

NAVAIR Sees AI as Future of Air Wing



NATIONAL HARBOR, Md. – In a well-attended presentation by Naval Air Systems Command (NAVAIR) on April 3 at Sea-Air-Space 2023, RDML Stephen Tedford, program executive officer for Unmanned Aviation and Strike Weapons (PEO (U&W)) explained the need for trust in autonomous systems while providing an overview of the Navy's unmanned aircraft, weapons, and target systems.

“If we have trust in autonomy, we can then make the move to truly artificial intelligence and in the future of the air wing,” Tedford said.

He encouraged a real-world perspective when thinking about autonomous systems, remarking that, “I know many of you here that are in suits now are retired military. Many of you [...] flew jets. At some point all of you were up and trying to find the tanker late at night, trying to get on the back side of the hose to get home. We learned that lesson over Afghanistan.”

“How can you make in-flight refueling autonomous possible?” Tedford queried. “What if a pilot just has to get close enough and then let the system take over for itself. And make it more reliable, make it consistent and make it easier,” he continued.

Open architecture may be the key.

“We always want open architecture systems,” Tedford said. “We need them for flexibility in our systems. Just like applications on your phone that you can add and get rid of. We need to be able to do that with our mission systems in the unmanned environment as well.”

Tedford also focused on the people behind the tech and stressed that autonomous systems and artificial intelligence don't operate in a bubble. Fundamentally, an unmanned system is still a human system.

"We know that unmanned really isn't actually unmanned," said Tedford. "There's a huge support staff that's involved in getting an aircraft in the air and conducting the mission. What we're talking about [...] having direct connectivity between our unmanned platforms and a manned platforms where the unmanned becomes an extension of the manned mission."