



grampaw pettibone

Some Birds Don't Fly

Two lieutenants (junior grade) and two crewmen were assigned a COD (Carrier Onboard Delivery) mission in a US-2C to deliver nearly 1,300 pounds of cargo. An installed Mk 8 tow reel in the aircraft weighed 790 pounds.

At an intermediate fuel stop, a small oil leak was discovered in the starboard engine nacelle, but the lines were found to be secure and the oil tanks were topped off. The amount of oil added indicated normal consumption on both engines.

The one and a half hour flight and landing on board the CVS went smoothly. Cargo was offloaded and the aircraft was reloaded with 1,114 pounds of freight and mail for delivery ashore. The crewmen carefully post-preflighted the starboard engine compartment oil lines. Everything was secure. The oil dip sticks were also checked; topping off was not required.

Passing 6,000 feet during climbout after catapult from the carrier, the copilot reported that a considerable amount of oil was leaking from the starboard engine around the propeller dome assembly; oil pressure was still normal, however. The pilot immediately headed back for the CVS, a distance of 26 miles.

Upon receiving the call from the returning COD, the ship immediately started a turn back into the wind. The deck was respotted forward and made ready for recovery by the time the aircraft was eight miles away. Clearance was given for a modified straight-in approach. The wind was down the angle at 28 knots.

When power was reduced aboard the US-2C for descent, the oil leak seemed to subside. Between 10 and 6



miles out, the aircraft was prepared for landing. Full flaps were lowered, the landing gear was dropped and power added. The increased rpm and manifold pressure intensified the oil leak, and the oil pressure started to drop rapidly.

The pilot intercepted the glide path slightly high and commenced his approach. At approximately one mile, the oil pressure fluctuated violently, dropped to 10 psi, and the propeller began to overspeed.

The starboard prop was immediately feathered and transition made to a single-engine approach. Flaps and gear remained fully down. As the approach continued, the plane started to settle. Power was added on the port engine several times in response to the LSO's calls. The S-2 arrived at the

ramp with full throttle.

At the cut, although the pilot reduced power, the nose of the aircraft came up, and the S-2 floated up the deck. The LSO called, "Land it! Land it!" The nose dropped and the plane touched down beyond the crossdeck pendants.

As the LSO called, "Bolter, Bolter," the pilot added full power on the port engine. The aircraft left the deck under full control, wings level, and climbed a little. The landing gear was retracted and the flaps left fully down.

The then doomed S-2 started gradually losing altitude until it struck the water 23.5 seconds after leaving the deck, about one-half mile ahead of the ship.

As soon as the aircraft came to a stop, all the crew exited through the overhead hatches. Rescue was accomplished on the double by one of the carrier's helos.



Grampaw Pettibone says:

Oh, my achin' blood pressure! These guys just plain doped off. With a combined total of over 1,000 hours in S-2 aircraft, you'da thought they'd know a little more about single-engine flight characteristics than they demonstrated.

I can't find fault with the decision to return to the ship. Considerin' the distance to the beach and uncertainty of future behavior of that starboard engine/propeller, it was a wise decision.

What happened after the engine quit, however, is just too durned much - or should I say just not enough? Where were these guys when the emergency procedures briefings were given? Hadn't they ever been in an OFT? The pilot stated that he "thought it would fly" on one engine with the gear down and full flaps. The copilot said he didn't know if it would or not. And he a designated plane commander, too!

Simple ignorance is not knowing; compound ignorance is not knowing that you don't know.

Natops plainly recommends two-thirds flaps for single-engine approach and one-third flaps for a bolter. It's a cryin' shame that two "fully qualified" pilots would show such disregard for a few simple procedures so critical to the continued flight of their aircraft.

This isn't the first time this sorta thing has happened. There are several pilots and crews who aren't around any more, because they didn't know what to do when an engine quit. (October 1968)

AHAA

The mission was dissimilar DCM involving two sections of A-7s and F-14s. A thorough face-to-face brief outlined three head-on engagements. Individual briefs addressed aircraft emergency procedures, departure/spin characteristics and recovery techniques. The A-7 wingman launched

and proceeded to the prebriefed rendezvous. There he conducted an inflight automatic flight control system (AFCS) check during which he had some initial difficulty engaging heading hold. The malfunction appeared to correct itself after several cycles of the control augmentation switch between cont aug and attitude hold.

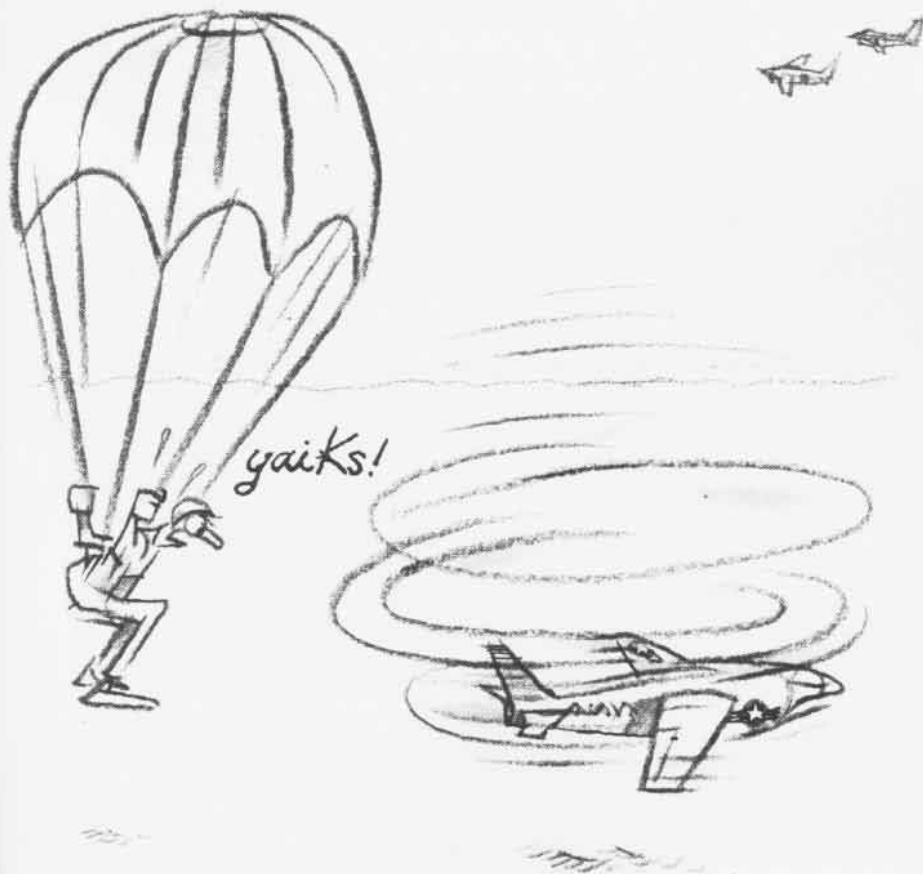
After the rendezvous, radio comm was established with the controlling E-2B. One fly-through and two engagements followed. During the third engagement, the A-7 wingman maneuvered from the right side of his combat spread position to close on the F-14 that had slipped into his leader's six o'clock position. While maneuvering for a look-up missile shot with 30 degrees nose-up, 20 degrees left bank, 300 kias, 13,000 feet altitude, in a 3.5 G turn, his aircraft suddenly departed from controlled flight.

The departure was characterized by a 10 to 15-degree initial yaw diver-

gence to the left, followed by a rapid yaw right. The pilot released all flight controls, activated the AFCS disconnect, and transmitted AHAA — the A-7 community procedural acronym used in departures to mean: A (AFCS disconnect), H (hands and feet off the controls), A (AOA check) and A (airspeed and altitude check).

The A-7 immediately entered a rapid right spin. No post-departure pitch or roll oscillations were noted. After two turns, the pilot applied full right aileron, full left rudder and stick slightly forward of neutral. AOA remained pegged at 30 units, airspeed remained at zero.

The flight leader confirmed a right spin. Controls were left in, through five turns, with no effect. The wingman ejected, passing 6,500 feet. The aircraft was observed to continue the flat spin until water impact. The pilot, suffering from extreme cold, was rescued approximately 25 minutes later.



Grampaw Pettibone says:

AHAA is right! Going into a spin is like stepping out on your wife. You might get away with it, but if you don't, bub, you're in a lot of hot water! (Cold water in this lad's case.) This pilot was highly experienced in departure/spin techniques, having logged well over 400 maneuvers while in various units flying several different aircraft. Did too much experience sucker this gent into takin' an ailing machine into the DCM pattern?

The aircraft mishap board concluded the most probable cause of the aircraft entering the spin following departure was failure of the AFCS roll augmentation cut-out to function properly. No maintenance-related factors were assigned. But this aircraft had had nine AFCS gripes in the past 26 days with nine additional AOA gripes. Three other squadron pilots had previously experienced sudden or unexpected departures in this machine. What I want to know is where was all this hot info being kept before the mishap. Sounds like someone took "hands and feet off the controls" in the maintenance department, and QA spun in, too. DCM training is a vital part of aircrew readiness, gang, and it's an all hands effort, as always! And that's the truth! Nuff said.