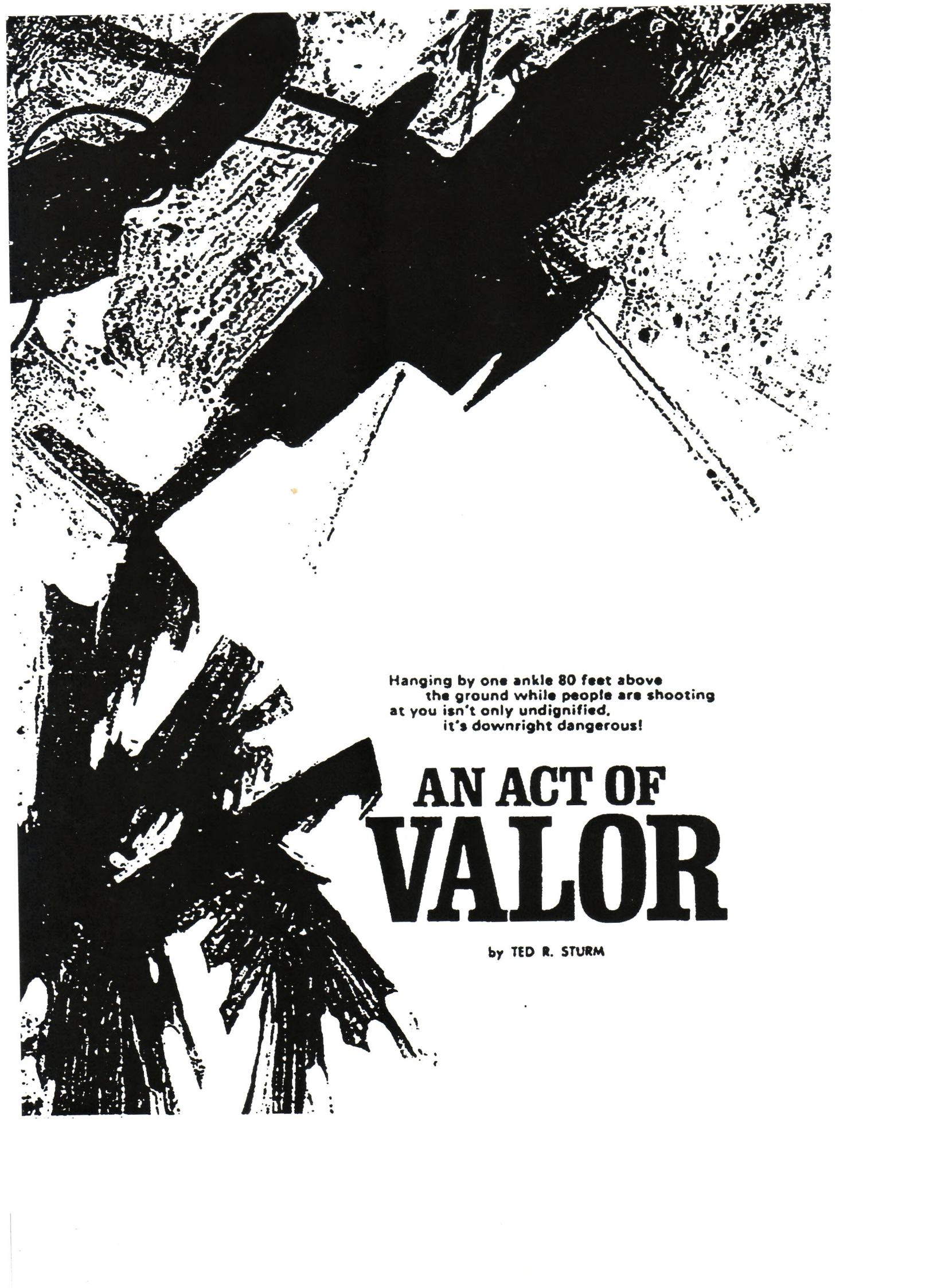




Hanging by one ankle 80 feet above
the ground while people are shooting
at you isn't only undignified,
it's downright dangerous!

AN ACT OF VALOR

by TED R. STURM

Newman wasted no time
in getting to where
the action is.

Through a growing darkness heightened by the dense forest, Sgt. Thomas A. Newman saw the outline of a man.

Flashes from a gun muzzle first attracted his attention, and as he inched his M-16 forward, it occurred to him to hold his fire. It was possible the shadowy figure was the injured F-105 pilot.

On the other hand, it could very well be an enemy soldier. They were all around, constantly announcing their presence by small arms fire. But even if it were the pilot, Newman wasn't sure how to reach him. More likely than not, the man was nervous, and would shoot at anything that moved.

The sergeant watched for another moment and then, even though he might give his position away to the enemy, he decided to shout. Immediately he heard a reply from the figure ahead.

"Over here!" the man answered.

"Sounds American," Newman muttered to himself. "Still, you can't tell. Almost everybody speaks a little English." There was only one way to find out.

Still on his stomach, Sergeant Newman inched forward. It was the pilot, all right, still in his life preserver, G-suit and survival gear. His arm was broken, as Newman had heard earlier. In a matter of minutes, the sergeant cut him free of his gear, and administered first aid.

Both he and the pilot, Col. Norman P. Phillips, could hear people moving through the brush, closing in on their position. Obviously, they had to get out of there in a hurry. But it was not to be an easy, routine rescue this time. Old Dame Fortune was feeling mischievous and had a few more surprises cooked up for this *Thunderchief* pilot and the pararescueman who had come to save him.

But some days are like that. Some days you *never* forget. And the fact that this was Memorial Day—May 30, 1968—only served as an additional reminder that sometimes the difference between a memory and a memorial can be a fraction of an inch, a single strand, or a split second.

Some men wonder, when they find themselves in a very tough spot, how they came to be there. Newman didn't wonder. He knew. When he joined the Air Force in 1965, he wasted no time in getting to where the action is. While he was still in basic, he volunteered for pararescue duty. About a year later, after seven tough, grueling schools that transformed the former high school student into a rescue expert, he was shipped to Guam. That was his first step toward the jungle he now shared with Colonel Phillips and an unknown number of enemy troops.

Newman was a busy man during the 19 months he spent on Guam. Before he left, he managed to help save a civilian seaman suffering from acute insulin shock; assisted a Navy corpsman in saving a chief petty officer who suffered a heart attack aboard a submarine; was credited with saving the lives of two Japanese fishermen who suffered severe burns in an engine room fire on board the fishing vessel *Shoichi Maru*, and aided in the treatment and evacuation of four more. In each of these cases, the indomitable sergeant had to parachute into the open sea.

Sergeant Newman was accepted for duty in Southeast Asia and departed for Eglin AFB, Fla., in December 1967. There he took pararescue specialist training in the HH-3E helicopter. After PACAF Jungle Survival School at Clark AB in the Philippines, he arrived at Nakhon Phanom RTAFB, Thailand, in March 1968.

That's the kind of a man in whose hands Colonel Phillips' life now lay. And although all pararescue men are the kind of people you trust in any

situation, Newman had a deep inner strength that he would be forced to draw on before the day ended.

In fact, even before he got on the ground to find the downed pilot, the situation got a little sticky. Newman and his "Jolly Green" crew had been scrambled to recover Phillips after his F-105 had been clobbered by 37mm antiaircraft fire west of Khe Sanh. He had bailed out and, because of the broken arm and a dislocated shoulder, was unable to get himself on the forest penetrator hoist that was to be lowered to him.

So Newman volunteered to ride the hoist down through two layers of jungle treetops and help strap the pilot on. Phillips was down in an area dotted with antiaircraft weapons and numerous enemy units armed with small arms and handheld automatic weapons. Not only that, but the poor visibility brought on by approaching darkness made it impossible for Newman to evaluate the area. He was unable to predetermine his escape routes should he and the pilot be forced to get to an alternate pickup area on foot.

As fighter escort aircraft strafed and bombed the area, Newman's chopper moved in. It was then the radio crackled with another bit of bad news. Because of his broken arm, the pilot was not able to ignite a smoke flare. Finding him would be tough.

Nevertheless, Newman secured himself to the penetrator, and as the helicopter hovered over the downed airman's suspected position, the pararescuer was lowered to the ground. He immediately established radio contact with the hovering Jolly Green, but could not contact Colonel Phillips.

There was only one way to find the pilot in the darkness and the dense foliage—hunt for him! Newman began to work his way in a constantly expanding circle. He had just completed the first circuit when he noticed that his hovering Jolly Green was catching a lot of automatic weapons fire from a ridge above him.

This situation brought three immediate problems into focus. First, the noise from the helicopter prevented Newman from hearing the enemy or the downed pilot. Second, he feared for the safety of the helicopter crew, and third, the hovering bird would soon draw the enemy forces to his position. Sergeant Newman asked the helicopter to leave. As it moved out, it was subject again to a barrage of heavy automatic weapons fire.

It was only a matter of seconds after the helicopter left that Newman saw the muzzle flash and the shadowy figure that turned out to be Colonel Phillips.

Now, as the colonel and the sergeant huddled in the foliage, they decided the enemy was too close to risk a pickup.

Getting his helicopter crew on the radio, Newman advised them to stand off. He also told them he would be shutting off his radio for a few minutes to evaluate the situation before he called them back in. There was still the danger of their being shot down by ground fire.

For nearly 20 minutes he and the pilot remained motionless, listening and watching for sounds of the enemy. Neither man moved nor made a sound, preventing the enemy from pinpointing their position. Soon the noise of movement in the undergrowth died away.

Now the sergeant called the helicopter in for the pickup. Again, as the chopper moved over their position, it received ground fire. Still they lowered the jungle penetrator. As Newman turned to help Colonel Phillips get on the hoist, he lost sight of the penetrator in the darkness. The numerous vines hanging from the trees all looked like the cable, and Newman had to search more by feel than sight. Finally, he found it, but realized the heli-

... He was hanging upside down 70 to 80 feet above the ground.

copter crew had dropped too much cable. Because of the excess on the ground, Newman could not follow it to the penetrator seat itself.

He asked the helicopter to take up the slack.

That's when it happened! One of those incidents occurred that can never be anticipated. Apparently Newman's statement was misinterpreted, and before he realized he was standing in the midst of the snarled hoist line, the cable was reeled in. It looped his ankle, jerking him skyward, upside down.

The violence of the jolt tore his radio and weapon from his hands. As he rose higher and higher he became entangled in the trees and his leg and ankle were wrenched brutally as he was pulled through the branches by sheer force. Then he went through the second tree canopy, buffeted and banged by the branches, lashed by the vines. Below, he could see the enemy's muzzle flashes, not more than 75 yards from him and the helicopter.

Fortunately, his radio was tied to his vest and he pulled it to him. Incredibly calm, he informed the helicopter crew of his predicament and asked them to lower him. At this point he was hanging upside down 70 to 80 feet above the ground and within 20 feet of the helicopter. Dimly, he could see the penetrator dangling some 30 feet below.

Most of the return trip was far less violent and much more comforting! Using his hands, he was able to avoid entanglement with vines and branches. But as he dropped through the trees the cable loosened around his ankle and he fell the last 20 feet to the ground.

Breaking the impact with his hands, Newman sprained his left wrist. By then, however, the colonel had reached the penetrator. Newman secured him to the seat, strapped himself on and told the chopper to reel away. Again on the trip up, increasingly accurate ground fire gave them a wild ride, but, amazingly, neither man was hit.

As they flew home, Sergeant Newman took care of the pilot's wounds, splinted his broken arm and checked his dislocated shoulder. He then treated him for shock, making him as comfortable as possible.

It had been a day to remember all right. Sergeant Newman and Colonel Phillips would never forget it. Neither would the United States Air Force.

Weeks later, Sergeant Newman became the third living enlisted man to be awarded the Air Force Cross. As Gen. Howell M. Estes, Jr., former commander of the Military Airlift Command, pinned the nation's second highest award on Sergeant Newman's chest, the words of the citation captured a little of the spirit of Newman's Memorial Day.

"Through his extraordinary heroism, superb airmanship, and aggressiveness, Sergeant Newman reflected the highest credit upon himself and the United States Air Force," the citation read.

But the Air Force was not finished rewarding this intrepid airman. Some 20 months after he rescued Colonel Phillips, Thomas A. Newman stood in the office of the Chief of Staff of the Air Force and became the 12th enlisted man in history to receive or share in the receipt of the Cheney Award.

The award, established in 1928 in memory of 1st Lt. William H. Cheney, who was killed in an air collision during World War I, consists of a certificate, a bronze medal and a \$500 honorarium. Annually it recognizes an "act of valor, extreme fortitude, or self-sacrifice in a humanitarian interest performed in connection with aircraft."

Today Tom Newman is a technical assistant at Doctor's Hospital in Milwaukee, Wis. He left the Air Force early in 1969. But this former airman has carved a niche in Air Force history. And it will stand through the ages as a testimonial to the courage, fortitude and valor of America's airmen. ☉



Thomas A. Newman, now a civilian, receives the Cheney Award from Chief of Staff John D. Ryan in honor of his act of valor.

Born only 10 years ago, the laser is here to stay. Its applications are manifold but its dangers still lie in the relative unknown. That's why Air Force scientists in Texas are working on the . . .

Goldfinger used it as a weapon. So did the bad guys in a Matt Helm adventure. In both movies, warped individuals with evil designs used intense rays of light to kill in their quests for power.

Science fiction? Most definitely. The laser is a long, long way from being an unstoppable weapon.

However, lasers already have many military applications. The 10-year-old creation of science, its name an acronym from Light Amplification by Stimulated Emission of Radiation, is being tested as target illuminators and accurate bomb-sighting systems' components. Lasers may overhaul bombing, giving practically 100 percent accuracy on payload delivery. Ironically, the bombing advancement will save money and, more importantly, lives. Combat strikes can be reduced significantly due to pinpoint accuracy. Bombs will hit the target—period.

Lasers have greatly excited the scientific world. The sharpest, purest, most intense light known to man, it can at close range vaporize any substance on earth. Scientists have worked on laser applications in communications, radio astronomy, heating and cooling, welding, precision alignment, radar and navigation, photography and medicine to name a few. Laboratory and practical applications have shown it to be a light of promise for all mankind.

But with all the promise shown by lasers, the art of laser applications may be outstripping the human element. Lasers can be dangerous. They are machines of light/heat/radiation. These elements affect the human body—many times adversely. Therein lie the dangers.

Early in the development of lasers, Air Force scientists began to study the biological effects of the intense light beam. Simultaneously, other Air Force scientists were working on practical applications of the newly found device.

Not completely satisfied with the smaller, early programs on biological effects, the Air Force consolidated the efforts. Now, laser biological effects are studied in the Ophthal-

mology Branch of the Clinical Sciences Division, School of Aerospace Medicine, Brooks AFB, Tex.

According to Everett O. Ritchie, Oculo-Thermal Function Chief, the Brooks-based study has two major projects: "Our primary function is first to determine laser irradiation which will cause biological damage. Then, on the basis of our findings, build in appropriate safety factors and make recommendations to the Surgeon General as to what levels of laser irradiation Air Force people can be exposed to without causing permanent damage."

To determine biological effects, a task force headed by Lt. Col. Paul W. Lappin conducts experiments with Rhesus monkeys, since their eyes most closely resemble the human eye. "The eye is the most susceptible to laser energy," says Lappin. "The laser is a highly concentrated beam of light, and the eye has the ability to focus on that beam. Since the laser generates a great deal of light energy on such a small point, it can easily cause blindness by burning the eye's retina. This is only one type of laser effect we are studying. We must determine permissible levels of exposure—we've got to know when the exposure level becomes dangerous."

Once danger levels are established, the second part of the overall project gets in high gear, so to speak. Working with established danger levels, the preventive measures project, headed by Lt. Col. John A. Carpenter, must design and fabricate devices to protect the human body from unacceptable levels of laser exposure. "As Colonel Lappin said," states Carpenter, "the human eye is the most vulnerable, but we aren't limiting the research to the eye only. We're involved in basic research that may afford protection to the skin and other parts of the body."

Work involving laser research isn't as simple as it may sound. Though the people involved have information generated by earlier studies, they feel they have a long way to go in refining safety stand-