Boeing JSF Builds on F/A-18E/F Super Hornet Schedule and Affordability Achievements

Boeing JSF Builds on F/A-18E/F Super Hornet Schedule and Affordability Achievements

In the 1990s, the Boeing F/A-18E/F Super Hornet program redefined how weapon systems are developed and evaluated. By integrating U.S. Navy operational test and evaluation (OT&E) pilots early in the aircraft development effort, Boeing and the Navy were able to identify and resolve issues long before those may have affected cost and schedule.

The Boeing team of Joint Strike Fighter suppliers and the government customer, known as the JSF One Team, is taking early OT&E involvement to the next level. Not only were U.S. Air Force and Navy OT&E experts involved early in the JSF aircraft design process, but they are integrating the latest digital modeling and simulation technologies into their own efforts to test and validate JSF operational effectiveness.

OT&E planning has been part of the current JSF concept demonstration phase of the program and will continue to run concurrently with engineering and manufacturing development in the next phase of the program. The JSF will emerge from EMD with operational issues resolved, ready for its "final exam" - dedicated operational evaluation.

"Dedicated operational evaluation of the JSF should be a straightforward process of verifying the operational and maintenance solutions we put in place during development," said Kathleen Fleming, JSF system test director. "Following the Super Hornet model, we can bring the JSF to dedicated operational evaluation with no significant issues."

Digital models and simulation tools used for weapon system design have allowed analysts to assess the potential operational effectiveness and suitability of the JSF and its systems as those are developed. This allows weapon system developers to address potential operational issues and incorporate changes as software is being refined - before hardware is manufactured and assembled.

The key is getting OT&E analysts, maintainers and pilots involved as early as possible in the development process. OT&E analysts, maintainers and pilots continue to participate in many concept demonstration activities, including virtual weapon loading and full-mission simulation, in which effectiveness and suitability of the JSF weapon system is tested in a virtual operational environment.

Integrating the OT&E community into the JSF development phase will ensure operational issues are identified and resolved so the weapon system can pass dedicated operational evaluation and meet the warfighters' needs.

Boeing, the world's largest producer of fighter aircraft, is competing to build the JSF under a four-year contract. A winner will be selected in 2001.

###

00-79

For further information: Randy Harrison (206) 655-1198