TAC ATTACK

FEBRUARY 1975

NUDE CENTER SPREAD PG. 16

TWO PROPS.... Pg. 10

TAC ATTACK FEBRUARY 75 VOLUME 15 NUMBER 2

FEB

FOR EFFICIENT TACTICAL AIR POWER

FEATURES

DEPARTMENTS

TACRP 127-1

Angle of ATTACK

let's talk money

Let's talk money. I'm sure it's a subject in the minds (and on the tongues) of most of us these days. I'll talk to you about the dollar cost of accidents and maybe put the figures into a context that we can all understand.

If you bought a new intermediate size car ten years ago, it probably cost about $3,500.00. Today, a similarly equipped machine would probably be about $6,000.00 – a good example of what inflation has done to our economy. Inflation not only raises the cost of cars and groceries – it affects the cost of fuel, AGE, and aircraft, to name only three.

Last year TAC had the best aircraft accident rate in its history. Even though it was our best year, we lost 13 crew members and 18 aircraft were destroyed in 19 major aircraft accidents. The 19 major and four minor accidents cost about $53.5 million. How much is that? Well, the cost of those accidents would pay for a squadron of A-7Ds. Keep in mind, too, that this cost reflects only money lost due to aircraft accidents – it doesn't include the cost and grief associated with those killed, or the cost of aircraft incidents and ground mishaps.

Equating dollars to accidents is a cold way to look at the facts, but it should help to underscore my point – TAC can't afford accidents. The amazing fact is that this waste can be stopped, by you! Last year 70 percent of our aircraft accidents were caused by operator error and inadequate supervision. When all accidents are combined – flight, ground, and weapons . . . we find human involvement was a cause 98 percent of the time. Tight supervision and adherence to accepted and proven procedures are a must.

William J. Bally Jr.

WILLIAM J. BALLY, JR., Colonel, USAF
Chief of Safety

USAF PHOTO BY SSGT J. SCOTT CRIST

FLYING SAFETY IS not PARAMOUNT

"It's simply a tradeoff between mission accomplishment and safety . . . "

by Maj Joe Tillman

The steely eyed young jock concluded his briefing and solemnly announced, "Gentlemen, remember . . . flying safety is paramount."

Hogwash! If flying safety was really paramount, our intrepid briefer would have concluded his spiel with the reminder that the whole thing was a practice briefing and since safety really is paramount, a hospital bus would be waiting outside the squadron building to take the aircrews back to the security of their respective homes.

"Safety is paramount" is but one of the many well-worn and half-true cliches that creep into conversations, briefings, newsletters, and posters. You want another one? How about, "the only acceptable aircraft accident rate is zero"? Flying airplanes is inherently risky — especially tactical missions, and the only way we can have a zero aircraft accident rate is to ground the fleet and retire to the bar. Sure, a squadron or wing should try for, and can achieve a zero rate for awhile, but sooner or later the demands of the mission, a maintenance goof, a materiel failure, or an unthinking pilot is going to put one in. It's a tradeoff between mission accomplishment and safety.

Let's get a little bit practical about this thing called safety (a word that is innocuous, at best). I've been at TAC Safety for over a year and think my opinions reflect the feelings of many people who really can say "Safety is my business." No, I'm not an expert in safety, nor am I going to try to blow smoke about qualifying my statements. Since I'm the editor, I'll vent some of these long sublimated opinions; if you don't like it — write a rebuttal. At least I'll have something to put on the "Letters" page. As the ol' golf pro says . . . "gotcha!"

So . . . flying safety is not paramount and TAC will never have a year-end accident rate of zero! Very negative stuff. Then, what is safety? How about, "safety is resource conservation through accident prevention?" Good Lord, that's awfully long for a good P. R. slogan and smacks suspiciously of an edict issued from a smoke-filled conference room. OK, how about, "safety sense saves cents?" Too tricky? So who needs a slogan, anyway?

Take a balloon. OK, now blow it up. Finished? Fine, now paint it safety-colored. All done? OK, give it to me 'cause I'm gonna bust it. Question: What's our best safety weapon? The hazard report program? Wrong. TAC ATTACK? Don't be silly. Our accident/incident reporting system? No, but you're getting warmer. The answer: The desire of most people to avoid busting their collective butts, that's what. Our second-best asset is the conscientious support people who work hard towards keeping the machines in condition, to do the mission and to bring man and machine back to terra firma together. The other answers all contribute to eliminating hazardous situations through the spread of information, but when you get down to the nitty gritty, it's the pilot's self-preservation instinct that gets most aircraft back down safely.

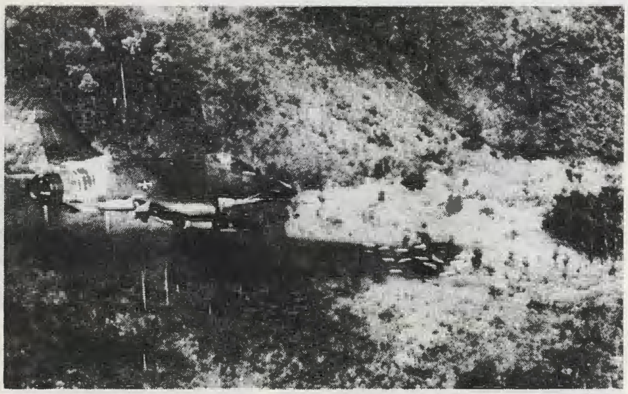
Except for the very few among us who harbor a strong death wish (most pilots in this category get their wish early in their careers), most of us choose to keep on surviving. The jock who runs out of airspeed, altitude and ideas at the same time rarely concerns himself with what his squadron DO, wife or crew chief will say if he makes it back. He thinks of ol' number one – and rightfully so. The desire to survive (or fear of death) is a very strong basic drive that has prompted superhuman acts by very human aircrews. What we want to do, you see, is provide our aircrews with the most dependable air machines possible and channel his will to live into life-saving (and aircraft-saving) actions. Sound simple? Don't you believe it. I would like to continue this opinionated scribbling with a few words directed at pilots and supervisors involved with the flying game. Don't stop me if I'm wrong.

Aircrews

Direct some of your survival adrenalin into actions that may keep you from "dropping into it" – before you take off. You're not going to know everything about aircraft systems, flying regulations, and tactical procedures when you graduate from RTU or CCT. In fact, you won't be completely knowledgeable in all facets of flight even when you retire from the Air Force – but you'd better learn all you can, while you can. Plan your mission so that risk is

minimized and, if necessary, brief it as if you were a greenie sitting in the briefing room and not an old pro standing behind the podium. Answer all the questions before you take off.

Know your aircraft's systems, but use your time wisely — don't spend a lot of hours learning things that won't keep you from killing yourself. ***Flashback: Crew bus on the way to a checkride and the SEFE says, "Trace a drop of JP-4 all the way through the aircraft until it's only a bit of foreign matter in a vapor trail . . ." Victim's answer? "First of all, you see, there were these dinosaurs, and . . . ."*** Better the SEFE should ask the aircrew what their weather category is, what critical field length means and how come he's wearing those funny-looking polaroid sunglasses. Spend your time knowing what you need to know in order to make the takeoffs equal the number of landings.



Know your tactical procedures. The hairier the mission, the safer you'll be if you and your fellow jocks know your procedures, options, and limitations — and those of your equipment and mission. Take a close look at the importance of the mission, then weigh it against the necessary risk. If the scale tips towards the unsafe side, speak up. A compromise may be necessary. That's accident prevention.

Supervisors

These are some of the "other guys" who can really keep the aircrews from busting their backsides. You know, aircrews and brain surgeons are lumped into a strange category — they are either superman or they flunk out. Nonsense! Somewhere out there are fliers and neurosurgeons who graduated at the bottom of their class and it's your job to know who they are (the aviators, not

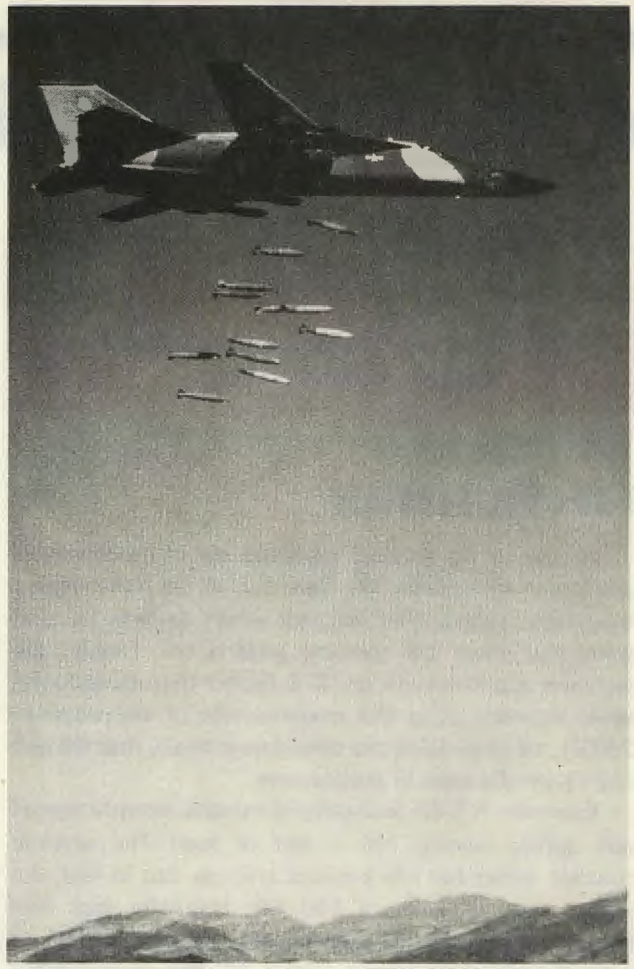
the doctors). How do you know who they are? Lots of ways — records, like the Form 8, for one. Talk to their flight commanders. Fly with them. Cover them in the casual bar and talk to them. I'm not saying these slowburners can't hack it. What I'm saying is that maybe they need a little more practice than others. They might need an occasional supervisory ride after a long leave or DNIF. It may be they need the confidence that only experience can bring, so if possible, schedule accordingly.

You say your unit is behind in flying time and the weather's giving you fits? You say you've got eight jocks who need night gunnery, but the weather at the range is marginal? You say three of these eight guys are FNGs, three just got back from leave and two have serious personal problems? You're asking me what to do? Hell, I don't know . . . I do know that if I were in your position and decided to send 'em on the mission, I would make sure they got all the help I could give . . . Like giving as much advanced notice as possible; maybe collect them in a corner and run over all possible hazards; insure they know what they are required to do and sit in on the briefing to make sure everything had been planned and briefed right; I might even scan the word pictures on their Form 8 and

see if any of them might have problems with any phase of the mission. Then, when I had done all I could, I'd sit back and cross my fingers. Like I say, it's a tradeoff.

If you really want to get the attention of a fellow who's walking out to his trusty aerospace vehicle to bust the surly bonds, sidle up to him and say, "Psst, you there! You with the 100-mission patch, the 24-hour Seiko and the two-hour butt – I've got some information that's gonna keep you from gettin' killed today. I know for a fact you're going to have hydraulic problems and you're not gonna know what to do." You've got his attention! Don't you know there'll be a mad scramble for his dash-one to read Section III, pp 26-27? Don't you know his beady eyes will cover the skin of his bird during a preflight for tell-tale signs of light red fluid? Don't you know he'll probably be so intent on those hydraulic gages, he'll taxi into his leader?

So what do we do – ground all aircraft if the weather is less than severe clear? Call a down-day if the maintenance chief's biorhythm chart tells him to stay in bed? No, we do just about what we're doing now – except better. We need to help the aircrews and



supervisors all we can by providing them with good, factual information about mission requirements and aircraft systems. We must channel the aircrew's desire to survive into practical self-study by providing them common sense information – like what happened to Captain A. Burner over at Sagebrush AFB when the framistan on his nerd became disconnected on takeoff. If we must point fingers, let's point them at situations, not people.

We always make the best use of past accidents and incidents to keep our people advised of problem areas. We give our people the best possible training and always motivate them to do things right. We always take all of the many factors into account before we schedule a mission. Our pilots always know their emergency procedures and handle problems right the first time. We always fix their birds using tech data so we don't overtorque a nut or forget to fasten a panel . . . and chickens have lips. I'm not saying that there aren't a lot of guys out there who do these things, I'm just saying there are not enough . . .and until there are, fly to stay alive in '75. Cheers.

TAC TIPS

interest items, mishaps with morals, for the TAC aircrewman

Your mouth is in afterburner but your brain has just compressor stalled.

T-33 FUEL SHORTAGE

We live in the strange, advanced age of moonwalkers and organ transplants. We have aircraft so sophisticated they have gadgets that tell you when systems fail and warn you when the warning gadgets fail. Despite the technical sophistication of 1975 (won't that sound funny when someone picks this magazine out of the rubble in 2005?), we keep doing the same things wrong that Wil and Orv's peers did back in the old days.

Example: A T-33 or another command recently flamed out during landing roll – out of fuel! The weather forecast called for 105 knots at altitude, but in fact, the winds were in excess of 150 Kts. Naturally their fuel computations were off. The aircrew decided to press on even though they passed within 50 NM of a suitable alternate, 120 NM from their final destination. The pilot declared emergency fuel (indicating they would need traffic priority and/or would land with less than 60 gallons) and requested clearance for a modified flameout pattern. This decision probably prevented a disaster.

There's a couple of obvious lessons here:

1. Don't be surprised if your headwinds at cruise altitude are higher than forecast this time of year. Plan accordingly.

2. Don't be hesitant to divert into a suitable alternate when the above happens.

3. When the gas stops, so does the aircraft. Luckily, this one was on the ground.

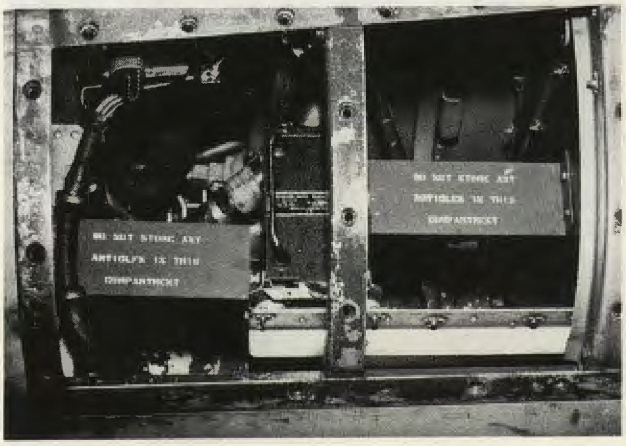
WARNING: THE SURGEON GENERAL HAS DETERMINED THAT STORING STUFF IN FIGHTERS IS DANGEROUS TO YOUR HEALTH

One F-100 ANG outfit, the 185 TFG at Sioux City, came up with a simple solution to a serious safety hazard that's worth passing on. If you're not a Hun jockey, don't stop reading – you might find this cure also has applications in your outfit.

After one of the unit's F-100Fs returned from a cross-country flight, it was discovered that the nose intake cover, pitot boom cover and main gear downlocks had been stashed in the aft electronic equipment bay, immediately behind the right hand expended link bay (access panel F-48). It was also discovered that by merely turning one of the downlocks, it could be wedged between a bell crank and aileron control rod. A little turbulence or a few "neggies" inflight could have resulted in an ops check on the egress system – or worse.

Huns not modified by TCTO IF-100-962 (RHAW) or TCTO IF-100-977 (strike camera) still have this handy little storage area that's ideal for shaving kits, etc – if you have a strong death-wish. The left bay on the F-model is pretty well crammed full of magic electrical stuff, but you lucky D-drivers have both left and right electronic bays sufficiently empty to attract the pack rats, so watch it!

The solution? Simple. A placard warning of the dangers of storing stuff in these bays (see photo below). The Surgeon General ain't got a monopoly on warnings.



ignition... then fuel!

The night before the near-disaster, the F-4D maintenance crew had motored the aircraft's engine to fold the wings. The next morning the crew chief discovered the right throttle to be out of the cutoff position during his preflight – so it didn't surprise him to find a small puddle of fuel in number two's afterburner section.

Enter the pilot. The situation was explained to him and he and the chief decided to blow the fuel out of the AB section. Insuring the master switches were off and the go-levers were in cutoff, the pilot cranked number two to 25 percent. After engine wind-down, the crew chief checked the AB section. It looked clean, so he gave a thumbs-up for a normal start.

Drum roll, please. At 10 percent, the ignition button was pushed. There was an immediate light-off and the EGT rose to 500 degrees. The chief told the aircrew that flames were coming out of the tailpipe, fuel was being dumped from 96R, and to abort the start. In a few seconds, the dumped fuel lit off and the flames seemed to go back into the engine. The crew informed ground control of the fire and egressed the Phantom. The crew chief put out both fires – the one on the ground and the flaming AB section. Luckily, there was no damage to the aircraft.

The engine shop people removed the engine, but could find no sign of a fuel leak. By now, you've probably guessed what happened – fuel that had puddled in the AB section was indeed blown out by applying air and motoring the engine over – but fuel had also puddled underneath the AB inner liner. Result? A near disaster.

There is nothing in maintenance TOs to tell the aircrew or crew chief what to do if fuel is pooled in the AB section. A tried (and usually true) solution is to blow the fuel out by motoring the engine with ignition and fuel cutoff switches off. This is O K as far as it goes . . . but it doesn't go far enough. In the F-4 (and most other aircraft), most of the fuel will pool below the AB liner and the invisible puddle is what almost did this trio in.

The unit that experienced this hairy happening has advised its aircrews and maintenance people of the problem and given them this guidance:

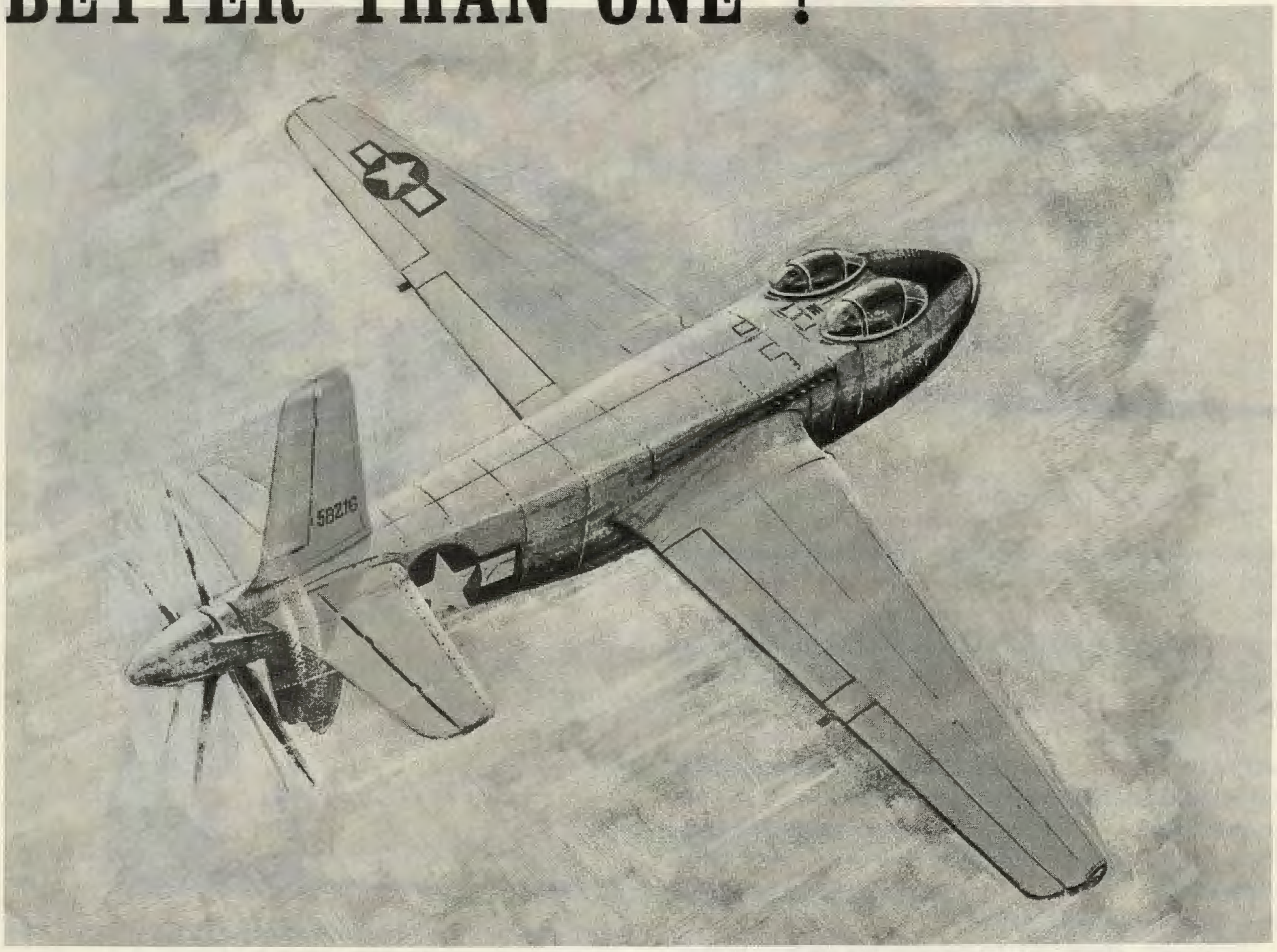
If, during preflight, any fluid accumulation is noted in the afterburner section, engine shop personnel will be notified so that they can check for the source of the fluid and drain the AB section prior to the next engine start.

The next time you decide to motor your engine to remove pooled fuel, or think you've taken care of the problem by doing so, ask yourself two questions:

1. How come I got gas there anyway?
2. Did I blow it all out?

Better yet, ask this question before you motor over – "Engine shop, could you come on out to parking spot echo three? I got gas pains."

WERE TWO PROPS BETTER THAN ONE ?



NUMBER 10 OF A SERIES

By William G. Holder
Contributing Editor

During a time in the 40s and 50s, there was an interesting family of aircraft. Their stay was short and, for the most part, they never lived up to the performances the designers had promised. The principle involved the use of two counter-rotating props driven from the same powerplant. The American concept basically used piston engines but at least one foreign example has successfully used the concept with jet power. The giant Soviet Bear bomber uses four turbo-prop engines, each equipped with two counter-rotating props.

Like their single-prop brothers, the two-prop birds employed their power in several different ways. First, there were those equipped with props in the normal nose location. Believe it or not, there was even a dual-prop pusher aircraft. The Germans, during WWII, devised an interesting variant of the principle with a normal prop in the front and then a counter-rotating pusher prop in the rear.

The reason designers chose the counter-rotating twin-prop scheme for their birds is now hidden in the pages of yellowed aircraft design drawings, but undoubtedly one of the reasons was the increased power that could be acquired from a single engine housing. Then too, if adequate power could be accomplished from the single twin-prop installation, it wouldn't be necessary to clutter up the wings with drag-inducing engine cowlings.

Following are several of the more prominent twin-screw planes that flew. It isn't meant to be a complete list, but serves as a sample of some of the development efforts. It would be interesting if TAC ATTACK readers could add to the list; so if you have any in your files, drop us a line.

The General Motors XP-75 Eagle (see October 74 TAC ATTACK)

This hodgepodge aircraft was a last ditch attempt to provide a long-range fighter. Airframe parts from existing aircraft were quickly integrated together to produce the Eagle . By the time it rolled off the production line in 1944, its long range mission had been superseded by the late model P51s.

The Eagle's twin props were driven by the new Allison V-3420 engine. The 24-cylinder brute weighed more than 3100 pounds and sported a 5.5" bore and a 6" stroke. It was actually made up by assembling two V-1710 engines into one crankcase. The six-throw, seven bearing, counter-balanced crankshafts turned in opposite directions. These, in turn, transmitted power through two counter-rotating drive shafts to a set of reduction gears in the nose.

A two-stage supercharger provided boost at altitude. Each three-bladed prop had its own hydraulic system for pitch changes. The props were a massive 12½ feet in diameter. The Eagle's performance, although certainly not unimpressive, did not provide any advantage over the already existing P-51s and P-47s. Its max speed was rated as 404 MPH at 32,000 feet, with a cruise speed of 250 MPH.

The Navy Douglas XTB2D-1 Sky Pirate

This massive aircraft was born in Navy channels to satisfy a need for a land based fighter-bomber. The bird, as it evolved, would have been too large for the early carriers. With a maximum range of almost 2900 miles, and 1250 miles with a 2000 pound torpedo, the Pirate was an amazing piece of aircraft hardware.

Sitting in the cockpit, the pilot was well over 20 feet in the air. It weighed some 18,500 pounds empty. The Sky Pirate had a top speed of about 340 MPH. Putting the size of this Navy bird on more familiar grounds, this bird weighed out about the same as a B-25 bomber.

The power was provided by a huge P&W XR-4360-8 engine which turned a pair of 14-foot diameter counter-rotating props. Oil-cooling duct intakes were located in the wing roots.

Impressive as the Sky Pirate's performance was, it just came along too late. Had the war lasted longer, the Pirate could have made it into the history books, but with the end of the war and the coming of the jet, the Pirate's time was past.

The Republic XP-72

A little-known modification to the P-47 Thunderbolt was the XP-72, equipped with two 3-bladed counter-rotating props. The bird was expected to be able to have a top end of about 540 MPH and be able to climb from sea level to 15,000 feet in a little over 3 minutes. The plane was built in an attempt to match the F-80A's performance.

The Douglas XB-42 Mixmaster

One of the most interesting flying creations was this twin-prop pusher configuration. For its time, the Douglas development effort looked rather advanced. Douglas

were two props better than one ?

EVEN STRANGER THAN THE XB-42 -THE NORTHORP XP-56 DURING REFUELING.

reasoned that with the engine mounted aft, there would be no turbulence problem. It was hard to describe the Mixmaster as looking like a bomber or a fighter – she had traits of both.

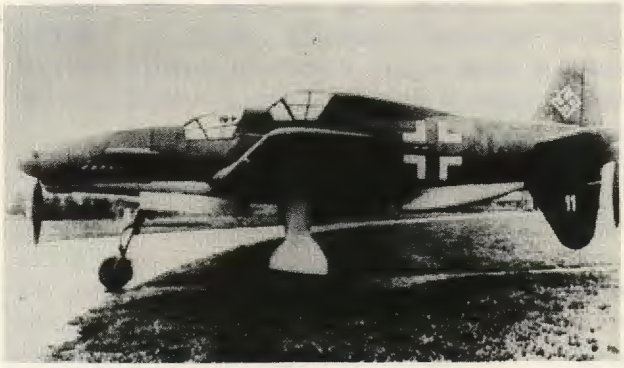
As strange looking as it was, the XB-42 had some pretty convincing performance figures. The bird could carry 2,000 pounds of bombs over 5,300 miles and burn only 2,000 gallons of fuel doing the job. It had a critical altitude speed of over 450 MPH.

The Allison 1710 engine was once again used, but this time two were used. They were located side by side, canted slightly inwards, with the left engine driving the forward propeller and the right powerplant driving the rear prop. The Curtis three-bladed props were driven through two power trains, each made up of five P-39 drive shafts connected to a gear box.

The XB-42 met a fate similar to its other twin prop kin. To many, it was superior to the bombers that were rolling off the production lines in great numbers, but it just didn't seem like a valid idea to introduce a new model at that time.

The XB-42 did not die easily and served as a test bed aircraft for several modifications. The XB-42A was fitted with two underwing jet pods in May 1947. The final XB-42 variant was the so-called XB-43 which did away completely with the twin pusher and used fuselage mounted jet engines.

Dornier 335



The twin prop principle also was investigated by other countries. The German Dornier 335 was one of the most formidable fighters of the war. The one difference in the two-screw device on this bird was that the two props were separated – one was located in the normal forward position, with a pusher prop in the rear. With a top end of 430 MPH, the so-called "Anteater" appeared in small numbers near the end of the war. The Germans had planned to replace the rear engine with a jet, but that modification was never accomplished.

Although this list is far from complete, I hope it has whetted your appetite to the twin-prop concept. The idea resulted in advanced designs, but they were replaced by an even more advanced concept – the jet engine.

TACTICAL AIR COMMAND

AIRCREWMEN of DISTINCTION

Lieutenant Colonel Peter J. Calamas

Captain David S. Johnson

310 Tactical Fighter Squadron
Luke Air Force Base, Arizona

Lieutenant Colonel Calamas and Captain Johnson were flying transition mission number one in the F-4 Central Instructor School at Luke AFB, Arizona. Captain Johnson, the student, was in the front cockpit of the F-4 and was performing an approach into Gila Bend auxiliary landing field. As the flaps were lowered on downwind leg at 1700 feet AGL, the aircraft began a rapid uncontrollable left roll.

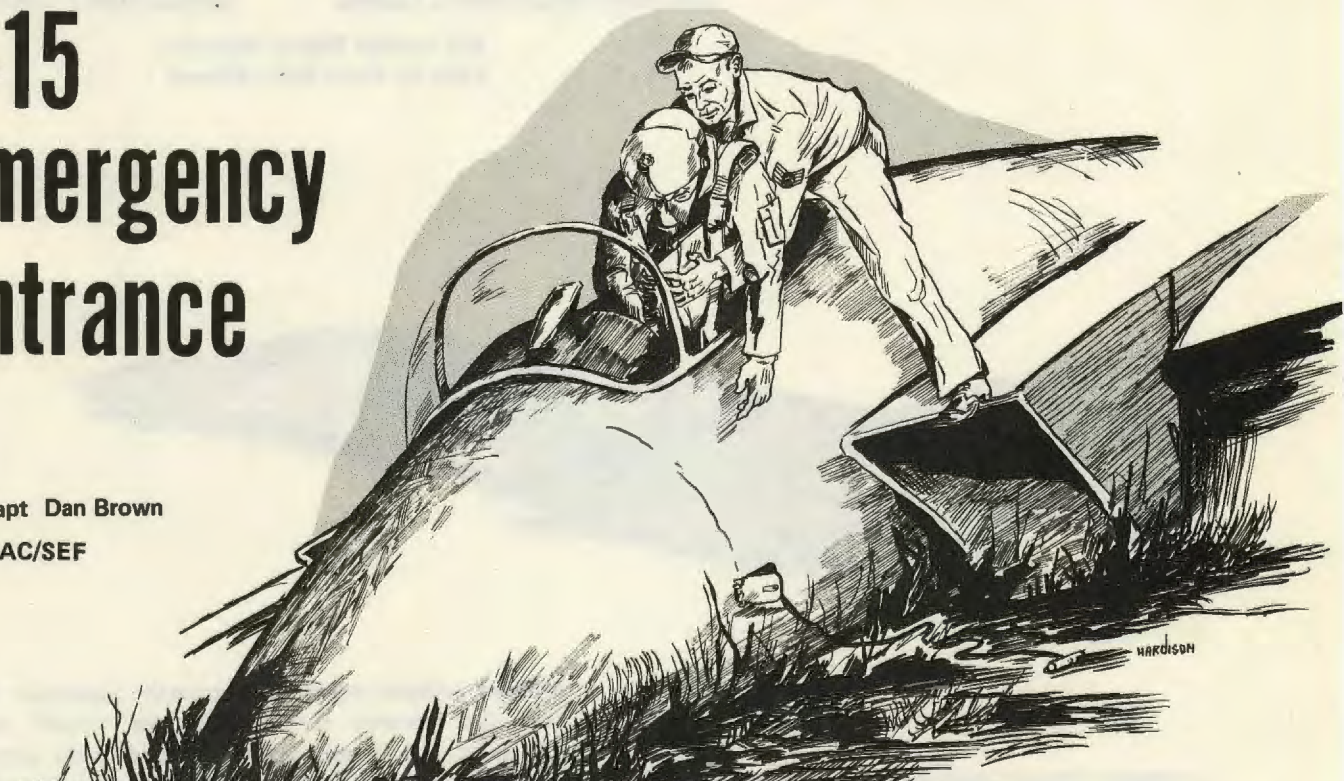
They added power, repositioned the flap switch, and applied aileron and rudder in an attempt to regain control. The roll progressed to 170° of bank (nearly inverted) and the nose began to fall. They applied as much forward stick as the airspeed would allow and held the recovery controls. The crew members knew that an ejection in this inverted attitude would be extremely dangerous. They held the recovery controls and the aircraft slowly responded. As it reached 90° of bank, they judged a complete recovery to be possible and decided not to eject. The recovery was completed at 200 feet AGL. A no-flap landing was then performed at Luke AFB.

Investigation revealed a faulty hydraulic flow divider was sticking in random positions which prevented the extension of the left trailing edge flap. It is likely that this malfunction also caused slow right flap retraction when the switch was raised, making the inverted attitude very extreme and slowing the recovery.

The quick reactions and courage that Lieutenant Colonel Calamas and Captain Johnson exhibited during this very serious emergency saved their lives and a valuable TAC aircraft. Their performance qualifies them as TAC Aircrewmen of Distinction.

SPO Corner

F-15 emergency entrance



by Capt Dan Brown
HQ TAC/SEF

Anyone reading recent issues of TAC ATTACK knows the F-15 has arrived. As additional Eagles come into the inventory, they will be showing up at more and more TAC bases as transients. As good as the F-15 is, there are going to be emergencies. Now is the time for you who specialize in responding to emergencies to brush up on "bent Eagle" procedures. Whether you are a firefighter, fly aircraft or work on the flight line, this info may be of use to you some day.

F-15 Emergency Entrance

You are the first person to arrive at an accident F-15 with unconscious pilot or pilots on board . . . what are you gonna do? If you are a firefighter, proceed IAW TO 00-105E-9 and your local Aircraft Pre-Fire Plan. If you are an F-15 pilot, follow procedures outlined in your Dash One. Read on, however, for a little refamiliarization.

First of all, don't go rushing up with a fire ax to bash in the canopy. A couple of rather unhappy things could happen. One, you might not get there. Those turbofan engines produce a lot of suction even at idle thrust, and you can't help the pilot from the inside of an intake. A better way to shut down the engines than hat, spats, arms and legs is mass application of firefighting agent. If no fire truck is rushing up, you can block the left intake duct with a truck or secure yourself with an adequate restraining line.

Two, you may do more damage to yourself than to the canopy when you try to break in. The built-in bird strike resistance of the polycarbonate canopy is also ax resistant. Best you stick to opening the canopy by prescribed normal or emergency means or cut through the canopy with the fire department K-12 saw along the canopy frame.

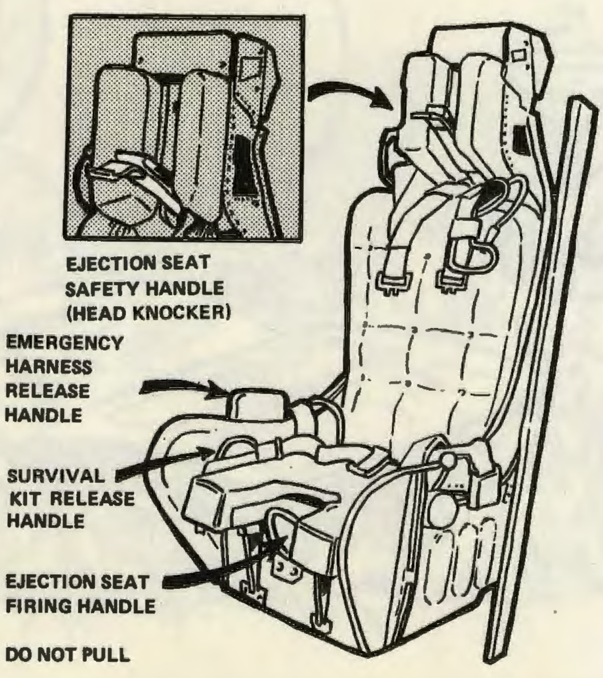
Aircraft Entry

Normal entry is via the external canopy control handle below the left canopy rail. Push the handle release button, let the canopy handle spring out two inches, then rotate the handle up and the canopy should open by counterbalance or hydraulic power. (On early pre-TAC aircraft, the handle in the up-position must be pulled out another inch and rotated up for hydraulic power.)

Manual entry is possible by unlocking the canopy with a socket wrench or breaker bar in the one-half inch socket just under left canopy rail and lifting the canopy, after which a safety strut should be installed.

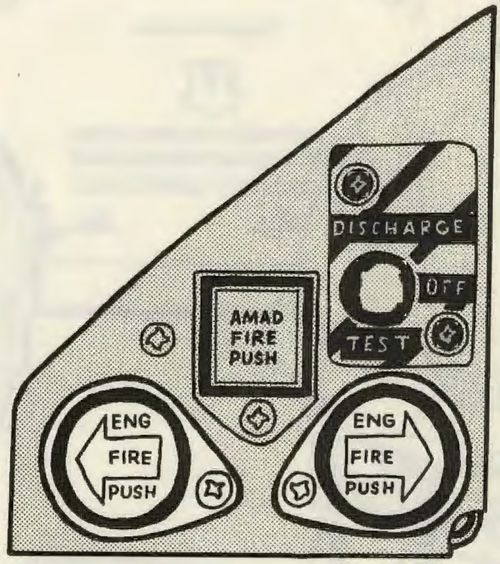
To jettison the canopy, open the external canopy jettison door forward of the external canopy handle, take the T-handle inside, pull to its landyard's eight-foot length, and yank hard.

Ejection Seat Safetying



The best way for you (or the guy inside) to avoid taking a short, fast ride with an unhappy ending is to safety the seat before doing anything in the cockpit. In the F-15, it's simple enough . . . reach in the center of the pilot's headrest and rotate out and down the part that reads "Pull Out To Safety Ejection Controls." A yellow and black checkerboard area shows on the handle top when the controls are safetyed.

Engine Shutdown



Frangible plastic covers protect the fire extinguisher buttons from accidental actuation. However, these covers break (when firmly pressed) allowing button actuation.

Depress the left and right engine fire extinguisher buttons, on the upper left side of main instrument panel, to shut down the engines.

If an engine is still running, shut it down by pushing the fire pushbuttons on the main instrument panel upper left corner or by raising the throttle finger lifts and moving the throttles aft to the stop.

Aircrew Extraction

Do not move the ejection seat firing handle on the seat front between the pilot's legs. Do release the pilot by releasing the survival kit buckles beside either hip and releasing the shoulder harness straps and lap belts.

Another way to release the pilot is to:

1. Release the shoulder harness straps.

2. Pull the yellow survival kit release handle on the outside of the pilot's right leg, up and aft until it comes off.

3. Pull the emergency harness release handle located on the right armrest, up to full extension.

Now – GET HIM OUT.

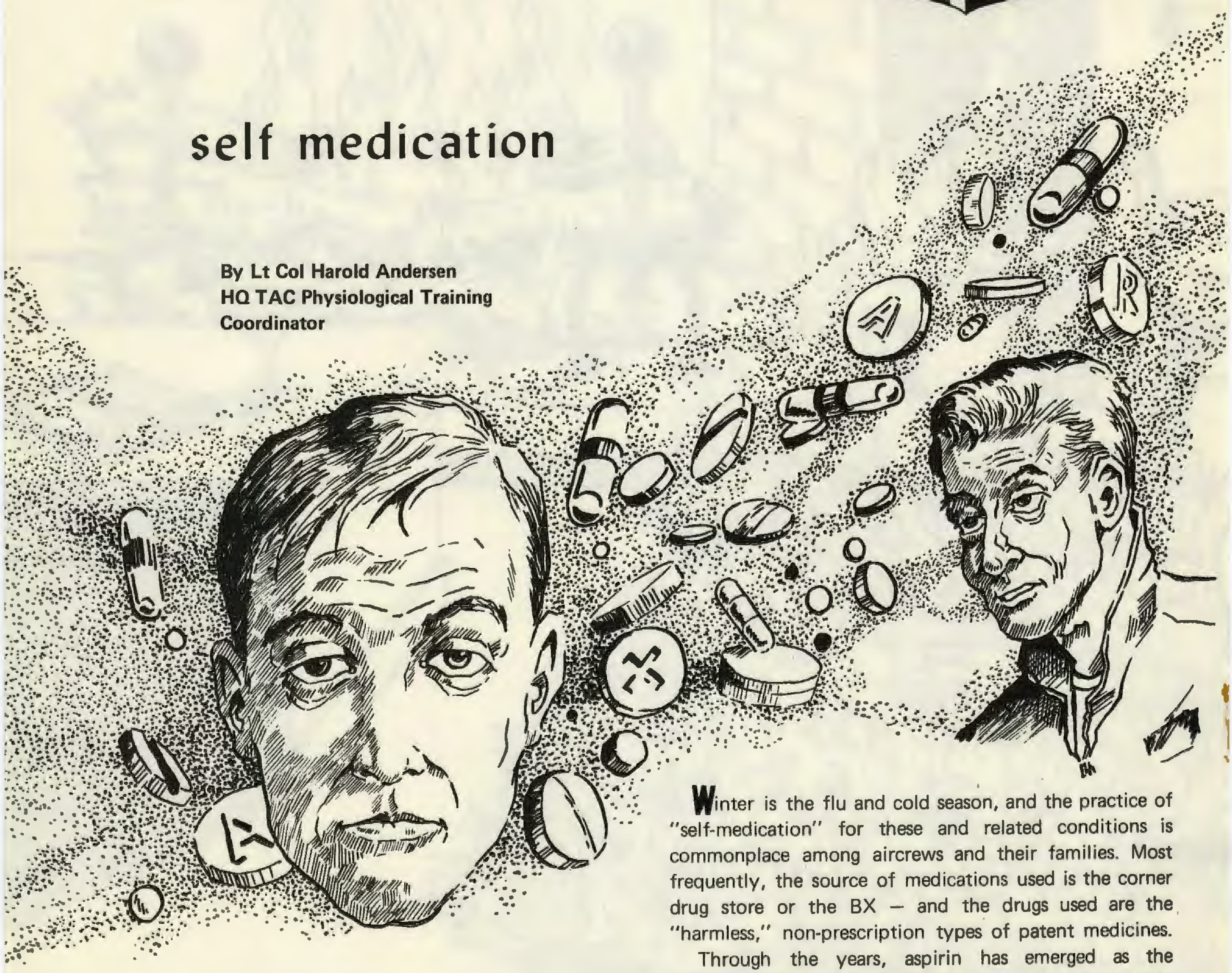

FIGHTER BIRDS
DO IT
BETTER
FOWL OF THE MONTH
FLEAGLE
HARDISON


Fleagle
F

PHYZ-BIZ

self medication

By Lt Col Harold Andersen
HQ TAC Physiological Training
Coordinator



Winter is the flu and cold season, and the practice of "self-medication" for these and related conditions is commonplace among aircrews and their families. Most frequently, the source of medications used is the corner drug store or the BX – and the drugs used are the "harmless," non-prescription types of patent medicines.

Through the years, aspirin has emerged as the "standard" drug, for a number of reasons: it is available everywhere without a prescription; it is easily administered; it is effective in reducing pain, fever and inflammations; and it is considered to be relatively safe and free from adverse reactions. But is it? Dosing yourself with any patent medicine without full knowledge of its ingredients, possible side-reactions, etc., is like playing solitaire without a full deck. Let's take a quick look at some facts that might change your mind – or at least modify your usage.

Aspirin belongs to a large group of compounds which are called "internal analgesics" – pain killers which are taken internally (as opposed to "external analgesics" which are rubbed onto the surface of the skin). The American consumer spent, in 1968, (the latest stats available to me) a total of $538.5 million on internal analgesic products, including nearly $103 million for plain aspirin and over $345 million for aspirin in combination with other pain relievers. Purchasers are mainly influenced in their selection of medications by TV, magazine and other commercial advertising sources. In spite of (or maybe, because of) this barrage of claims, consumers remain quite naive and relatively uninformed.

There are some 60 products in the market-place, the brain-children of 36 different manufacturers. The local BX carries (at last count) about 18 of these products, in different sizes and forms, and even during the summer months (June, July and August) sells nearly 5,000 bottles of all sizes (amounting to hundreds of thousands of headache treatments!).

Most commonly, aspirin is compounded with other agents, some of which are of questionable value. Most of the 60 products noted above are "combination of ingredients" types; over half contain aspirin combined with phenacetin, caffeine, salicylamide or NAPAP (acetaminophen). As a comparison, a Bayer aspirin tablet contains 324 mg of plain aspirin. The inclusion of these additional agents may require additional precautions. The rationale for the routine use of caffeine is not clear, even to pharmacists and pharmacologists, but 26 of the products contained it in amounts ranging from 8.1 mg to 75 mg. If the caffeine in coffee bothers you, these products will probably have you strolling on the ceiling!

Nearly 60 years ago (in 1916 to be exact), it was known that aspirin caused internal bleeding. In 1938, undissolved particles of aspirin were discovered in the center of ulcers on the stomach wall. Subsequent studies have conclusively shown that aspirin produces necrosis (death and destruction of a circumscribed portion of tissue) of the stomach wall. Now this information probably comes as news to the average consumer although aspirin was implicated almost 60 years ago, and the mechanism of the damage has been known for 36 years! Ever see a commercial which informs you of this fact?

Among users who do have some knowledge of this phenomenon, it may be ignored or forgotten because of belief that it's rarely observed. The probability of rolling a "7" with the dice, at a crap table, is 1/16 (16.6%) and gamblers play those odds all the time, not considering the odds prohibitive. In comparison, one study has shown that nearly 70% of those individuals taking aspirin (and related compounds called salicylates) show gastric bleeding! That's hardly a gamble – it's almost a foregone conclusion!

It has also been shown that either a saturated solution of aspirin, or particles of aspirin will produce this gastric erosion. If the aspirin is taken to overcome the "hangover" which usually follows alcoholic excess, the probabilities will most likely be enhanced, since the alcohol can (and does) cause irritation of the stomach wall. Persistent G.I. ulcers have been observed in heavy drinkers who use aspirin freely. The best way to avoid this irritation/ulceration is with buffering (using an antacid) and plenty of liquids (water or milk) in the stomach. Some of the products available observe this, since they come equipped with a built-in buffering system, e.g., Bufferin and Alka-Seltzer.

Another factor to consider is the likelihood of taking a full dose of one of the aspirin-containing internal analgesics along with nasal decongestant capsules such as Coricidin, Dristan or Super-Anahist, which also contain aspirin, caffeine, etc. Prolonged dosing with both may bring the concentration of aspirin and other compounds to toxic levels in the blood stream.

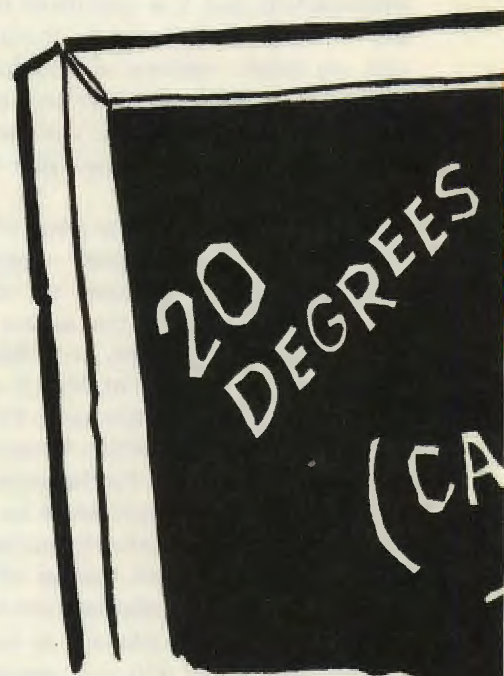
Besides this gastric bleeding (which is bad enough), large doses of aspirin (3-8 grams per day, or the amount in 10-25 Plain aspirin tablets) can cause "ringing in the ears," vertigo and hearing loss.

As pointed out in an earlier article on "Hypoxia," the phenacetin which frequently accompanies aspirin, can convert your hemoglobin (the red, blood pigment) to a form which can't carry oxygen (called methemoglobin). One gram of phenacetin (the amount contained in 6 Empirin tablets) a day, for an extended period can convert more than 3% of your hemoglobin to this altered form.

The thing to remember is that self-medication is, at best, a risky business, even if you use good judgment and read the labels (which few people do) because you are not trained in the use of drugs and the recognition of symptoms of adverse reactions.

We are not so gullible as to believe that aircrews and their families will discontinue the practice of self-medication (I'm not even sure that complete discontinuance would be desirable), but if we can create an awareness of the potential problems, we'll be satisfied.

the case of the DISAPPEARING LIFT VECTOR



by Capt Wiley Greene
FSO, 162 TFTG, Tucson AZ

Intrepid A. Aviateur just didn't like to fly at night, especially when it was as dark as it was this time. No moon, no horizon — just a few lights here and there, and some of them had to be stars.

"Well, I might as well fly the gages and get some instrument practice", he thought.

"Airplanes aren't supposed to fly after dark, the lifties are different." He had heard something like that said by some of the "Old Heads" who didn't like to fly during happy hour any better than he did. The air was so smooth that I. A. noticed a need to make a power adjustment everytime he banked his Super Dooper, Super Sonic Super Sabre.

"Ah Hah! The lifties DO change. It must be Black Magic."

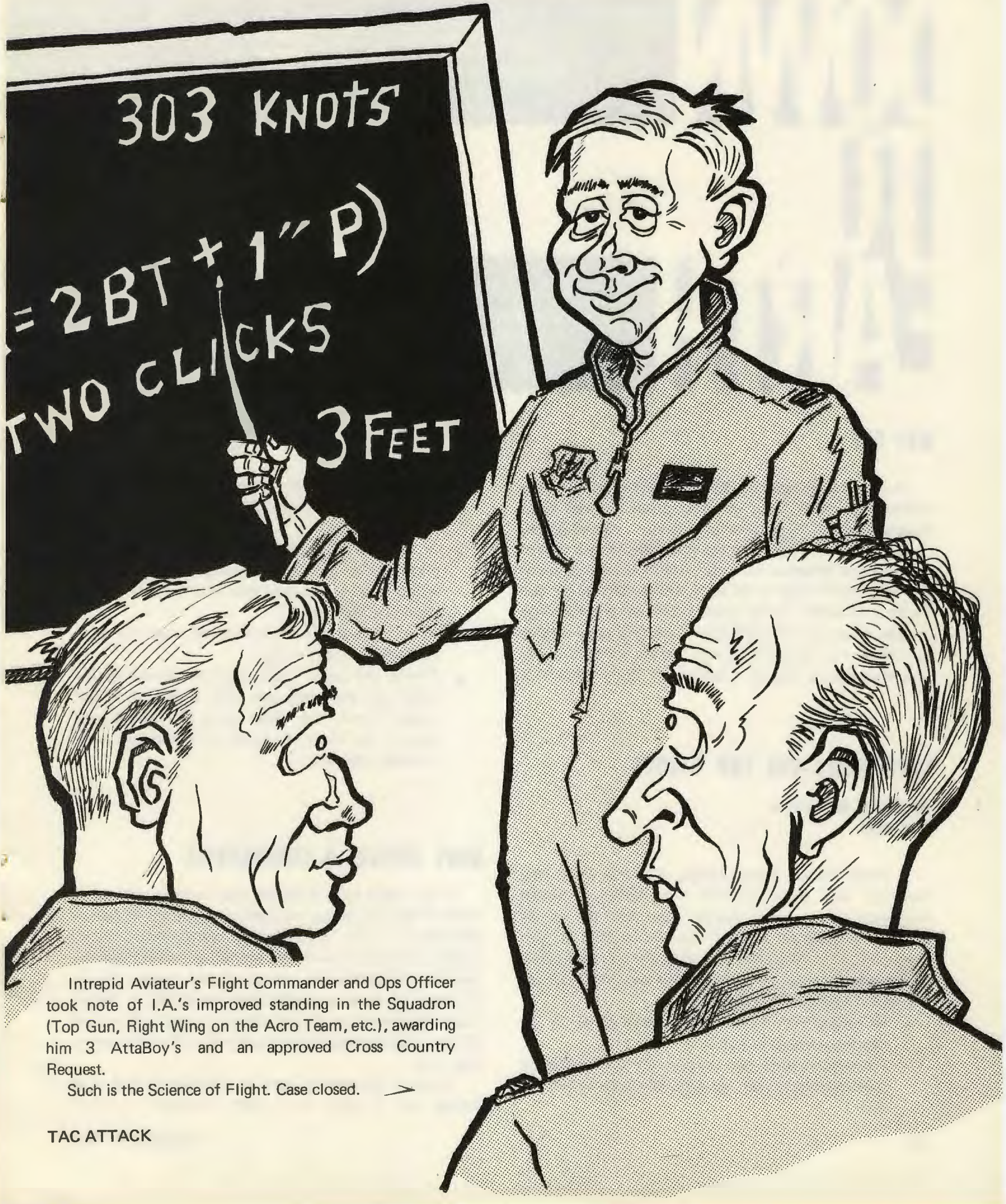
Skill and cunning overcame ignorance and superstition long enough for I.A. to make a good landing.

After eight hours of uninterrupted rest, Intrepid Aviateur began a very intensive investigation (in depth) to discover where the Lifties went. He wasn't too anxious to mention his quest to the Squadron Jocks because they were still laughing about the "BAK-12 Incident." So I.A. decided that The Clue had to be in the Dash One somewhere and he would search for it. Sure enough, back in the virginal pages of the Dash One — Performance Data — he found a small, innocuous chart that suggested a relationship between angle of bank and equivalent gross weight.

"Ah Hah!" Intrepid Aviateur exclaimed. (He really didn't say that but the expletive he DID use had to be deleted.) "Since I'm smart enough to know that my aerospace vehicle doesn't suddenly get heavier just because I throw in a little bank, it must relate to a loss of lift vertical to the earth. Ergo, if I would maintain altitude in a turn, then I must either slow down because of the increased "G" or I must increase thrust to keep a constant head of steam."

Intrepid's next flight gave him an opportunity to explore the sanctity of space with his newly acquired knowledge.

During his round robin, he programmed his turns so as to roll out on the centerline of the new course, thereby eliminating intercept problems. (By using one percent of his true airspeed as turn radius and adding his altitude in miles above ground level to the turn radius, Intrepid was able to use DME to tell him when to start his turns.) He found that bank angles of less than 20 degrees required very little throttle movement. In the holding pattern at 303 knots indicated and using 30 degrees of bank in the turns, Intrepid worked out the formula, Constant Altitude (without airspeed loss) equals Two Clicks of Back Trim and One Inch of Throttle (CA = 2 BT + 1" P). As he rolled into the turn, he put in the Two Clicks of Back Trim and advanced the Throttle one inch. As he rolled out of the turn, he would undo what he had done. With just a little bit of practice came superb bank control, altitude deviations of 3 feet, and hardly a wiggle of the airspeed needle.



Intrepid Aviateur's Flight Commander and Ops Officer took note of I.A.'s improved standing in the Squadron (Top Gun, Right Wing on the Acro Team, etc.), awarding him 3 AttaBoy's and an approved Cross Country Request.

Such is the Science of Flight. Case closed.

DOWN TO EARTH

GROUND SAFETY
Quotes and Notes

Always try to drive so that your license will expire before you do.

WHY 55?

In case you thought the 55 MPH speed limit was just a bureaucratic WAG, read on. The speed is based on a Department of Transportation study comparing gas consumption to speed. The study revealed that a typical 4,000 pound American car gets 11.08 miles per gallon at 70 MPH, 13.67 MPG at 60 MPH, 16.98 MPG at 50, and 14.89 at 40 MPH. The conclusion was that the best range for gas milage was 50 to 55 MPH — and that speeds above and below that range can reduce fuel economy. You say you don't drive a typical, 4,000 lb car? Sorry 'bout that!

CHAIN SAWS–USE AND MISUSE

By John D. McColman
TAC/SEG

A chain saw is a handy gadget. It prunes trees, cuts firewood, and clears wooded lots. Being a cutting instrument, it also causes injuries. Because of the job for which it is designed, it's not feasible to equip it with foolproof guards. The only real safeguard is knowing how (and how not) to use a chain saw. Here are some tips from the NATIONAL SAFETY NEWS:

- All traces of fuel and oil should be wiped off the chain saw before it is started.
- Don't operate the saw without a proper muffler or spark arrester. Chain saws are notorious for starting fires.
- Be sure and release the throttle when moving short distances — for longer delays, shut the machine down.
- Wear good, close-fitting gloves — they'll protect you from minor scratches and burns from the hot muffler.
- In hilly country, stand on the uphill side when bucking logs (cutting a log into sections). A log rolling over you could be fatal when you're carrying a running chain saw.
- Never attempt to start a chain saw when the blade is jammed in a tree or log.
- Finally, and most important of all, always keep the blade well sharpened and oiled. A dull blade will "walk" or skip over tough wood, and heat buildup from a dry chain can cause it to snap and cause "flailing" injuries.

BABY SITTERS & EMERGENCIES

If you use a baby sitter for your children, there's no need to tell you about the commonsense tips in case of emergency — like providing the sitter with a phone number where you can be reached and a list of emergency numbers, including the poison control center. There's probably no need to restate the importance of leaving your sitter with a list of instructions on what to do in case of fire or carbon monoxide poisoning — I'm sure you do that now.

There is one critical item of information that most people fail to give to a sitter, however — YOUR

ADDRESS AND HOW TO GET THERE! It may sound simple, but look at it this way – unless your baby sitter lives next door, she (or he) is working in a strange neighborhood. If you don't provide the sitter with a map or written instructions, the following could result:

Situation: A kitchen fire causes the baby sitter to grab the phone and dial the fire department's number you had conveniently provided.

Dialogue: "Hello – quick, help me, there's a fire here!"

"Calm down, please, tell me where you are."

"Just a minute," The sitter dashes out to the front door and rushes back. "I'm at 322 Rosemount Drive – no, make that Rosemount Place . . . just a minute." She grabs the phone book, "that's Rosemount Drive."

"OK, we're on our way. Now what section of town is that address in?"

"I don't know . . . I think it's just off Hillcrest, but I'm not sure . . . ."

OK, I guess you get the picture. Before you leave a baby sitter, draw a simple diagram of your house's location, pointing out landmarks such as schools, hospitals or shopping centers, that could serve as good references for emergency vehicles. If you're not a cartographer, leave written instructions she can read over the phone, such as: "I'm located at 322 Rosemount Drive. It's just off Hillcrest Boulevard, one block north of Madison High School." (Subdivision, postal zone, etc are great helps)

Simple? You bet – and the few minutes it takes to write it down is pretty cheap insurance against injury or death to a dependent.

The following letter-to-the-editor to a British newspaper is reprinted courtesy of FLIGHT SAFETY REVIEW, the RAF Strike Command safety magazine.

AIR DISASTERS

Sir – Yet again we hear of another vast air disaster. An airliner has flown into a mountain. Remember the Trident that "stalled" into a field? These and previous crashes have been solved by an inquiry which gives reasons such as pilot error, structural failure or other feeble excuses.

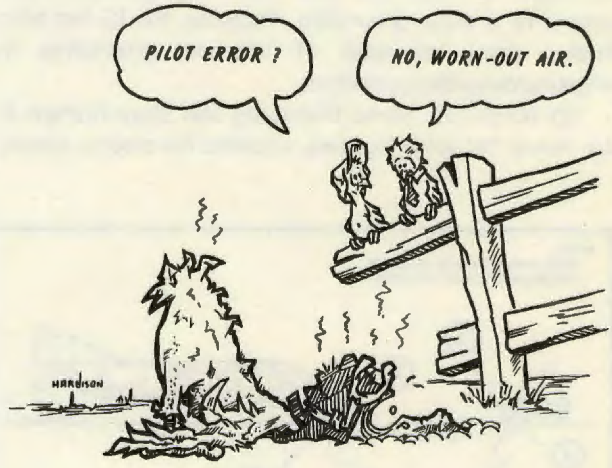
It is blantantly obvious to the merest intelligence that the answer to the problem lies not in the pilots, aeroplanes or ground controllers, but in the air upon which they depend for support.

All materials have a degree of flexibility, air included. Take for instance a strip of steel. With continuous bending back and forth, there will come a time when the molecular structure changes and becomes crystalised, leaving the steel with as much strength as a piece of cheese.

The air will react in the same way but, due to its greater flexibility to start with, the weakening process will take much longer. We have now reached the stage where aeroplanes have become so numerous that they are in danger of colliding over our airports.

With this type of concentration, any one pocket of air is being churned about at such a rate that its supporting properties change and it allows the aeroplanes to fall to the ground.

Consider the recent Trident crash; the aeroplane is equipped with automatic slots, flaps and other anti-stall devices. It even has a warning bell for the pilot to indicate when its airspeed falls too low for it to fly, but still it fell to the earth, causing one of our worst ever air disasters. We were assured that the pilot suffered a heart attack



caused by some scribbling on his flight pad by another crew member.

It is time we realize that courts of inquiry are bound to issue these excuses in order to gain time to find the real solution.

The solution is simple. We must stop all aeroplane flights for periods of one year minimum to give the air time to recover, just as the strip of steel must be annealed to restore its flexibility.

Yours sincerely

D. J. TIGWELL
Downfield Crossing
Bungalow, Stround

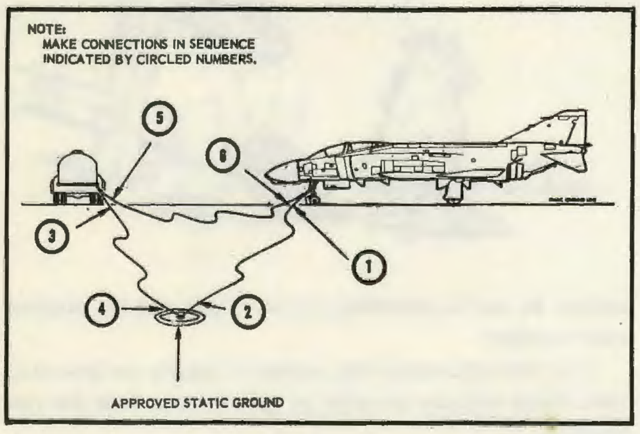
CHOCK TALK ...incidents and incidentals

STATIC ELECTRICITY

by TSgt Whiting
TAC/SEG

When equipment is in operation, material is being processed, or men are working, static electricity is produced. Moving belts, turning pulleys, and the flow of liquid gas or steam through pipes can produce a spark that could trigger sensitive powders or volatile liquids into an explosion or fire. The safe way to neutralize static electricity is static grounding. Recently, the IG has been finding many examples of improper groundings in refueling/defueling operations.

TO 00-25-212, Static Electricity and Stray Current in Air Force Refueling Systems, explains the theory, nature, and methods of reducing static electricity hazards. Grounding, bonding, operating, and inspection procedures are outlined in detail. TF 5924, a 21-minute color film titled "Static Electricity," is a good film of the subject. Personnel working in areas where static electricity presents a hazard should familiarize themselves with applicable directives, and if possible, view the film. We can't afford to lose valuable resources through misuse, or failure to use simple static grounding equipment.



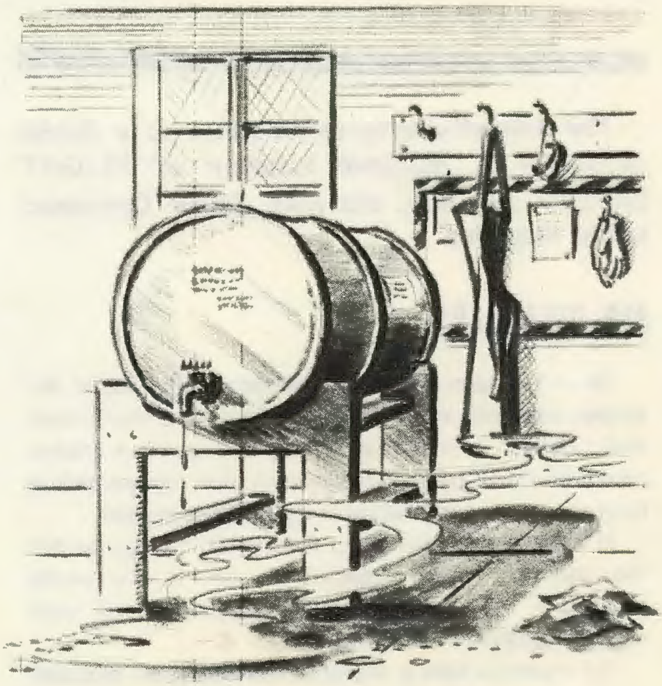
CLEANING SOLVENTS

Courtesy, F-5 Technical Digest

Just because a cleaning solvent is approved for a specific job does not mean it is safe to use without taking precautions. This was recently demonstrated when a crew chief removed a section of engine cowling and doused the oil-covered engine with solvent. The engine had been shut down minutes earlier and was still hot, causing the solvent to vaporize and ignite, extensively damaging the engine and remaining sections of the cowling.

Fire is only one danger. Toxic effect of vapors and irritation from skin contact are others. When working with cleaning solvents, always keep the following in mind:

1. Any mineral base solvent is capable of igniting spontaneously at some specific temperature. Always make sure the engine is "cold" before spraying with solvent, and use only in areas free from open flames.
2. Vapors of solvents are toxic. Always use in a well ventilated area.
3. Solvents can irritate the skin. Remove saturated clothing as soon as possible and cleanse skin.
4. Should any solvent be accidentally swallowed, get medical attention immediately.



5. Always use a solvent approved for the job to be done, and keep in mind that special precautions may sometimes be required. Some solvents used to degrease engine parts, for example, are so potent that any skin contact requires medical attention.

6. Use all protective equipment required for the job. The use of goggles, respirators and rubber aprons may not be optional – check your tech data.

If ever in doubt about what precautions are necessary, check the manufacturer's warning label – if you're still not sure, check with your supervisor.

TRANSIENT ALERT–INADVERTENT CANOPY JETTISON

During a night refueling on an F-4, the Transient Alert attendant noticed fuel/venting overboard from the fuselage vent mast above the drag chute compartment. The drag chute had failed to jettison prior to engine shutdown, so the attendant stopped the refueling and decided to try to jettison the chute to avoid soaking it with JP-4. His intentions were good, but his decision to go it alone wasn't. Using only a parking wand for illumination, he reached in the front cockpit. Instead of pulling the drag chute jettison handle, he grabbed the canopy jettison handle. The canopy fired off as advertised.

The lessons are obvious, but they need repeating:

1. Never fool with cockpit controls or switches you're not qualified and/or certified to handle.

2. If you are qualified to operate in a cockpit, be sure you have enough light to see what you're doing. You don't spend enough time in an aircraft's "office" to pull a blindfold cockpit check, so don't even consider it.

There's one more bit of information worth passing on if you need to remove an F-4 drag chute. It's designed to be released through chute inflation by engine thrust. When the chute is collapsed, the retaining link slips away from the release mechanism opening, making it very

difficult to separate the drag chute with a steady pull on the chute lanyard. The best way to separate it is to work the chute lanyard in a whipping motion. This allows the retaining link to slide up to the release mechanism opening and fall free.

This info is for those who are qualified to perform drag chute jettison in the first place. We don't want to kill your "can-do" attitude . . . we only want you to be aware of your responsibilities and do the best job you can within those parameters. When in doubt, call for expert advice.

Hey! pass it along... nine others are waiting.

EGRESS EXPLOSIVES SAFETY

By Capt John N. P. Reisbick
Hq TAC/SEW

Egress components remain the major items involved in explosives mishaps. In 1974, 30 out of 92 explosives mishaps involved egress systems. Nothing gains attention faster than undesired, unexpected and unwarranted inadvertent activation of egress components. A few examples are in order:

Two qualified egress specialists were removing a seat bucket for inspection. The survival kit piston motor actuator inadvertently fired when the lanyard snagged on the guillotine safety pin, pulling the mode select arm into the automatic position. The safety pin slid down the actuator lanyard, removing the actuator block, thus firing the actuator piston motor. Cause: The specialists failed to properly secure the actuator lanyard and exercise caution when lifting the kit. Familiarity with the task sometimes breeds inattention.

The WSO was lowering his seat during taxi back to the parking ramp. As the seat lowered, the guillotine cartridge inadvertently fired, releasing all harness restraints. The CRU-60/P oxygen hose connector became lodged in the emergency harness release handle at some time during the WSO's strap-in. As the seat was lowered, the CRU-60/P connector jammed between the handle and the console, causing the handle to rotate upward and fire the cartridge. Cause: The WSO failed to exercise caution during preflight strap-in. The absence of a bracket to secure the connector set him up to fire the cartridge.

The crew chief, a contract civilian technician, was attempting to open the RAT door on a TF-104 to facilitate other maintenance. He moved the right leg strap, which was positioned behind the canopy jettison handle, to obtain access to the RAT actuator lever. He inadvertently activated the emergency jettison handle, separating the canopy from the aircraft. Cause: The technician failed to exercise caution while working in close proximity to egress components. Design location of the leg restraints increased his trauma.

Statistics verify a common denominator between personnel error and egress mishaps. Most are caused by noncompliance with tech data, compounded by inattention and/or complacency. From past experience, we know that 1975 explosives mishaps will occur primarily on the flight line; and most will be caused by people who don't use their books or common sense.

Supervisors — take a look at your training programs. Evaluate the use of tech data. Monitor the quality of maintenance. Talk to your people who work on the systems and to those whose lives may depend upon them. Identify your soft areas — harden them up, and your egress mishaps will decrease. >

WEAPONS MISHAPS

TAC DEC	TAC THRU DEC	TAC THRU DEC 1973		ANG DEC	ANG THRU DEC	ANG THRU DEC 1973
			EXPLOSIVE			
3	75	170	TOTAL	1	13	53
2	43	67	Personnel	1	7	36
0	27	70	Matériel	0	[illegible]	13
1	[illegible]	33	Other	0	0	4
2	[illegible]	15	MISSILE			
9	[illegible]	6	NUCLEAR			

TAC SAFETY AWARDS

Maintenance Safety Award


TSGT GONZALEZ

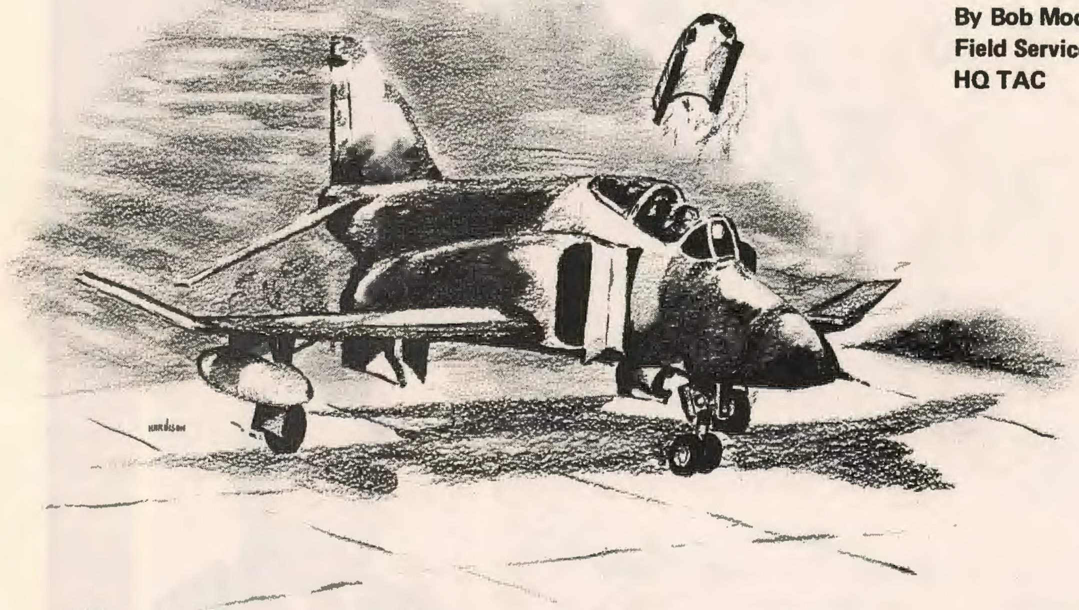
Technical Sergeant Louis G. Gonzalez, 834 Field Maintenance Squadron, 834 Tactical Composite Wing, Hurlburt Field, Florida, has been selected to receive the Tactical Air Command Maintenance Safety Award for this month. Technical Sergeant Gonzalez will receive a certificate and letter of appreciation from the Vice Commander, Tactical Air Command.

Crew Chief Safety Award


SSGT CURLE

Staff Sergeant John W. Curle, 425 Tactical Fighter Training Squadron, 58 Tactical Fighter Training Wing, Williams Air Force Base, Arizona, has been selected to receive the Tactical Air Command Crew Chief Award for this month. Staff Sergeant Curle will receive a certificate and letter of appreciation from the Vice Commander, Tactical Air Command.

F-4 STALLED CANOPIES



By Bob Moore, McDonnell Aircraft Co
Field Service Engineer
HQ TAC

Why does it still happen? Why do we keep on losing canopies? We're losing most of them for the same old cause – stalled during takeoff. Now this is a cause that can be eliminated if we will get our stuff together. The canopy locking system isn't that complicated – in fact, maybe it's so simple that we have fallen into that old rut of complacency. When a canopy is inadvertently lost, it seems we throw out the window (no pun intended) all past experience and knowledge of the canopy system. It appears that we have an uncontrollable urge to re-invent the wheel.

In a recent incident, a canopy popped up slightly during takeoff, demonstrating typical indications of a stalled canopy. Fortunately, that canopy did not depart the aircraft. However, there have been three other canopies lost during the past six months because they were stalled.

A stalled canopy results when it is restricted from closing completely and the actuator begins moving the mechanism to position the lock rollers in the hooks. Since the canopy is not completely closed, the lock rollers contact the hook points and bind up, instead of rolling into the hooks, resulting in misaligned locking stripes. The overcenter linkage, because of it's flexibility, continues to be rotated by the actuator to the overcenter position. The moment the linkage reaches the overcenter position, the canopy unlock limit switch is actuated, turning off the canopy unlock light. During takeoff, as the canopy raises up, the rollers are allowed to roll underneath the hooks. The departing canopy draws the piston rod out resulting in shear pin failure.

Why, then, do canopies stall? A stalled canopy is usually caused by one or more of the following:

1. Rain seal restriction.
2. A canopy that does not fit.
3. Foreign object in the mechanism or on the canopy sill.
4. Inflatable seal expanded prematurely.
5. High refrigeration air flow into the cockpit during canopy closing (throttle above idle).
6. Mechanism grossly out of rig.

Remember, once the canopy has been closed and locked properly and the mechanism is overcenter, it will remain locked. The actuator could, in fact, be removed from the aircraft at this point and the mechanism would remain locked.

Here are three things you, the aircrewman, can do to prevent stalled canopies.

1. Prevent FOD from entering the canopy rail area and/or the canopy mechanism.
2. Insure throttles are at idle during canopy closing.
3. Be positive that the locking stripes are aligned.

These checks can prevent lost canopies due to stalling. Keep your bonnet on.

FLEAGLEGRAM

RESPONSES FROM THE FRONT

Editor:

I would like to point out the importance of the survival vest. I was a door gunner on a UH-1N Green Hornet helicopter with the 20 SOS at Cam Rhan Bay RVN in '71. Our aircraft was brought down by enemy fire and we crashed in a rice paddy. Myself and the other gunner both took AK47 shell hits in the buttocks and hips. The policy in the squadron was that you didn't have to wear the vest, but you had to have it in the aircraft. On impact, the other gunner's vest was thrown out of the bird. We were in 3 feet of water and both bleeding heavily. My other gunner died from loss of blood, but I was luckier – I had my vest on and used the bandages from it to pack into the wounds. This stopped the bleeding enough to save my life and I'm grateful for it – and for the instruction I received at survival school. If it wasn't for that school, I wouldn't be alive today.

RICHARD T. KING, Sgt
834 MMS
Hurlburt Fld FL

You may have been lucky to make it out alive, but in our opinion you made your own luck by being equipped and prepared for the situation. It's too bad the guy who made the squadron policy that the wearing of the vest was optional didn't share your attitude. The equipment is available for your use and there are several survival schools (plus unit-level continuation training) designed to teach you to use the equipment you have. If you take advantage of these things (as you obviously did) your chances of surviving a hairy experience are greatly increased, and after all that's the whole idea behind life support. We would much rather hear from you and others like you than read about fatalities.

Capt Mike Byers
TAC Life Support Branch

Editor:

Recently I attended a Drug/Alcohol Abuse Class as directed by the USAF. The class was an excellent one. However, there were no procedures relative to "First Aid" for the drug/alcohol victim. What can one do until highly trained personnel arrive on the scene in the event an individual is under the influence of drugs or alcohol? How can you secure safety for the individual and the property in the immediate area?

The idea is to formulate a "First Aid" procedure such as we have for other health circumstances, such as drowning, electrical shock, etc.

JAMES H. WOOTEN, MSgt
31FMS
Homestead AFB FL

First aid for drug and alcohol victims is basically the same as for any other life-threatening emergencies:

1. Position the victim on his side, to prevent him from choking.

2. Make sure his throat is clear of any fluids or foreign materials and that his tongue is not blocking the airway.

3. Perform mouth-to-mouth resuscitation if he is having trouble breathing.

4. Cardiac massage should be performed if the heart has stopped.

5. Hyper-active subjects should be calmed as much as possible to protect the victim (and yourself).

6. Keep the victim as warm and comfortable as possible.

Where possible, your first action should be to inform a bystander to telephone for medical assistance, but don't leave the victim unless it's absolutely necessary and you've done all you can.

letters to the editor

From our whazzit department . . .

We've had this photo in our files quite some time, but when we're asked what the hey is going on, we can't come up with an answer. If any of our readers know the story behind this corn clipping' T-bird, please drop a line and fill us in. It's keeping us up nights. –ED

"The 8th Tac Ftr Wg will hold its annual reunion during the period 28 Feb. – 2 Mar. 1975 at the Crystal City Marriot, Arlington, Va. Contact Major Ken Keller, HQ USAF/XOXXE, Washington, D. C. 20330. Ph. 57741."

FLIP QUIZ ERROR

Editor:

Found your test on symbology in the Dec 1974 issue interesting. Suggest your man in charge of compiling the test be required to check symbol number six. In line with this request, I am submitting this as a "Correction to Publ". Symbol shown should be identified as an ADIZ rather than a FIR.

CHARLES K. DAY
772 Buckley Rd
St Louis MO 63125

Reference symbol 6 from the quiz in your December 74 issue, is defined in the current High Altitude Charts as an Air Defense Identification Zone (ADIZ) which was not a choice on your quiz. By elimination, it seems the only definition remaining to describe symbol 6 was your FIR boundary which is shown differently in the charts. Could this be an error or have I overlooked something?

1/LT LYNN M. RANDEL
Base Operations Officer
933 Combat Support Sq (AFRES)
Gen Billy Mitchell Field Wisconsin

I enjoyed your quiz on FLIP symbols in the December issue of TAC ATTACK.

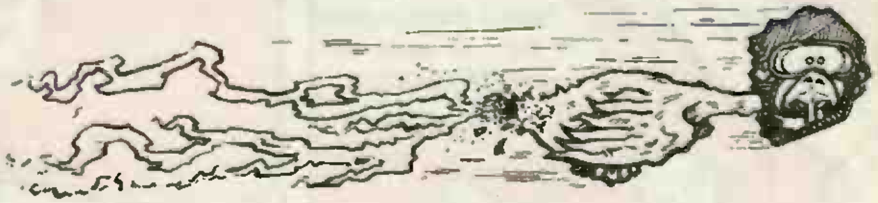
I did notice a minor error on symbol number 6, I believe the symbol represents and ADIZ and not an FIR boundary.

MAJ PRESLEY W. DONALDSON
136ARG (TEX ANG)
Hensley Field, Texas

We would like to say we purposely included a mistake to see if any of our readers were paying attention, but we didn't; we goofed. Symbol # 6 was, indeed, an ADIZ boundary and not an FIR boundary. We got caught with our symbols down. It should have been and not – ED.

☆ U.S. GOVERNMENT PRINTING OFFICE: 1975-635. 210/7

TAC TALLY



	TAC DEC	TAC Thru Dec 1974	TAC Thru Dec 1973	ANG DEC	ANG Thru Dec 1974	ANG Thru Dec 1973	AFRES DEC	AFRES Thru Dec 1974	AFRES Thru Dec 1973
TOTAL ACFT. ACCIDENTS	3	23	40	1	20	16	0	6	1
MAJOR ACFT. ACCIDENTS	3	19	27	1	19	11	0	4	1
AIRCREW FATALITIES	4	13	27	0	8	1	0	2	2
TOTAL EJECTIONS	2	18	26	0	10	8	0	2	1
SUCCESSFUL EJECTIONS	2	16	15	0	8	7	0	1	0

FIGHTER/RECCE WINGS ACCIDENT FREE MONTHS		
81	33 TFW	TAC
48	4 TFW	TAC
33	127 TFW	ANG
30	31 TFW	TAC
28	121 TFW	ANG

OTHER UNITS ACCIDENT-FREE MONTHS		
144	130 SOG	ANG
124	2 ADGP	TAC
113	136 ARW	ANG
105	143 SOG	ANG
93	DET 1, D.C.	ANG

MAJOR ACCIDENT COMPARISON RATE 73-74

		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
TAC	73	5.0	5.1	5.1	4.2	4.3	5.0	4.8	4.4	4.2	4.1	4.2	4.1
	74	4.5	5.4	5.6	4.5	4.0	3.6	3.0	3.1	3.0	2.9	2.8	3.1
ANG	73	8.5	8.6	6.8	5.0	4.7	5.1	4.3	4.2	4.6	4.2	3.9	3.8
	74	7.2	8.6	8.2	5.7	6.9	7.0	7.6	6.6	6.3	6.4	6.9	6.4
AFRES	73	14.9	6.7	4.1	3.2	1.8	1.5	1.3	1.1	1.0	.9	.9	.8
	74	0	16.4	8.9	8.8	6.7	5.3	5.8	5.0	4.3	3.8	3.5	3.3


FLEAGLE
YA' KNOW ROB, PILOTS REALLY HAVE TO KEEP UP WITH THE LATEST CHANGES.
YEAH, WITH TODAY'S NEW AIRCRAFT, THERE'S A LOT TO KEEP UP WITH...
AND THE TRAINING WE GIVE OUR AIRCREWMEN STAGGERS THE MIND.
© Continental Features, Inc. 1975
WITH ALL THEY HAVE TO KNOW WE ARE LUCKY TO BE BLESSED WITH SOME MIGHTY GOOD STICKS...
HARDISON
HOWEVER, THERE IS ALWAYS THAT 10% THAT DIDN'T GET THE WORD AND REQUIRE ADDITIONAL GUIDANCE.
WING D.O.