

**Del Rio could have been the Hollywood movie set of a West Texas border town.**

**It's windy, and the weather tends toward seasonal extremes. A large U.S. Air Force Base 6 miles east of town is named after Jack T. Laughlin, a B-17 pilot**

**and Del Rio native killed over Java within a few weeks of the Japanese attack on Pearl Harbor.**

**Our Thunderbirds Team flies into Laughlin on Oct. 20, 1967, for an air show the next day, honoring 60 or so lieutenants graduating from pilot training.**

**We go through the standard pre-show routine. Lead and 5 do their show-line survey, while the rest of us make the rounds of hospital and school**

**visits and give interviews. Next day, proud parents watch as new pilots pin on wings.**

**At noon, we brief at Base Ops. As usual, an ' inspection team ' comprising base and local dignitaries joins us for a photo session before we step to**

**the jets.**

**The film *Bandolero !* is in production near the base, and its stars, Jimmy Stewart and Raquel Welch, show up in the inspection team. Jimmy**

**Stewart is a USAF Reserve brigadier general, a founder of the Air Force Association and a big hero to all of us.**

**And Raquel Welch is . . . well, she's Raquel Welch.**

**We're wearing white show suits, my least-favorite outfit. Lead can choose from among gray, blue, black or white, but today, we look like ' ice cream selling ' Good Humor men.**

**Plus, even with the air conditioning set to nearly blowing snow balls I'll be working the solo demonstration so hard, sweat soaks my collar.**

**This would not matter much, except we do a lot of taxiing in-trail.**

**With only 6 feet. between the end of my pitot boom and No. 5's afterburner, I take a huge load of engine exhaust into the cockpit. Soot clings to**

**the dampness, leaving a noticeable ' ring around the collar ' when wearing white.**



**At Del Rio, I follow my usual routine and roll the collar under**

**once we have taxied away from the crowd. After the show, I'll roll it back out again,**

**the chimney-black still there, but now underneath, out of ' show watcher sight.'**

**We taxi short of the runway for a quick pre-takeoff inspection by a couple of our maintenance troops. As No. 6, I'm flying F-100D serial number**

**55-3520.**

**We take the runway, the four-aircraft Diamond in fingertip and Bobby Beckel and I in Element . . 500 ft. back. The Diamond releases brakes at**

**precisely 1430.**

**Bobby and I run up engines, my stomach tightening against the surge of isolation and exhilaration that comes before every air show takeoff.**

**By this time in the season, the Team is really ' clicking along.'**

**We have a lot of shows under our belt and know what we are doing.**



**Twenty-one minutes into the event, it's going well--a nice cadence and rhythm. We approach the climax . . the Thunderbirds. signature ' Bomb**

**Burst.'**

**My job is to put smoke "pigtails" through the separating formation, doing ' unloaded ' maximum aileron rate rolls in perfect vertical.**

**Even only a couple vertical rolls require establishing a perfect up-line. But more than a few also requires starting them with a ton of airspeed.**

**As the Diamond pirouettes into the entry for the Bomb Burst entry . . I grab for altitude . . but seconds later at just the right moment, dive down**

**after them . . hidden from the crowd . . behind their masking smoke.**

**The Super Sabre's airspeed builds up fast. The Thunderbirds switched to the F-100 in 1956, making us the world's first supersonic flying team. So**

**I have to be mindful of a hard-and-fast absolute rule  
: DO NOT go supersonic during the airshow.**

**No booming the crowd.**

**So, I need to stay sub-sonic.**

**On the other hand . . just barely subsonic.**

**Hmmmmm. Let's say . . Mach 0.99.**

**The biggest mistake I can make is to be early. The Diamond is about to break in all four directions. And if I get there too soon, I don't have an exit**

**strategy. If I'm too late it looks ugly.**

**Today, my timing looks good, so I light the ' burner . . start pulling back into a perfect vertical climb . . not looking but guessing it was very close**

to a thoroughly practiced 6.5 G pull up.

If I get it right, I'll hit the apex of the Bomb Burst 5 seconds . Then immediately after the Diamond separates . . snap the throttle out of ' burner '

to get the smoke going . . airplane perfectly vertical . . going very fast.

As the Diamond pilots track away from one another to the four points of the compass . . I'll put on those lazy, lovely vertical pigtails Then cut off

the smoke while figuring out how best to make a good-looking slow-speed recovery to normal flight.

But at Del Rio . . it doesn't turn out right.

When I started that aggressive pull into the vertical . . the Super Sabre . .

just . . . **b-l-e-w d-a-m-n-e-d u-p !**

*Now, F-100 pilots are accustomed to loud noises . . because its afterburner can ' bang ' pretty hard as the afterburner's raw fuel ignites.*

It's also fairly common for its engine compressor to stall . . to force a violent cough of rejected air from its intake.

Flame belches out the oval nose--which will definitely wake you up at night--and the shock can kick your feet off the rudder pedals.

Any F-100 pilot who hears a loud " **BANG !** " automatically thinks : 'compressor stall ' So he unloads centrifugal force . . allowing ram air to

travel in the right direction.

**SO, INSTINCTIVELY . . the explosion caused me to relax back stick-pressure . . to unload G's from the airplane.**

**And now, my brain has zoomed fully into one of those fast-forward mental exercises where entire seasons compress into seconds . . tree leaves**

**change color . . as you're looking.**

**I ease the stick forward seemingly lethargic way . . even having time to consider :**

**" THIS IS**

**NOT A**

***COMPRESSOR STALL ! "***

**In retrospect, the airplane had already unloaded itself, making my remedy superfluous,**

**But there was instantly . . significant pilot lore at work here.**

***No matter what else happens . . fly the airplane. Forget all about lift and drag and thrust and gravity. Just fly the damn airplane . . until the last***

***piece stops moving. Good old 55-3520 has quit flying.***

***But I have not quit flying !***

**Now there's **FIRE !****

**Not just a little smoke. **Flames fill the cockpit.** I have to**

**eject. I grab the seat handles and tug up, firing the canopy and exposing ejection**

**triggers on each side of the handles.**

**I yanked both triggers and immediately feel the seat catapult into the slip stream.**

**Seat-separation is automatic . . too fast to track . . the seat disappearing as I curl into a semi-fetal posture to absorb the parachute's opening**

**shock. Jump school helps here . . and I kind of congratulate myself on perfect body position.**

**Then the chute snaps open--much too quickly--jolting me back to real time and short-circuiting transition from stark terror . . to giddy elation,**

**the evil Siamese twins of parachute jumping.**

**My helmet is gone. And I look up to see a couple of chute panels are torn, several shroud lines severed. And there's one large rip in the can-**

**opy's crown.**

**I'll be coming down a bit quicker.**

**Going to land in the infield, near show-center. Have to figure out the wind, then try to quickly collapse the chute reducing the threat of being**

**dragged along the crude desert .**

**I slammed into the dirt . . instantly getting dragged .  
. I focused on collapsing that damn chute !**

**Finally, I stand up, thinking I'm in one piece. And here comes a blue van with some of our mechanics in it. While**

simultaneously the huge ram-

ifications of what's happened so quickly . . begins sinking in.

In 14 years and 1,000-plus air shows, the Team has been cunning enough to do all our metal-bending during our training sessions . . and out

of sight.

This is our first accident in front of a crowd.

And the ' honor ' is mine.

I gather my gear and climb into the van. Someone suggested immediately taking me to the base hospital. But my brain's still functioning and I

told him : ' *No.* ' *Let's tell the ground crew I'm OK first.* "

So we stop, I get out of the van, shake hands, toss the crew chiefs a false smile and highly insincere ' thumbs-up. '

Jimmy Stewart is still there and comes over to say nice things. Raquel hasn't stayed for the show, so no air-kiss. Our narrator, Mike Miller, stops

and jokingly tells me . . maybe we should probably leave ' the **THING** . . you just performed . . out of the next Thunderbird airshow . . ' though it

was interesting to watch.

That's when I found out I'd ' jerked the wings off ' a Super Sabre.

On most modern fighters, the wings are well behind the pilot. You can see them in the rear view mirror or if you look back, but otherwise they're



**not in your field of view. Of course, I had been watching the Diamond, ahead and well above me. Therefore I hadn't seen my swept wings ' pop ' off.**

**All I knew was the airplane exploded.**

**The F-100 has a large fuel tank in the fuselage. It's on top of the wing 's center section . . forward of the engine.**

**When both wings popped off the airplane . . its raw fuel was inhaled directly into its full-throttled engine.**

**Everything exploded around me . . into . . a ' fire ball.'**

**The shock wave from the blast propagated up the air intake . . and ' b-l-e-w o-f-f ' the first 6 feet of F-100's nose. The tail of the jet also was**

**badly damaged, setting free the drag chute.**

**And as the F-100's drag chute came fluttering down . . some in the crowd believed my personal parachute had failed.**

**After exploding, briefly pumped raw flames through the cockpit-pressurization system entering the cockpit at the pilot's shoe level . . and**

**sent flames scorching the back of his head.**

**My flying boots . . shiny for an ROTC guy . . charred beyond fixing. And I my neck . . where I'd rolled my collar underneath . . had been roasted**

**bright red.**

**I was barely subsonic . . when the wings failed. But with the nose blown off, the F-100 became a fairly blunt object and would have slowed quickly.**

**On the other hand, I remained with the aircraft just nano-seconds after the explosion . . hadn't time to decelerate**

**much. So . . when I came out**

**of the jet, wind blast grabbed my helmet, rotated it 90 degrees and ripped it off my head.**

**It was found on the ground with the visor down, oxygen mask hooked up and chin strap still fastened. As the helmet rotated, the sturdy neck**

**strap rasped my raw fuel burned neck . . caused the fuel burned neck to bleed more than a bit.**

**During airshows, the Team always has their ' zero-delay ' parachute lanyards hooked up to the airplane . . giving us the quickest possible chute**

**deployment . . explaining why my chute opened so fast . . too fast, as it turned out.**

**Because it was connected to my parachute . . the ejection seat tore through a few nylon fabric panels.**

**The immediate opening at very high speed was certainly harsher than normal. And as my torso ' horse whipped around ' aligning with the chute's**

**risers, the tough straps did further damage to the back of my neck . . the body part apparently singled out for retribution.**

**Walking into the base hospital, I'm startled by my image in a full-length mirror. Above, a sign says : " Check Your Military Appearance."**

**Mine looks like I've crawled into a burlap bag with a mountain lion. The white show suit is a goner, the cockpit fire having given it a base-coat**

**of charcoal gray accented by blood . . with a dressing of dirt, grass and sagebrush stain.**

**Being dragged along the ground accounted for all the camouflage. But I hadn't realized my neck was bleeding so much. I look like the main**

**course in a throat slasher movie -- ' *The Solo Pilot From Hell.*'**

**They keep me in the hospital overnight. The Team visits, and Mike Miller smuggles in a dry martini in a half-pint milk carton.**

**Everybody's leaving for Nellis AFB the next morning. So I tell the hospital people I'm leaving, too, and ask our Slotman, Jack Dickey, to pack my**

**stuff at the motel. The 1967 show season is over.**

**After I ' punched out' my broken aircraft remained on a ballistic trajectory . . scattering parts along the extended flight path into the Texas desert.**

**Most of the engine and the main fuselage section impacted about 2 miles down range from my initial pull-up spot. All the bits and pieces landed**

**on government soil, and there was no injury or property damage.**

**My aircraft was wiped out.**

**And I signed a hand-receipt for \$ 696,989.**

**But . . if there is a good kind of accident, this was it. Nobody was hurt, and all the scrap metal was collected for post-game analysis.**

**The Super Sabre's wings mate into a reinforced box at the center of the fuselage . . and it's usually the strongest part of the airplane.**

**When my aircraft's wing center box was inspected, it was found to have failed. North American Rockwell, the**

**manufacturer, tested the box  
on a bend-and-stretch machine.**

**And it broke during the test at an equivalent load of 6.5  
G Same as the aerobatic flight I was in when both Super  
Sabre's wings whipped off**

**. . not quite above the wide open-mouths of the airshow  
crowd.**

**It shouldn't have happened, since the F-100's maximum load  
limit is 7.33 G. But my F-100's wing center box had  
fractured along a fatigue crack.**

***And there were about (30 ) thirty more fatigue cracks in the  
vicinity.***

**Among other past accidents . . various F-100 losses in Vietnam  
looked suspiciously similar.**

**The recovery from a dive-bomb pass is a lot like my high-  
speed, high-G pull-up into the Bomb Burst. In the Vietnam  
accidents, the pieces had not**

**been recovered, and the aircraft were written off as combat  
losses.**

**Later, specialists found considerable fatigue damage in the  
wing center boxes of our other Thunderbird aircraft. USAF  
immediately put a 4 G limit**

**on the F-100 and initiated a program to run all the aircraft  
through depot modification to beef up the wing center box.**

**So my hairy accident almost certainly served to save other  
pilots lives after revealing a serious structural weakness in the  
Super Sabre.**

**Merrill A. [ Tony ] McPeak**

**Ed. Tom Weeks : USAF General Merrill A. McPeak also flew F-100, F-104, F-4, F-111, F-15 and F-16 fighters, participated in nearly 200 airshows as**

**the Thunderbird's solo pilot . . ' Tony ' flew 269 combat missions in Vietnam as an attack pilot and as a FAC high-speed forward air controller. He**

**commanded the Misty FACs, 20th Fighter Wing, Twelfth Air Force and Pacific Air Command, completing his career as U.S. Air Force Chief of Staff.**

**Source : Aviation Week & Space Technology :**

**' *Contrails* '**

**[ *abridged* ]**