

**GOVERNMENT OF INDIA  
DIRECTORATE GENERAL OF CIVIL AVIATION  
AIR SAFETY DIRECTORATE  
AV. 15011/2/2007-AS**

**Air Safety Circular No 2 of 2007**

**Subject: Helicopter Accident due bad Weather.**

In recent past a helicopter while engaged in an air tour flight, encountered adverse weather conditions and crashed into mountainous terrain. Pilot and all four passengers on board were killed.

The investigators determined the probable cause of accident as “ the pilot’s decision to continue flight into an area of turbulent, reduced visibility weather conditions, which resulted in the pilot’s spatial disorientation and loss of control of helicopter”.

Investigation revealed that helicopter operation to the destination was challenging due to terrain, mountain winds and rapidly changing cloud conditions. Further more it was observed that pilots were operating in that region for less than two months. The pilot’s inexperience in assessing the local weather conditions was a contributory factor. It has been recommended that aviation authorities develop and require a cue-based training programme for pilots that specifically addresses local weather phenomenon and in flight decision-making.

During investigation it was further discovered that **pilots typically flew between 7-8 hours a day without lunch or bathroom breaks.** Between the flights they will keep the rotors turning to reduce wear on the engine. Though these practices were permitted by regulations but had an adverse impact on the pilot’s decision-making and performance.

Moreover it was found that the operator had never been subjected to inspection by aviation authorities in the past. Lack of surveillance was cited as a contributory cause.

Finally it was noted that mountainous landscape, limited air traffic control coverage, challenging weather and high density air traffic make it a prime candidate for National Automatic Dependent Surveillance Broadcast (ADS-B) program and recommended that the aviation authorities accelerate the implementation of ADS-B infrastructure capable of providing services to aircraft flying air routes in the area.

The above is for the information and guidance of all concerned with the helicopter operations in the interest of Safety.

Dated 15<sup>th</sup> March 2007

(M.J. Singh)  
Asstt. Director Air Safety

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