

GRAMPAW PETTIBONE

Toxic Tango

Pack-up for a two-week deployment was handled by junior members of the squadron. A "filler and bleeder" unit full of Coolanol (fluid for cooling radar units) was packed in a conex box.

A hollow plug vice one-way check valve was incorrectly installed in the unit. Contents of the box were not thoroughly checked by a supervisor or a cargo certifier. The box was loaded upright on a pallet and flown from NAS West to NAS East aboard a C-118.

The unit was not used during the deployment, remained in the conex box and was loaded, on its side, in a C-9B for the return trip, once again by junior personnel. It was not properly inspected during this evolution either. On board the C-9 were 45 passengers and over 11,400 pounds of cargo.

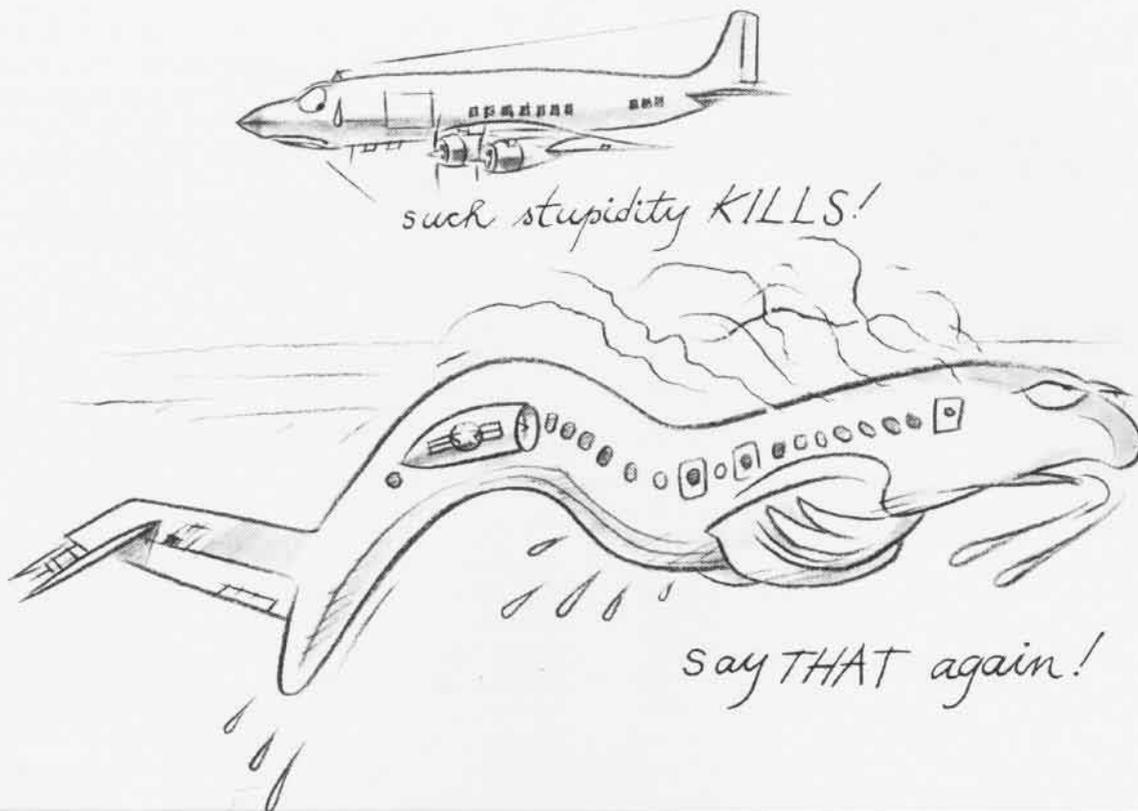
Ten minutes into the flight, liquid seeped from a pallet. The crew radioed ground personnel who advised that the substance was probably Coolanol. A de-



termination was made that it was non-hazardous. The liquid spread aft under passenger seats. Personnel began sopping

it up with rags. The substance produced a strong odor and was eye-irritating. Cabin crew and passengers complained of nausea, headaches, light-headedness and weakness. The pilot decided to return to the starting point. Shortly, a flight attendant wiping up the spill was overcome by fumes and passed out. A passenger also fainted.

The pilot declared an emergency, oxygen masks were deployed, and the crew went through the cabin smoke or fume elimination checklist. The cabin was depressurized at 10,000 feet. Fume removal and supplemental oxygen gave immediate relief to all hands. The flight attendant and passenger awakened. Forty-five minutes after takeoff the C-9B was safely back on the ground. Crew and passengers were examined by medical personnel and released. The "fill and bleed" unit was examined and found to be drained of its contents (about 3/4 of a gallon). The aircraft was cleaned and the cargo scrutinized. The flight departed next day without further incident.





Grampaw Pettibone says:

Sufferin' swamp gas! I'm tellin' ya, ladies and gents, unless we turn up the interest level on the handling of hazardous materials, disaster is as certain as the sun settin' in the west. Airborne, toxic exposure incidents are on the rise.

Accountability and knowledge of NAVSUP 505 and related directives are the keys to prevention. Fumes will knock you out. Petroleum distillates can harm skin and eyes.

Heaven help us if a gas spill, or the like, meets up with an ignition source!

Even if cargo is signed for by a plane crew, squadron or unit personnel are not absolved of the responsibility for proper packaging. Senior personnel must be involved and be held accountable for their actions. I gotta sinkin' feelin' that there are too many cavalier attitudes out there in Naval Air when it comes to handling toxic-type stuff. One C.O. put it right, "Hazardous cargo incidents can be likened to a game of Russian roulette. You may spin the chamber of the pistol, pull the trigger 100 times and all you'll get is a click. But on the one hundred and first trigger pull. . . ."

Faulty Formation

A flight of five *Phantoms* was holding between cloud layers at 2,500 feet for a flyby. (One was an airborne spare.) The aircraft were to make the formation pass at 800 feet. Weather at the flyby point was 1,000 feet overcast, three miles visibility, the prebriefed "go/no go" minimums.

The flight leader elected to examine weather firsthand, briefed his flight to maintain their holding position and broke away, entering clouds at 1,500 feet. He located clear airspace at 600 feet with 3 miles visibility. As he climbed to rejoin his flight, Lead talked to ground control and the decision was made to cancel the flyby due to weather.

At 2,500 feet, Lead spotted the four *Phantoms* to his right. He summoned them to join him as he turned left. Number Two, with Number Three on his left wing, flew to the inside of Lead's turn to begin a CV rendezvous. Number Two lost Lead as each flew either side of a



small cloud, pulled up and reduced power to ensure safe separation. Two's speed bled off to 200 knots.

Upon recontact, Two lowered the nose and accelerated to 300 knots. Number Three was observed to be a bit acute, at Number Two's nine o'clock, when Two initially pulled up. Three then slipped back four plane lengths into a sucked position.

Shortly, Number Four *Phantom*, on the outside of the turn, inadvertently entered a cloud layer, made an adjustment and regained VFR. Seeing this, Lead asked if Four had a problem. This transmission directed the attention of Number Two's RIO away from Number Three on his left. When he looked back, he couldn't find Three. After fruitless transmissions, Lead descended, searched and discovered signs of a crash. There was, apparently, no ejection attempt. The pilot and RIO were killed, the aircraft destroyed.

Study of the wreckage indicated the *Phantom* struck the water in a nose-high attitude, flaps down, with the starboard

engine at 89 percent, afterburner engaged, and the port engine between 70-73 percent, nozzle full open, 1,800-2,100 pph fuel flow. These latter parameters are consistent with a stalled or stagnated engine.



Grampaw Pettibone says:

I'm mad! I'm sad! Another case of bad headwork and pressin' on that back-fired, tragically. Number Three probably stalled the aircraft and/or the left engine tryin' to maintain position on Lead and ran out of recovery room. The vital problem, though, was failure by Lead and the Section Leader to maintain adequate rendezvous speed. They got too slow! The decision to gather up the flight in marginal VFR conditions, when there was clear sky above the cloud layers, made matters worse. The wingman got backed into a box he couldn't get out of.

Sure, weather was a factor. But the bottom line was sound airmanship, or lack of it.