U.S. military builds flight scheduling system with Red Hat Open Innovation Labs

The United States military consists of the Army, Marine Corps, Navy, Air Force, and Coast Guard.

**Challenge**

Through the Defense Innovation Unit (DIU), the United States military sought to improve squadron operations scheduling and flight training for its Marine pilots and aircrew by creating a new solution using modern, efficient development practices.

**Path to innovation**

The DIU worked with Red Hat® Open Innovation Labs for an immersive, human-centered design engagement. During the first phase, Red Hat experts and Marine participants worked together to define and validate a strategy for creating a new flight scheduling system. Activities focused on user-first design thinking and lean product development practices.

During the second phase, Air Force participants and Red Hat developed an initial demo version of the new product, supported by DevSecOps and continuous delivery (CD) approaches. Teams worked closely with Red Hat to build in-house expertise on open, collaborative culture and open source technology—such as creating and running microservices on OpenShift®.

**Business outcomes**

After their Open Innovation Labs engagement, the Air Force team continued to independently design, validate, and build a minimum viable product for the new flight scheduling system, Puckboard. The team also integrated its existing DevSecOps tools and continuous delivery (CD) pipeline to automate security scans, testing, and deployment for this new solution.

“By establishing a fundamental understanding of end users and their needs, and then ensuring the Department of Defense gains the necessary software development skills to fulfill those needs, Open Innovation Labs helps the Department of Defense solve tough problems when other approaches might fail.”

Mike Walker
Global Senior Director, Red Hat Open Innovation Labs, Red Hat