

**Rotorcraft Occupant Protection Working
Group**

**Task 6: Status Report to the
Aviation Rulemaking Advisory Committee**

Dennis F. Shanahan, M.D., M.P.H.
Working Group Chair

June 21, 2018

ROPWG MEMBERS

- Dennis F. Shanahan (Chairman) - Injury Analysis, LLC
 - Robert J. Rendzio - Safety Research Corporation of America (SRCA)
 - Harold (Hal) L. Summers - Helicopter Association International
 - Jonathan Archer - General Aviation Manufacturers Association (GAMA)
 - Daniel B. Schwarzbach, SPO - Airborne Law Enforcement Association's (ALEA)
 - Krista Haugen - Survivors Network for the Air Medical Community
 - Joan Gregoire - MD Helicopters
 - Rohn Olson- Bell Helicopter Textron, Inc.
 - Matthew Pallatto – Sikorsky
 - William Taylor - Enstrom Helicopter Corporation
 - Pierre Prudhomme-Lacroix - Airbus Helicopters
 - David Shear - Robinson Helicopter Company
 - Chris Meinhardt – Air Methods
 - John Heffernan - Air Evac Lifeteam
 - John Becker - Papillon Airways Inc
 - Christopher Hall - PHI Air Medical, LLC
 - Bill York - Robertson Fuel Systems
 - Randall D. Fotinakes - Meggitt Polymers & Composites
 - Marv Richards – BAE Systems
 - Flavio Iurato – Leonardo Helicopters
 - Laurent Pinsard - EASA Structures Engineer
 - Rémi Deletain - EASA Powerplant & Fuel Engineer
- FAA Advisor
- Martin Crane

SUMMARY OF TASKING

- **Task 1 and 2** – Develop a cost-benefit analysis report for incorporating the existing occupant protection standards 14 CFR 27.561, 27.562, 27.785, 27.952, 29.561, 29.562, 29.785, and 29.952 via §§ 27.2 and 29.2 for newly manufactured rotorcraft.
- **Task 3** – Either make specific written recommendations on how all or part of 14 CFR 27/29.561, 27/29.562, 27/29.785, 27/29.952, should be made effective via §§ 27.2 and 29.2 for newly manufactured rotorcraft or propose new alternative performance-based occupant protection safety regulations for newly manufactured rotorcraft that will be effective via §§ 27.2 and 29.2.
- **Task 4 and 5** - Develop an initial report containing recommendations on the findings and results of the cost-benefit analysis if a new alternative performance based occupant protection safety regulations effective via §§ 27.2 and 29.2 are proposed.
- **Task 6** – Advise and make written recommendations on **incorporating rotorcraft occupant protection improvements and standards into the existing rotorcraft fleet and/or new alternative proposed performance-based regulations**. Occupant protection standards include either all or part of 14 CFR 27.561, 27.562, 27.785, 27.952, 29.561, 29.562, 29.785, and 29.952.

SCHEDULE

- Federal Register Announcement of ROPWG – November 5, 2015
- Meeting 1 – January 21 - 22, 2016
- Meeting 2 – March 1-2, 2016
- **Task 2 Interim Analysis Report** – submitted March 13, 2016
- Meeting 3 – July 26 -27, 2016
- **Task 2 Analysis Report** – submitted November 10, 2016
- Meeting 4 – February 8-9, 2017
- **Task 5 Interim CRFS Report** – May 11, 2017
- Meeting 5 – June 28-29, 2017
- Meeting 6 – September 12-13, 2017
- Meeting 7 – December 14-15, 2017
- **Task 5 Recommendation Report (CRFS)** – January 23, 2018
- **Task 5 Recommendation Report (CRSS)** – January 29, 2018
- Meeting 8 – February 14-15, 2018
- Meeting 9 – March 27-28, 2018
- Meeting 10 – May 10-11, 2018
- Meeting 11 – June 13-14, 2018
- **Task 6 Recommendation Report deadline** – August 5, 2018

STATUS OF TASKING

- Intervention strategies (IS's) have been developed and scored based on a modification of the FAA AVP developed CAST System.
- Based on the scoring of the IS's and other factors, the number of IS's will be pared down, categorized and prioritized within each category.
- The seven intervention categories are shown below:

ROPWG Task 6 Intervention Categories

1. Near-Term Implementation of Current Occupant Protection Regulations to the Existing Rotorcraft Fleet
2. Educational/Incentive Programs (Government and Private Sector)
3. Industry Standards
4. Personal Protective Equipment Use for Certain Missions
5. Changes to Enhance/Improve Occupant Protection Regulations
6. Research to Improve the Crash Safety of Rotorcraft (FAA, NASA, Private Sector)
7. Public Use Rotorcraft

STATUS OF TASKING (Cont.)

- Cost data for implementing regulatory changes has been acquired from OEMs and cost-benefit analysis begun.
- Final recommendations will be agreed upon at the June meeting.
- Recommendation Report writing has begun.
- Currently on track for Task 6 Report completion by August 5, 2018.

AREAS For ARAC CONSIDERATION

- ROPWG has no outstanding issues for ARAC consideration.