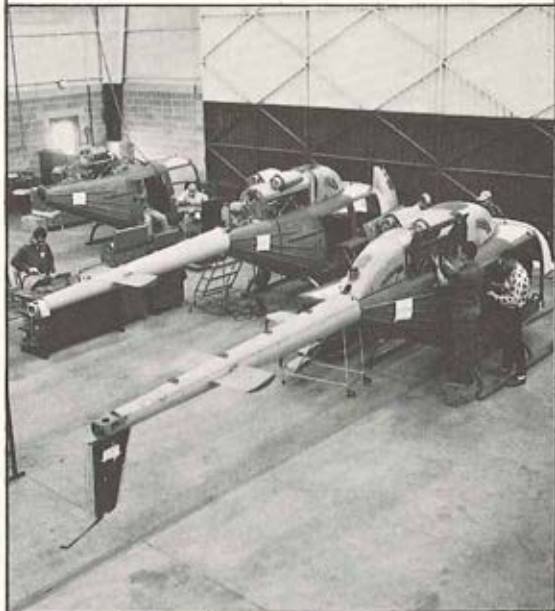
THE CARD-OPERATED 650 was a small-scale computer and very limited in its capabilities. As a result, during the 16 months in which TMC operated the card 650, our application was limited to a partial requisition process and stock accounting operation. We were able, manually, to match our requisition cards against a card stock balance deck and then to process the balance and requisition cards through the computer which resulted in an updated stock balance card and a partial shipping document. By-products of this application were utilized in the preparation of a Financial Inventory Report through the media of Conventional Electrical Accounting Machines.

THE NEXT STEP in our progress was the acquisition of two tape-operated IBM 650 Computers. In March 1958, TMC converted its Stock Accounting Punch Card File with essential elements of Cataloging Data to magnetic tape. With two tape-operated 650 computers, TMC was able to expand considerably from the initial





## NEWS PHOTOS



limited operation and requisition processing was accomplished on a daily basis. Shipping cards or documents were prepared by the computer and secondary supply action notices for items not available for issue were given to the Supply Managers. In addition, many reports required by the Department of the Army, such as "Statement of Inventory Transactions," and the "Supply Management Inventory Report" were prepared directly from the computers.

IN DECEMBER 1959, the IBM 705 Model III was installed at TMC. Of primary importance was the expanded memory capacity and the faster internal processing speeds. While the 650 was limited to 20,000 digits of memory, the 705 III had 80,000 available. This allowed us to build our Master Record so that its capacity is practically unlimited insofar as the number of characters are concerned.

IN FEBRUARY 1962, the large-scale IBM 7080 Computer was installed. The major

advantages of the 7080 over the 705 MOD III are faster processing speeds and less maintenance time since the 7080 is a completely transistorized computer as opposed to the 705 MOD III, which has vacuum tubes. The changeover to the IBM 7080 from the IBM 705 MOD III was comparatively simple since no reprogramming was involved. This was possible because the 7080 is constructed to accept all 705 MOD III programs without changing them in any way. We found no examples where the programs that were written for the 705 MOD III would not operate on the 7080.

OUR SYSTEM for utilization of 7080 is described as follows: The daily input consists of changes to supply management data, such as stock number changes, price changes, commodity code changes, supply action code changes, source code changes, etc. In addition, we include customer's requisitions, receipt of materiel at depots, inventory adjustments, due-

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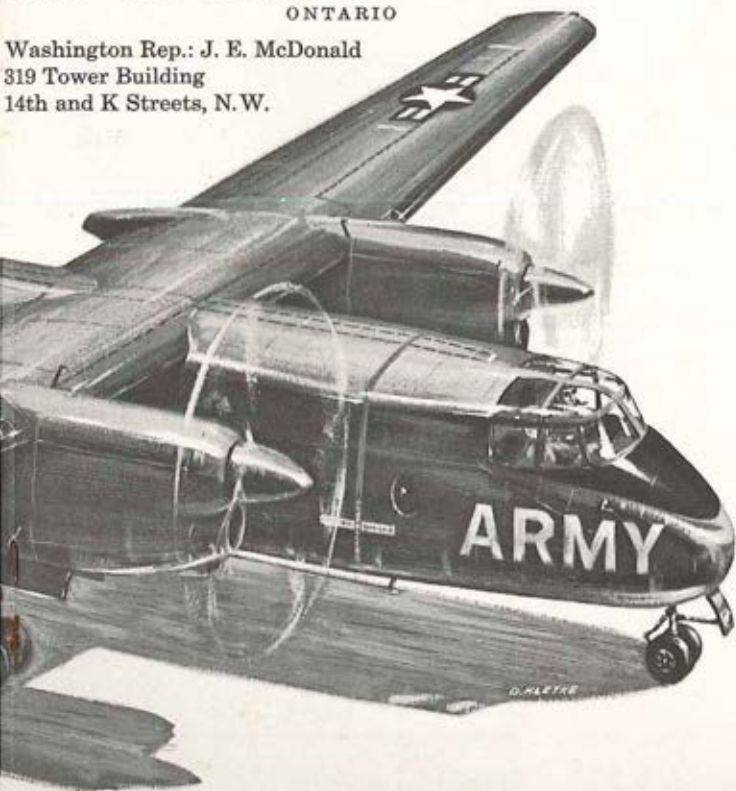
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outs, releases, purchase requests, contracts, etc. The first step is the conversion of this input data to a transaction tape by off-line equipment. The term "off-line equipment" means we do not use the 7080 computer in this phase of the operation. The transaction tape is then processed thru the "pre-edit" program.

**DURING THIS PROGRAM** all of the transaction codes are checked for validity and numerous item accounting codes are assigned mechanically. As an example, the computer checks to see if the item has a valid Federal Stock Number, if FIA-FUND Code relationship is correct, if the transaction code is correct, etc. In other words the "Pre-Edit Program" reduces the introduction of erroneous data into our system to a bare minimum. The transition tape is then sorted into stock number sequence.

#### **FSI CROSS-REFERENCING**

**THE TRANSACTION TAPE** is then processed against the Number Edit-Cross Reference Tape, which contains approximately 1,200,000 numbers for the primary purpose of updating the stock number in each transaction, if the originator failed to use the current stock number. The Numbers Edit Tape contains all the current Federal Stock Numbers, former stock numbers, and manufacturers' part numbers, etc. All these numbers are cross-referenced to the current Federal Stock Number. As an example, if a customer utilized a repair part number which he obtained from the actual repair part taken from an aircraft, his requisition would be converted to reflect the applicable current Federal Stock Number by this

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## **CONTRACT SER**





## SERVICES SYMPOSIUM



■ Head table guests at a luncheon during the Fifth Annual Army Aviation Contract Services Symposium held Jan. 28 in Washington, D.C., are (left to right), Winston Castleberry, Pres., Southwest Airmotive Co.; Edward C. Cox, OASA (I&L); Brig. Gen. Robert R. Williams, CG, US Army Aviation Center; Frank W. Hulse, Chairman of the Board, Southern Airways Co.; Hon. Paul R. Ignatius, Assistant Secretary of the Army (I&L); Rex H. Madeira, Exec Vice Pres., Page Aircraft Maintenance, Inc.; Brig. Gen. David B. Parker, CG, USATMC; Charles G. Gilledge, Pres., Dynalectron Corp.; Col. John Koletty, AMC; and Beverly E. Howard, Pres., Hawthorne Aviation. Secretary Ignatius addressed the luncheon at the symposium sponsored by the National Aeronautical Services Association. LEFT: Lt. General Hamilton H. Howze, CG of XVIII Airborne Corps, principal speaker at the one-day meeting, is shown addressing the assembled group of military and industry officials. (NASA photos)

process. After the transaction tape has been processed against the Numbers Edit Tape and all numbers have been updated, the updated tape will be processed against the Master Record.

AS A RESULT, the following list of major products are obtained.

◆ We will have a complete, updated Master Record Tape. All receipts will have been posted and requisitions subtracted from the Inventory Balance on hand, and supply management data changes posted for each affected stock number.

◆ Inquiries - All operating elements receive, on a daily basis, replies to their inquiries. We have programmed into our system a provision to allow TMC employees to place an inquiry transaction against any item in our system on a daily basis. An inquiry card containing the stock number and their identification number is placed into that day's computer input transactions. The following morning they will receive a printed reply which contains the supply data information as requested.

◆ The Directorate of Procurement and Production is given notification of contracts which are delinquent plus certain statistics about the operations of that directorate. For example, on any day, the computer can furnish the number of purchase requests and the age and status of these requests.

◆ The Comptroller can be given a daily, weekly, or monthly fund status, since all commitments, obligations, and expenditures are posted against the affected stock numbers. Further, the Comptroller will be furnished his Stock Fund Accounting Ledgers and customer bills on a cyclic basis.

◆ The Directorate of Centralized Depot Supply Activities will be given an answer on all the requisitions. There is a shipment detail card for all requisitions for which TMC had stock on hand, or a secondary action notice advising the supply



manager why the requisition was not satisfied. In addition, CDSA is given a daily transaction register of all accounting transactions for audit purposes.

ON A MONTHLY BASIS, the computer prepares many different management and operational reports. For example, Supply Control Studies for low and medium dollar value items are prepared. These studies are complete in their own right and the supply managers now spend their time analyzing them instead of preparing them. At the end of the quarter, complete Supply Management and Statement of Inventory Transaction Reports are prepared and submitted to the Department of the Army.

ANOTHER MILESTONE passed is the automatic preparation of TMC catalogs. We now prepare the SM 55-2 Pricing Guides and the SM 135 Repair Parts Manuals directly from the computer. This is accomplished by passing the Master Record and extracting the items that are

■ A photograph taken during the recent design compatibility tests of the CH-47A Chinook helicopter and the Pershing ballistic missile indicates that mobile missiles are not far off. An Army-Industry team conducted the compatibility tests at McCoy Air Force Base, Fla., exploring the extension of the range of the "shoot and scoot" missiles by means of rapid air-transport into otherwise inaccessible launch sites. ■■

to be published and printing these items in manuscript form. In total, we are now producing 475 individual reports on a quarterly basis. To produce this volume of work on a manual basis would be virtually an impossible task.

IN SUMMATION, it is readily apparent that the biggest advantage of the large-scale computer is that we now have a complete integration of all supply management and asset data in a central computer file on which all supply decisions and actions are recorded, and that this information is readily available to all.



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## BELL AWARD

BRIGADIER GENERAL ROBERT R. WILLIAMS (RIGHT), COMMANDING GENERAL OF THE U.S. ARMY AVIATION CENTER, IS SHOWN RECEIVING THE 1962 GROVER E. BELL AWARD FROM HARVEY GAYLORD, PRESIDENT OF THE BELL AEROSPACE CORP., ON BEHALF OF THE AVIATION CENTER, FORT RUCKER, ALA., "FOR DEVELOPMENT OF THE ARMED HELICOPTER CONCEPT INTRODUCED TO SERVICE BY THE UH-1B HELICOPTER DURING 1962." THE AWARD, FOUNDED BY THE LATE LAWRENCE D. BELL, WAS PRESENTED IN PALO ALTO, CALIFORNIA, AT THE ANNUAL HONORS NIGHT BANQUET OF THE HELICOPTER ASSOCIATION OF AMERICA. (AIA PHOTO)

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## CLIMATIC TEST

A U.S. ARMY YUH-1D IROQUOIS HAS COMPLETED THE AIR FORCE PHASE OF ITS ADVERSE WEATHER TESTING PROGRAM AND HAS BEEN TURNED OVER TO THE ARMY FOR MORE CLIMATIC TORTURE. IN SUCCESSIVE PERIODS, THE YUH-1D RECEIVED CLIMATIC TESTING AT EGLIN AIR FORCE BASE, FLORIDA; WRIGHT-PATTERSON AIR FORCE BASE, OHIO; AND EIELSON AIR FORCE BASE, ALASKA. THE AIRCRAFT HAS DRAWN FAVORABLE REPORTS AFTER TESTING IN TEMPERATURES THAT RANGED FROM 65 DEGREES BELOW ZERO TO 125 ABOVE. THE IROQUOIS "D" MODEL HAS SINCE BEEN TURNED OVER TO THE ARMY IN ALASKA FOR FURTHER TESTING.



### CAPTAINS (CONT.)

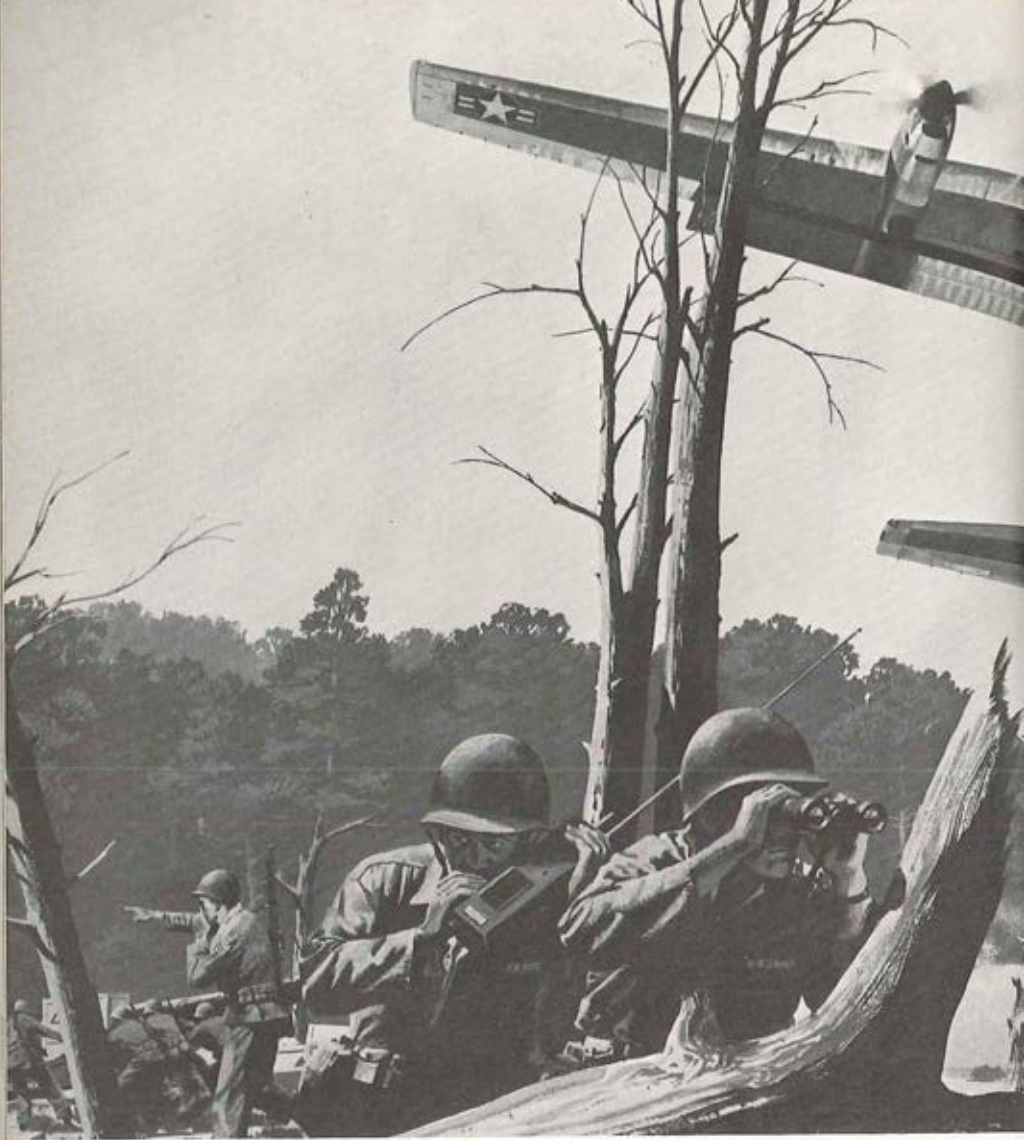
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### CAPTAINS (CONT.)

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FLEMING, JERRY L.  
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FOREMAN, RICHARD G.  
U.S. Army Adv Group (NG)  
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FOURNIER, ALBERT L.  
G-3 SOM, 7th Infantry Division  
APO 7, San Francisco, California  
FOURNIER, CHARLES A.  
U.S. Army Signal Brigade  
APO 403, New York, New York  
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Fort Hood, Texas  
HELFFENBERGER, FORREST H.  
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HURST, DALE W.  
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APO 612, San Francisco, Calif.  
HUTCHINS, CHARLES F.  
Nat'l Guard, Akron/Canton A/P  
Greensburg, Ohio



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## C-130 Hercules

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## DEPARTURE

L.T. COLONEL JAMES B. GREGORIE, RECENT FORT RUCKER DEPUTY CHIEF OF STAFF, WHO HAS DEPARTED FOR A NEW ASSIGNMENT IN VIETNAM, IS SHOWN SITTING AT THE CONTROLS OF A CARIBOU CV-2 AIRCRAFT. COLONEL GREGORIE, WHO PILOTTED THE FIRST PRODUCTION MODEL CARIBOU TO BE DELIVERED TO THE U.S. ARMY AVIATION SCHOOL, HAS HELD THREE IMPORTANT POSITIONS AT USAAVNS, SERVING FIRST AS DIRECTOR OF FIXED WING TRAINING, THEN DEPUTY DIRECTOR OF INSTRUCTION, AND THEN DEPUTY CHIEF OF STAFF. HE RECEIVED MILITARY ASSISTANCE ADVISOR TRAINING AT FT. BRAGG PRIOR TO LEAVING FOR SOUTHEAST ASIA.

### CAPTAINS (CONT.)

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AFAOCC 63-3 USAAMS  
Fort Sill, Oklahoma



## HALL OF FAME

A NEW ENTRY TO THE "HALL OF FAME," CAPT. JOHN GHERE (LEFT), INSTRUCTOR PILOT OF "C" PHASE OF THE INSTRUMENT DIVISION AT USAAVNS, IS SHOWN BEING PRESENTED WITH A CERTIFICATE OF OUTSTANDING ACHIEVEMENT BY CAPT. LEON WIGGINS (RIGHT), INSTRUMENT DIVISION COMMANDER OF ADVANCED FIXED WING TRAINING. CAPT. GHERE WAS PLACED IN THE INSTRUCTOR PILOTS' HALL OF FAME FOR HAVING 1,000 ACCIDENT-FREE HOURS IN "C" PHASE AS A PILOT INSTRUCTOR. THE FORT RUCKER OFFICER ACTUALLY HAS SOME 2,000 ACCIDENT-FREE FLIGHT HOURS TO HIS CREDIT. (USA PHOTO)



### CAPTAINS (CONT.)

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D Company, 66th Armor  
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Company B, 3rd Brigade, 6th Inf.  
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## NEW INSIGNIA

BRIGADIER GENERAL DAVID B. PARKER, COMMANDER OF THE ARMY TRANSPORTATION MATERIEL COMMAND, MANAGES A SMILE AS HIS SECRETARY, MISS VIRGINIA BINGHAM, SEWS THE NEW INSIGNIA OF THE U.S. ARMY MATERIEL COMMAND ON HIS UNIFORM. OVER 20,000 OFFICERS AND ENLISTED MEN OF THE 7.2 BILLION DOLLAR COMMAND, WHICH REPLACED THE ARMY'S SEVEN TECHNICAL SERVICES, WILL SOON WEAR THE NEW RED, WHITE, AND BLUE PATCH. GEN. PARKER'S AIRCRAFT, RAIL, AND MARINE LOGISTIC AGENCY IS A SUBORDINATE OF THE COMMAND IN WASHINGTON, D.C. (U.S. ARMY PHOTO)

### CAPTAINS (CONT.)

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### LIEUTENANTS (CONT.)

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## ROLL-OUT

THE FIRST JET COMMANDER WAS ROLLED OUT OF THE RESEARCH & DEVELOPMENT CENTER HANGAR AT AERO COMMANDER'S NORMAN, OKLAHOMA, FACILITY, IN MID-JANUARY. FOLLOWING ROLL-OUT THE JET COMMANDER WILL BE PUT THROUGH THE INITIAL GROUND TESTS LEADING TO A 4B TRANSPORT CATEGORY CERTIFICATION, ACCORDING TO AN ANNOUNCEMENT BY TED R. SMITH, VICE PRESIDENT OF ENGINEERING OF THE BETHANY, OKLAHOMA, FIRM. THE NEW TWIN-ENGINE EXECUTIVE TRANSPORT IS POWERED BY TWO J-85 ENGINES OF 2,850 LBS. THRUST EACH AND IS EXPECTED TO SPEED AT .80 MACH AT AN ALTITUDE OF 35,000 FEET.



### LIEUTENANTS (CONT.)

HUTCHISON, RAY B.  
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SPRENGER, RONALD J.  
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Columbus, Georgia  
STEVENS, DARRYL M.  
2200 55th Lane  
Fort Smith, Arkansas  
SWIFT, IVAN C.  
216 N. Bush Street  
Mason, Michigan  
SWINTON, RAYMOND M.  
57 Kirby Street  
Fort Rucker, Alabama  
TONDREAULT, JEAN H.  
37th Engineer Group  
APO 165, New York, New York

### LIEUTENANTS (CONT.)

TRAGESSEER, JOHN N., II  
82nd Aviation Battalion  
Fort Bragg, North Carolina  
TSAL, SUNNY  
62 Dove Street  
New Orleans 24, Louisiana  
VARNON, JERRY R.  
2nd Brigade, 19th Infantry  
APO 112, New York, New York  
VOOS, MELVIN H.  
9695 Walnut Avenue  
Elk Grove, California  
WALKER, JACK A.  
Officer Student Co, USAAVNS  
Fort Rucker, Alabama  
WILLIAMS, FRANK K.  
21st Aviation Company  
Fort Rucker, Alabama  
WILSON, CHESTER L.  
1st Aviation Company (FWLT)  
APO 91, San Francisco, Calif.

### CWO'S

AHLSTEDT, HERBERT A.  
8th Transportation Co. (LH)  
APO 38, San Francisco, Calif.  
ALBRITTON, ARTHUR M.  
93rd Transportation Co. (LH)  
APO 96, San Francisco, Calif.  
BELL, FRED O.  
8th Transportation Co. (LH)  
APO 38, San Francisco, Calif.  
BERRY, CARL S.  
80th Transportation Co. (LH)  
APO 949, Seattle, Washington  
BIVENS, ROBERT D.  
133 E. Coral Way  
Grand Prairie, Texas  
BOLES, BOBBY P.  
614 Potomac View Avenue  
Woodbridge, Virginia  
BROWN, RICHARD W.  
1321 W. MacKenzie Drive  
Phoenix, Arizona  
BURK, FRIEDRICH  
Hqs, 7th Army Aviation Group  
APO 154, New York, New York



# #3,000

THE 3,000TH HELICOPTER BUILT BY THE BELL HELICOPTER COMPANY AT ITS FORT WORTH, TEX. FACILITIES WAS DELIVERED FEB. 7 TO THE U.S. ARMY. THE AIRCRAFT WAS A TURBINE-POWERED UH-1B IROQUOIS FITTED WITH FOUR M-60 MACHINE GUNS. DELIVERY OF THE AIRCRAFT WAS MADE TO MAJ. DOUGLAS M. MOODY, OPERATIONS OFFICER AT THE FORT WORTH GENERAL DEPOT BY LEN SEITZ, BELL MILITARY CONTRACTS ADMINISTRATOR. BELL HAS BUILT A TOTAL OF 3,338 HELICOPTERS AS AT FEB. 7. THE FIRST 388 OF WHICH WERE MANUFACTURED AT BUFFALO, N.Y. PRIOR TO THE TRANSFER OF THE COMPANY'S ROTARY-WING ACTIVITIES TO TEXAS IN 1951. (BELL PHOTO)

## CWO'S (CONT.)

CAMPBELL, BILLY J.  
USAAVNS  
Fort Rucker, Alabama

CANUP, CLYDE W.  
Headquarters Company USAAVNS  
Fort Rucker, Alabama

CHAMBERS, REX K.  
60th Aviation Company  
APO 46, New York, New York

COLEMAN, HENRY  
5139-2 Custer Hill  
Fort Riley, Kansas

CULLEN, RICHARD N.  
1st Aviation Detachment  
APO 128, New York, New York

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2041 N. Star Road  
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DELANEY, JAMES  
Student Officer Co, Box D-45  
Fort Rucker, Alabama

DICKEY, KENNETH E.  
202nd Transportation Co, (MH)  
Fort Benning, Georgia

DONLEY, KENNETH G.  
54th Transportation Co, (MH)  
Fort Sill, Oklahoma

EAKINS, JAMES R.  
11th Transportation Company  
APO 46, New York, New York

FULLER, JOHN, III  
93rd Transportation Co, (LH)  
APO 96, San Francisco, Calif.

GOVIN, STEVEN P.  
93rd Transportation Co, (LH)  
APO 96, San Francisco, Calif.

GRABSKI, EDWARD J.  
4520 Atom Street  
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HARDEN, RALEIGH L.  
Box 622  
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HARR, ROBERT B.  
Aviation Company, 11th ACR  
APO 305, New York, New York

HULSEY, LLOYD W.  
USAAVNS, FW Class 63-6  
Fort Rucker, Alabama

## CWO'S (CONT.)

ISENMANN, LESTER G.  
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MURRAY, GEORGE W., JR.  
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RHEW, JAMES L.  
919 Shannan Drive  
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ROMASZEWSKI, ALFRED J.  
10419 Burl Avenue  
Inglewood, California

TAYLOR, LAWRENCE J.  
36th Transportation Company  
APO 165, New York, New York

VERBEEK, GERALD D.  
110th Transportation Company  
APO 29, New York, New York

WILDE, RAYMOND C.  
Officer Student Co, USAAVNS  
Fort Rucker, Alabama

WOODRUFF, RAYMOND A.  
81st Transportation Co (LH)  
APO 95, San Francisco, Calif.

## WARRANT OFFICERS

ALTIS, HILBERT E.  
2200 W. 48th Street  
Shawnee Mission, Kansas

BAGGETT, JIMMY M.  
937th Engineer Co (Avn) (IAGS)  
Fort Kobbe, Canal Zone

CLINE, GARY K.  
Star Route B, Box 3500  
Anchorage, Alaska

CURTIS, DAVID E.  
3rd Aviation Company  
APO 36, New York, New York

## WO'S (CONT.)

EICHNER, WILLIAM J.  
D Troop, 1st Cavalry, 1st AD  
Fort Hood, Texas

ESTESS, KENNETH E.  
3rd Aviation Co (Inf Div)  
APO 36, New York, New York

FUESTING, PAUL B.  
601 N. Second Street  
Effingham, Illinois

GOULD, ROGER K.  
1st Missile Bn, 26th Arty (Avn)  
Scott AFB, Illinois

HITT, ROBERT A.  
2326 Rochester Road  
Pittsburgh, 37, Pennsylvania

LAMBRECHT, JACK E.  
15th Aviation Company, 1st CD  
APO 24, San Francisco, Calif.

LOCKE, BENNETT J.  
P. O. BOX 149  
Tonica, Illinois

MERCHANT, JOHNNIE H.  
1215 S. 11th Street  
Duncan, Oklahoma

O'BRYEN, PRESTON E.  
Paradise,  
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OLSEN, JOHN S.  
USA Garrison, Avn, 69th Sig Bn  
APO 325, New York, New York

PHILLIPS, GERALD J.  
Box 95 A, RD #1  
Mineral Ridge, Ohio

TURMAN, WILLARD G.  
94th Engineer Bn (Constr)  
APO 154, New York, New York

WHEELER, BUD E.  
General Delivery  
London, West Virginia

## WOC'S

FANT, CHARLES E.  
Officer Student Co, USA/VNS  
Fort Rucker, Alabama

GIBSON, CECIL C.  
3507 7th Avenue  
Granite Falls, Minnesota



## AGREEMENT

HAWKER SIDDELEY AVIATION LIMITED, LONDON, HAS REACHED AGREEMENT WITH THE NORTHROP CORPORATION OF BEVERLY HILLS, CALIF., FOR COLLABORATION IN THE PRODUCTION OF THE P.1127 JET V/STOL AIRCRAFT. UNDER THIS AGREEMENT, NORTHROP WILL ACQUIRE FROM HAWKER SIDDELEY DESIGN INFORMATION AND TECHNICAL KNOW-HOW ON THE P.1127 AND RELATED AIRCRAFT. THE WORLD'S FIRST OPERATIONAL V/STOL STRIKE AIRCRAFT. THE P.1127 HAS FLOWN AT SPEEDS RANGING FROM A SUPERSONIC FORWARD SPEED TO ABOUT 15 KNOTS BACKWARD. THE JET-POWERED AIRCRAFT OPERATES ON THE PRINCIPLE OF VECTORED THRUST.



### WOC'S (CONT.)

GRIMM, GERALD A.  
Route 4  
Elmore City, Oklahoma  
KELLEY, MAX B.  
Officer Student Co, USAAVNS  
Fort Rucker, Alabama

### OFFICER CANDIDATES

BIJL, ROELF  
50th Company OC, 5th Stu Bn.  
Fort Benning, Georgia

### SP/6'S

RADOS, FRANK V.  
El Rancho Mobile Home Park-25  
Marina, California

### SP/5'S

McCOLLUM, DONALD W.  
504th Aviation Company  
APO 696, New York, N.Y.  
TRUE, LARRY E.  
2226 W. Bijou  
Colorado Springs, Colorado

### ASSOCIATES

BARRETT, GEORGE B., JR.  
2420 N. Lake Avenue  
Altadena, California

### ASSOCIATES (CONT.)

BAUGHMAN, GEORGE W.  
1114 Leesburg Pike  
Falls Church, Virginia  
CAMPOBASSO, T.A.  
13416 Tangle Ridge Lane  
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DEARING, D.R.

Route 2  
Rush Springs, Oklahoma  
FLORKO, THEODORE W.  
7117 Silvercrest Drive  
Cincinnati, Ohio

GREEN, A.H.  
15 Adriatic Drive  
Hampton, Virginia  
HEINIMAN, ARTHUR M.

34 Dixie Drive  
Ozark, Alabama

HUNTER, J. ROSS  
Vertol Division, Boeing  
Morton, Pennsylvania

JOHNSON, LEROY D.  
Aircraft Radio Corporation  
Boonton, New Jersey

JOHNSON, RUSSELL D.  
4501 Baldwin Drive  
McLean, Virginia

LEWIS, DAVID L.  
504 Gramling Street  
Marietta, Georgia

LINDHOLM, GEORGE  
Hayes-Napier Field Division  
Dothan, Alabama

### ASSOCIATES (CONT.)

SAUBERAN, MRS. PATRICIA  
1953 Westover Drive  
Pleasant Hill, California  
SOULE, PETER F.  
2008 Hillyer Place, N.W.  
Washington 9, D.C.

### RETIRED

HALL, THOMAS E., Lt Col  
4356 Bonfils  
Bridgeton, Missouri  
HOLTON, GEORGE J., CWO  
11358 Manchester Road  
Kirkwood 22, Missouri  
JEFFREY, ROBERT J., Lt Col  
4518 N. 86th Place  
Scottsdale, Arizona  
PACKER, JACOB L., CWO  
315 Congress Street  
Denton, Texas  
RORICK, MELVIN W., Lt Col  
811 N. Grant, Apartment 5  
Little Rock, Arkansas  
SNYDER, HAROLD R., Lt Col  
General Delivery  
Zephyr Cove, Nevada  
WHEAT, HERCHELL M., CWO  
45 Curtis Drive  
Lee Hall, Virginia  
WOODS, JAMES R., Lt Col  
Route 2, Box 166  
Pine Mountain, Georgia

## FEBRUARY-MARCH, 1963 CHAPTER MEETINGS

■ 82ND AIRBORNE DIVISION CHAPTER. Combined business and professional meeting. Stag dinner. Installation of officers. Capt. Robert E. Wilson, recently returned from Vietnam, Guest Speaker. 82nd Abn Division Officers Open Mess, Friday, 1 February.

■ ARMY AVIATION CENTER CHAPTER. Buffet Dinner and Dance. Officers Club Annex (Old Club). PAYGB starting at 1730 hours. Tickets required. Friday, 8 February.

■ NATIONAL EXECUTIVE BOARD. Mid-winter quarterly meeting. Blue Room, Lake Lodge, Lake Tholocco, Fort Rucker, Ala. 8-10 Feb.

■ LECH RIVER CHAPTER. Dinner-Dance and Professional Meeting. Col. Conrad R. Stansberry, President, USAREUR Region, as Guest Speaker. Free bar, 1900-2000 hours. Main Ballroom, Officers Club, Augsburg, Germany, 23 February.

(Continued on Page 46)



# AAAA NEWS

## USAREUR GATHERING

An estimated 900 Army aviation personnel and dependents and some 100 industry participants are expected to attend the Fourth Annual Meeting of the USAREUR Region of AAAA at the U.S. Army Recreation Center, Garmisch, Germany, during the period 8-10 March.

Traditionally, the gathering has served as the forum for the interchange of professional information and as the backdrop for the annual election of AAAA officers for the USAREUR Regional activity.

Early reports from the fourteen Chapter organizations within the USAREUR Region indicate widespread membership participation.

A full photo report of the Fourth Annual Meeting will appear in the March, 1963 issue.

## RENEWAL NOTICES

Renewal notices for the 1 April 1963-31 March 1964 membership year were forwarded to the AAAA's

6,687 members in mid-February. Members are reminded that the new membership year begins on 1 April 1963.

## JOB PLACEMENT

The Association has served as a clearing house for job placement information since October, 1959, and has been instrumental in securing desired employment for many members within the general aviation industry. As before, the applicant who desires placement assistance must have a definite commitment as to retirement, separation, or discharge.

## NAT'L BOARD MEETING

The actions taken at the 8-10 February meeting of the National Executive Board at its mid-winter meeting at Fort Rucker will be reported in the March, 1963 issue. The mid-winter quarterly meeting was attended by eighteen of the twenty-six members of the National Board.

## THE Y AVIATION ASSOC OF AMERICA, INC.



## VIETNAM VETERANS RECEIVE AIR MEDAL AWARDS

■ Nine officers who received the Air Medal for meritorious achievement while participating in aerial flight in Vietnam are shown in front of the AAAA banner following a late January meeting of the Fort Benning Chapter. From left to right are Capt. Lonnie W. Bryan & Robert J. Kuhn; 1st Lt Theodore E. Motlow; Capt Don E. Finney; 1st Lt William H. Hinds (who also received the DFC); Capt Gary R. Bill; CWOs Kenneth E. Dickey & Rob't E. Dixon; and Capt. Ronald E. Dixon.



# AAAA PHOTOS



■ TOP RIGHT: Shown receiving the AAAA's Silver Medal in a Hqs, USCONARC ceremony held prior to his retirement on 31 January, the Army's ranking aviator, four-star General Herbert B. Powell (right) was lauded for his guidance, leadership, and personal participation in the growing aviation program. Col. Robert R. Corey (left), President of the Fort Monroe Chapter, represented the Association and made the presentation. ■ TOP LEFT: Brig. Gen. Hallett D. Edson (center), Deputy CG of the U.S. Army Mobility the Lindbergh Chapter of AAAA and the St. Louis Section of the AHS, ■ CENTER LEFT: 1st Lt. William H. Hinds (right), recipient of the Distinguished Flying Cross while participating in aerial flight in Vietnam, is congratulated by Gen. Bruce C. Clarke, Ret., at award ceremonies held during a recent dinner of the Fort Benning Chapter. Lt. Hinds was one of nine officers to receive the medal at the Fort Benning Quad-A gathering. ■ BOTTOM: Col. Warren R. Williams, Jr., President of the Army Aviation Center Chapter, presents membership incentive checks to the representatives of student class OFWAC 62-11 and OFWAC 62-9 upon their attainment of 100 per cent membership in AAAA. From left to right are 1st Lt. A.B. White, Jr., Lt. Col. Robert V. Reitan, Col. Williams, Capt. Eulus E. Evans, and 2d Lt. John C. Hall. ■■



JAN.-  
FEB.  
1963

# \$3.82 MONTHLY AT AGE 24

## Average Net Cost of Protection with AAAA's \$20,000.00 Ordinary Life Policy over a period of 20 Years

**NOT AN "ESTIMATE," BUT GUARANTEED IN POLICY!**

Monthly Premium by Government Allotment at Age 24	\$23.00
Total Premiums Paid (At the End of 20 Years)	\$5,328.00
Guaranteed Cash Value (At End of 20 Years)	\$4,409.40
Net Cost (Over a 20-Year Period)	\$ 918.60
Net Average Monthly Cost (\$918.60 divided by 240 Months)	\$ 3.82

You have \$20,000.00 protection for 20 years and if you choose the "lump sum" option of 3 options, you receive \$19.18 in cash surrender values for EACH \$23.00 monthly premium you have paid, or if you wish, at age 44, keep your \$20,000.00 policy in force until age 65 without further payment of premiums between ages 44 and 65. If a \$10,000.00 Ordinary Life policy is more within your means, the low long-term cost to you is proportional.

Under the life insurance program endorsed by the AAAA, the insured may select an insurance plan that best fits his particular needs. The basic plan selected by the National Insurance Committee of AAAA concerns itself with Ordinary Life Insurance—sometimes referred to as Straight or Whole Life.

Why? . . . Ordinary Life is permanent insurance. It provides lifetime protection at guaranteed rates . . . It provides cash values which can be borrowed to meet emergencies, or to provide you with a monthly income at a later date . . . It can provide you with a reduced paid-up LIFE-TIME policy at a later date at no additional cost to you . . . It can extend the face amount of your coverage for many years at NO additional premium, when converted to paid-up extended term insurance.

On the opposite page is a table that provides you with a true picture of the NET COST TO YOU of a \$10,000.00 policy after a twenty year period. The cash values listed in the tables are guaranteed in your policy, as is the stable premium rate. For purposes of illustration, the table employs a face amount of \$10,000.00 coverage. The net average monthly cost of a larger—or smaller—policy would, of course, be proportional.

No war clause, no extra aviation premium, no evidence of insurability for military personnel, no reduction in face amount with age, no geographical restrictions, no "potential" premium increase.

If you are a member of AAAA and have been thinking about increasing your life insurance protection, get all of the facts on the AAAA-endorsed LIFE INSURANCE PLAN today!



# **\$10,000 ORDINARY LIFE, GUARANTEED AVERAGE NET COST PER MONTH DURING 20 YEAR PERIOD**

Age at Issue	Premium per Month	Premium for 240 Months (20 Years)	Cash Value at End of 20 Years	20 Year Net Cost (Premium Less Cash Value)	Net Average Monthly Cost (Total ÷ 240)	Age at Issue	Premium per Month	Premium for 240 Months (20 Years)	Cash Value at End of 20 Years	20 Years Net Cost (Premium Less Cash Value)	Net Average Monthly Cost (Total ÷ 240)
21	\$9.90	\$2376.00	\$1979.10	\$396.90	\$1.65	34	\$15.50	\$3720.00	\$3043.40	\$676.60	\$2.82
22	10.30	2472.00	2052.70	419.30	1.75	35	16.10	3864.00	3132.50	731.50	3.05
23	10.70	2568.00	2127.90	440.10	1.83	36	16.80	4032.00	3222.20	809.80	3.37
24	11.10	2664.00	2204.70	459.30	1.91	37	17.50	4200.00	3312.70	887.30	3.69
25	11.50	2760.00	2283.00	477.00	1.99	38	18.40	4416.00	3403.70	1012.30	4.22
26	11.90	2856.00	2362.80	493.20	2.05	39	19.20	4608.00	3495.20	1112.80	4.64
27	12.30	2952.00	2443.90	508.10	2.12	40	20.20	4848.00	3587.40	1260.60	5.25
28	12.80	3072.00	2526.40	545.60	2.27	41	21.10	5064.00	3679.90	1384.10	5.76
29	13.20	3168.00	2610.10	557.90	2.32	42	22.10	5304.00	3772.90	1531.10	6.38
30	13.70	3288.00	2694.90	593.10	2.47	43	23.10	5544.00	3865.90	1678.10	6.99
31	14.10	3384.00	2780.80	603.20	2.51	44	24.20	5808.00	3959.00	1849.00	7.70
32	14.50	3480.00	2867.50	612.50	2.55	45	25.30	6072.00	4051.70	2020.30	8.41
33	15.00	3600.00	2955.10	644.90	2.69	<b>ORDINARY LIFE IS AVAILABLE TO AGE 64</b>					

**CLIP  
OUT!  
WRITE  
FOR  
FACTS  
TODAY!**

## **To: LIFE INSURANCE PLAN**

1 Crestwood Road  
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PLEASE SEND ME, WITHOUT OBLIGATION, THE  
FACTS ON THE AAAA-ENDORSED LIFE INSURANCE PLAN. I AM PARTICULARLY INTERESTED  
IN ( ) ORDINARY LIFE; ( ) \_\_\_\_\_

NAME \_\_\_\_\_

ADDRESS \_\_\_\_\_

CITY \_\_\_\_\_ ZONE \_\_\_\_\_ STATE \_\_\_\_\_

( ) I am an AAAA Member.

Date of Birth \_\_\_\_\_

# NEW MEMBERS JOINING AAAAA

SP/6 Stanley N. Allen  
 Captain David J. Amara  
 Lieutenant David C. Ammons  
 Lieutenant Harry J. Amsonberg  
 Lieutenant Wesley B. Avery  
 Lieutenant Donald L. Bachall  
 WO Donald A. Bailey  
 Mr. A. Stuart Baldwin  
 Lieutenant Max R. Baldman  
 Lieutenant Ian A. Basteller  
 Lieutenant Robert S. Billings  
 Lieutenant Judson L. Bireley  
 Mr. Alan Blankfield  
 SP/5 Robert M. Blanchfield  
 SP/5 William D. Bohn  
 Lieutenant Bernard L. Bottoms  
 CWO Edward B. Branch  
 Captain Ben L. Breedlove  
 SP/7 Joseph F. Brent  
 PFC Larry L. Bridenbaugh  
 Major William Broady  
 Captain Howard E. Brown  
 Lieutenant Jerry H. Brown  
 SP/5 James H. Brown  
 Lt. Col. Wallace R. Buelow  
 Captain Jesse M. Burch, Jr.  
 Lieutenant John R. Burden  
 Lieutenant John F. Byrnside  
 Lieutenant Richard E. Calvert  
 Lieutenant Doyle R. Campbell  
 Major Charles V. Carney  
 Lieutenant Jimmy R. Chapman  
 SP/5 Walter J. Cloud, III  
 Lieutenant Louis J. Colombo  
 Lieutenant Allan Cooper  
 Lieutenant Marvin A. Cox  
 Lt. Col. Horace J. Crouch, Jr.  
 SP/5 Robert L. Crowell  
 Lieutenant Morris E. Crump  
 Lieutenant Robert E. Cunningham  
 Lieutenant Dean E. Danielson  
 Lieutenant William F. Desmond  
 Lieutenant Franklin D. Dickson  
 Mr. Eric E. Doorkly  
 Captain Frank F. Dorey  
 Lieutenant James R. Elliott  
 CWO Ernest O. Eubanks

Lieutenant Noel A. Fischer  
 Lieutenant Wayne G. Fleming  
 Lieutenant Jerrold Forester  
 Captain John R. Franznick  
 Lieutenant Loren W. Franke  
 CWO Ronald T. Garrison  
 Captain Bruce H. Gibbons  
 Lieutenant Alvin W. Gowdy  
 Major James E. Greer  
 Captain Vernon C. Grigg, Jr.  
 Lieutenant George R. Hall  
 Lieutenant Robert L. Hammond  
 Captain Lee M. Hand  
 Lieutenant Lynn H. Harnden  
 Lieutenant Chesley F. Harriman  
 Lieutenant John M. Harris  
 Lieutenant Alfred M. Herms  
 Lieutenant Jon C. Holtzman  
 Lieutenant Robert T. Hooker  
 Lieutenant William T. Hooks, Jr.  
 Lieutenant James F. Humphries  
 Captain George N. Ivey  
 Captain John R. Jones  
 Lieutenant Lewis E. Kauffman  
 Lieutenant James T. Kearns  
 Lieutenant Marion L. Kerr  
 Captain William D. Kirby, Jr.  
 Lieutenant Thomas A. Knudtson  
 Lieutenant John E. Kreiner  
 Lieutenant William R. Laird  
 Captain Guillermo I. Larios  
 Dr. Finn J. Larsen  
 Lieutenant John A. Lasch  
 Captain Freddie E. Lehmann  
 Captain Harlan W. Lohmann  
 Lieutenant Raymond Magana, Jr.  
 SP/4 Robert J. Marr  
 Lieutenant Horace R. Matthews  
 Lieutenant John D. McCurdy  
 Major Laurence F. McKay  
 Lieutenant Burnell M. Mercer  
 Major Robert L. Michelson  
 Colonel George M. Miller, Jr.  
 Lieutenant Leslie J. Miller, Jr.  
 Lieutenant Thomas G. Moody, Jr.  
 SP/5 Jack S. Neel  
 Lieutenant Leo J. Noiles

Captain Victor R. Olvera  
 SP/6 William D. O'Rourke  
 Lt. Col. Douglas F. Parham  
 SP/6 Jarvis E. Peele  
 Captain Merrill T. Peterson  
 Lieutenant Joe T. Pope  
 Lieutenant George F. Prawitt  
 Lieutenant Robert H. Reynolds  
 Captain Carl E. Rhodes  
 WO Eugene L. Richardson  
 Captain Benjamin D. Roberts  
 Lieutenant John H. Roberson  
 Captain Pierce I. Robertson  
 Captain Albert F. Rodriguez  
 Captain John C. Ross  
 Lieutenant Laurence G. Rumlion  
 Major Edward W. Sargeant  
 Lieutenant Hudson A. Schnell  
 SP/6 Harvey E. Schult  
 Lieutenant William C. Schweitzer  
 CWO James Scott  
 SP/4 Lawrence J. Scullin  
 Lieutenant Robert D. Shelton  
 Captain Jerry L. Shelby  
 Captain Edward R. Shore, Jr.  
 CWO Donald H. Smith  
 Lieutenant David C. Spencer  
 Lieutenant James C. Strange  
 Lieutenant Thomas L. Stewart  
 Lieutenant Jon C. Stillman  
 S/Major Kenneth Storms  
 SP/6 John M. Stotz  
 SP/4 Frank W. Szilagyi  
 SP/4 Leslie J. Szucs  
 SP/6 Billy J. Taylor  
 Lieutenant Charles E. Taylor  
 Lieutenant Guy P. Thatcher  
 Lt. Col. William G. Thomas, III  
 Lieutenant Royal K. Toebes  
 Lieutenant Anthony M. Vickers  
 Lieutenant Thomas G. Wardell  
 Captain Roger A. Waterbury  
 Lieutenant James H. Weaver  
 Mr. William B. Wells  
 Lieutenant Charles E. Williams  
 Lt. Col. Louis A. Williams  
 General Robert H. York

## FEBRUARY-MARCH, 1963 CHAPTER MEETINGS

- **FULDA CHAPTER.** Stag Dinner and Professional Meeting. "On the house." Lt. Col. McCoy, Guest Speaker. Bad Hersfeld Officers Club, 9 Feb.
- **USAREUR REGION ANNUAL MEETING.** U.S. Army Recreation Center, Garmisch, Germany. Professional sessions. Evening social activities. 8-9-10 March.

- **ALAMO CHAPTER.** Professional Meeting. Mr. John M. Peterson, Ryan Aeronautical Company, Guest Speaker. "Development of XV-5A Lift Fan Research Aircraft Development." 1930 hours. Fort Sam Houston Officers Open Mess, 28 March.
- **FORT CAMPBELL CHAPTER.** Professional all-day program. Evening social activities. Chapter elections. Site to be announced. 22 March.





## 10-ton lift for our armed forces

Sikorsky's new S-64 Skycrane is a universal transport that can deliver 10 tons of men, materiel, machines, or fuel (POL) wherever military needs dictate.

The S-64 hefts its load in one big bundle or several small ones. It handles cargo of virtually any size or shape. It can even carry detachable

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Now in final test at Sikorsky, the 145-mph Skycrane will soon be ready to serve our armed forces as a 60-man troop transport, flying crane, tactical weapon, logistic vehicle, and as airborne artillery.

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DIVISION OF UNITED AIRCRAFT CORPORATION

STRATFORD, CONNECTICUT

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# ARMY AVIATION

VOLUME 12  
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FEBRUARY, 1963

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