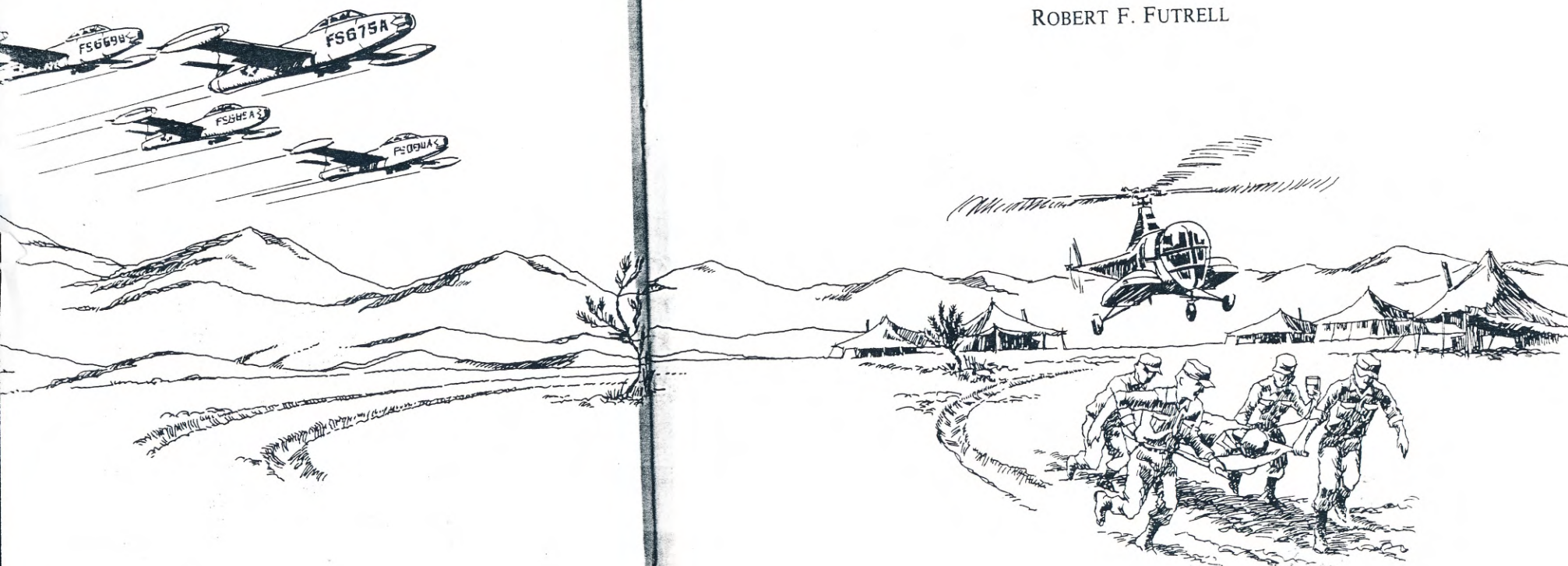


The United States Air Force In Korea 1950-1953

by

ROBERT F. FUTRELL



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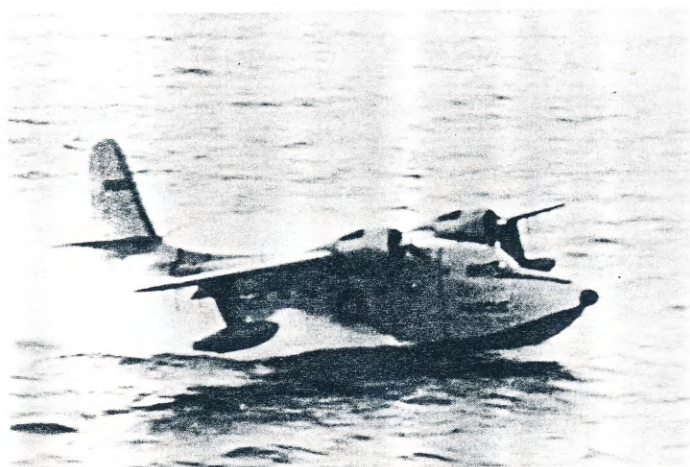
3. Air Rescue's Mission Was Expanded

The Korean war offered the first test for search and rescue organizational tactics developed in World War II. For the performance of search and rescue functions in June 1950, FEAF possessed the 2d and 3d Air Rescue Squadrons. Administratively, these units were a part of the world-wide Air Rescue Service—a subordinate command of the Military Air Transport Service—but their operations were controlled by FEAF and its subordinate commands. Flights of the 2d and 3d Air Rescue Squadrons were located at various bases where they could best perform emergency search and rescue services. The 2d Squadron served the Thirteenth and Twentieth Air Forces, while the 3d Squadron was based in Japan and came under the operational control of the Fifth Air Force and later the 314th Air Division and its successor Japan Air Defense Force. At the Korean war's beginning a search and rescue version of the Flying Fortress bomber—the SB-17—was the standard aircraft of the rescue squadrons, but the 3d Rescue Squadron had a few Sikorsky H-5A helicopters—small, two-seat, rotary-wing aircraft which were used for short-range rescue pickups. In the first month of the war, on 28 July 1950, the 3d Squadron received a detachment of Grumman SA-16 amphibian aircraft. If the seas were smooth enough, these "Albatross" SA-16's could land and retrieve downed airmen from the water.⁷⁶

Under the command of Lt. Col. Klair E. Back after 28 August 1950, the 3d Air Rescue Squadron pioneered in the employment of new search and rescue equipment and techniques, which, for the first time as a standing procedure,

included the rescue of stranded personnel from behind enemy lines. At first the 3d Squadron employed its SB-17's primarily as orbit aircraft for the B-29 strikes, and the new SA-16's maintained continuous daylight patrols over the Tsushima Straits. Seven days after their arrival an SA-16 piloted by Captain Charles E. Schroder picked up Ensign Glenn T. Farmworth, a Navy pilot who had been in the water off Korea less than two hours. On 15 August an SA-16 crew picked up a Mustang pilot only five minutes after he had parachuted into the water off southern Korea.⁷⁷

The newest developments in air rescue were taking place in the immediate area of the ground fighting in South Korea. On 7 July 1950 the 3d Squadron sent two L-5 aircrews and aircraft to Korea. Called Mercy Mission No. 1, the L-5 pilots attempted several pickups without much luck, for the little liaison planes could not operate from the rice paddy lands of Korea. On 22 July, however, the rescue flight at Ashiya sent an H-5 helicopter detachment to Taegu, which soon attracted General Partridge's notice. In a few days, moreover, the Eighth Army's surgeon called on the helicopters to help him evacuate critically wounded soldiers from front-line aid stations to the 8076th Mobile Army Surgical Hospital at Miryang and the 8054th Hospital in Pusan. The helicopters could operate in the mountainous and rice-paddy terrain where the liaison planes could not function. Early in August 1950 General Partridge accordingly directed the 3d Squadron to station six of its nine helicopters in Korea, and General Stratemeyer asked USAF to give him 25 H-5's to be used

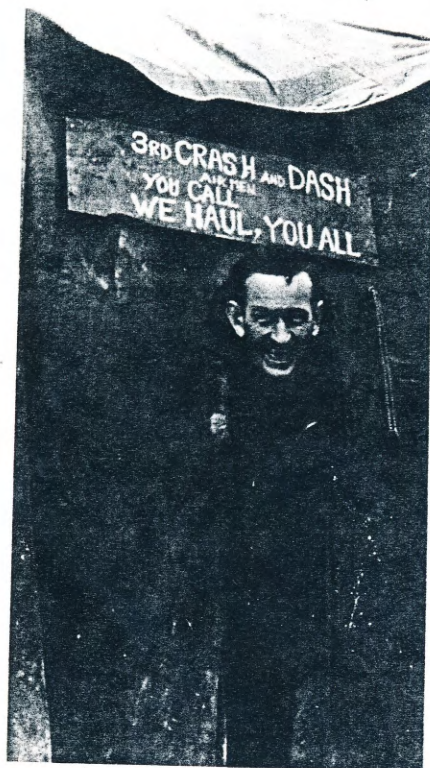


Because of its ability to land on water and land, the SA-16 Albatross is used to cover aircraft water routes throughout the Far East.

by a special evacuation and utility squadron. By stripping other commands, USAF started 14 H-5's to the Far East, but it ruled that the 3d Squadron would continue to handle the mercy missions. By 29 August the Helicopter Detachment had evacuated 83 soldiers whom the Eighth Army surgeon said would never have survived a ten-to-fourteen-hour trip by ambulance to a field hospital.⁷⁸

Evacuation of front-line Army casualties continued to be a major concern, but the 3d Air Rescue Squadron and the Fifth Air Force recognized that new arrangements would be needed as United Nations Command forces attacked northward from the Pusan perimeter. On 27 August 1950 the Fifth Air Force accordingly established a Rescue Liaison Office in the Joint Operations Center, and on 30 August the 3d Squadron formally organized Detachment F in Korea, under the command of Captain Oscar N. Tibbets. The close coordination between the Joint Operations Center

and Detachment F soon permitted the first rescue of a pilot from behind the enemy's lines. Covered by a rescue combat air patrol (ResCAP) of friendly fighters, Lt. Paul W. Van Boven flew his H-5 to Hangan-dong on 4 September and successfully retrieved Captain Robert E. Wayne. When the United Nations front lines advanced, Detachment F moved from Pusan (K-1) to Taegu (K-2) and then on to Seoul (K-16). From this location on 10 October, Lt. David C. McDaniels and paratrooper Captain John C. Shumate made a 125-mile trip to save a wounded British Navy flier, Lt. Stan W. Leonar from under enemy fire at Changjon. Employing two H-5's and three L-5's from Pyongyang, Detachment F evacuated 47 injured paratroopers from the drop zones at Suncheon and Sukchon on 22 and 23 October. Flying from Kunu-ri and Sinanju in November, the H-5 elements rescued pilots at extreme distances, one as far north as Kanggye. When the Chinese troops attacked southward, Detachment F withdrew its



TSgt. Basil L. Boatright of the 3d Air Rescue Squadron doesn't mind advertising his work.

forward elements, and on 2 January 1951 the detachment evacuated Seoul and moved to K-37 airstrip south of Taegu. In the autumn of 1950 the 3d Squadron had also begun to station SA-16 aircraft on strip alerts at Wonsan and Seoul. With the retreat of the United Nations forces, the strip-alert SA-16's stationed themselves at Taegu Airfield.⁷⁹

In the early months of 1951 the helicopter pilots of Detachment F, 3d Air Rescue Squadron, continued to render meritorious services. When elements of the U.S. 2d Division were

surrounded at Chipyeong-ni, six H-5's delivered blankets, blood plasma, and medical supplies and took out the most serious casualties, each helicopter making three trips on the afternoon of 15 February 1951. The next day four H-5's weathered a 40-knot wind and a blinding snowstorm to evacuate 22 soldiers from Chipyeong-ni, bringing the two-day total to 52 evacuees. During March 3d Squadron rescue pilots saved six out of seven 35th Fighter Group pilots who went down behind enemy lines. Up until this time the only helicopters used in Korea were the small H-5's, which could carry a pilot and a technician inside and two passengers in external litter capsules, but in March 1951 an Air Proving Ground team brought two test-model Sikorsky YH-19's to Korea. The day after their arrival one of the YH-19's helped the H-5's evacuate wounded and injured paratroopers from the Munsan-ni drop zone. In this effort, on 24 and 25 March, the helicopters flew 77 sorties to evacuate 148 paratroopers from under intense mortar and small-arms fire which damaged two of the helicopters. For work such as this the YH-19 excelled, for it could carry eight litter patients or ten passengers, plus a pilot and medical technician. At this time, however, Detachment F regarded the larger helicopter as a complement rather than a replacement for the smaller H-5. Most front-line evacuations or pilot pickups involved single individuals. When friendly pilots went down off Korea's coast, strip-alert SA-16's were dispatched to recover them. In a heroic demonstration after dusk on 11 June 1951 Lt. John J. Najarian landed his SA-16 in the shallow, debris-filled Taedong River, one mile south of Kyomipo, and picked up Captain Kenneth Stewart, who had bailed out of a flak-damaged Mustang

at twilight. Covering flights of Mustangs beat down flak coming from both banks of the river and switched on their landing lights to show Lieutenant Najarian low-hanging high-tension wires which he had to avoid. In spite of every possible obstacle Lieutenant Najarian saved the Mustang pilot.⁸⁰

As United Nations Command forces defeated the Communist armies in Korea in the late spring of 1951, the search and rescue mission in Korea began to change. The Eighth Army had fewer front-line casualties, and its new organic helicopters undertook a larger proportion of the front-line medical-air evacuation missions. At this same time, however, Communist flak was beginning to down more and more United Nations fliers over enemy territory. In recognition of the growing importance of aircrew rescue work, the 3d Air Rescue Squadron reorganized its old Detachment F on 22 June 1951 and redesignated it as Detachment 1, 3d Air Rescue Squadron. Personnel augmentations allowed Detachment 1 to open a full-scale Search and Rescue Coordination Center in the Fifth Air Force's Tactical Air Control Center at Seoul. From this central location the Korea rescue coordination center received requests for rescue action through the facilities of the tactical-control system and used these same communications to direct the rescue effort.⁸¹ Since the H-5 helicopters had a radius of action of only 85 miles, the Korea rescue detachment had always divided its planes and personnel into elements which were based where they were apt to be needed. In the summer of 1951 one element was located at the 8055th Mobile Army Surgical Hospital, a second element was placed near the U.S. 45th Division command post at the center of the battleline, a third element served the truce negotiators at



Rescue helicopter

Munsan-ni, and the remaining element stood strip-alert at Seoul Airfield (K-16), which was also the main base for Detachment 1. A search and rescue radio net connected the several rescue elements, and every ten days the elements rotated their H-5 crews and planes to Seoul for rest, inspections, maintenance, and repairs. The Grumman SA-16's, which rotated to Korea from Japan, were also based at Seoul Airfield.⁸²

During the months of heavy ground fighting marked by large close-support efforts, the lateral disposition of rescue elements along the front lines had been proper, but in the autumn of 1951 the Fifth Air Force began to attack rail-transportation targets in northwestern Korea. When the Sabres and fighter-bombers went into this sector of enemy territory, an SA-16 from Seoul customarily orbited north of Cho-do. If a fighter pilot ran into trouble, he called out a "Mayday" and, if possible, headed to the predetermined orbit-rescue point off Korea's western coast. When the pilot ditched, crash-landed,

or parachuted, his own flight gave him rescue combat air patrol until the SA-16 arrived. In order to augment the rescue potential, the Fifth Air Force in November 1951 required the 3d Rescue Squadron to keep three SA-16's in commission at Seoul at all times, and the 3d Squadron promptly required its Flights A, C, and D to provide one rotational amphibian apiece, which, in order to secure closer coordination, were now placed under the operational control of Detachment 1. In smooth seas and warm summer weather the amphibians had little difficulty landing to pick up surviving airmen, but with the coming of winter weather in 1951 matters took a new turn. The SA-16's could not normally chance landings if waves ran higher than five feet, and in freezing weather the amphibians could soon accumulate too much ice to take off. Even when protected by anti-exposure suits, moreover, the downed pilots could not long survive in the frigid water of the Yellow Sea. To speed the rescue work in December 1951, the Fifth Air Force asked Detachment 1 to move an H-5 helicopter element from Seoul to Cho-do. At this time the little island of Cho-do was not secure enough from the danger of enemy raids, and Detachment 1 accordingly based two H-5's on the island of Paengnyong-do, and each day that weather permitted the H-5's moved up to Cho-do for daytime alerts. Within a month Cho-do was firmly in friendly hands, and in January 1952 Detachment 1 stationed two H-5's there for a rescue alert.⁸³

Exploiting the opportunity permitted by the circumstance whereby the Red MIG's virtually refused to operate over water, Detachment 1, 3d Air Rescue Squadron operated a highly effective rescue effort off Korea's northwestern coast. Since many water rescues and

all land pickups were made by helicopters from Cho-do or Paengnyong-do, the closer a pilot got to either of these two points before he abandoned his plane, the better were his chances of survival. The slow and vulnerable helicopters were ordinarily able to go inland for some distance, but could not cross the belt of enemy defenses along the main west-coast supply routes. Beginning in February 1952, Detachment 1 received H-19 helicopters as replacements as the H-5 helicopters were wrecked or worn out. These larger helicopters proved more suitable for water rescue work, since they had a radius of 120 miles. Originally, the H-19's were outfitted with floats for water landings, but most H-19 pickups were made by means of a line dropped from the H-19's hydraulic-powered hoist. Two H-19's were finally stationed on Cho-do, and one H-19 handled rescue work from Paengnyong-do.⁸⁴ Although the rescue establishment grew strong in northwestern Korea, it remained unavoidably weak at the other end of the battleline and in southern Korea. Most airfields in South Korea were served by amphibious vehicles and crash boats, but these surface vessels often could not get to pilots who went down in the tidal swamps and offshore mud flats. Detachment 1 stationed an H-5 at Kunsan Airfield, but its limited resources would allow nothing more in the summer of 1952.⁸⁵

During the autumn of 1952 the Fifth Air Force managed to get a slim augmentation of its rear-area rescue facilities. Effective on a world-wide scale on 14 November 1952, all Air Rescue Service units were reorganized on a group-squadron basis, so that the 2d and 3d Air Rescue Groups replaced the similarly numbered squadrons. At this same time the regularly constituted



An H-19 rescue chopper over the Han River near Seoul.

Air Rescue flights became numbered squadrons, and, effective on 1 March 1953, Detachment 1, 3d Air Rescue Group, was redesignated as the 2157th Air Rescue Squadron. To help in southern Korea and at the eastern end of the battleline, the 2d Air Rescue Group in December 1952 provided two SA-16's, two H-19 helicopters, and a paramedic team, and these planes and people were organized at Pohang Airfield as Detachment 2, 3d Air Rescue Group. In March 1953 one H-19 moved from Pohang to Kangnung, giving additional rescue coverage of Korea's east coast. During December 1952 the Fifth Air Force also received a small windfall of helicopters when FEAF sent four H-19's of the Philip-

pine-based 581st Air Resupply and Communications Wing to Seoul. In March 1953 two SA-16's from the 581st also went to Seoul. These 581st Wing planes were supposed to fly covert missions, but they also helped with rescue work.⁸⁶

Rescue resources continued to be spread thin in Korea, but the 3d Air Rescue Group added distinguished service to its already outstanding Korean war record. During the floods of July 1952 helicopter crews saved 710 United Nations soldiers who were stranded in exposed forward positions by high waters. Enemy opposition and mechanical troubles continued to send friendly pilots to Cho-do and Paengnyong-do bail-out zones, where air-alert



Maj. Frederick C. Blesse

SA-16's and ground-alert H-19's picked them up. Using standardized rescue procedures, Detachment 1 and 2157th Squadron crews worked fast and effectively. In probably the fastest air-sea rescue on record, an H-19 from Cho-do hoisted a reconnaissance pilot from the water in fifteen seconds. In September 1952 an H-19 crew rescued a downed airman and two men from a naval helicopter which had crashed in an attempted rescue. The SA-16's commonly flew escort for the H-19's and other Grumman crews also made rescues. In September 1952 an SA-16 saved Major Frederick C. Blesse, then the leading Sabre ace, when he ran out of fuel over the Yellow Sea after combat in MIG Alley. Outstanding rescues continued in the spring of 1953. On 12 April an H-19 crew rescued Captain Joseph C. McConnell, Jr., when he parachuted into the Yellow Sea. Already an ace, McConnell would continue in combat and become the leading jet ace of the Korean war. In

three days, 16-18 May 1953, the H-19's made five aircrew pickups to save six lives. In the first four incidents the H-19's lifted fighter pilots from the Yellow Sea, and in the last episode an H-19 from Seoul penetrated far into enemy territory to save two survivors from a B-26 which had crashed north of Haeju.⁸⁷

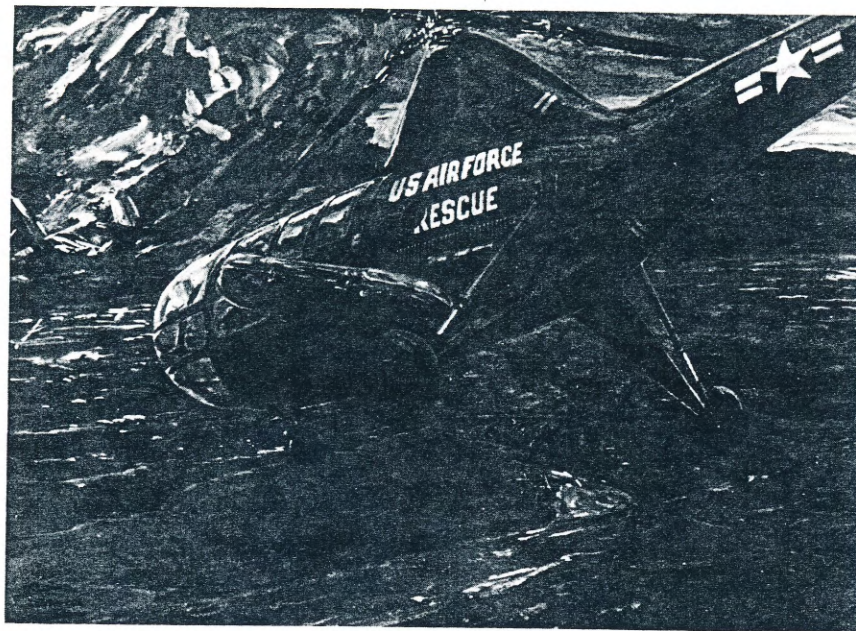
Operating rescue control centers at Misawa, Johnson, Komaki, and Ashiya air bases, and a flight-following service at Johnson Air Base, the 3d Air Rescue Squadron and Group afforded search and rescue services over Japan's land areas and sea frontiers. Equipped with a principal component of SA-16's early in the Korean war, Flight D at Ashiya (which became the 39th Squadron) was always active in the water areas off southern Korea. Using first SB-17's and then the newer SB-29's, Flight B (37th Squadron) at Komaki early provided offshore orbit patrols for B-29 strikes made by Bomber Command. The RB-45's of the 91st Strategic Reconnaissance Squadron were so unsafe for ditching that a Japan-based rescue plane held a station orbit over the Japan Sea each time these planes crossed to Korea. When the B-29's went to night operations they did not immediately require any route or orbit patrols by SB-29's, but in November 1952 hostile night fighters were stalking 98th Wing bombers and Bomber Command asked the 3d Air Rescue Group for help. Accordingly, the 37th Air Rescue Squadron began to send an SB-29 to trail the last B-29 in a bomber stream. Keeping continuous radio watch, the SB-29 followed the B-29's to their coast-in point in Korea and then orbited at a point where it could render assistance to distressed bomber crews when they coasted out of Korea.⁸⁸

Operating in an area remote from Korea, the 2d Air Rescue Squadron

and Group used only a part of its capabilities in support of the Korean war effort. Based at Kadena, however, Flights C and D (which became the 33d and 34th Air Rescue Squadrons) initially possessed short-range H-5's, OA-10's, and SB-17's, and had to limit their rescue work to their immediate vicinity. In March 1952 Flight D received its fourth SB-29, which brought it to authorized strength and permitted a new service to B-29 crews. Searching for lost B-29's was always time-consuming and often ended in failure. Flight D therefore proposed to fly precautionary escort and orbit for the B-29's as the bombers traveled to and from Korea. When the bomber crews liked the idea, Flight D began to provide the service on 8 May 1952 and it was continued throughout the war. Prior to the departure of the first B-29 from Kadena, an SB-29 took off and stood patrol out to sea. After all bombers were successfully airborne, the SB-29 accompanied the bombers to their coast-in point at Korea and then waited for their return. When the bombers came from their mission, the SB-29 shepherded them back to Kadena. These "guardian angels" were always handy if B-29's were crippled. They could alert other rescue facilities, and if the B-29 ditched at sea the SB-29 could light the ditching area with flares and drop its 30-foot A-3 lifeboat.⁸⁹ It so happened that the SB-29's of the 34th and 37th Squadrons fortunately did not get an opportunity to use their A-3 boats to assist downed B-29 crews, but the precautionary escort and orbit tactics greatly increased the morale and well-being of the Superfortress crews.

During the Korean war the USAF Air Rescue Service met and overcame many problems and demonstrated that aircrews would be rescued from behind enemy lines as a normal operation.

Contributing to the successful accomplishment of the air-rescue mission in Korea was the United Nations aerial superiority which allowed vulnerable rescue planes to operate without fear of enemy air attack, a centralized control and coordination of air-rescue capabilities in Korea within the Joint Operations Center and the Tactical Air Control Center, the employment of such new aircraft as the SA-16 amphibian and the H-19 helicopter, and the use of new emergency-survival equipment, including the little URC-4 emergency radio transceivers which were ultimately carried by all aircrews.⁹⁰ Taking advantage of these fortunate conditions, the Air Rescue Service crews ably accomplished their mission. During the Korean war 1,690 USAF airmen went down in enemy territory and many of these men doubtless did not survive their landings, but air-rescue crews saved 170, or 10 percent, of USAF airmen who were lost in action over enemy territory. The rescue crews also retrieved 84 airmen of other United Nations air services from areas held by the enemy. Counting both aircrewmembers and other personnel, the Air Rescue Service crews rescued 996 men from enemy territory. Within friendly lines, the rescue crews also picked up and evacuated 86 airmen to places of safety. As a secondary mission, the Air Rescue Service organizations in Korea performed emergency front-line medical air-evacuation tasks. In fulfillment of this secondary task, Air Rescue Service aircrews evacuated a total of 8,598 men, most of whom were front-line ground casualties.⁹¹ Without in any way reducing the luster of the Air Rescue Service achievement in Korea, it is appropriate to note that rescue crews were required to perform many tasks



Casualty Evacuation (Art by David S. Hall, Courtesy Air Force Art Collection)

which were not necessarily in context with their main mission of rescuing downed airmen. Foremost of these diversions was front-line medical air evacuation. The Air Rescue helicopter crews were often required to land or recover intelligence agents along the mud flats of Korea's northwestern coast, an undertaking which did not

contribute to the search and rescue mission. The test of combat nevertheless indicated that in the future—as new search and rescue equipment was produced and rescue units gained the ability to penetrate deeper into enemy territory—a larger search and rescue force would be required to support a tactical air force in combat.⁹²

4. Medical Air Evacuation Saved Countless Lives

In the theaters of operations of World War II United States armed forces had moved sick and wounded men by air to places of medical care and hospitalization. In this war, how-

ever, medical air evacuation had always been thought to be an emergency method of transporting the wounded, and it was used only when casualties could not be transported by normal

means of stretcher-bearers, field ambulances, hospital trains, and hospital ships. As a matter of policy, the Army sought to keep a casualty as far forward as possible in order to return him to combat as soon as possible. The echelons of the medical system and the normal surface means of transportation were keyed to keeping wounded men forward. When a man was wounded in combat he was transported to a battalion aid station by litter-bearers or by a litter jeep. From the battalion aid station he was evacuated by motor ambulance to a regimental collecting station and thence to a division clearing station, at which point he could either be dispatched to an evacuation hospital or routed to a mobile army surgical hospital which could provide emergency surgery and short periods of hospitalization. Either directly, or through the mobile army surgical hospital, the more seriously wounded patient, or the man who required special treatment, moved by motor ambulance or hospital train to an evacuation hospital, where he was hospitalized pending recovery or removal to a general or a convalescent hospital in the communications zone.⁹³

If aeromedical air evacuation had not been fully developed within the theaters of operations during World War II, the AAF Air Transport Command's work in moving casualties from the theaters to the United States had nevertheless won wide acceptance. In the years after the war the Military Air Transport Service had so expeditiously managed world-wide aeromedical

evacuation that in September 1949 the Secretary of Defense had made air the primary method for transoceanic movements of military patients.* Despite the recognition that aircraft provided the fastest and cheapest means of moving patients between theaters of operations and the United States, neither the Army nor the Air Force had given enough thought to the possible use of aeromedical evacuation of sick and wounded within theaters of operations. Exact service responsibilities and the procedures to be employed were not fixed. The Far East Command did not have a regulation governing medical air evacuation until 18 December 1951, and the directive issued at this late date did little more than confirm existing policies and practices which had been informally effected in the theater.⁹⁴ In the absence of established procedures and responsibilities, aeromedical evacuation gained acceptance through its demonstrations of utility, but the system employed was always far from perfect.

When American troops landed in Korea in July 1950, the Eighth Army implemented traditional systems for moving and hospitalizing its sick and wounded. As a matter of policy, the Eighth Army stated the rule that patients expected to return to duty within thirty days would be hospitalized in Korea. Men requiring specialized treatment or more than thirty days' hospitalization could be moved to general hospitals in Japan. Recognizing that the speed with which a front-line casualty received adequate medical

*At the outbreak of the Korean war, the Military Air Transport Service was providing aeromedical evacuation for about 350 patients a month who were moved from Tokyo to the United States. The first C-54 loaded with Korean war casualties left Haneda International Airport on 20 July 1950, and the Military Air Transport Service soon employed the routes, facilities, and planes that transported personnel and cargo to Japan to return casualties to the United States. Between 26 June 1950 and 31 July 1953 the Military Air Transport Service transported 43,196 Korean war casualties to the United States for further hospitalization or special medical treatment. *USAF Statistical Digest*, Fiscal Year 1953, p. 520.

care frequently determined his survival, and knowing of Korea's limited surface transportation, General Stratemeyer moved quickly to afford medical air evacuation to the Eighth Army troops in Korea. At the war's beginning Flight 3, 801st Medical Air Evacuation Squadron, was attached to the 374th Troop Carrier Wing at Tachikawa, and on 4 July 1950 General Stratemeyer informed General MacArthur that FEAF was prepared to accomplish air evacuation of casualties from Korea.⁹⁵ During July and August 1950, however, the Eighth Army made only a token use of medical air evacuation. Up to 15 September 13,105 patients were evacuated from Korea, of whom only 3,855 (29.6 percent) were evacuated by air, although it was estimated that as many as 36,000 could have been accommodated in empty cargo planes. Because of the rough roads between Taegu City and Taegu Airfield, the Eighth Army preferred to move its casualties southward by train to the evacuation hospital in Pusan. Most of the patients evacuated from Pusan to Japan were moved by ship. Some patients were taken to Pusan East Airfield (K-9) for air evacuation, but the airfield had no medical holding facilities, and patients often had to wait for excessive lengths of time before someone arranged for air transportation. The Eighth Army could not afford to count on a "catch as catch can" system of air evacuation and accordingly used more reliable and orderly surface transportation.⁹⁶

While the Eighth Army was initially lukewarm toward the evacuation of its casualties by Air Force transports, the Eighth Army's surgeon eagerly exploited the 3d Air Rescue Squadron's helicopter detachment for the evacuation of front-line casualties to mobile army surgical hospitals. As has been seen, General Stratemeyer asked

USAF on 14 August 1950 to organize and dispatch to him an "evacuation and utility squadron" with 25 H-5 helicopters and the trained medical personnel required to handle front-line evacuation work. Later on USAF would perceive that such a function as this was a logical and desirable extension of its assault troop-carrier effort, but in August 1950 some USAF officers in Washington observed that their planning for aeromedical evacuation "has not included the U.S. Army function of evacuation from front-line battle stations" and hesitated to set a precedent. The USAF Surgeon General nevertheless urged that Stratemeyer's request should be met, and USAF on 21 August agreed to send FEAF 14 H-5's and to raise the 3d Air Rescue Squadron's allocation to 23 helicopters. USAF ruled at this time that the Air Rescue Service must have first claim on all helicopters, and it refused to allow Stratemeyer to form a special evacuation squadron.⁹⁷ Following receipt of the Eighth Army's request for organic helicopters, which was passed through General MacArthur on 20 August, the Department of Army authorized organic helicopters to many of its units and organized helicopter ambulance detachments.⁹⁸ The Eighth Army would not begin to receive its organic helicopters in any numbers until January 1951, but a tacit decision had been made which would be of long-lasting significance. The Army would handle aeromedical evacuation forward of its mobile army surgical hospitals, while Air Force transports would provide medical air evacuation rearward of the initial points of medical treatment in the combat zone.

With the establishment of the FEAF Combat Cargo Command on 26 August 1950, General Tunner directed his staff to take a look at aeromedical evacua-

tion. Up until this time in Korea aeromedical evacuation was judged to have had "a rather spotty history." Although one flight of the 801st Medical Air Evacuation Squadron was attached to the 374th Wing, the Headquarters, 801st Squadron and two flights were in the Philippines, where their personnel authorizations augmented the staff of the Clark Air Force Base hospital. Making a trip to Korea on 9 September, Colonel Clyde L. Brothers, FEAF's surgeon, Colonel F. C. Kelly, the Fifth Air Force's surgeon, and Major George Hewitt, Cargo Command's assistant director of traffic, discovered that the Eighth Army wanted aeromedical evacuation but only if it could be placed on an orderly basis. Cargo Command soon effected the procedures which would give the Eighth Army the service it wanted. Wherever possible, Cargo Command preferred to develop aeromedical evacuation as a concomitant to the delivery of personnel and cargo to Korea and, after off-loading in Korea, C-54, C-47, and C-46 aircraft picked up casualties for delivery to hospitals farther south in Korea or in Japan. The command preferred to use C-54's and C-47's for the work and could employ C-46's, but the noise and drafts in the cargo hatches of the C-119's prevented use of the Boxcars for medical air evacuation. Cargo Command also decided not to commit any special transport crews to air evacuation, but to brief all the crews of suitable transports on standard evacuation procedures. Since additional medical personnel would be required for the expanded system, FEAF directed the movement of the 801st Squadron and its two flights from Clark to Japan effective on 14 September, and the squadron was filled with locally available personnel and new flight nurses

from the United States. As developed in the FEAF Combat Cargo Command, air evacuation was the responsibility of Lt. Col. Allen D. Smith, who served as Cargo Command surgeon and commanded the 801st Squadron. Each day at noon Army medical evacuation officers in Korea and Japan informed the Combat Cargo Command surgeon's office of the number of patients to be moved from one place to another at a particular time on the following day, and the surgeon's office submitted consolidated requests to the Transport Movement Control for the scheduling of the necessary airlift. Whenever possible, Cargo Command added apparatus, nurses, and medical technicians of the 801st Squadron to planes which delivered their cargo in Korea and then picked up aeromedical evacuation patients. When necessary, however, special aeromedical flights were always set up to take care of the Eighth Army's requests for aeromedical airlift.⁹⁹

During September and October 1950 the FEAF Combat Cargo Command exploited centralized control, plus continuous field liaison, to make aeromedical evacuation the standard method of transporting sick and wounded personnel in the Far East. Early in September the Eighth Army continued to deliver most patients to Pusan by train. From the hospital in Pusan, patients requiring hospitalization in Japan were moved to Pusan Airfield (K-9) where they were loaded aboard waiting planes and moved either to Itazuke or directly to Tokyo. Some patients were flown to Itazuke direct from Taegu and Pusan.¹⁰⁰ Later in September, when Kimpo Airfield was secured, Cargo Command instituted an immediate evacuation plan in support of the U.S. X Corps, using a minimum of three C-54 flights spaced periodically

throughout the day to lift patients. This lift was supplemented as requirements dictated. Following the capture of the airfield at Wonsan, Cargo Command evacuated casualties directly to Itami Air Base, near Osaka in Japan. On 17 October, when the airstrip at Sinmak was opened, C-54's removed patients to Kimpo, where they were turned over to the 8055th Mobile Army Surgical Hospital. On 21 October Cargo Command began to evacuate patients from Pyongyang, and on 29 October C-47's began to lift wounded men from Sinanju Airfield to Kimpo. The air-evacuation program had its troubled moments. Some aircraft reported with insufficient numbers of litters or without heating arrangements. Loading patients required extra time and tended to hold up the dispatch of planes out of Kimpo and Pyongyang, and the traffic-

control officers at these fields were reluctant to release planes for air evacuation until late in the day. But the aeromedical evacuation problem was generally well managed during the United Nations attack into North Korea. During October 1950 2,840 patients were moved by airlift within Korea, 3,025 were evacuated from Korea to Japan, and 2,590 were moved within Japan. From the outbreak of the Korean hostilities to 31 October 1950 a total of 24,496 patients was moved by airlift.¹⁰¹

Aeromedical evacuation achieved new dimensions in November 1950, for the Chinese Communist attack combined with frigid weather to take a heavy toll of United Nations soldiers. Early in December Kyushu Gypsy C-47's shuttled some 4,689 wounded or frost-bitten soldiers and Marines



Flight nurses take time out to warm their toes during evacuation activities, December 1950.

from the Communist-besieged airstrips at Hagaru-ri and Koto-ri. The 21st Squadron C-47's delivered their casualties to the airfield at Yonpo, whence Marine R5D's carried Marine casualties to Itami while Air Force C-54's lifted wounded Army soldiers to Fukuoka. Because of the dangers up front, 801st medical technicians cared for patients aboard the C-47's, but 801st flight nurses staffed the planes for the aeromedical lifts to Japan. In western Korea Combat Cargo nurses and technicians cared for patients lifted to the very last from the airfields given up to the Reds as the Eighth Army retreated from Sinanju, then Pyongyang, and finally from Seoul and Suwon. Early in December the Eighth Army feared that the Communists might overrun all of Korea and decided to empty its combat-zone hospitals. On 5 December Cargo Command accordingly used 131 flights for aeromedical work and lifted 3,925 patients, thus accomplishing the Korean war's largest day of aeromedical airlift. Continuing the procedures worked out by the FEAF Combat Cargo Command, the 315th Air Division (Combat Cargo) took air-evacuation emergencies in stride. In January 1951, as the ground fighting centered around Wonju, only the C-47's could lift patients from the short combat strips there and at nearby Chungju. At 0945 hours on 13 February the Eighth Army reported that 600 patients at Wonju required evacuation, and before midnight C-47's diverted from tactical missions lifted 818 patients from the forward hospitals, including 401 from Wonju. The report of the number of patients at Wonju had been somewhat exaggerated, and Eighth Army operations formally objected to the diversion of the C-47 aircraft from tactical airlift to medical evacuation. The Far East Command,

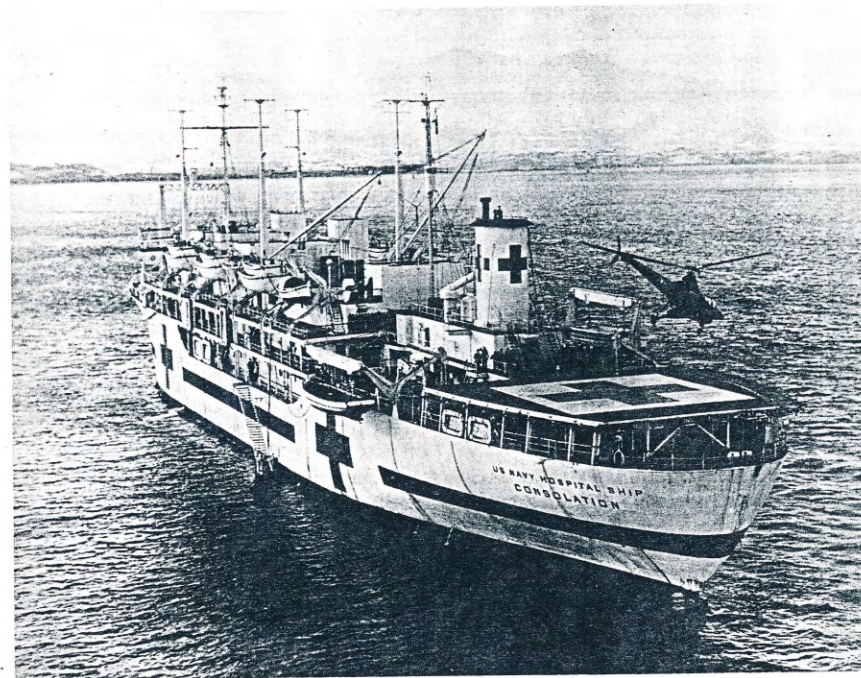
however, ruled that the diversion was justified. Two days later the hospitals at Pusan were overloaded with casualties, and the 315th moved 1,325 patients for another one of its busiest air-evacuation days. When the fighting shifted toward the Seoul area, C-54's were able to lift casualties first from Suwon and then from Kimpo and Seoul Airfields. With the completion of a better airfield at Hoengsong later in the spring, the C-54's could also lift eastern-front casualties directly to hospitals in Taegu and Pusan.¹⁰²

During the autumn of 1950 and the spring of 1951 3d Air Rescue Squadron helicopter crews had continued to perform most front-line medical air-evacuation work. The helicopter elements which performed this work were usually based at a mobile army surgical hospital, and they were dispatched to the front lines by the surgeon-in-charge of the hospitals. Because of a shortage of the H-5's, the helicopters had to be used conservatively, but when a soldier received a head wound, a sucking chest wound, or a stomach wound, the speed with which he received medical treatment determined whether he would live or die. With helicopter evacuation, men wounded at the front were often in surgery within an hour. As of 20 February 1951, Air Rescue Service helicopters had evacuated 750 critically wounded soldiers, and the Eighth Army surgeon said that fully half of these men would have died if they had been moved by surface transport.¹⁰³ General Stratemyer had nothing but praise for the work of the Air Rescue helicopter pilots, but he still insisted that air evacuation ought to be divorced from air rescue. When General Vandenberg was in Tokyo on 16 January 1951, General Stratemyer gave him a requirement for 31 helicop-

ters, most of them to be used to form a provisional evacuation squadron. Back in Washington USAF was unwilling to strip the Air Rescue Service of any more H-5's and new H-19's and H-21's would not be available from production until early 1952.¹⁰⁴ On 11 March 1951 General Stratmeyer nevertheless asked Vandenberg to provide the Fifth Air Force with a liaison squadron and to authorize it 12 H-5's and 12 L-5's. The squadron would handle air-evacuation missions. On 14 July USAF authorized the Fifth Air Force to activate a liaison squadron with 12 L-5 liaison aircraft, but it reminded FEAF that the Air Rescue Service would have first claims on all helicopters received from production.¹⁰⁵ For a third time, on 24 July 1951, FEAF insisted that it required a squadron of H-19 helicopters which it would assign to the 315th Air Division for front-line medical air-evacuation work. This time USAF bluntly stated that no liaison or helicopter units were available or even programmed for deployment to FEAF.¹⁰⁶ Effective on 25 July 1951, the Fifth Air Force activated the 10th Liaison Squadron at Seoul Airfield (K-16), but without helicopters this squadron was generally limited to courier and light-transport services performed for the Air Force and could not effectively perform air-evacuation missions for the Eighth Army.¹⁰⁷ Although the Air Rescue Service helicopters were going to continue to evacuate some front-line casualties, the Army and Air Force agreements concerning Army aviation reached on 2 October 1951 and 4 November 1952 made the Army responsible for "battlefield pickup of casualties, their air transport to initial point of treatment, and any subsequent move to hospital facilities within the combat zone."¹⁰⁸

Eighth Army casualties declined after

July 1951 when the beginning of the truce talks marked a lull in ground fighting, but the 315th Air Division still continued to airlift from three to six thousand sick and wounded soldiers each month. Taking advantage of the reduced emergency, the 315th worked to effect more regular aeromedical procedures than had been possible in the days of active ground fighting. Since most C-46 aircraft still lacked litter straps and sanitary facilities, the 315th decided not to use them any longer for aeromedical evacuation. Only C-47's, which could handle 26 patients, or C-54's, which could accommodate 36 patients, were to be used for aeromedical lift. Whenever possible, the C-54's would handle the patient lift, but if front-line airfields were too small for the four-engine planes, the C-47's would shuttle patients to Korean hospitals.¹⁰⁹ Long before then, medical air evacuation had fairly well put Navy hospital ships out of business, but in December 1951 and January 1952 the Far East Command sought to learn whether the hospital ships could serve as floating mobile surgical hospitals. To test the proposition, Marine ground casualties sustained in the Inje area of eastern Korea were brought to a forward airstrip at Pupyong-ni by Marine helicopters. At Pupyong-ni C-47's picked up the wounded Marines and flew them over some of Korea's highest mountains to a seaside airstrip at Sokcho-ri. From this strip two 3d Rescue helicopters shuttled the casualties to the hospital ship *Consolation*, anchored about two miles off shore. After surgical care aboard ship, patients were helicoptered back to Sokcho-ri, where C-54's picked them up and flew them to Tokyo hospitals. Before the termination of the experiment on 24 January 1952, 315 patients were treated on the *Consolation*. The



The USS *Consolation* (Courtesy U.S. Navy)

procedure worked fairly well, but all concerned agreed that it was inadvisable to move wounded men so many times.¹¹⁰

The conversion of the 315th Air Division's wings to more modern aircraft in the autumn of 1952 had an effect upon medical air evacuation, for the 315th was giving up four squadrons of C-54's, the planes most favored for aeromedical work. This change brought problems which demanded the especial attention of Lt. Col. Jesse K. Grace, who took over as 315th surgeon and 801st Squadron commander on 19 January 1952. The huge Globemaster C-124's that the 315th received in exchange for its C-54's proved to have certain advantages and disadvantages

for lifting medical patients. As a practicable maximum, each C-124 could accommodate 127 litter patients or 200 ambulatory patients, and the loading of such numbers on a single C-124 took less time than to load equivalent numbers on several planes. The C-124 also required fewer flight nurses and medical technicians, proportionate to the patient load it carried. Under the situation in Korea, however, the Globemasters had aeromedical disadvantages. In a test mission in 1951, a C-124 lifted a record load of 167 patients from Pusan to Itami, but in the routine airlift evacuations in 1952 and 1953 the C-124's never carried this many patients again, chiefly because they could never secure so many

casualties at one time. The Fifth Air Force, moreover, would not allow the C-124's to land at Pusan East Airfield, where the 315th Air Division had always loaded patients being evacuated from the hospitals in Pusan City.¹¹¹ The 315th Air Division had anticipated these problems, and it had equipped its C-46's for air evacuation. Beginning in September 1952, the C-46's carried maximum loads of 26 patients in the intra-Korea, Korea to Japan, and intra-Japan aeromedical airlift. The C-54 aircraft retained by the 21st Troop Carrier Squadron also provided aeromedical lift from Korea to central Japan.¹¹²

At any time during the Korean hostilities the 315th Air Division was able to provide far more aeromedical lift than the Eighth Army required, but the small size of the 801st Medical Air Evacuation Squadron continued to be a limiting factor in the care and handling of airlifted patients. Within the means permitted to it by austerity in the medical services, USAF provided the 801st with flight nurses and enlisted technicians in excess of the squadron's authorized strength, but in the critical days of 1950 and 1951 the nurses and technicians often flew as many as three round trips a day and literally worked themselves to exhaustion. On maximum aeromedical evacuation days, moreover, the 801st simply did not have enough nurses and technicians to accompany all aircraft, and the aircrews cared for the sick and wounded men they carried. In addition to the in-flight medical care it provided, the 801st always kept a medical service corps officer or a senior noncommissioned officer in charge of the "operating location" at each airfield where patients embarked or debarked. These officers served as liaison with local medical units and supervised the

loading and unloading of patients.¹¹³ The 801st Squadron recognized that it should also have been able to man and operate casualty staging and holding facilities where patients could await airlift.¹¹⁴ This informal assumption of what should have been a definitely established responsibility did not work too well. In the spring of 1951 the usual holding facility in Korea was a row of sagging tents in a sea of mud, and patients often complained of shortages of food and blankets. In many instances the holding detachments did not have patients ready when planes came, and sometimes they canceled airlift requests after flights were dispatched. Either occurrence wasted the time and effort of flight nurses and medical technicians.¹¹⁵

Based upon combat reports from Korea and upon maneuver experience in the United States, the USAF Surgeon General on 26 May 1952 completed a table of organization for an aeromedical group which was more capable of performing theater functions than was the old aeromedical evacuation squadron. Among other features, the group's table of organization included cellular casualty staging flights which could be manned, as needed, to serve staging and holding activities.¹¹⁶ For more than a year the USAF medical service could not obtain the trained personnel it needed to activate overseas aeromedical evacuation groups, but in the spring of 1953 USAF was finally able to authorize FEAF to replace the 801st Squadron with the 6481st Medical Air Evacuation Group, effective on 18 June. In deference to the unusual aspects of the aeromedical problem in the Far East, the 6481st was organized as a table of distribution organization which absorbed the functions, personnel, and equipment of the 801st Squadron and was authorized

the additional strength and equipment it needed to take over the processing, temporary care, and staging of military casualties for air movements.¹¹⁷ At this time, however, the Army Forces Far East was reluctant to release control of the aeromedical staging facilities and presented arguments in favor of maintaining the *status quo*. Pending a resolution of the problem by the U.S. Department of Defense, the Army medical service continued to operate the aeromedical staging facilities in the Far East. After the end of the Korean war, on 8 December 1953, an Army-Air Force agreement finally recognized that the Air Force was responsible for providing the aeromedical evacuation system for both Army and Air Force.¹¹⁸

During the three years of the Korean hostilities the 315th Air Division and its predecessors (including the 374th Wing) provided aeromedical evacuation for 311,673 sick and wounded patients, a total which exceeded the number of troop casualties, since it often included multiple movements of the same patients within Korea, between Korea and Japan, and within Japan.¹¹⁹ The story of aeromedical evacuation established certain facts without doubt. Aeromedical evacuation proved so dependable that hospital ships could be used as floating hospitals rather than for transporting patients. Air evacuation was safe. Only six patients were lost in a single fatal accident, this on 22 December 1952 when the pilot of a Royal Hellenic Air Force C-47 evidently mistook instructions and collided with a jet fighter-bomber at Suwon Airfield.¹²⁰ Air evacuation was humanitarian. Knowing that an airplane would carry them speedily and comfortably to a well-equipped hospital, patients usually assumed a "worst is over" outlook, which lifted their spirits at the very time they needed to take

heart. The same speed brought patients to medical centers where specialists had access to the best possible equipment. Air travel caused far less trauma than travel over rough roads or jolting railways. Other factors contributed—such as blood therapy and antibiotic drugs—but aeromedical evacuation also had a large part in reducing the Korean war's death rate of the wounded to one-half the rate in World War II and to one-quarter the rate in World War I. Air evacuation was also economical. Patients generally occupied backload space on transport planes which otherwise would not have been utilized. The system was also economical of scarce medical-service personnel. Working with a centrally controlled air fleet, a single medical air-evacuation squadron accomplished far more than had been customary for several evacuation squadrons working under decentralized controls in World War II.¹²¹

In Korea medical air evacuation had made tremendous strides, but many Air Force officers doubted that this phase of air activity had yet attained its maximum effectiveness. In Korea, for example, air evacuation had been fitted into the traditional Letterman organization of Army medical services—a system which had been designed in terms of walking litter-bearers, horse-drawn ambulances, and surface transport. The Army system, moreover, required the evacuation of casualties through successive hospitals in order to keep a wounded soldier as close to the front as possible. Understanding the capabilities of air transport to move the wounded and to return the recuperated to duty rapidly, Air Force medical officers doubted the validity of the Army's philosophy of medical evacuation. "The farther and faster the wounded are removed from the combat area," stated Colonel Allen D. Smith,

"the better, more efficient, and more economical will be the medical care." The advantages which might be attained by relating medical operations to air-transport capabilities were well revealed during August 1951 in a zone of interior maneuver called "Southern Pine." Employing an integrated system of aeromedical evacuation and using two helicopters for front-line pickups and a transport aircraft for evacuation to rear-area hospitals, the 1st Aeromedical Group worked so successfully that the 43d Infantry Division's surgeon was able to suspend all but the most forward echelon of ground medical activity, thus idling 600 persons and 100 vehicles of the Army medical service. In this maneuver all simulated combat

casualties were sufficiently screened in advanced areas as to prevent "over evacuation," but all legitimate casualties were immediately removed from the combat area to communications zone hospitals. This procedure lessened medical manpower and logistical burdens up front, relieved patients of the stress of the battle area and got them more adequate medical care, and freed ground combat troops of responsibilities of caring for casualties. No such integrated medical evacuation system was employed in the Far East during the Korean war, and for this reason aeromedical evacuation doubtless did not make its maximum contribution to the United Nations Command war effort.¹²²

5. Air Weather and Airways Communications Services

In recognition of the global air-transport responsibilities assigned at its creation in 1948, the Military Air Transport Service was charged to provide an Air Weather Service and an Airways and Air Communications Service (AACS) which would girdle the globe. At the outset of the Korean war Air Weather Service and Airways and Air Communications Service units were under FEAF's control for the performance of their assigned functions in the Far East. As the war progressed, both functions were increasingly vital to the accomplishment of the United Nations Command's mission.

When the war began in June 1950, the 2143d Air Weather Wing was responsible for weather services in the Pacific theaters of operations. From his headquarters in Tokyo Colonel Thomas

S. Moorman, Jr., commander of the 2143d Wing, commanded three ground weather squadrons—the 20th Weather Squadron in Japan, the 15th Weather Squadron serving the Philippines, Okinawa, and Guam, and the 31st Weather Squadron in Hawaii and the Marshall Islands. He also commanded two weather reconnaissance squadrons—the 512th at Yokota in Japan and the 514th on Guam. In addition to the meteorological reports obtained by its own units, the 2143d Wing received weather data from stations of the Japanese national weather service and from the Ryukyuan weather service. The wing also monitored the international meteorological broadcasts emanating from Russian weather stations, which would continue during the Korean war. The wing

received no weather reports from Communist China, for even before the beginning of the war the Red Chinese government had ceased to share its weather with the remainder of the world.¹²³

In the years since 1945 the United States armed forces had striven to develop all-weather capabilities, but air, ground, and naval forces were still vulnerable to the influence of the natural elements. As the North Koreans used weather to cover their treacherous attack, the 2143d Air Weather Wing galvanized into action. The 512th Reconnaissance Squadron Weather, flew its first "Buzzard Special" WB-29 weather-reconnaissance mission over Korea on 26 June 1950, and within the next few days the weather crews of this squadron not only provided in-flight meteorological readings but they also flew zigzag courses over Korea and reported tactical observations to the 8th Fighter-Bomber Wing at Itazuke. On 27 June the 20th Weather Squadron airlifted its first station weather detachment with portable weather equipment to the airfield at Taegu. After this weather detachments were among the first organizations to move into new Korean airfields and among the last to move out. Because of the demands in Korea, the 20th Squadron expanded the number of its regular detachments from 13 at the war's start to 32 in November 1950. On 14 November 1950 a special two-man weather-observation team began operations at Sinanju. The reports of this two-man team were so valuable that the Eighth Army agreed to attach one of them to each of its corps headquarters. Similar teams were also established at small Korean airfields, where traffic was too light to justify a weather detachment, and at isolated locations including the islands of Cheju-do and Sochong-do and later

Paengnyong-do, Cho-do, and Yo-do. By the end of September 1950 the 512th Squadron was flying two weather reconnaissance missions over Korea each day: "Buzzard King" over North Korea and the Yellow Sea and either "Buzzard Dog" or "Buzzard Easy" over adjacent areas. In an effort further to expand its weather collections on 28 July 1950, the 2143d Wing had inaugurated a program whereby a weather forecaster was placed aboard combat aircraft to observe weather in areas from which such data were not otherwise available. Beginning in October 1950, moreover, two F-82's of the 68th Fighter-All Weather Squadron flew pre-dawn weather-reconnaissance missions over North Korea.¹²⁴

Although the 2143d Air Weather Wing expanded to accomplish the added tasks posed by the war in Korea, the improvised weather structure in the Far East ultimately required a more permanent organization. Since the general organizational concept of the Air Weather Service was to align its units with major commands wherever possible, the 2143d Wing activated the 30th Weather Squadron effective on 16 November 1950 and charged it to provide specialized services for the Fifth Air Force and to control the weather detachments in Korea. Months earlier the 2143d Wing had pleaded the need for a tactical weather-reconnaissance unit, and on 25 December 1950 the Fifth Air Force organized the 6166th Air Weather Reconnaissance Flight, which was first attached to the 543d Tactical Support Group and finally to the 67th Tactical Reconnaissance Wing. Authorized six WB-26's, the flight commenced operations on the night of 7 February 1951 and thereafter commonly flew several prebriefed routes over North Korea and such other special coverage as the Joint