Aerospace Medical Association

Medical Guidelines for Airline Travel

Reported In-flight Illness and Death

Anthony D. Evans, MBChB
Claude Thibeault, MD

Although there are no publicly available databases providing information on the number of
in-flight medical emergencies or deaths, the few studies published in the literature indicate that
they are uncommon. Minor illnesses such as near-fainting, dizziness, hyperventilation (1) do
occur more frequently. However, serious illnesses, such as seizures and myocardial infarction,
also occur.

Likewise, deaths are rare with one study reporting 0.31 in-flight deaths per million passengers
(2). Another more recent study quote a death rate of 0.3% among all patients with in-flight
medical emergencies. (3) A number of authors have suggested the adoption of an international
standardized recording system for in-flight medical events, but after detailed consideration of
such proposals, it was found that this would be a costly and logistically difficult task, and
unlikely to result in practical benefits (4,5). A more practical and cost effective approach may
be for individual State (country) regulatory aviation authorities to consider the topic with the
airlines they regulate and ask them to submit in-flight medical event data in an agreed format.
Although this would impose some costs on the regulatory authority and on the airlines,
reporting systems already exist for safety related events and it may be feasible to modify these
to record health related events.

REFERENCES:

1. Gendreau MA, DeJohn C. Responding to medical events during commercial airline
3. Peterson DC, Martin-Gill C, Guyette F, Tobias AZ, McCarthy CE, Harrington ST, Delbridge
   TR, Yealy DM. Outcome of medical emergencies on commercial airline flights, N Engl J
5. Mahony PH, Myers JA, Larsen PD, Powell DMC, Griffiths RF. Symptom-based
categorization of in-flight passenger medical incidents. Aviat Space Environ Med