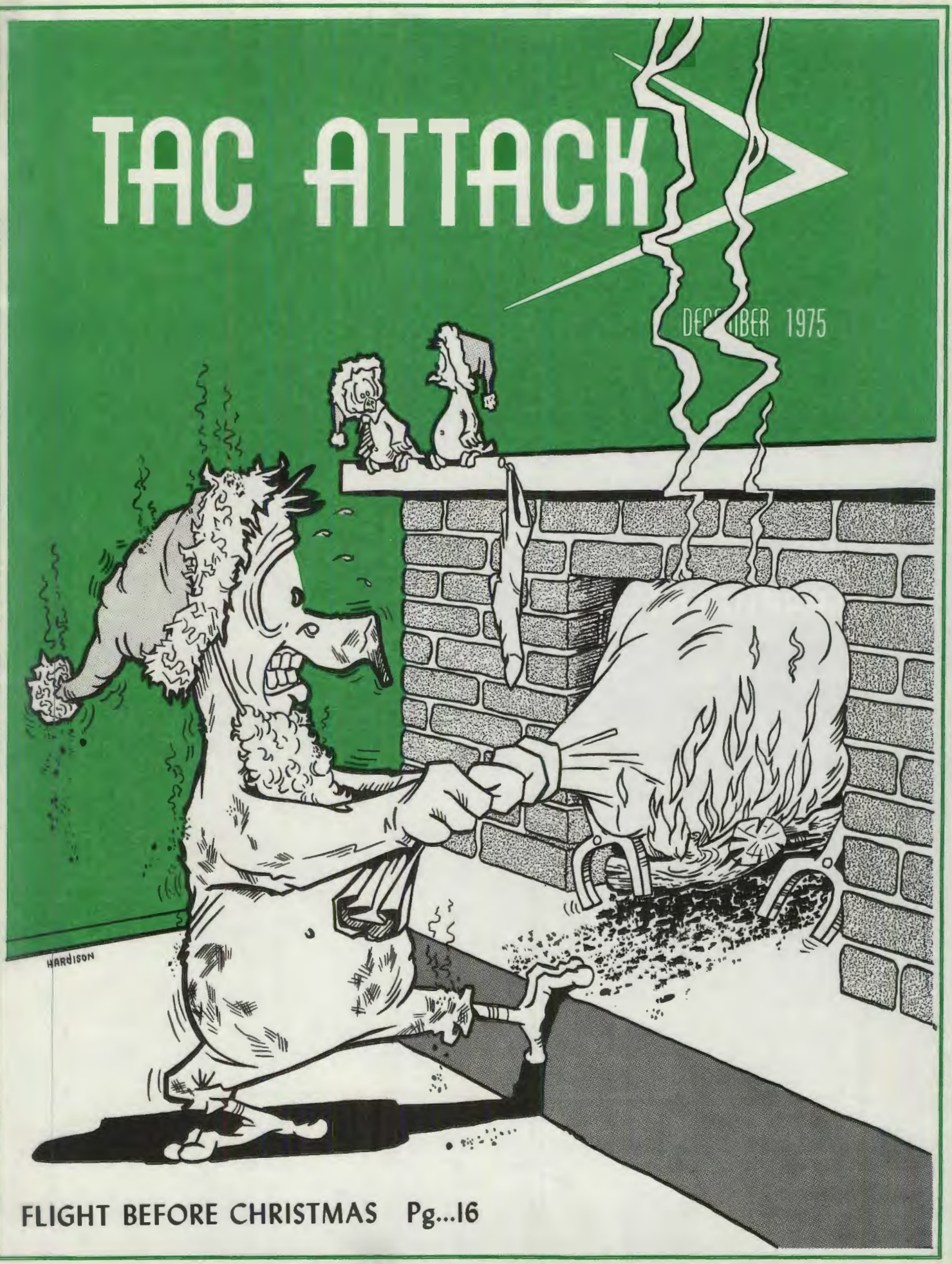
TAC ATTACK

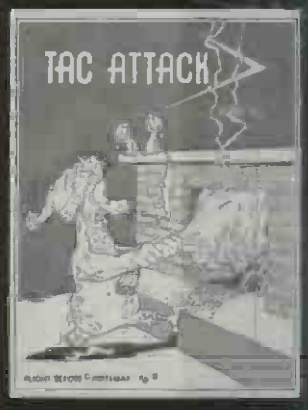
DECEMBER 1975



TAC ATTACK DECEMBER 1975 VOLUME 15 NUMBER 12

TAC ATTACK

FOR EFFICIENT TACTICAL AIR POWER



FEATURES

DEPARTMENTS

TACRP 127-1

Angle of ATTACK

HOLIDAY DRIVING

COL J.D. MOORE
Chief of Safety

The Christmas and New Year holiday season invariably brings a sharp increase in accidental deaths and injuries. Last year, three TAC people died in automobile accidents between 20 December 1974 and 5 January 1975 - tragic losses during an otherwise joyous season.

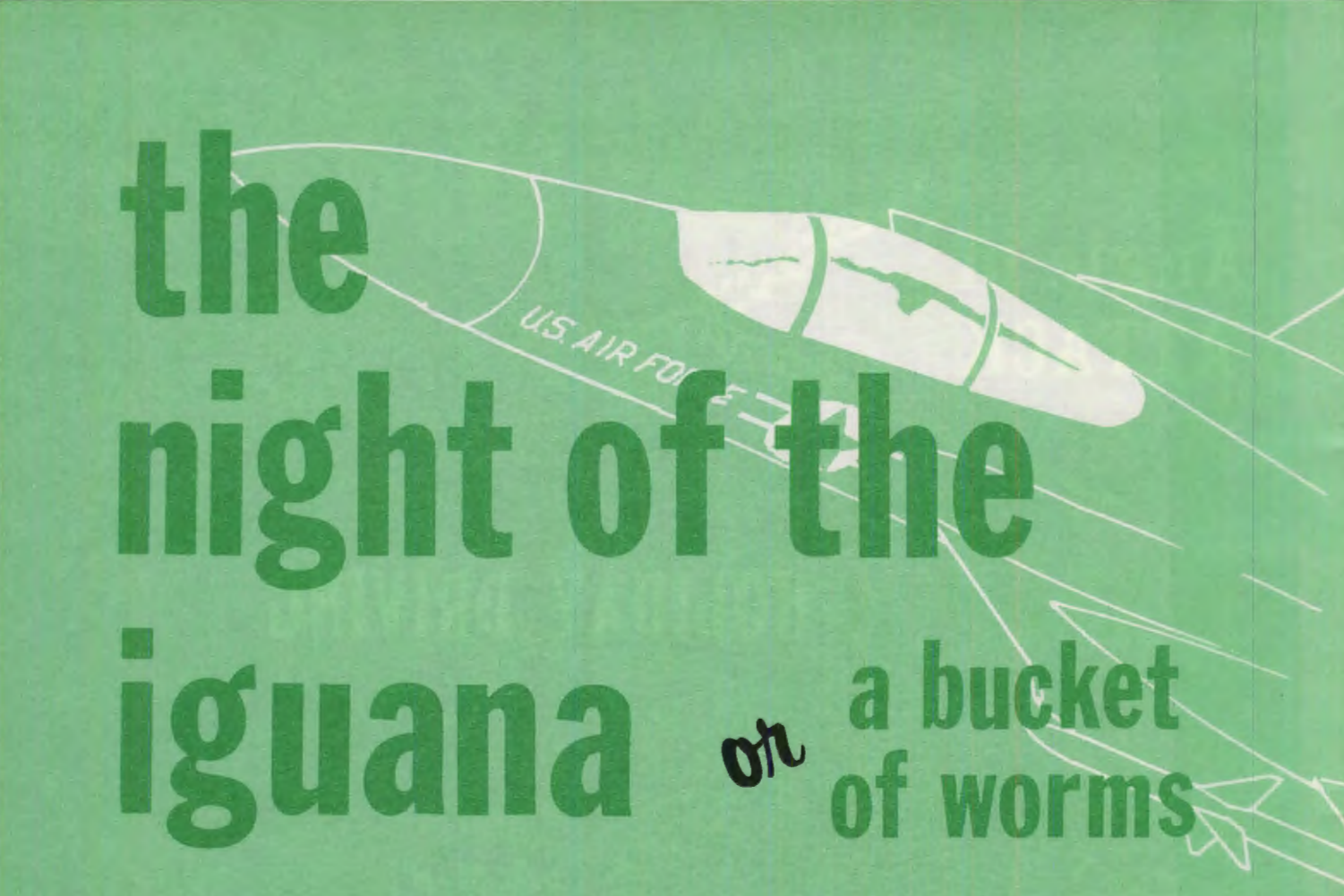
Several conditions combine to make these holiday periods particularly dangerous. More people travel to visit friends and relatives. There is increased exposure to crowded highways, bad weather and longer hours of darkness. Combine these with an increased consumption of alcohol (involved in two of last year's mishaps) and we have an accident looking for a place to happen. One more factor has been added ... the 55-mile-per-hour speed limit. While this lower speed limit has saved lives, it can also increase the time drivers spend behind the wheel. We cannot cover the same distances as before without taking more time and becoming more fatigued.

Commanders, functional managers and supervisors, with the help of their safety people, should plan now to combat holiday deaths with an aggressive safety education program. Initiate a "Lights on for Safety" program for the Christmas and New Year holidays. Recommend that drivers of both government and privately-owned vehicles drive with headlights on during the day. Lights increase other drivers' safety awareness and make vehicles easier to see, especially in bad weather and during the dawn/twilight hours.

Safety education works - if applied conscientiously and enthusiastically. Use the tips offered in the article on page 20 of this issue. Stress the importance of sobriety and allowing ample time for travel. Films, posters, newspaper articles and vehicle inspection programs are some of the other tools available to commanders and supervisors. Death never takes a holiday ... let's bring 'em back alive at the end of '75.

Have a good one!

the night of the iguana or a bucket of worms



By Maj Wiley E. Greene
162 TFTG
Ariz ANG

Once upon a time, in the land of Nod, there dwelt a most rich and powerful King. Being both rich and powerful, it was necessary for him to equip and maintain a large contingent of Mounted Horse. As is the wont of Mounted Horse, a weekend jaunt in the country was scheduled on the Monthly, confirmed on the Weekly and checked on the Daily. (The King became very angry if the procedure or the tail number changed in any way, shape or form.) And so it was that one of the Mounted Horse did gallop through the countryside.

Over fields of snow, leaping past green forests, onward he rode until finally stopping to rest at one of the King's Stables by the Sea. A day of Rye and Rest (one day to be called "R and R") and One of the Mounted Horse chose to return to his castle. The King, with much cajoling and begging by the Barons of each region, had built stables across the land so that his Mounted Horse could be dispersed for training, alert, and all sorts of wondrous reasons, and these stables were very good for obtaining sustenance for the wandering Horse. Marvin the Marvel had even given the King's Stables marvelous ways of talking to each other. The One of Mounted Horse talked to King's Stable One and he could not go there because the Keeper of the Stable feared the arrival of the King's Helpers. The One of Mounted Horse spoke with


LONG

...night of the iguana

King's Stable Two and he could not go there because the Keeper of the Stable wanted only Messengers of the King to use his Facetious Facility. The Royal Weather at Stables Three, Four and Five were royally rotten and Horse wouldn't like it so One of Mounted Horse had to look far afield to find a Stable of Suitable Status. Finding one was not easy, and the distance was one to stretch the capability of Horse's Stomach. But the Royal Weather was Field Grade and One of Mounted Horse rode into the Setting Sun.

Voices of the Grunts followed One of Mounted Horse as he traveled first across the Big Water and then the Land of Gators, but it was as he entered the Land of Gators that One of Mounted Horse became concerned. Wind of the West had become angry and was making it most difficult for Horse to make his way. As it was, in the Land of Gators that One of Mounted Horse was denied the use of the King's Stables, so he and Horse pushed forward. Voices of the Grunts spoke reassuringly of Royal Weather in the Land of Tall Words. Although One of Mounted Horse was suspicious, for it was one of the Grunts that proclaimed that Wind of the West was happy that day, he sat easy and waited for the banners of King's Stable Twelve to break the horizon. Being smarter than the average Bear and well trained in the Art of Subterfuge, One of Mounted Horse attempted to talk to Stable Twelve's Watcher of the Weather. But there was no talk from Stable Twelve. Voice of the Grunt suggested that One of Mounted Horse get with it and steer Horse towards the stable, which was done. Horse was getting hungry and One of Mounted Horse was glad to hear the Voice of Stable Twelve Grunt, but was startled to hear that Field Grade Weather had turned into Five Hundred and One with Blowing Snow. A naughty word came to mind when asked what his intentions were, but One of Mounted Horse didn't get to say it for Fate then crumped the UHF. Knowing that Horse was too hungry to make it to the Alternate Stable, One of Mounted Horse quickly steered Horse onto the Path of TACAN and silently promised to make an offering to any Good Fairy who would get him onto the Stable Grounds without breaking something. His promise was heard for One of Mounted Horse was shown the Light of the Strobe and Horse was gently guided to his stall. Stable Twelve Weather Watcher later declared "Below Minimums" and One of Mounted Horse quietly drifted to the Club.

(Horse and One of Mounted Horse spoke of their adventure only after many moons had passed over their Home Drome.)

Now it is the Time of Flaky Weather once again and One of Mounted Horse comes forth to leave these Wondrous Words to History:

"Fear not as you wander across the countryside for few peasants are hostile, but look to your Horse and do not short his stomach. Verily I say to you that if all of your eggs are in one basket they will be scrambled."

TACTICAL AIR COMMAND

AIRCREWMEN of DISTINCTION

On 10 October 1975, Captain Gilbert and Second Lieutenant Connell, a student crew in the F-4E, had completed a live DART firing and were returning to base. On GCA base leg, Captain Gilbert lowered the landing gear and Lieutenant Connell immediately noticed that the main gear was down and locked, but the nose gear indicated unsafe. He advised Captain Gilbert, who recycled the gear in an attempt to get a down and locked indication. The main gear retracted and locked, but the nose gear remained unsafe. At this time, they noticed a master caution light, a check hydraulic gauges light and zero utility hydraulic pressure. Captain Gilbert flew the aircraft past the tower and was advised that the nose gear was cocked down at a 45° angle.

Captain Gilbert accomplished emergency gear lowering procedures while Lieutenant Connell read the appropriate emergency checklist. Main gear indicated down and locked, but the nose gear still indicated unsafe. They were joined by a chase pilot who confirmed that the nose gear was cocked down at about 45°. Captain Gilbert porpoised the aircraft in an unsuccessful attempt to get the nose gear down. During this time, the runway was being foamed for their landing. A practice straight-in approach was flown, so that Captain Gilbert and Lieutenant Connell could familiarize themselves with the foam strip. Another straight in was flown to landing. The aircraft was landed short of the foam, the nose gently lowered into the foam, and then the drag chute was deployed. Directional control was maintained by judicious use of emergency brakes. After the aircraft came to rest, the crew shut down the engines and egressed normally. Due to Captain Gilbert's accurate touchdown, exceptional skill in easing the nose down to the runway, and keeping the aircraft in the foam, damage was limited to scraping of the 20mm cannon muzzle fairing.

Excellent crew coordination, professional judgement, and skill resulted in recovery of a valuable combat aircraft with minimum damage. Their actions qualify Captain Gilbert and Lieutenant Connell for this month's TAC Aircrewmen of Distinction Award.

Capt William H. Gilbert
4501st Tactical Fighter
Replacement Squadron
56th Tactical Fighter Wing
MacDill AFB Fla

2d Lt Thomas M. Connell
4501st Tactical Fighter
Replacement Squadron
56th Tactical Fighter Wing
MacDill AFB Fla

TAC TIPS

tac tips

interest items, mishaps with morals, for the TAC aircrewman

It is not enough to do good;
one must do it the right way.
John Viscount Morley

ATTITUDE CHECK

Everything looked normal as the A-7 took off. At approximately 1700 feet AGL, the SLUF entered the clouds. As a left turn was initiated, the ADI "froze" in pitch and bank - without warning or failure indications. The heading portion of the ADI operated normally, but pitch and bank references were frozen in a level flight attitude. The ADI "OFF" flag did not appear nor did the IMS "DUMP" or "IMS NOT ALIGN" lights illuminate. Fortunately, the jock had a quick crosscheck, noticed the malfunction, and caged his eyeballs to the standby attitude indicator(which was operating normally) before a dangerous attitude was attained.

Although the A-7D's ADI off-flag warning system is designed to actuate when the system encounters IMS power failure, indicator failure, or general power failure, it is obvious there are certain insidious malfunctions that can occur. These can be bad news to the jock who is slow on the gauges.

Oklahoma City ALC is conducting an in-depth investigation of not only how a failure of this type can occur, but more importantly, how to give the pilot some sort of indication that his primary attitude reference has failed, whatever the failure mode is.

Whether you're flying a SLUF, Phantom, Thud, Aardvark or whatever, remember to include the standby attitude indicator in your crosscheck. It could ruin your whole day if you don't.

TIGER SAVES TIGER

The F-5E was practicing low approaches to burn down fuel to landing weight. On the third approach, the Tiger II did not get a safe indication on the left main gear. Tower confirmed the gear was unsafe and another F-5 joined with the incident aircraft.

The flight departed the pattern and several attempts to lower the wheels were made using the alternate and normal gear lowering system ... neither worked.

The pilot then attempted to break the gear loose with varying airspeed and G loads. Varying G loads up to 3.5G were applied with no effect. Gear extension speed was then exceeded and G loads increased in an attempt to get the wheels down. On the final attempt, the pilot accelerated to 295 KIAs at 12,000 feet MSL, rolled into 135 degrees of bank and snatched 5.5Gs. The left main gear indicated safe! The pilot immediately slowed below extension speed and executed a straight-in approach and landing without further difficulty.

The left main gear actuator connector connecting pin had apparently backed out of the housing in flight and jammed against the aft well skin. This prevented both normal and alternate gear extension. G loads applied during attempt to lower the wheels caused the pin to rip through the skin in the wheel well and allowed the gear to extend. The roll pin in the gear assembly is designed to safety the actuator

connecting pin in position. The roll pin in the left wheel well of this aircraft was installed in the forward part of the casting, not the aft part as it should have been. In fact, the hole for the roll pin was misdrilled approximately two and one-half inches forward of its design position.

Why did the jock over-G the aircraft in an attempt to lower the wheels? Because he knew his aircraft well and knew that if he did not get that gear down he would have to eject. Rather than just following the procedures and jettisoning the aircraft, he did that little bit extra ... and as a result, proved himself a real tiger and saved a valuable aircraft.

O-2 SENDS LAU-68 PCS

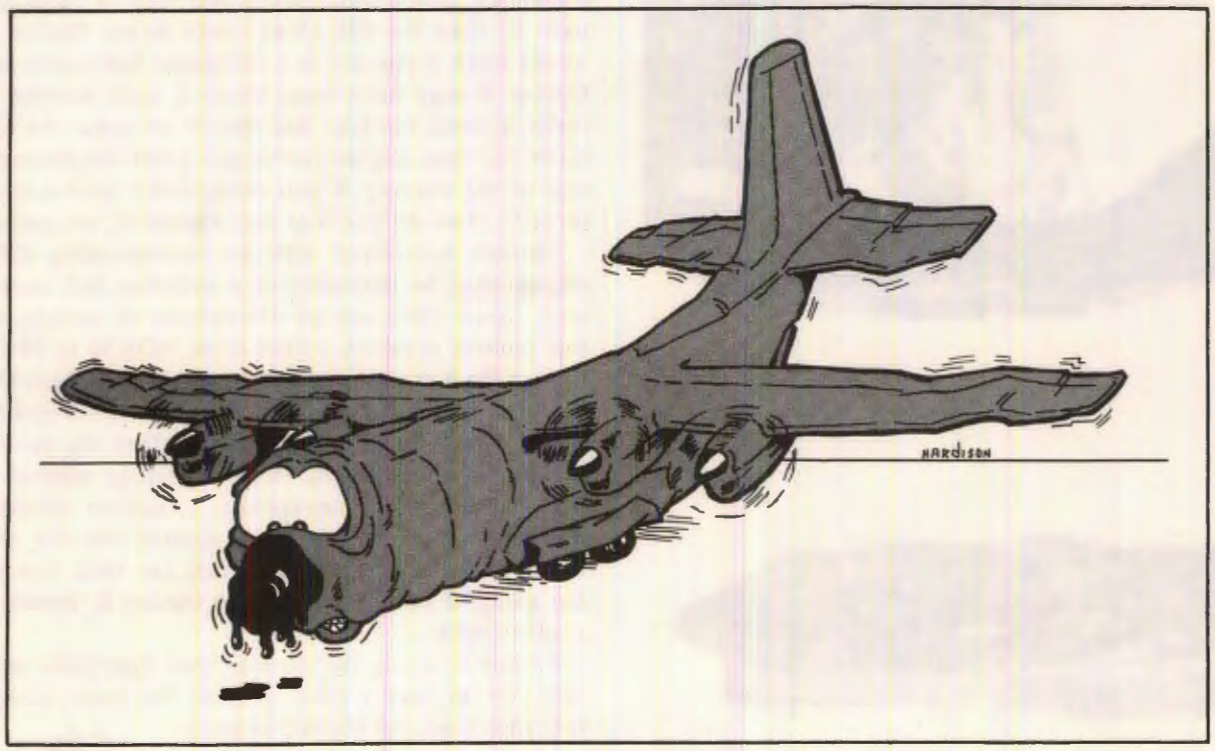
On the first pass after entering the range, the Oscar-Deuce driver mistakenly selected Right Outboard "drop" instead of "fire" on the armament control panel. The rocket pod was armed, the O-2 cleared in hot, and the jock squeezed the trigger. Result? One each LAU-68 rocket launcher and seven 2.75 rockets dropped off of the right outboard wing station ... unscorable at six. It seems as if we carry at least one article per month on this or similar subjects. Yet people continue to fail to use their checklists. Do the job right.

C-130 NOSE JOB

A C-130 got a nose job recently because of switchology problems. The Herky was taxiing for takeoff when the crew heard loud humming noises that seemed to be emanating from under the flight deck. The aircraft was stopped and an onboard observer scanned the nosewheel well area through the observation area. Nothing unusual was spotted, so the observer deplaned for a look-see. He noticed the radome was on fire! The crash crew responded quickly to the radio call and extinguished the fire, but not before the hurt Herky had received unauthorized plastic surgery to its proboscis.

It seems the Nav had inadvertently positioned the radome anti-icing switch to the AUTO position, and when the engineer ran his prop and engine anti-icing check during the taxi checklist, bleed air to the radome did its dirty deed. The switch is placarded and a caution note in Chapter 4 of the C-130 Dash-One warns of this problem, so it's up to you guys to prevent radome overheat/fire. This isn't the first time this has happened, but with your help, it could be the last.

No, we aren't trying to horn in on MAC FLYER. Lest you fighter jocks forget, TAC still has Herky gunships, Combat Talons and ABCCC birds ... and for you '130 guys, keep in touch! We need your inputs. -ED



EMERGENCY SITUATION TRAINING A-7

By Capt Marty Steere
HQ TAC/SEPP

SITUATION

You're doing confidence maneuvers in your SLUF at 15,000 feet. As you retard the throttle at the completion of one maneuver, the RPM remains at 99 percent. Throttle movements have no effect on RPM - wadda' ya' gonna' do now, Bunky?

OPTIONS:

A. Don't do anything and it will go away.
B. RTB and execute a stuck throttle approach.
C. Attempt to retard the throttle to the idle position and switch to manual fuel.
D. Get out of the simulator and tell the instructor you have to go fly.

ANALYSIS:

Option A works for us paper pushers and bean counters at headquarters nest, but if you don't do something fairly soon you'll run out of JP-4 and have to take the silk chute route home. Option D would work if you are in a simulator, but you're not. Option B may have some merit if your problem is really a stuck throttle. But there's no sense shutting down the only engine you've got 5,000 feet from the end of the runway if you really don't have a stuck throttle. How do you find out? Option C, of course.

Throttle movement with no corresponding RPM change may be indicative of a defective fuel control unit. Since there are no restrictions in moving the fuel control selection switch from NORM to MAN, we can do it even if the RPM is high. The Dash-One also recommends that if the throttle position and the engine speed are mismatched, to retard the throttle to idle before switching from normal to manual or back unless the emergency situation dictates otherwise. If a defective fuel control was the problem, you're back in business and can land with the fan going. If not, you're back to Option B. But that's another story.

So before trying the stuck throttle approach, make sure you do have a stuck throttle. Try going manual fuel and check out the fuel control.

SPO Corner

F-4 MARK III Anti-Skid System Update

By Capt Marty Steere, F-4 SPO

Some hot poop on the Mark III anti-skid system just came in. As most of you know, the Mark III improvement is derived from smooth, modulated valve operation and crossover protection which prevents wheel lock-up on a wet runway. The new system can be energized at high speed, without apprehension of a locked wheel.

In its present state, the Mark III system improved F-4 wet runway braking performance by 7.4 to 12.7 percent and dry runway performance by 9 to 13 percent. The manufacturer states that a minor valve change will provide a further increase in system response and braking effectiveness ... an additional 7 to 10 percent! Testing is underway to confirm this.

The following test results show the F-4 stopping distance and percent improvement velocities comparing present Mark II with the new Mark III system.

Brakes on Velocity	Total Distance (Feet) Wet Runway Mark II	Mark III	Percent Improvement
130.5	6050	5600	7.4
136.4	6700	6100	8.9
142.3	7500	6600	12.0
148.2	8250	7200	12.7
	Dry Runway		
142.3	3200	2900	9.4
148.2	3500	3150	10.0
154.1	3800	3300	13.1

Delivery of Mark III anti-skid system TCTO kits began last month at a rate of 100 kits per month. Installations will be at field level and an 18-month installation schedule is planned.

We'd like to give our special thanks to a former HQ TAC F-4 SPO, Lt Col Burt Miller. He was instrumental in pushing this mod through. Burt has traded in his B-B stacker and bean counter for a Starfighter at Luke. His efforts to get the MK III system may save a lot of Phantom jocks from riding the wild rhinoceros down a wet runway ... sideways.

F-111

Emergency Landing With Nose-Gear Retracted

While perusing the mass of papers on my desk, I came across an article by the folks at General Dynamics on "Emergency Landing With Nose-Gear Retracted." It has a good discussion of which procedure is preferred and why. So, here it is ... hope you like it as much as I did.

The current 1F-111( )-1 Flight Manual emergency procedures recommend an approach-end barrier engagement (AEBE) for a nose-gear-up landing. To date, there have been four cases where well executed landings have been made without using the barrier and one landing using the barrier. Damage was similar in all cases ... with or without barrier use.

WHICH PROCEDURE IS PREFERRED?

After review of the previous analysis and updating the study, General Dynamics still recommends the AEBE as the nose-gear-up emergency procedure if landing gross weight is within the available barrier capability and runway, weather and aircraft conditions permit.

What are the advantages of a Barrier Engagement?

1. AEBE applies positive control to the aircraft throughout the slide.
2. Potentially less aircraft damage.
3. Provides more precise foam placement and fire/rescue equipment location.
4. Reduces the risk of fire from both hot brakes/wheels and friction as brakes are not used and the aircraft sliding distance on runway is much less.

AEBE PROCEDURE

1. Touchdown in center of runway, 400 to 600 feet short of the cable.
2. Prior to cable engagement, lower aircraft nose to a level attitude.
3. Do not apply brakes.
4. Immediately after cable engagement, smoothly fly the nose to the runway while airspeed for control is available.

DISCUSSION

Figure 1 presents a diagram of the forces acting on the aircraft and rotating about the main

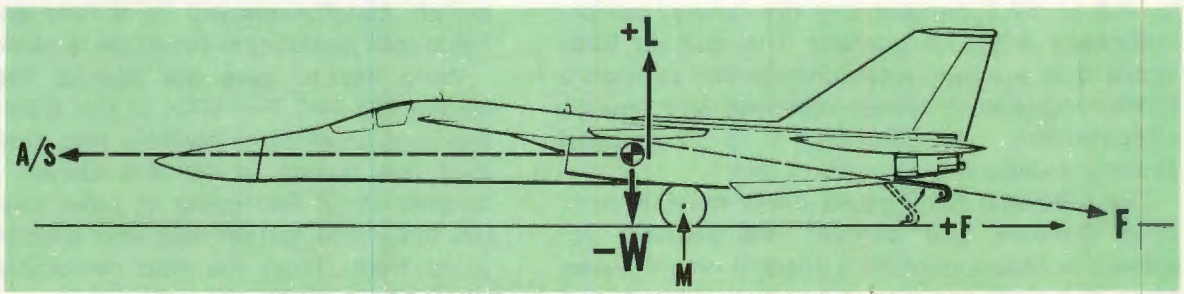


Figure 1 FORCE DIAGRAM WITH MLG ON RUNWAY AND NLG RETRACTED

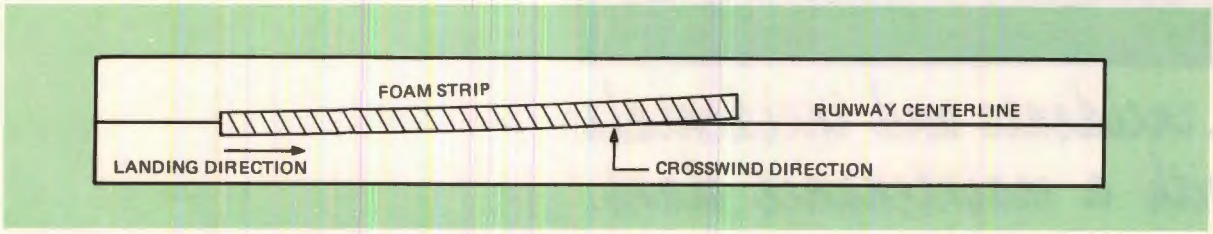


Figure 2A

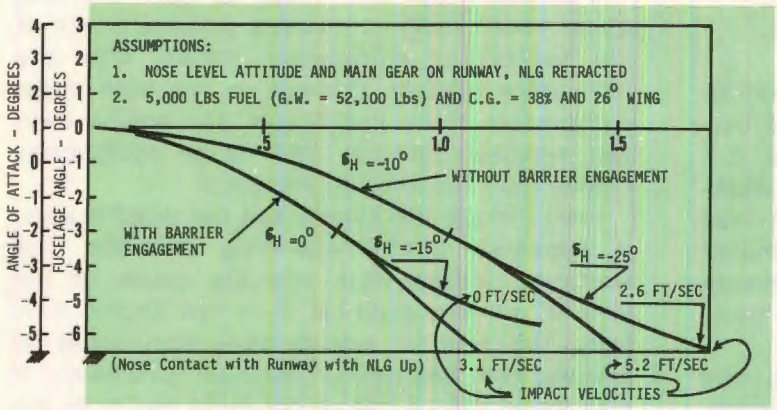


Figure 2 NOSE IMPACT VELOCITIES USING RECOMMENDED TECHNIQUES WITH & WITHOUT BARRIER ENGAGEMENT WITH NOSE GEAR RETRACTED

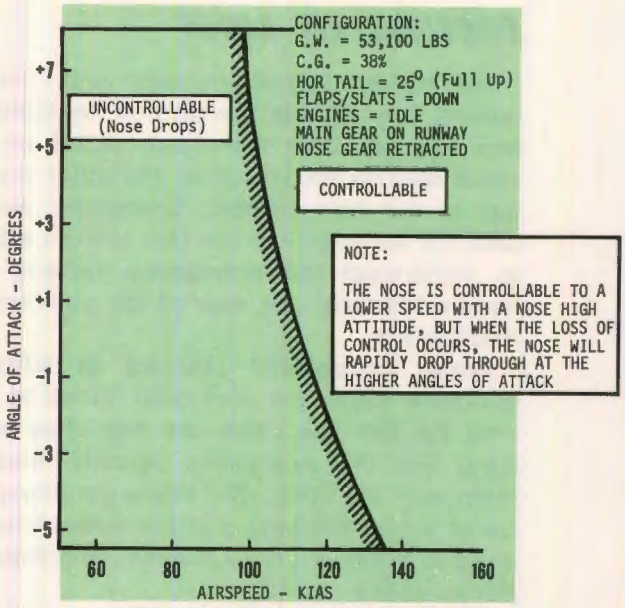


Figure 3 MINIMUM SPEED TO HOLD NOSE UP AT SPECIFIED ANGLE OF ATTACK

gear (not about the aircraft C.G.). Since aircraft gross weight (W) is such a dominant factor in the reaction forces, especially as airspeed and lift decrease, it is recommended that the fuel remaining be decreased to 5,000 lbs or less and 26 degrees wing be used for landing. This will move the center-of- gravity (C.G.) aft which will decrease the moment arm of the (W) factor.

Figure 2 presents a comparison of the predicted nose impact velocities with and without AEBE. The following techniques are recommended to minimize the nose impact velocity.

1. When the AEBE is used, smoothly fly the nose down to the runway by easing the stick back as the nose starts down immediately after engaging the cable. Continue to use back-stick until contact is made with the runway.

2. When barrier is not used, establish approximately 10 degrees TEU horizontal tail position as the foam is approached with the main gear on the runway and hold until -2 degrees angle-of-attack is reached, then apply full back-stick to minimize the impact velocity. Apply brakes with anti-skid engaged after getting the nose on the runway. If crosswind factors above 5 knots are present, spray the foam as shown in Figure 2A as the aircraft will tend to weathervane to the downwind side of the runway centerline during the slide on the foam.

Figure 3 presents the minimum airspeed for which enough tail power is available to hold the aircraft at a desired angle-of-attack (at a given gross weight and center-of-gravity) with the main gear on the runway.

Other very significant facts/trends revealed during the analysis are:

1. The barrier inputs a moderate nose-up moment into the aircraft. (Reference Figure 1).

2. The nose must be lowered to the runway above a minimum airspeed to minimize the impact velocity (Reference Figure 3).

3. The toal energy to be dissipated through friction (aircraft sliding on the runway) when the barrier is utilized is only 1/3 of the amount to be dissipated without the barrier.

CHOCK TALK

chock talk

...incidents and incidentals with a maintenance slant.

SURVIVAL KIT BLUES

Two egress technicians went to a Phantom to remove the aft seat bucket and facilitate a battery change. One technician stood on a B-1 stand reading the checklist; the other was working in the rear cockpit. Everything went well until the technician in the rear cockpit attempted to disconnect the emergency harness release handle link from the sear of the guillotine firing mechanism.

What happened? Instead of lifting the guillotine safety pin with both hands to disconnect the link, the safety pin was lifted with one hand and the emergency harness release was lifted with the other. The safety pin unexpectedly came out of the sear and the tension being applied to the emergency release immediately fired the guillotine cartridge.

OK, but the guys were following the checklist - right? Yes, they were - but the procedures in the checklist are presented in the shortest practical form for use by qualified personnel and are not intended to provide full technical instructions. Detailed instructions are given in the basic Tech Order and should be known by qualified personnel. If you are not absolutely sure of the detailed procedures, refer to the Tech Order.

ENGINE SPECIALISTS MAKE PILOTS SMILE

An F-4E was on the trim pad for troubleshooting an engine write-up. Prior to engine run, the engine specialist performed a thorough FOD inspection and noted a small nick on a first stage compressor blade. The nick appeared to be within tolerances and inspections by three different supervisors revealed no damage to the next four stages.

A decision was then made to open the inlet guide vanes (IGV) to make a positive check of the succeeding compressor stages. After the IGVs were opened, damage to the sixth stage compressor blade was found. The engine case was removed and the 14th stage compressor blades were found to be damaged.

Even though the engine had damaged blades, it appeared to be operating normally. The damaged blades were not the cause of the original engine write-up. It is not known how long the engine would have continued to operate with this type of damage. Fortunately, it was found before one of our jocks had to fly the Phantom back to the home drome sans one engine.

The people at this unit showed they are true professionals. They didn't take the easy way out. Even though no serious damage was apparent at first, they expended a lot of time and effort checking for further damage ... and it paid off. A "good on ya."

FIZZLED SIDEWINDER

The munitions load crew loaded an AIM-9 on the AERO-3B launcher. During the scheduled mission, the aircrew performed several AIM-9 attacks and the captive missile operated normally.

When downloading the missile, the crew noticed burn marks on the guidance and control unit and no captive missile adapter plug installed. The squib had functioned and the gas generator grain expended.

Looks like another failure to follow Tech Data. This time it cost Uncle Sam $3,258.00. TO 1F-4C-33-1-2, para 11-8, step 2 states: "Install captive adapter." Let's save some of those hard-earned tax dollars and conserve our combat capability -- use Tech Data.

without clothes in the land of snows

The pilots of an F-4 (another command), recently lost their clothes en route to the cold country from a Southern U.S. location. The Phantom took off as number three in a four-ship during the early morning darkness. After the sun came up, another aircraft noticed number three's cargo carrier was missing. The separated cylinder was located on a beach near the departure base.

What happened? You're right ... failure to follow Tech Data. Step 1B of TO 1F-4C-35 C1-9, (accessory installation) was not followed. A drilled bolt, castellated nut and cotter pin were not installed.

Not using Tech Data resulted in not only the loss of the cargo carrier, but two slightly chilled jocks. Use Tech Data ... it'll give everyone a warm feeling.

THE FLIGHT BEFORE C

Now listen closely and you shall hear,
The strangest tale in many a year.
The story of how, on a Christmas long past,
My meeting with Santa was nearly my last.

CANTO I

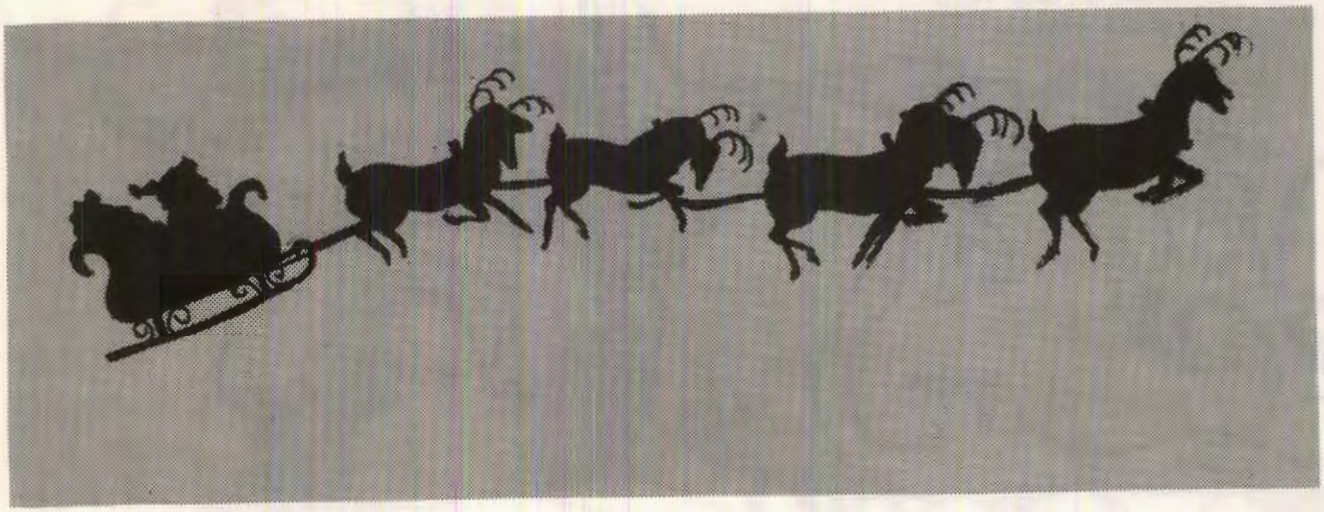
'Twas the flight before Christmas
And from all o'er the base, the crew had assembled
For the flight to take place.
The pilot was busy preflighting
the craft,
Checking fuel load and compasses,
flight plans and raft.
He was weary and worn, but with
no thought of bed,
For visions of home danced
'round in his head.
Our baggage was stowed with the
usual care,
In hopes for a smooth ride through
unstable air.

And I in my hardhat with chinstrap
pulled tight,
Settled down in my comfortable
seat on the right.
The crew climbed aboard through
the new-fallen snow,
All carefree and happy and
anxious to go.
With checklists completed (we
knew them by heart),
I raised up a thumb -- we were
ready to start.
Then out on the wing there arose
such a clatter,
That I turned in my seat to
see what was the matter.
All engines were high time, but
for this hop they'd run,
We got clearance to taxi, the
flight had begun!
The moonlight, reflected by
new-fallen snow,
Gave the ice on the runway a cold,
eerie glow.
Now lurching, now skating, to the
duty we slid,
And conducted our runup in a
slight starboard skid.
We got clearance to take off, climb
and report,
And I hoped as we rolled that we
wouldn't abort.
We swerved and we slithered,
then at once we could tell,
That we'd broken ground safely
and had wheels in the well.

HRISTMAS

CANTO II

IFR was the way that our flight
plan decreed,
And relieved after takeoff,
we put down our beads.
Then all settled down to the
tedium of flight,
Lookouts peering sharp toward the
depths of the night.
The sky was so dark, there was
barely a light,
From stars or moon to guide us
just right.
"Fear not," said our pilot, his
voice calm and dry,
"Always travel on gages -- 'tis the
one way to fly." Then suddenly what, to my
eyes should appear,
But a miniature sleigh and eight
tiny reindeer.
Closing fast from below -- we had
to be quick,
For I knew we were about to
collide with St. Nick!
"Pull up!" I screamed, my hair
all on end,
"Great snakes! Christmas Eve!
Will this be our end?"
Lucky for us, my reflexes were
quick,
I gave a great heave and pulled
back on the stick.
More rapid than eagles our courses
converged,
And as he whistled on by us, my
heart gave a surge.
With reindeer in front and a
small sleigh behind,
It was too small a target for Center
to find.
We looked back with awe as he
sped through the night,
With no visible means to sustain
him in flight.
And I shuddered to think of the
Yuletides to come,
And the damage to all that might
have been done.
My friend, it was truly an incident
rare,
And in silence we churned on
through the night air.
Silent and pensive, no longer
carefree,
Each one straining his eyes
through the darkness to see.



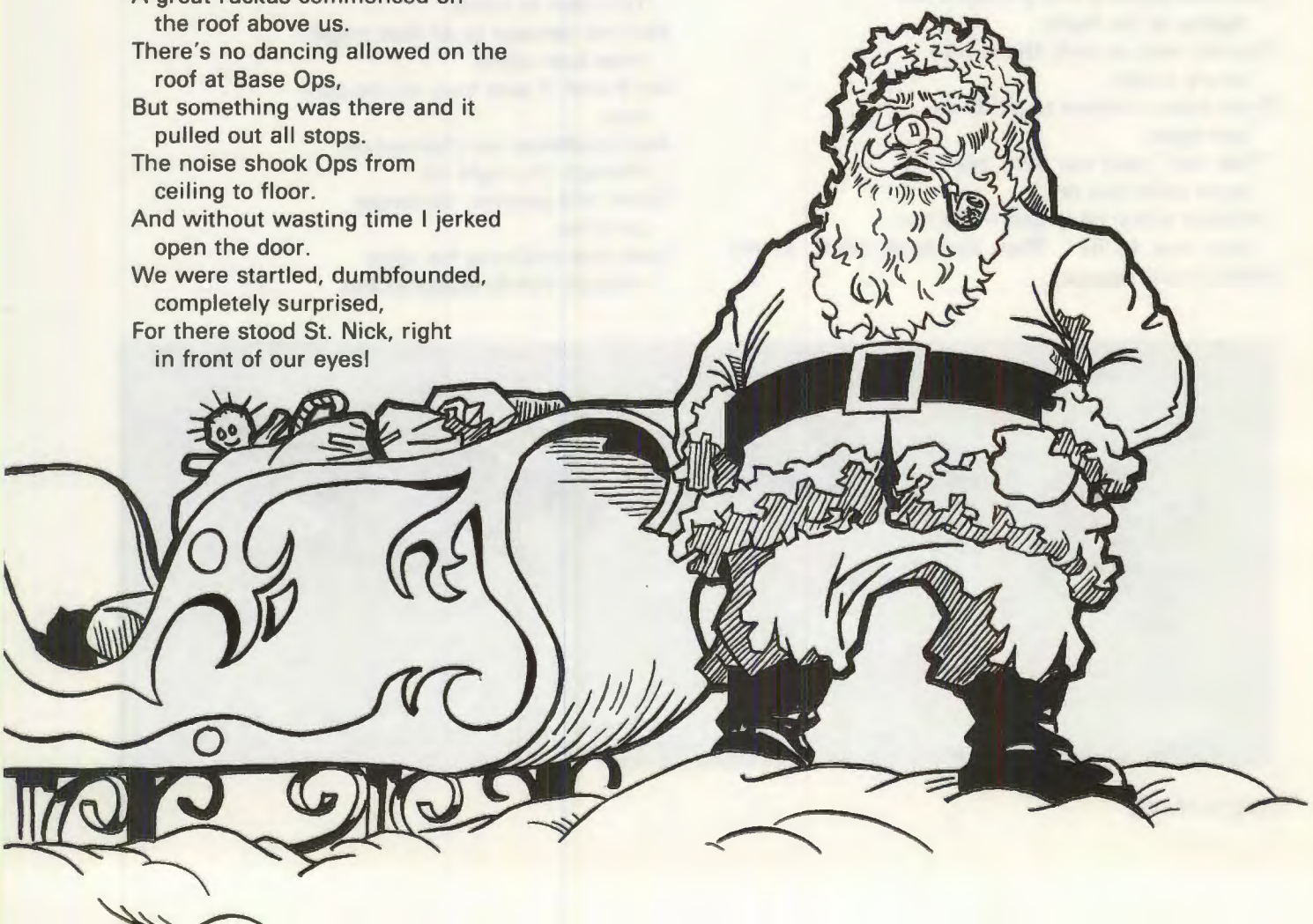
THE FLIGHT BEFORE CHRISTMAS

Overcome by the thought of whom
we had met,
We finished the flight, our palms
damp with sweat.
The landing was smooth, executed
with skill,
We rolled to the line and shut
down the mill.

CANTO III

Then we trudged through the
snow to report to Base Ops,
Glad to be done with the most
hectic of hops.
"A near-miss!" the DO surprisedly
cried,
You'd better believe it," our
pilot replied.
Then the questioning started, and
'midst all the fuss,
A great ruckus commenced on
the roof above us.
There's no dancing allowed on the
roof at Base Ops,
But something was there and it
pulled out all stops.
The noise shook Ops from
ceiling to floor.
And without wasting time I jerked
open the door.
We were startled, dumbfounded,
completely surprised,
For there stood St. Nick, right
in front of our eyes!

He was over age for a stick, and
too fat to boot,
With a crazy fur collar on a red - poopy suit. His
beard was the wildest, his
hardhat insane,
His hair snowy white,
a tousled old mane.
Nodding t'ward the roof, he spoke
rather warily;
"Have to park my team, but just
temporarily."
Then he entered and said with
his voice in a hiss,
"Where the hell do I go to report
a near-miss?"
"Check with the SOF,
he'll give you a form."
The old boy roared "Thanks,"
his voice like a storm.
He strode to the desk, slammed
his fist without pause,
And cried,"Service, young fellow,
don't snit Santa Claus!"



CANTO IV

Then he spoke not a word, but
went straight to his work,
And filled out the forms -- how
his pencil did jerk.
Our pilot worked calmly, he was
no fool.
While Santa struggled and snorted,
losing all of his cool.
Our pilot, an eagle, then lifted
his face,
And said, "It was your fault;
you were in my airspace."
Santa's face got all red and he
threw up his hands,
"My fault," he roared, "You didn't
check NOTAMS!"
The NOTAMS were handy,
as they usually are,
And there was Santa's notice --
he'd filed special VFR.*

*A special method of filing, long since obsolete. Revived only on Christmas Eve for a special purpose.

"Gee, Santa," gulped our eagle,
"You sure have your proof,
"This shows that it's easy for an
old pro to goof!"
Reassured of our intentions,
Santa's anger soon fled.
His cheery smile came and his
good humor spread.
"Full well this shows
how man goes amiss,
But in aviation, you know,
mistakes don't make bliss.
But now I'm late, so all take
heed.
And learn all the things you'll ever
need.
Don't be complacent, never
assume,
And on Christmas Eve, give me
plenty of room."
With a smile and a nod he went
out in the snow,
And we followed, all hating to see
Santa go.
Then laying his finger alongside
his nose,
To the roof of Base Ops he
smoothly arose.
He called to his team, and with
a wink on his face,
Off they all flew, straight out into
space.
And we all heard him say
as he drove out of sight,
"Happy Christmas to all,
and to all a safe flight!"

**By Lt Robert F. O'Conner (Ret.)
and Robert Trotter -
with apologies to Clement Moore
Courtesy, Navy APPROACH**

DOWN TO EARTH

GROUND SAFETY
Quotes and Notes

SAFETY 76

... Going Home For the Holidays?

Many TAC troops will soon be loading up the family sedan and heading home for the holidays. It is a joyous time and we all should relax and be happy and merry. For this very reason, we have to make sure we don't relax too much and become complacent or press a little. Nothing spoils the holiday spirit of love and good cheer as fast and completely as an accident. Yet, every season hundreds of such tragedies break into family plans and cause unhappiness. Now, with the big season just around the corner, is a good time to resolve that our own carelessness will not be the cause of our own (or someone else's) grief.

TAC bases, located throughout the U.S., are affected by varying degrees of winter weather. Most of us will be exposed to some adverse driving weather if we take a trip, whether snow or rain.

* * * *

First of all, be sure your car is in top shape. Usually the owner's manual contains valuable information, useful for cold weather operation. Here are a few things to check:

- Inspect the entire cooling system and fill with antifreeze.
- The electrical system may need your attention. The old battery that made it through the summer may not be adequate in frigid weather.
- Make sure the tires are in good condition. A set of snow chains is good winter weather insurance in most states. If you plan on using studded tires, check state regulations. If you are traveling to Wisconsin, Minnesota or Michigan, you may not be able to use them.
- Make sure there are no leaks in your exhaust system and the muffler is functioning properly. Never keep windows completely closed while at idle.
- Make sure that your heater and defroster operate efficiently. If you have an air conditioner, remember it will rapidly defog the interior of a car on a cool morning.
- Install new windshield wipers. Add anti-

freeze/solvent to your windshield washer reservoir.

* * * *

Usually, winter driving takes more time - whether engine warmup or getting started and stopped. While the car is warming up, clear frost, ice and snow from the windows. Don't forget the outside mirror, headlights and taillights. Adjust speed to road conditions, avoid sudden starts, stops and sharp turns. A sharp eye is needed to spot glare ice, black ice, or other slick spots.

Brakes should be cautiously pumped to slow down or stop on slippery surfaces.

Be mindful that other drivers are faced with the same driving problems you are. Watch the behavior of other vehicles with special alertness. Bad weather also affects the behavior of pedestrians. It makes walking more difficult and that hat or parka hood may reduce their ability to hear and see. Be especially alert for them.

The days are shorter and the 55 mph speed limit is being strictly enforced. Allow yourself plenty of time. Plan trips so that even an unexpected delay won't rush you. Do not start a trip when you are already tired. Rest up first.

Use the safety belts. Be certain everyone has a belt and uses it (don't forget the shoulder harnesses). Children should be taught to always buckle up. Have a good, reliable restraining seat for infants too small for seat belts.

* * * *

Plan your trip well. Get your maps early and learn your route. Use interstate highways whenever possible. These major thoroughfares are approximately three times safer than rural highways. Even though they are safer, they may present some particular problems:

- Never back up on a freeway. If you miss your exit, go on to the next one.

Be alert for highway hypnosis. Driving these highways is monotonous.

- Watch your exit speed. Slow down in deceleration lanes and exit at posted speeds.
- When entering the freeway, accelerate and merge smoothly into the traffic flow - don't come to a complete stop unless absolutely necessary.
- Always signal your intentions when changing lanes or exiting.
- On two-lane sections, use left lane for passing only. Stay in right lane except to pass.

* * * *

Driving may not be the only hazard you might encounter while going home for the holidays. If you are making an overnight stop, whether by camper or motel, and the unit has a separate oil or gas fired heating unit, check it out. See if it is working okay and make certain the combustion chamber is vented to the outside. If you have any doubts, don't use the heater. Carbon monoxide is a silent, odorless killer.

* * * *

Don't pick up hitchhikers. That poor guy out there may look harmless and just needs a ride - but, LET HIM WALK! Here are some startling facts:

Some time back, New Jersey state troopers began checking turnpike hitchhikers and discovered that 163 were runaways, 98 AWOL servicemen , 7 inmates fleeing mental institutions and 5 escaped convicts. The fingerprints of about 500 others were on criminal records. A similar, smaller survey was conducted in a small Arizona town where lawmen were curious about the many hitchhikers that were passing through. Out of 100 hitchhikers, they discovered that 84 had criminal records. Twelve others were either juvenile runaways or AWOL servicemen. ONLY 4 OF THE 100 WERE WITHOUT POLICE RECORDS!

There is no reason to feel any obligation to these people. You wouldn't open your home to them, so why admit one to your car?

* * * *

And now, we come to the subject we always seem to talk about - ALCOHOL. Alcohol is involved in approximately one-third of all sports, recreational, and private motor vehicle accidents. This is the season for good spirits, so we won't belabor the subject. But, if you're going to drink, be a social drinker. Social drinking is:

- A glass of wine to enhance a meal.
- A drink or two while having fun.
- Sipping and eating.
- Drinking and talking with friends.
- Never having to say you're sorry for what you did while drinking.
- Knowing when to say WHEN.
- Never drinking when driving.
- If you need a drink just to be social, that's not social drinking. Have a good holiday and a safe trip. We want you back alive!

MERRY CHRISTMAS AND HAPPY NEW YEAR.

FLEAGLEGRAM

RESPONSES FROM THE FRONT

Fleag -

Every winter somewhere in the world an Air Force member gets run over on the flight line or on a road because his clothes were not reflectorized IAW TO 14-1-4. Now is the time to check the TO, order the tape, and get the troops reflectorized -- before winter arrives with its short days and long nights.
SMSgt Herbert C. Williams
363AMS/MAAV-SE

Dear Sarge -

Thanks for your illuminating observation. For you guys that don't think you can be flattened by a fuel truck, tug, F-4, SOF vehicle, et al, check out the photos. Get lit and live!

CAN YOU SEE THE GUY ON THE RIGHT?

Fleag -

It's autumn again, and flying in adverse weather is a direct attempt to challenge Mother Nature. My personal Cherokee lies burnt and crumped on Granite Mountain, near Spokane - the result of an attempt by an inexperienced pilot to challenge the weather. The pilot was killed. A similar accident also occurred five days later.

When will people learn (or have they ever been taught) that weather must be given the highest of priorities and respect, whether flying light aircraft or Air Force hot rockets? Recommend you stress the dangers of weather (and flight planning) either in your magazine or by TAC directives to all flying units.

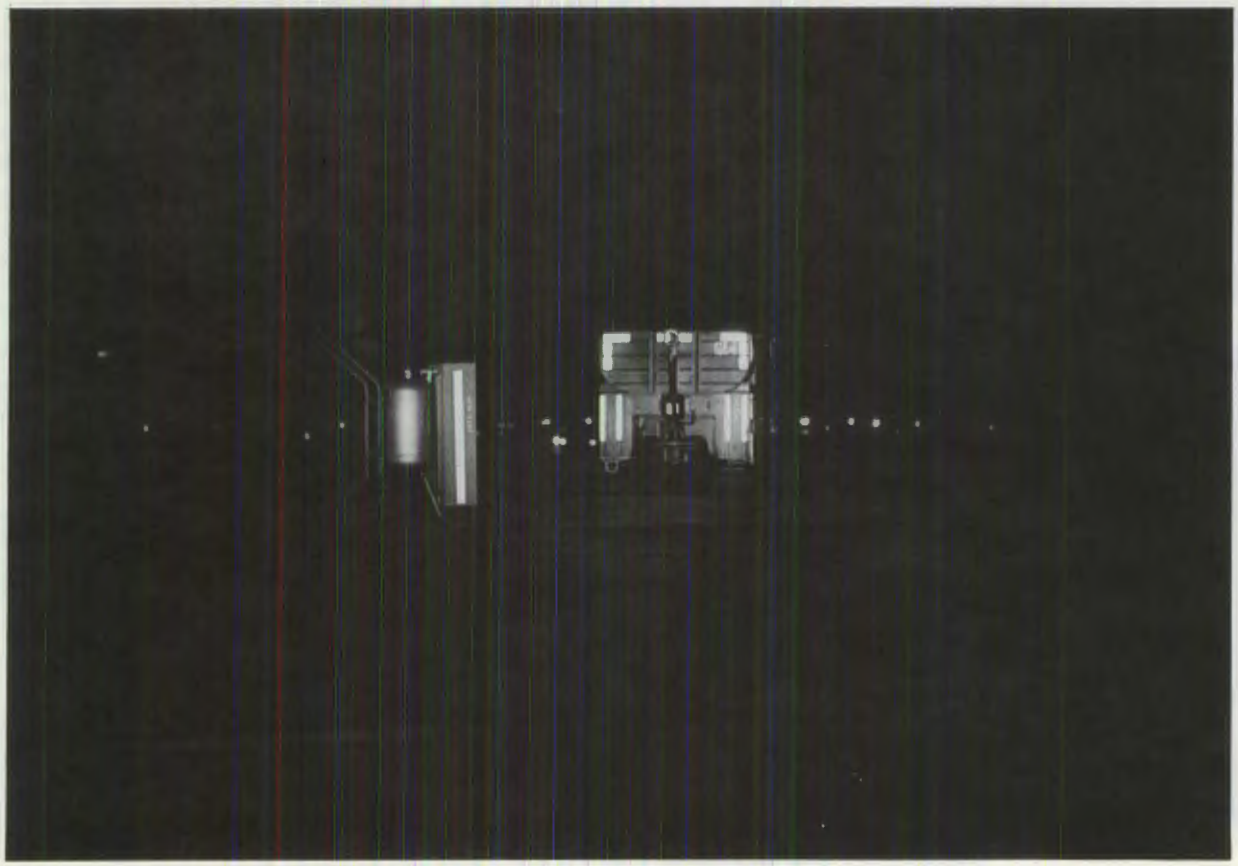
When will they learn? It's too late after you find yourself in a bad situation ... it's too late for these two guys.

Capt Glenn D. Scott
116 TCS, Oregon ANG

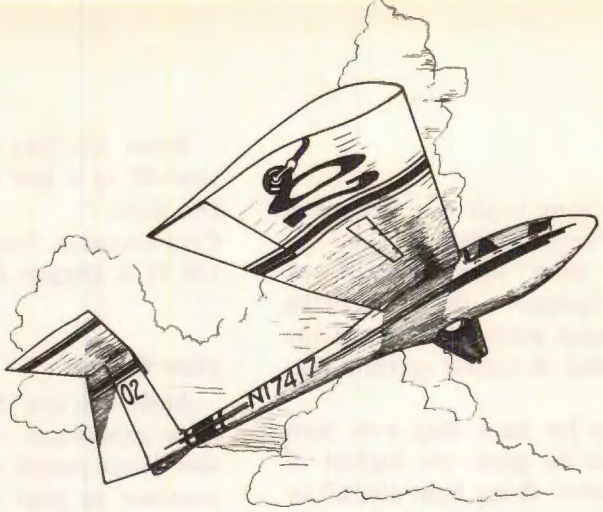
Dear Glenn–

Right you are. Some people never learn ... except from experience. The problem with this system is that many people never survive round one. We will continue to pass on "war stories" of other jock's bouts with Mother Nature (or any potential hazard) and hope they take our word for it. Thanks for your contribution.

Fleag



HOW ABOUT YOUR AGE EQUIPMENT?



Bug Smashers, Gliders

1

2

By Capt Marty Steere, TAC/SEPP

It's a bright sunny day. Perfect for flying a cross-country. Mile High AFB is a perfect place to RON. In a few minutes you will be able to climb out of your Phantom and head for a frosty Coors. Haven't had one of those in months. The scene you see around you, as you clear the area, is the same as that in photo 1 ... beautiful. What you don't know is that in approximately five seconds you and your Fox Four will occupy the same airspace at the same time as that glider ... the one that's at 12 o'clock, 2,000 feet away!

Photo 2 shows the bogey 2.5 seconds later ... 1,000 feet. Your problem now is to determine which direction the glider is heading if you need to take evasive action, and then take the action. All of this has to take place in the remaining 2.5 seconds.

If you do not see the glider or take the correct action, you may land with a new addition to your

and Other Flying Things

jet ... a glider outrigger wheel, if you are able to land at all (photos 3 and 4). In this instance, we were lucky and no one was injured. But what about the next time? Will you be as fortunate?

The best way to prevent a potential mid-air is planning. How? Check the IFR Supplement and FLIP Planning for any notices concerning glider operations or light aircraft activity in your destination area. Look at a sectional map of the destination area. Are there any natural navigation routes, i.e., rivers, highways, pipelines, mountain passes, etc, near your destination? Are there any recreational areas nearby that would attract general aviation? Will the arrival routes to your destination take you near any departure/arrival routes for small civil airfields? By doing these things, you decrease your mid-air potential and increase your awareness of civil air traffic near your arrival/departure base.

Keep those Mod One eyeballs uncaged. There are bug-smashers, gliders, and other flying things out there that are difficult to see...until it's too late.

TACTICAL AIR COMMAND

Maintenance Safety Award

Sergeant Gary L. Tritt, 35th Organizational Maintenance Squadron, 35th Tactical Fighter Wing, George Air Force Base, California, has been selected to receive the Tactical Air Command Maintenance Safety Award for this month. Sergeant Tritt will receive a certificate and letter of appreciation from the Vice Commander.

SGT TRITT

TACTICAL AIR COMMAND

Crew Chief Safety Award

Airman First Class Paul Meza, 49th Organizational Maintenance Squadron, 49th Tactical Fighter Wing, Holloman Air Force Base, New Mexico, has been selected to receive the Tactical Air Command Crew Chief Award for this month. Airman Meza will receive a certificate and letter of appreciation from the Vice Commander, Tactical Air Command.

crew chief safety award

A1C MEZA

TACTICAL AIR COMMAND

Ground Safety Award of the Quarter

First Lieutenant Patrick F. Spinks, 4th Field Maintenance Squadron, 4th Tactical Fighter Wing, Seymour Johnson Air Force Base, North Carolina, has been selected to receive the Tactical Air Command Ground Safety Award for the third quarter, 1975. Lieutenant Spinks will receive a certificate and letter of appreciation from the Vice Commander, Tactical Air Command.

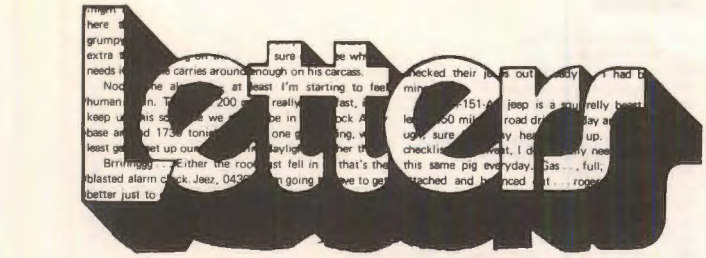
1LT SPINKS

TAC ATTACK INDEX

1975

ABBREVIATIONS

BC - BACK COVER
CT - CHOCK TALK
DE - DOWN TO EARTH
FC - FRONT COVER
PB - PHYZ-BIZ
SC - SPO CORNER
TT - TAC TIP
WW - WEAPONS WORDS
OA - OUTDOOR ALMANAC



While on a recent T-39 admin flight, I happened to catch sight of this strange aircraft parked in an alert area. The bird bore U. S. Air Force markings, but it may have been a devious attempt to camouflage a hitherto secret foreign entry (unsuccessful) in the A-7/A-10 flyoff. Any readers having more data on this aerial oddity should contact us with their explanations - we'd like to share this "find" with the TAC ATTACK readership. - ED

Editor-

For 13 years I have been reading AOA editorials by the TAC Chief of Safety. The vast majority have been uncontroversial motherhood approaches.

Colonel Joe Moore's October point of view is a distinct departure from the norm. He is so correct and to the point that it hurts to see it in print. I wonder why we don't have those flight commanders any more? Could it be that our personnel policies are working against operational objectives?

As an afterthought, you might tell the lieutenant who thought the fun has gone out of flying to come sit at my desk for a week to improve his perspective.

Major John C. Morrissey
AF Representative, USACGSC
Fort Leavenworth Kans

Editor

I would like to comment on two letters you printed in the October issue. First, the one regarding Col Moore's editorial about the fun having been taken out of flying. I agree. Flying in the Air Force isn't nearly the fun it once was. Just as enjoyable and perhaps more rewarding, but not as much fun. There's a hell of a difference. Recruiters haven't used "fun" as an inducement for potential Air Force pilots for years. We've long since passed the time when taxpayers can or should support our "flying for fun." Today's pilot should expect nothing more than an opportunity to apply himself to his job, to learn all he can about his airplane and its mission and to perform with it to the limit of his ability. There is a great pleasure in doing just that. But not fun. For fun, I recommend a Pitts.

Secondly, regarding Capt Broyles' letter to "set the record straight" on the Phyz-Biz article in the August issue about SCUBA diving. With or without a typo, the original statement was correct. Divers can be "bent" following dives that are well within the no decompression limit of the U.S. Navy decompression table. Those tables are based, among other things, on a standard ascent rate of 60 feet per minute. Faster ascents, as in a panic situation, can lead to the bends even though the time and depth exposure alone would indicate a safe dive. Further, drowning and air embolism and their causes are not related in any way to the depth or duration of a dive. The only criticism I would offer about the article would be with the inference that only novice divers are susceptible to the maladies listed.

In keeping with Capt Broyles' statement of experience/qualification, I've been a licensed pilot for 34 years, a fighter pilot for 25; a SCUBA diver for 22 and a certified NAUI diving instructor for 8.

Keep up the good work on a super good magazine.

Lt Col Coy Austin
HQ 9 AF/IGI

TAC TALLY

	TAC			ANG			AFRES		
	OCT	Thru OCT		OCT	Thru OCT		OCT	Thru OCT	
		1975	1974		1975	1974		1975	1974
TOTAL ACFT. ACCIDENTS ►	4	26	19	2	14	16	0	0	6
MAJOR ACFT. ACCIDENTS ►	4	24	15	2	12	16	0	0	4
AIRCREW FATALITIES ►	4	20	9	1	7	8	0	0	2
TOTAL EJECTIONS ►	3	14	14	0	6	6	0	0	2
SUCCESSFUL EJECTIONS ►	3	11	12	0	5	4	0	0	1

FIGHTER/RECCE WINGS		
ACCIDENT-FREE MONTHS		
58	4 TFW	TAC
43	127 TFW	ANG
40	31 TFW	TAC
28	56 TFW	TAC
21	27 TFW	TAC

OTHER UNITS		
ACCIDENT-FREE MONTHS		
154	130 SOG	ANG
123	136 ARW	ANG
115	143 SOG	ANG
103	DET 1, D.C.	ANG
79	135 TASG	ANG

MAJOR ACCIDENT COMPARISON RATE 74-75

(BASED ON ACCIDENTS PER 100,000 HOURS FLYING TIME)

		JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
TAC	74	4.5	5.4	5.6	4.5	4.0	3.6	3.1	3.2	3.0	2.9	2.8	3.2
	75	7.9	5.4	3.6	2.6	3.1	3.5	5.2	6.4	6.0	6.5		
ANG	74	7.2	8.6	8.2	5.7	6.0	6.3	7.6	6.6	6.3	6.4	6.9	6.4
	75	5.3	2.8	5.3	3.7	4.7	6.8	5.9	5.1	5.1	5.4		
AFRES	74	0	16.4	8.9	8.8	6.7	5.3	5.8	5.0	4.3	3.8	3.5	3.3
	75	0	0	0	0	0	0	0	0	0	0		

★ U.S. GOVERNMENT PRINTING OFFICE: 1975. 635-295/5


FLEAGLE
HARDISON
ACE OF THE ICE.
© Stan Hardison, 1975
KRRRACKK!
WHAT AN ICE HOLE !!