May 2016

AirWaves is published monthly and contains information about activities and benefits of the Association of Airworthiness Professionals.

AAP Officer Logbook

A Message from the President

There has been a flurry of activity since last month as AAP continues to flourish. We've increased our membership to 42 members. In addition, the website continues to grow to keep our membership informed.

We welcomed Dave Cripps to the Board of Directors team. Dave is the Deputy Director of the Aviation Engineering Directorate at the U.S. Army Aviation and Missile Research, Development and Engineering Center overseeing airworthiness for all Army aircraft.

We also appointed two chapter officers. Mike Troup will serve as Treasurer. Mike is an Airworthiness Lead at Lockheed Martin for the F-16 and T-X Programs. Jeff Baldino will serve as Webmaster. Jeff is an Airworthiness Lead at Lockheed Martin for the C-5M Program. Welcome Mike and Jeff!

Dawn McGarvey-Buchwalder has graciously volunteered to be the Editor of the

AirWaves Newsletter effective June 2016. Thanks Dawn!

Call to Order

AAP Chapter Meeting Held on 17 May 2016

The May AAP Chapter Meeting was held on 17 May 2016. The membership selected and prioritized the initial operating committees. The priorities forcommittee development and initial committee member volunteers are as follows:

1. Ethics

- Bob Vankeppel
- Matt Crabtree
- Laurette Lahey

2. Communications

- Dawn McGarvey-Buchwalder
- Jeff Baldino
- Bob Vankeppel
- Sue Reviello

3. Elections

- Mike Fox
- Traci Brass
- Mike Troup

4. Member Meetings

- Don Roberts

5. Membership

- Don Roberts (Chair)
- Tom Lewis
- Sue Reviello

6. University Engagement

- Laurette Lahey (Chair)

- Don Roberts
- Mike Fox
- Perry Whitten
- Bob Vankeppel

7. Technical Publications

- Tom Lewis (Chair)
- Don Roberts

If you are interested in joining one of the operating committees, please contact the committee chair or Denna MacLeod.

Meeting presentation and minutes are on the AAP Website.

The next AAP meeting will be held on Tuesday, 7 June 2016 at 7:30 PM EST

Member Spotlight

Dawn McGarvey-Buchwalder

After33 years of service with the USAF, Dawn McGarvey-Buchwalder retired from WrightPatterson AFB. She is a native Daytonianattending the University of Dayton to obtain a Bachelor of Chemical Engineeringdegree and a Master of Science in Computer Science, with an emphasis onman-machine interface.

Mostrecently, she served as the USAF's first Technical Advisor and Branch Chief forAirworthiness (AW) from 2011-16, executing DOD & Air Force Policy Directiveson AW. Key to this duty was facilitatingissuance of flight authorizations for over 150 USAF military types throughdevelopment of bulletins and operating instructions, providing effectivetraining, establishing the infrastructure for planning, reviewing, tracking andauditing of AW products, liaising with National and International AWAuthorities and promulgating accurate, expeditious and thorough assessment offor safety of the warfighter.

Priorto this appointment, Ms McGarvey-Buchwalder was the F-35 Chief Flight SystemsEngineer and Pilot Systems Lead from 2004-11. She was the technical focal pointfor the development, qualification, certification, production readiness andflight testing of all F-35 pilot centric hardware, to include helmet mounteddisplay, head down displays, ejection system, life support, pilot flightequipment, Pilot Vehicle Integration, accommodation, cockpit equipment,lighting, and canopy.

MsMcGarvey-Buchwalder's career has also had her leading life support programs onX-32, X-35, F-22, YF-22, YF-23, KE-3A, and C-12 with a focus to ensure thatwarfighter protection was commensurate with aircraft capability. She was integral to technology transitionfrom the laboratory to the field in areas of Helmet mounted display, G/Altitudeprotection, Ejection restraint, Thermal protection, Vulnerability protectionand Onboard Oxygen Generating Systems.

Asa 5'2" female, she was an anthropometric subject for the USAF. She was utilized in the evaluation ofreach/strength/vision for pilot, maintainer and aerial refueling operations acrossthe majority of USAF platform, as well as used to assess helmet and clothingfit.

Dawnis currently working for Dayton Aerospace, Inc., as a Senior Associate, stillassisting the aerospace and particularly the Airworthiness community.

She is married and has 2 adult sons. She loves the outdoors: bicycling, hiking,canoeing; and is a certified kettlebell instructor.

THE CHALLENGE HIRING EXPERIENCED AIRWORTHINESS PROFESSIONALS

By: Denna MacLeod

The increased importance onairworthiness, particularly in military programs, has placed greater awarenessthat airworthiness planning and activities need to be implemented early in theacquisition of new aircraft programs and modifications. A typical jobrequisition for an airworthiness engineer requires significant experiencedeveloping and performing technical airworthiness certification activities forhighly complex air vehicle systems. So where do defense contractors find thisspecific pool of talent? Very few current airworthiness professionals made theconscious decision to enter the profession. Even fewer universities in the U.S.offer courses related to airworthiness. Many airworthiness engineers weredrafted into the profession from systems engineering or system safetydisciplines enticed by the challenge airworthiness certification activitiespossess. Despite their critical role for assuring and ensuring airworthiness,airworthiness engineers are not required to hold professional certification or undergoa formal method for recognizing knowledge, education, and experience in theprofession. Operators assume aircraft are designed properly and delivered in anairworthy condition placing a tremendous responsibility on the airworthinessengineer. In The Nimrod Review, an inquiry into the wider issuessurrounding

the loss of Nimrod XV230 in Afghanistan on 2 September 2006, theIndependent Review Team report states, “Airworthiness must be delivered bypeople who are suitably qualified and experienced and have the right skills andtraining” [1]. The airworthiness engineer ranks among the more experiencedengineers of the company and utilize this experience to lead teams of airvehicle subject matter experts through the airworthiness certification process.However, very few defense contractors have a defined career path for developingan airworthiness engineer. Unless an engineer is intrigued by the airworthinesscertification process, a subject matter expert may be reluctant to depart thetraditional technical career path for the uncharted career path of anairworthiness engineer. As defense budgets decline, defense contractors havereduced the workforce leaving organizations understaffed and overworked asemployees are required to undertake additional tasks leaving little time forknowledge transfer and training. The result is an increasingly shallow pool of talent. Thereinlies the challenge. Programs have an emergent need for experiencedairworthiness engineers but are unable fill the positions due to the lack ofqualified candidates. Developing future airworthiness engineers is critical tothe success of future aircraft programs. AAP is rising up to this challengethrough mentoring, education, and university engagement activities aimed athigh potential individuals who are looking to explore career options as anairworthiness engineer.

1. Haddon-Cave, Charles. The Nimrod Review. 28October 2009. Crown Copyright 2009.