Helicopter Occupant Safety Technology Application (HELISAFE)

Fact Sheet

Project information

HELISAFE TA

Grant agreement ID: 502727

Start date: 1 March 2004
End date: 30 November 2007

Funded under:
FP6-AEROSPACE

Overall budget:
€ 4 753 598

EU contribution:
€ 2 699 999

Coordinated by:
AUTOFLUG GMBH
Germany

Objective

HeliSafe TA research and development work focuses on improving occupant protection in case of a helicopter crash. It is the follow-on project of HeliSafe. The latter is successfully completed after more than three years of work in March 2003. The major outcome of HeliSafe is a demonstrated 33% decreased probability of injury in the most typical helicopter crash. This was achieved by HeliSafe-designed cabin and seat set-up. It is estimated that 30 to 50 percent of fatalities in helicopters will be avoided if the aircraft is equipped with effective safety equipment.

The HeliSafe consortium is committed to develop a knowledge base on active occupant safety in Europe carried by the fact that passenger safety standards for helicopters and fixed wing aircraft are lagging 15 to 20 years behind the automotive state-of-the-art technology. This is why HELISAFE TA is making extensive use of the existing automotive technology.

HeliSafe focussed its research on developing improved restraint systems and airbags including crash sensors. Encouraged by the results of HeliSafe, HeliSafe TA is continuing the work by focussing its research and technology work on advanced safety seats, cyclic stick arrangements which significantly lower the risk of injury for the pilot and knee protection devices.

Such safety equipment must be able to protect occupants independent of their weight, size and for passengers in different seat positions (out of position, resting position, lying on stretcher, etc.).
In comparison to car crashes, helicopter crashes occur largely in areas, which are not easily accessible. In these cases, the occupant is on his own. A mitigation of the injuries is necessary to enable an injured occupant to leave the damaged helicopter without outside help. Therefore a helicopter requires even better safety devices than a car, because of the additional risk of post-crash events (fire, death by drowning, etc.).

Programme(s)

FP6-AEROSPACE - Aeronautics and Space: thematic priority 4 under the Focusing and Integrating Community Research programme 2002-2006.

Topic(s)

AERO-2002-1.3.1.1i - Cabin environment

Call for proposal

FP6-2002-AERO-1

See other projects for this call

Funding Scheme

STREP - Specific Targeted Research Project

Coordinator

AUTOFLUG GMBH

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Participants (11)

FUNDACION PARA LA INVESTIGACION Y DESARROLLO EN AUTOMOCION

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