Boeing 737/2T5, EI-CON

AAIB Bulletin No: 3/2003	Ref: EW/C2001/08/05	Category: 1.1
INCIDENT		
Aircraft Type and Registration:	Boeing 737/2T5, EI-CON	
No & Type of Engines:	2 Pratt & Whitney JT8D-15 Turbofan engines	
Year of Manufacture:	1981	
Date & Time (UTC):	24 August 2001 at 0719 hrs	
Location:	Stand B23 R at London Stansted Airport	
Type of Flight:	Public Transport	
Persons on Board:	Crew - 6	Passengers - 118
Injuries:	Crew - None	Passengers - None
Nature of Damage:	None	
Commander's Licence:	Airline Transport Pilots Licence	
Commander's Age:	45 years	
Commander's Flying Experience:	10,500 hours (of which 6,000 were on type)	
	Last 90 days - 200 hours	
	Last 28 days - 200 hours	
Information Source:	Aircraft Accident Report Form submitted by the pilot, Cockpit Voice Recorder and enquiries by AAIB	

The aircraft was on Stand B23R at Stansted Airport with the APU running and the cabin doors closed awaiting engine start clearance for a flight to Torp, Norway. The weather was fine, with a reported wind strength of 4 kt. While awaiting ATC clearance the flight crew noticed that the APU had shut down automatically and the fire bell sound briefly. The APU fire warning light did not illuminate. The commander asked the ground crew to check the APU area for signs of fire and, if none were present, to reconnect the ground power unit. Having been told that there were some diminishing traces of smoke present the commander decided to disembark the passengers and called the Senior Cabin Crewmember (No 1) to the flight deck to instruct her to begin the

disembarkation. Later she returned to the flight deck and informed the flight crew that the passenger steps had been removed.

While the commander was requesting that the steps be replaced the APU fire warning light illuminated and remained on. The flight crew carried out the APU fire drill and the commander informed ATC of the fire warning and requested Airport Fire Service (AFS) attendance.

The ATC Ground Movement Controller initiated a full emergency. The Cockpit Voice Recorder (CVR) recording indicated that, approximately 1 minute 12 seconds after the commander requested the AFS he instructed the No 1 to open the doors and get the passengers out.

The cabin crew opened the left forward door (L1) but the escape slide, appearing to be bent, twisted and at an excessively steep angle, was not used. After some delay the right forward door (R1) and the two aft doors (L2 and R2) were opened and the passengers evacuated without injury down their associated slides. Some delay was reportedly caused by a passenger using a video camera blocking the cabin aisle. The flight crew had to call their flight operations department for assistance to offload a passenger in a wheelchair. Units of the AFS arrived at the aircraft during the evacuation and informed the crew that there was no sign of fire. Concluding that the alarm was false, the flight crew remained on the aircraft.

Subsequent examination of the aircraft by a maintenance organisation found that the fire handles for the APU and for No1 and No2 engines had been operated. Escape slides from doors L1, L2, R1 and R2 had been deployed and the right overwing exit hatch had been removed. No evidence of fire in the APU bay was found and it was determined that the fire warning had been caused by a low resistance fault in the APU tailpipe overheat detector circuit.

The L1 slide (B F Goodrich Part No 101616-105) had been installed on the aircraft on 6 June 2000 following overhaul. Its incorrect deployment had been caused by the presence of a strap that should have been removed during installation. The strap formed a shipping tie that retained the slide within its valise during pre-installation transportation and handling, a measure that had been necessary with older designs of slide. Removal of the tie during installation however was specified in a warning notice on the slide Authorised Release Certificate (JAA Form One). The engineer who certified the installation of the slide by a contracted mechanic reported that he could have missed the presence of the tie as its colour matched that of the slide and therefore was not conspicuous. He was also of the opinion that the notice on the release certificate, warning of the need to remove the tie, did not stand out from the surrounding text.

An operators check of their aircraft fleet ascertained that no other ties remained in place on installed slides. The maintainer issued a quality notice to emphasise to maintenance personnel the inconspicuous nature of the slide ties in use and the need for their removal on slide installation. Additionally, recommendations were made to the slide supplier for the release document warning notice to be made more prominent and for packing ties to contrast with the colour of the slide material.