

Follow-up Action on Occurrence Report

FACTOR n. 04/2007 Rev. 0

Date : 14 March 2007

Operator: Commercial

Date of occurrence : June 16, 2002

Locality: Anafi Island (Greece)

Aircraft: Helicopter type A109 E registered SX-HDR

Synopsis: The helicopter was assigned an emergency medical evacuation of a patient from Anafi Island to Rhodes hospital. After the embarkation of the patient the a/c took-off at 23:05 UTC : since that time there was no target related to the helicopter on the radar screen as well as any contact of the helicopter with ground stations. Immediately a state of emergency was declared .The wreckage was found at dawn of June 17 . The accident caused five fatal injuries .

Final Report : Report N° 06/2003 issued by
AAIASB (Air Accident Investigation & Aviation Safety Board) of Hellenic Republic

Follow-up action

The following recommendations issued by AAIASB are based on the findings of the a.m. accident investigation in conjunction to data, which were derived from Flight Safety Foundation Vol. 22 of 1 January 2003.

The present position is based mainly on JAR OPS 3, which have been adopted by ENAC as a code for Commercial Air Transportation with helicopters.

Note: Recommendations 2003-28 up to 2003-35 are addressed to the Hellenic Civil Aviation Authority

Recommendation 2003 – 17 Decision for the execution of the mission

Text: The decision for the execution of the mission must be taken exclusively by the pilots, based on purely operational criteria and given that there is an absolute necessity for its execution, especially when a night mission is requested.

ENAC Response : ENAC accepts this recommendation as follows:

The Italian Code of Navigation paragraph 809 grants the Commander with the power of the final decision; this concept is also re-iterated in the ENAC Circular OPV-18A Draft paragraph 3.1. In addition the Operator Operations Manual stresses that the decision is funded only on the pilot in command judgment based on operating criteria.

ENAC Status : Closed

Recommendation 2003 – 18 Equipping all pilots with the CFIT/ALAR KIT of the FSF

ENAC Response : the usage of this tool will be recommended to FTO/TRTO (Flight Training Organisations/Type Rating Training Organisations) and HEMS Operators as an auxiliary mean for training purposes and normal activity preparation .

ENAC Status : Open

Recommendation 2003 – 19 Flight Planning

Text : Flight Planning must meticulously prepared. All details must be considered covering :

- Crew composition and duties
- Routes to be followed and fuel
- Weather conditions actual and forecasted, wind direction and speed, turbulence, wind shear and other weather parameters and phenomena
- MOCA/MEA altitudes to be maintained
- En route and destination terrain anaglyph and terrain peculiarities
- Standard departure & arrival procedures and aids to be utilized (Radio aids, PAPI, etc.)
- Criteria for eventual missed approach execution
- Atmospheric and environmental conditions including obstruction lighting . Also celestial lighting, moonshine , starshine and sky conditions in case of NVFR .

ENAC Response : ENAC accept this recommendation as follows :

Commercial pilots have to be familiar with an accurate flight planning. Italian schools and training organisation during the preparation courses underline the importance of the elements listed above; also during the normal activity the Operations Manual reflect these concepts for prevention purposes. However ENAC will re-iterate to all the operators and training organisation the concept addressed by this safety recommendation. This activity is part of the ENAC "Safety Plan 2006-2008", which is intended to obtain an 80% accident rate reduction.

ENAC Status : Open

Recommendation 2003 – 20 Maximum Performance Instrument Take-Off (MPITO)

Text : MPITO must be performed when conditions impose obtaining of maximum altitude in the shortest time. During night this procedure must be performed on instruments by the P1 . This way visual sign on the ground are not required especially when there is intense lighting at the heliport . P2 monitors and is responsible for informing P1 about the existing separation from the ground and the other flight parameters .

ENAC Response : ENAC accept this recommendation as follows :

Questa pubblicazione costituisce la risposta ENAC iniziale ad ogni Raccomandazione di sicurezza fatta dall'Agenzia Nazionale Sicurezza Volo. Lo status "APERTO" o "CHIUSO" indica il completamento o meno di tutte le azioni ritenute necessarie dall'ENAC in risposta alla Raccomandazione.

The procedure described is followed “*de facto*” during :

- Operator Conversion Training , Recurrent Training and Checking
- Operator Proficiency Check
- Line Check

HEMS Operators will be requested to insert it in the Operations Manual as a recommended procedure .

ENAC Status : Open

Recommendation 2003 – 21 Cockpit Resource Management

Text : The extensive development of CRM training for crew member is absolutely necessary . Scheduling two pilots in the cockpit who have different nationalities and whose native language is different creates conditions which require a thorough understanding and cooperation which can be established only after extensive training towards achieving a uniform behaviour in all phases of the mission , especially during NVFR flights .

ENAC Response : ENAC accepts this recommendation in the following terms .

JAR OPS 3.943 concerning CRM has been adopted; this concept is also re-iterated in the ENAC Circular OPV-18A Draft paragraph 9. Particular emphasis will be given to the use of the aviation English.

ENAC Status : Closed

Recommendation 2003 – 22 Flight Safety Programme

Text: It is imperative that a complete Aviation Safety Programme be implemented. It must be headed by a Flight Safety educated Senior Captain. Among others, the program should include a Hazard Reporting System and a system of free communication should be encouraged in order that all risks involved in flight operation be recognized and consider properly . The Captain in subject should refer directly to the CEO of the company.

ENAC Response : ENAC accepts this recommendation as follows :

ENAC has adopted JAR-OPS 3; according to JAR-OPS 3.037 implementation from each operator engaged in public transport operations of an accident prevention and flight safety programme is required. According to ICAO Annex 6 Part III provisions ENAC shall require from 1 January 2009 that an operator will implement a Safety Management System has part of its flight safety programme. Furthermore ENAC requires that operator complies with the mandatory occurrence reporting system established in accordance with EC Directive 2003/42.

ENAC Status : Closed

Recommendation 2003 – 23 Helicopter Simulator

Text : If and when a simulator is available, a recurrent training has to be programmed in order to assess the skill level of the pilots and their capacity to face emergency conditions, recovery from unusual attitudes and CRM.

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ENAC Response : ENAC accepts this recommendation as follows :

JAR FCL , which covers the use of flight simulators as a tool for pilot training , has been adopted by ENAC as a code of regulations .
No additional actions are envisaged.

ENAC Status : Closed

Recommendation 2003 – 24 Crew member programming

Text : Programming of the helicopter crews should be always prepared bearing in mind the functions of the human body . The circadian cycle and the fatigue effects on the oxygen supply and night vision should be a subject of a very serious study from the side of the helicopter operator, who should take advantage of the international scientific knowledge and the Aviation Medicine Centre of the Hellenic Air Force (KAI) . It is also suggested that symptoms of fatigue and smoking as well as their effect on night vision be presented in the form of lectures to all helicopter pilots of the Operators by experts in the subject .

ENAC Response : ENAC accepts this recommendation as follows :

The fatigue and circadian criteria have been considered in establishing the current regulation governing flight and duty time limitations . This regulation is specific for HEMS and now it is under review .

As far as lectures are concerned to be held by fatigue experts , we prefer to encourage each Operator to provide appropriate information to the personnel through press articles and videos.

ENAC Status : Open

Recommendation 2003 – 25 Power Assurance Checks (PACs)

Text : PAC should be performed and recorded in accordance to maintenance manuals.

ENAC Response : ENAC accepts this recommendation as follows .

Aircraft are maintained according to approved maintenance programmes. Operators and maintenance stations have their procedures approved for registration of maintenance tasks performed. ENAC has implemented dedicated procedures for safety oversight of operators and maintenance/repair station based on an audit programme.
No additional actions are envisaged.

ENAC Status : Closed

Recommendation 2003 – 26 Installation of ELT

Text : ELT equipment should be installed in accordance to technical specifications

ENAC Response : ENAC accepts this recommendation as follows.

According with EASA regulation all equipment installed on board have to be installed by approved organisation according to approved data. ENAC has implemented dedicated procedures for safety oversight of operators , maintenance/repair station and manufacturers.
No additional actions are envisaged.

ENAC Status : Closed

Recommendation 2003 – 27 Search lights

Text : The specific helicopters must be supplied with search lights .

ENAC Response : ENAC accepts this recommendation as follows.

According to the current ENAC technical regulation at least one search light has to be installed on public transport helicopters, including those operated for HEMS, for IFR and night flights .
No additional actions are envisaged.

ENAC Status : Closed