

CI027 Occurrence Investigation

Executive Summary

On December 7, 2016, China Airlines scheduled passenger flight CI027, a Boeing 737-800 aircraft, registration B-18605, was from Roman Tmetuchl International Airport, Republic of Palau, to Taoyuan International Airport, Taiwan, with the captain, the first officer, 6 cabin crew and 133 passengers, totally 141 persons on board. At approximately 1940 hours Taipei local time when the aircraft was flying over the Manila Flight Information Region at 38,000 feet, smoke emanated from a mobile phone while it was charging. The cabin crew followed the standard procedure putting out the smoke and disposed of this device properly. The captain continued the flight to the destination upon confirming that there would be no more safety concerns for this flight. The flight landed safely in Taoyuan International Airport at 2205 hours.

According to the Aviation Occurrence Investigation Act and Annex 13 to the Convention on International Civil Aviation, the Aviation Safety Council (ASC) an independent aviation occurrence investigation agency, was responsible for conducting the investigation. Agencies invited to participate in this investigation included Civil Aviation Administration, Ministry of Transportation and Communication; National Communications Commission; China Airlines; and Taiwan Samsung Electronics Co. Ltd.

The draft Final Report of the occurrence investigation was completed in August 2017. In accordance with the procedures, it was reviewed at ASC's 60th Council Meeting on August 29, 2017 and then sent to relevant organizations and authorities for comments. After comments were collected and integrated, the draft Final Report was reviewed and approved by ASC's 63th Council Meeting on November 21, 2017. The Final Report was published on January 5, 2018 following the presentation of the opinions by Taiwan Samsung Electronics Co. Ltd at the 64th Council meeting on December 26.

There are a total of 5 findings from the Final Report, and no safety recommendations issued to the related organizations.

Findings Related to Probable Causes

1. The battery of occurrence mobile phone could have developed short circuit during charging, causing high temperature within the closed space of the mobile phone, and subsequent burning and smoking.

Findings Related to Risk

None

Other Findings

1. There is no evidence to show that the occurrence was relate to flight crew, weight and balance of aircraft, aircraft maintenance and the airworthiness of this aircraft.
2. All cabin crew of this flight had been properly trained on how to put out cabin fire, they were also capable of extinguishing cabin fire; they were all quite capable of handling the situation of smoke coming out of mobile phone properly by following relevant procedures of cabin.
3. The flight crew properly followed relevant company procedures in checking the origin of the fire and concluded, after assessment, that this aircraft could continue this flight safely. This complies with company procedures prescribed.
4. The airlines should evaluate the necessity of equipping the on-board fire extinguisher auxiliary equipment suitable for lithium batteries fire.

Safety Recommendations

None