

Technology Today ARFF Seminar

by John Michael Anderson

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If you attended the recent seminar in Panama City Beach entitled “Technology Today & ARFF Seminar” then you might enjoy reliving this short but exciting training session. I would like to begin by saying that the insight that I gained from a glimpse of the future of ARFF has motivated me and I hope you feel the same way. Our profession is certainly not stagnant; rather it is progressing at light speed with some of the smartest minds hard at work to make ARFF more effective and efficient.



The leadership in our profession was quickly revealed when we heard from the United States Air Force Fire Chief, Mr. Donald Warner. Chief Warner began his Air Force Fire Career in 1965, and he is still serving by leading the charge for innovation and change. One key interesting point that Chief Warner made was that Ultra High Pressure (UHP) is the answer to on-scene resupply and he went on to explain that the USAF is going to go 100% UHP!

Next, we were given a motivational speech from Congressman Curt Weldon of Pennsylvania. Congressman Weldon proved to be passionate, engaged, and knowledgeable on the issues facing firefighters in a post-9/11 America.

After these two key leaders we spent the remainder of day one in seminars with the R&D personnel from the Air Force Research Laboratory. Jennifer Kalberer facilitated and the attendees were exposed to a variety of ground breaking developments. Mr. Virgil Carr gave an overview of synthetic fuels and foam evaluations, and Dr. Kevin Grosskopf briefed on heat dissipation by way of three dimensional animations.

David Trevvett from AFRL discussed “Enhanced firefighter safety and effectiveness. In response to the growing concern for firefighter safety his message is we must strive to

work smarter rather than “harder”. The “Pyrolance” high pressure piercing nozzle was introduced. The water jet has 4500 psi, a granite abrasive can be mixed into the stream, and is ideal for cutting into aircraft fuselages or any other cutting/entry situation.



Mr. Ramon Sellers closed out day one with a presentation on R&D from AFRL on composite materials. He illustrated that composite materials readily ignite, burn intensely, require large amounts of agent to extinguish, and are difficult to completely extinguish. One possible answer to this serious ARFF concern may be Intumescent Paint. This process amounts to an insulating blanket in the form of a paint that is applied over composite aircraft. When this painted surface is exposed to heat the paint will prevent flame from spreading by developing a self-extinguishing reaction that protects the material, buying time for first responders to arrive and take action. The reality is that the newest Air Force Fighter Aircraft is the F-22 Raptor and it comes in at a cost of \$361 million each! We simply have to protect our military’s assets and this program may be the answer.



Day two found all attendees loading onto buses and traveling to the Research site on the grounds of Tyndall Air Force Base. The research site houses the A-380 Air Bus Mock up and it is a very imposing site. Mr. Keith Bagot explained the interagency agreement between the AFRL and the FAA to have this mock up for research into passenger safety. One of the big discussions centered around ARFF personnel using the A-380 mock up for hot burn training. Unfortunately, the FAA teamed up with AFRL to conduct research and development in the area of passenger and crew safety, any ARFF hot burns would be a bonus. More to come on this hot topic.

All the conference attendees were given a thorough briefing and demonstrations on new devices and tools for ARFF personnel. The weather was very hot and the humidity was high, but a good time was had by all.

I believe that this was a special informative seminar and it provided insight into what our industry can expect to see in the coming months and years. I am personally proud to know that the focus of ARFF is on research and development. I feel very comfortable knowing that many of the problems facing the aviation world are being addressed between the FAA and the USAF through the AFRL.



About the author: John Michael Anderson is a Captain with the Pensacola Fire Department currently assigned to the Pensacola Regional Airport (ARFF). His primary duty is suppression, but he is also charged with all ARFF training for 40 Driver/Operators and Company Officers. His background in fire protection began in 1978 as an Airman in the USAF. He is still active with the USAF as a Chief Master Sergeant assigned to Eglin Air Force Base. ■