

# Aviation Human Factors Industry News

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From the sands of Kitty Hawk, the tradition lives on.

Hello all,

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## Inspectors 'failed to check runway' before Concorde crash

A French manslaughter trial probing a deadly Concorde crash blamed on a **strip of metal lying on the runway** heard Wednesday that inspectors had failed to check the runway before the disaster.

Three runway checks were supposed to be carried out each day, the court was told, but **no inspection had been carried out for nearly 12 hours** before the supersonic jet took off at 4:42 p.m. on July 25, 2000.



"The day of the accident, the last inspection was carried out at 5:00 in the morning," Judge Dominique Andreassier said, reading out documents presented to the court in Pontoise, near Paris.

The afternoon inspection had not been carried out on runway 26 at Paris Charles de Gaulle airport **because a fire drill was being conducted**, she said.

The trial opened Tuesday with French engineers who built the Concorde in the dock alongside Continental Airlines **mechanics** accused of causing the crash that sounded the death knell for supersonic travel.

The US airline and two of its technical staff are accused of the manslaughter of 109 people on the plane -- most of them German tourists -- and four hotel workers on the ground.

A former French civil aviation official and two former Concorde engineers face the same charges in the mammoth trial expected to last four months and cost more than three million euros (4.2 million dollars).

All parties deny any wrongdoing.

The court will decide whether to side with investigators and technical experts who say the crash was caused by a metal strip that fell off a Continental DC-10 that took off on the same runway just minutes before the Concorde.

**The strip shredded a tire**, causing a blow-out and sending debris flying into an engine and a fuel tank and setting it on fire, according to investigators.

The court will also ask whether the French aviation official and the two engineers failed to correct faults on the supersonic jet favored by the rich and famous for their trans-Atlantic trips.

Continental's lawyer Olivier Metzner has promised to present witnesses -- including firemen based at the airport -- who would testify that the New York-bound plane was on fire well before it reached the metal strip.

Metzner said Tuesday that "there is an attempt to protect the Concorde and the image that it projected of France" and that it was absurd to blame the crash on a small metal strip.

Continental could receive a maximum fine of 375,000 euros (525,000 dollars) if found guilty. The individuals, who all deny the charges, face up to **five years in jail** and a fine of up to 75,000 euros.

Most of the families of the people who died in the crash agreed not to take legal action in exchange for compensation from Air France, the EADS aerospace firm, Continental and Goodyear tire maker.

Judge Andreassier on Wednesday postponed a decision on whether to call off the manslaughter trial as demanded by Metzner, who claims the eight-year judicial inquiry that preceded it was allegedly skewed against the US airline.

She said she would wait until the final stages of the proceedings before determining whether to declare the proceedings null and void, prior to giving her verdict.

<http://www.google.com/hostednews/afp/slideshow/ALeqM5gwLiAD1FmO-CwfPvWfY1H2Z4NUsA?index=3>

## **NTSB Blames Crew in February 2009 Buffalo Crash**

During a public meeting on February 2, 2010, the NTSB adopted a report on the February 12, 2009 crash of Continental Connection flight 3407 that determined that the captain **inappropriately responded** to the activation of the stick shaker, which led to a stall from which the airplane did not recover.

The aircraft was a Bombardier Dash 8 (N200WQ), and was flying as a Connection aircraft, though it was operated by Colgan Air. On the night of February 12, 2009, it was on a scheduled flight from Newark, NJ to Buffalo, NY and crashed in a residential area about five miles (8km) from the airport. One house on the ground was destroyed. All 45 passengers and four crew members were killed, along with one person on the ground.



Their report stated that during approach, when the stick shaker activated to warn the flight crew of an impending aerodynamic stall, the captain should have responded to the warning **by pushing forward** on the control column. However, the captain **inappropriately pulled aft** on the control column and placed the airplane into an accelerated aerodynamic stall from which the crew could not recover. The NTSB also identified as probable causes the flight crew's **communications procedures**, the captain's **ineffective management**, and the airline's procedures for airspeed selection during approaches in icing conditions.

This investigation has generated substantial public interest over the past year in part because of issues, that may have **contributed indirectly** to this accident, including **crew fatigue** and the related issue of pilot pay. The captain commuted hundreds of miles and the first officer commuted from the other side of the country prior to reporting for duty, and the NTSB concluded that both pilots **used an inappropriate facility** during their last rest period before the accident flight. The NTSB also concluded that the pilots' **performance was likely impaired because of fatigue**.

The synopsis of the accident investigation report is currently available, and the full report will be available in a few months. In the meantime, the public can review a wide variety of information, including the public docket, which contains testimony, exhibits, and other information used by the NTSB during the investigation.

AirSafe.com's Initial Report on this Accident

<http://www.nts.gov/Publictn/2010/AAR1001.htm>

<http://www.youtube.com/watch?v=dqQTendSIEs>

[http://www.youtube.com/watch?v=vMy8kZ2\\_TMs&feature=player\\_embedded](http://www.youtube.com/watch?v=vMy8kZ2_TMs&feature=player_embedded)

## Lahood Raps USA Today's Maintenance Investigation

Department of Transportation Secretary Ray Lahood came out swinging against a USA Today report that **alleged that 65,000** airline flights over the last six years occurred in aircraft that were not properly maintained. The newspaper said the findings surfaced after a six-month investigation into **maintenance practices** by the airlines and oversight by the FAA found both lacking. On his blog, Lahood said FAA inspectors are constantly monitoring maintenance and the recent airline safety record is evidence of that. "Contrary to the assertion in USA Today, **we are not allowing** flights to leave the ground in 'unsafe condition,'" Lahood wrote. He noted the FAA's proposal to fine American Eagle Airlines \$2.5 million for faulty weight-and-balance calculations on 154 flights is proof that the FAA is serious about safety.



However, in a follow up to the maintenance story, USA Today suggested the millions of dollars in fines assessed against airlines in the past year is a symptom of the problem and not an indication of a solution. It noted that over the past six years, the airlines have been cited for **1,300 maintenance infractions**, most resulting in warning letters rather than fines. Meanwhile American Eagle is crying foul over its proposed fine, saying the discrepancies were found in the **backup paper-based weight-and-balance calculation system**, rather than the primary electronic system that actually provides the numbers.

## Plane crash victim families honor anniversary

It was the 10th anniversary of the crash of Alaska Airlines Flight 261 into the Pacific Ocean off the Ventura County coastline.

Eyewitness News spoke with relatives of the 88 victims in an exclusive report on their story of hope and inspiration. For the victim families, it's been years of counselors, lawyers and NTSB (National Transportation Safety Board) hearings.

Last Sunday, 300 relatives will gather. Some so heartbroken, they have never attended a memorial before. But there is a flip side to the stories of loss. It's what some families achieved through their pain. "This of course is the Ryan family. Terry and Barbara and Pat and Jim," said Jay Ryan, who lost four family members.

His brother and sister-in-law and his nephews are gone. Jay Ryan is reminded by every photo, and not just of his family.

Eighty-eight passengers and crew crashed into the ocean off Port Hueneme on Alaska Airlines Flight 261.

"It wasn't an act of god, it wasn't a storm, it wasn't bad directions from the tower. It was simply a mechanic who had failed to perform a very vital function," said Ryan.

The mechanic **failed to maintain a critical screw on the back stabilizer, according to the NTSB** -- a shocking oversight, to Ryan.

Adding to the horror, Ryan and his wife Madeline were almost victims too.

"As a matter of fact, we missed the flight," said Ryan. "We were supposed to go."

Ryan could not let go. And so with other victim families he worked on a memorial and for safety reforms.

**More than 30 NTSB recommendations were implemented.**

Today Alaska Airlines says it is sorry for the accident and enumerates layers of **new safety measures**.

The airline released a statement: "Each of our operating divisions also has its **own quality assurance program, which is monitored by an independent internal evaluation process**," wrote Caroline Boren, Alaska Airlines managing director of communications.

As Ryan's family prepares for Sunday's 10th anniversary, they are mindful that it could have been worse.

It was evident as belongings were fished from the water. There was a camera, and a photo of loved ones, a family as tight as they come.



"It's the saddest thing and also the best thing about my brother's family is that all four of them went together. Had there been one left behind, it would have been terrible," said Ryan.

And so Ryan turns now to the good borne from tragedy.

"We hope that we have improved airline safety to a slight degree. And they don't have the personal involvement, but we will always remember our loved ones for the sacrifice they made," said Ryan.

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## NTSB Reauthorization Hearing Held

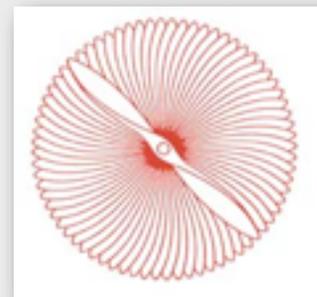
The National Transportation Safety Board (NTSB), as part of its reauthorization proposal, has requested statutory authority to investigate aviation incidents, as well as accidents. NTSB also proposed **10 additional aviation-related statutory changes**, including subpoena authority, access to financial and medical records and access to new data recording media.



Safety Board Chair Deborah Hersman told the House aviation subcommittee last week that these statutory changes would allow NTSB to **learn more in its investigations** and expand the board's aviation safety recommendations. Hersman stated that she plans to focus on transparency, accountability and integrity during her term as chair, adding that she has made progress on these goals since her confirmation in July 2009.

## Online IA Renewal Training

Online Inspection Authorization Renewal Training that is efficient, and at the same time excelling in content and presentation. All of the course materials have been approved by the FAA for IA Renewal. It is simple: register, train at your own



pace, test and receive your certificate of training.

The course is conducted by IARenewal.com, the leader in online IA renewal training. The course is updated annually to provide material that is relevant to safety and regulatory issues surrounding the aviation maintenance environment. These courses combine together for the 8 hour course requirement for IA Renewal.

Signup for IA Renewal Training: <http://sugarcrm.atp.com/iatraining/>

[http://www.iarenwal.com/course\\_description.php](http://www.iarenwal.com/course_description.php)

## Shame on EU as Vietnam Leads the Way in Aviation Safety

Despite the constant flow of statements from the European Union and (European Aviation Safety Organization) that Europe has the highest aviation standards in the world; it is in fact the civil aviation authority of Vietnam that has shown Europe how to behave.

Jetstar Pacific, an Asian low cost airline with Qantas (Australia) as a major shareholder, has been making headlines for the wrong reasons. Whistleblowers made serious claims about **low maintenance standards** which of course have been strongly denied management. Now however a report produced by the Vietnamese Civil Aviation Authority based upon their own thorough investigation has confirmed multiple lapses in safety and standards due to a **"very poor and ineffective" culture of safety maintenance.**

Furthermore the airline had maintenance approvals and senior management approvals revoked whilst being allowed a very short period of time to get itself and the company back in order and come up to the required standard. Senior management of Jetstar Pacific regrettably chose a **"shoot the Messenger"** approach by firing the whistleblowers rather than applaud their integrity. The whistleblowers despite being placed under incredible pressure **remained strong** by placing passenger safety before their own concerns.

The situation for the brave engineers who refused to allow this gross abuse



by

of regulation to continue resulted in loss of employment despite the overwhelming evidence highlighting **poor management**.

Unfortunately however many of the issues raised at Jetstar Pacific are to be found in a number of European airlines. Despite reports being submitted to EASA by AEI officials and many others of similar incidents of abuse and threats to suspected whistleblowers, the European regulators **allow malpractice to continue unabated** whilst refusing to increase whistleblower protection.

How does the European Union justify its "Blacklist" which contains very few European operators when it is itself unable to properly regulate airlines under its authority? The European Aviation Safety Agency (EASA) to the amazement of many of its international partners has no powers of enforcement whilst the European Commission is just plain incompetent, unable to set proper priorities due to political squabbling amongst member states.

AEI which represents more than **45,000 aircraft maintenance engineers** globally considers that no engineer should lose their job for protecting the safety of the traveling public. Fred Bruggeman AEI General Secretary said that "the aviation industry continues to treat whistleblowers in a manner more **appropriate for the Middle Ages**. The time has come for regulators to stand up to aviation bullies and introduce effective legislation holding managers to account. The only jobs that should be taken away following a whistleblower situation such as this are those management positions that **allowed the unsafe situation** to develop. They are the real culprits and this need to be recognized".

## **CG: Tangled hoist led to 2008 Dolphin crash**

A helicopter crash that killed a four-member Coast Guard aircrew last year was caused when a **tangled rescue hoist snapped and damaged the rotor blades**, according to a report released Friday.

The aircrew managed to right the helicopter but did not realize that the helicopter was too damaged to return to land the night of Sept. 4, 2008, according to investigators.

The Dolphin HH-65 crashed into the Pacific Ocean six miles south of Honolulu International Airport.

Rear Adm. Manson Brown, commander of the 14th Coast Guard District based in Honolulu, visited and called family members of the crash victims this week to discuss the results of the investigation. He held a news conference Friday at Barbers Point. “The investigations found **no misconduct** by any personnel,” Brown said at the conference. “The crews on both platforms acted with the utmost professionalism under the extreme circumstances.”



The aircrew was practicing raising and lowering a rescue basket to a motor life boat about 20 feet below—a **typical training exercise** in fair weather conditions. At 8:11 p.m., the aircrew was recovering its fifth hoist of the rescue basket when the accident occurred. As the boat rose on the crest of a wave, the helicopter descended slightly creating slack in the thin steel cable, which became entangled on the boat’s dewatering standpipe toward the back of the boat. As the boat rode the swell down and the helicopter regained altitude, the cable became taut and “physically pulled the helicopter down to the right,” according to investigators. The cable snapped at the pipe, causing the right side of the helicopter to pop up and the helo to roll to the left. As the helo rolled, the main rotor blades hit the hoist boom assembly above the door. This put the blades out of balance and damaged the main gearbox suspension system.

Capt. Jack Vogt, the commanding officer of Barbers Point, said it was a tribute to the aircrew that they were able to regain partial control of the aircraft, because the airframe would have been vibrating severely as it slowly came apart in the air. The helo climbed to 500 feet and accelerated to 50 mph to try to make it back to land. After three minutes and 15 seconds and issuing several “Mayday” calls, the helicopter crashed into the water at about 8:15 p.m., about five miles off the coast of Oahu.

The report’s authors concluded that the air crew should have immediately begun to discuss ditching the aircraft, but Vogt said that they likely were too busy trying to control the helo.

“Basically, the aircraft was breaking apart as the aircrew was trying to regain control and fly the aircraft for recovery,” said Vogt, who has logged 2,700 flight hours in Dolphin and Jayhawk helicopters.

Brown said this was the first time that rotor blades have come into contact with the hoist boom assembly, which led to the crash. He said the Coast Guard has implemented several changes.

“We are a Coast Guard family and this hits all of us very deeply and very hard,” he said. “We’ll continue to **focus on safety** and take whatever steps are necessary to make sure this type of mishap never happens again.”

## **It Pays To Follow Instructions – Don’t Assume!**

After landing the flight crew reported that the brakes snatched when they applied from LH pilot position and when taxiing onto stand, the aircraft stopped abnormally quickly as the brakes were applied again from the LH pilot position.

On initial investigation it was found that LH **rudder pedal return springs were disconnected**.

Subsequently it was identified that a **night shift** technician, **not familiar** with the removal of the rudder pedal installation, had been given the task to carry out the removal of these units.

The technician had just commenced carrying out the removal of the LH pilot pedal assembly using the correct data AMM reference chapter 27, when the supervisor checking to see if he was ‘OK’ with the task, found him removing the return springs in accordance with the AMM and **acquainted him with a simpler ‘alternative method’** which did not require the springs to be disassembled.

The technician then proceeded with the removal of the pedal unit as he had **been instructed**.

The investigation established that although the technician **thought he had reconnected** the subject springs before commencing removal of the rudder pedal assembly using the **alternative method**, he could not be 100% certain. From this it was ascertained that the springs were **not re-connected** and because the removal of the LH & RH pedal assemblies was completed



using the **'norm' alternative and unapproved method**, engineers were not looking at the springs when re-installation of the pedals was undertaken.

This was despite the fact that the entry made on the task card stated the correct maintenance data reference AMM 27 for removal and refit, which included an entry for disconnecting the springs.

At the time, the engineers believed the entry that they made satisfied a company requirement to enter a data reference on the task card and was the most suitable for the task being carried out, although the **individuals concerned consciously knew** that those instructions had not been followed or complied with.

It was later established that a more appropriate entry would have been a data reference to the component maintenance manual (CMM 27) for the disassembly of the rudder pedals.

Consequently, engineers who certified the maintenance task document **were unaware** of the disconnected springs.

This, combined with the assumption that suggested everyone knew how the pedals were **'always' removed using the alternative method**, contrived to ensure that the disconnected set of springs became overlooked and not subsequently reconnected or inspected.