RENO AIR RACES—NTSB FINDINGS (NEWS PIECE, RENO PUBLIC RADIO)

INTRO: At a hearing this morning in Washington, the National Transportation Safety Board issued findings of its investigation into the fatal crash at last year's National Championship Air Races. KUNR's Michael Hagerty reports.

NTSB investigators say screws in the modified P-51 Mustang's elevator trim tabs — those are flaps that help stabilize the aircraft — were too loose and showed years of wear, causing one of the tabs to break loose under the stress of flying more than 400 miles an hour.

That caused pilot Jimmy Leeward to lose control before the aircraft crashed into the stands at last September's event, killing Leeward and ten others and injuring more than 60.

At the hearing, investigator Clint Crookshanks showed photos of screws recovered from the doomed aircraft.

screws.wav—"All of the trim tab attachment screws that remained installed on the accident airplane were loose with negligible resistance from their respective lock nuts. Such that the screws could be inserted and removed using only fingers. All of the lock nuts examined from the accident airplane showed evidence of age and extensive wear on their inserts. And several had evidence of yellow paint beneath the topcoat of paint as shown in the right photo. The information available indicates that the airplane was painted yellow prior to the 1985 Air Races, which means they had not been replaced for at least 26 years." (35)

The problem was noted in a pre-race inspection just days prior, but there's nothing to confirm it was ever fixed. As a result, the Reno Air Racing Association, after its own investigation, is making changes to its inspection process to try and make sure nothing like that slips through the cracks again.

Air Race Spokesman Mike Draper said the investigation validates the changes the organization is making, to – as he put it – institutionalize the culture of safety he feels was already present at the event.

draper-formalize—"And with that comes even better documentation of inspections. And even better documentations and better chain of command on how inspections have been addressed or issues have been addressed. And really formalizing — even further than it has been. And make no mistake. It's been a formal process but even further formalizing it and standardizing the inspection process. That is something we're working on." (26)

And since the accident, the organization has added a Director of Safety to its board.

The investigation also showed there was no verification that some modifications to the aircraft were ever adequately flight-tested, as the Federal Aviation Administration had mandated. Investigator Clint Crookshanks said the plane had never been pushed to the limits it faced during the fatal race.

fastest.mp3—"The data showed that the accident flight was the fastest the airplane had ever flown on the course by about 35 knots, and the engine power settings were the highest ever used." (09)

The hearing was particularly damning of the pilot and crew. Investigators said photos from prior races on the course – and in the race where the accident occurred – showed deformations in the plane's skin and the cockpit canopy.

clues—"All of these factors provide strong clues to the pilot and crew that the airplane was being operated beyond its structural limits and should have forced a more detailed examination of the airplane." (10)

Board member Robert Sumwalt had more harsh terms for it.

roulette—"And the way I look at it quite honestly is if you're modifying an airplane without fully understanding how those modifications can affect the aerodynamics then you're basically just playing Russian roulette with an aircraft. And if you want to go out and fly and fly fast and try and win that's one thing. But as the chairman said, unlike Russian roulette, in this case when you go out and you do those things you not only endanger your own life, but you potentially endanger the lives of others. And that is what happened in this particular case." (36)

The findings will no doubt play a role in several lawsuits victims and families have filed. None of Leeward's flight crew could be reached for comment. The Air Racing Association has also moved the racecourse an additional 150 farther away from spectators for this year's event...

plane-nats

...and made changes to the course design, so that pilots, like this one — testing out the course during June's annual Pylon Racing Seminar — wouldn't face such a hard turn as they head closest to spectators. One of those pilots, Chris Rushing, likes the new feel.

simple-transition—"Just softened it up a little more for us so when we come around Pylon 5 coming around to the home pylon it's a real simple transition for us." (09)

Still, NTSB Chair Deborah Hersman said the accident should affect how participants — and spectators — think about risks involved in air racing from now on.

taking-risks.wav—"The pilots know that they are taking risks. That is what they sign up for. But air race pilots expect that the risks taken are theirs alone. This accident forced everyone to re-evaluate that expectation." (17)

This year's Air Races are scheduled for September 12th through the 16th. Michael Hagerty, Reno Public Radio News.