

Remotely Piloted Aircraft (RPA)

What is it?

Remotely Piloted Aircraft (RPA) have been referred to as unmanned aircraft (UA), unmanned aerial vehicles (UAV), unmanned aircraft systems (UAS) and/or remotely piloted vehicles (RPV). However, RPA is the current and correct designation used to describe MQ-1 Predator, MQ-9 Reaper and RQ-4 Global Hawk systems. These RPA are flown either line-of-sight (LOS) or beyond line-of-sight via satellite from a ground control station (GCS). The BLOS concept minimizes the forward footprint of the RPA while allowing global combat missions to be flown from the U.S.

RPA provide ground commanders a persistent and highly capable intelligence, surveillance, and reconnaissance (ISR) platform capable of finding, fixing, targeting, tracking, engaging, and assessing almost any given target with the flexibility to be dynamically re-tasked. MQ-1/9 RPA provide real time full motion video (FMV) in both IR and DTV, have SIGINT capability, as well as strike capability with on board precision guided munitions. Mission sets for the MQ-1/9 include but are not limited to ISR, SIGINT, Close Air Support (CAS), and Air Interdiction (AI).

What has the Air National Guard done?

The ANG has been on the leading edge of RPA operations since inception. In 2006, the 163RW began MQ-1 operations. Since then, the ANG has established a total of 7 RPA units. The states of AZ, CA, NV, TX, and OH are established as MQ-1 Units, with OH currently in conversion from F-16 and slated for an IOC of 1QFY12. Each state (other than OH) has been operating two CAPs (surge operations) for over four years via a mix of mobilization and volunteerism. The state of NY has the ANG's only MQ-9 unit, and has flown one steady state orbit for over a year. The state of NV boasts the ANG's only RPA classic associate unit, which supports FTU and LR training at Creech AFB, NV. To date, the ANG has logged over 150,000 combat hours in the MQ-1 and MQ-9.

What continued efforts have the Air National Guard planned for the future?

The future will be shaped by the continued escalating demand for RPA by our Global Combatant Commanders (GCCs). ANG units will convert to RPA as legacy systems retire or where TFI solutions can be leveraged to bring capability to the field. By FY13, ACC has established a requirement for the ANG to increase capacity to 11 steady state CAPs; 6 more than the current capacity. As our new units stand-up to meet ACC's 65-CAP goal, our current ANG MQ-1 units will stand-down "surge" operations. This will allow for a "normalization" of our units to their programs of record, and will provide significant and much needed relief to our workforce.

In addition to meeting GCC demands for persistent, lethal ISR, it is critical that ANG RPA have ready access to operations within the National Airspace System (NAS). Current FAA restrictions are prohibitive for robust RPA training and timely response to domestic emergency, disaster relief, or incident awareness and assessment (IAA) tasking. It will be critical for the ANG to test and equip RPA with the appropriate hardware to launch, recover, and operate ANG RPA in the NAS. NGB staff is currently working with ACC and Air Force staffs to (1) acquire sufficient Launch and Recover Ground Control Stations to posture the ANG to respond to emergent domestic tasking, (2) stand up an RPA test capacity in California and/or Arizona to test sensors, avionics and tactics for application to utilization of RPA in the NAS, and (3) acquire the technologies necessary to conduct training and operations within the continental United States.

Why is this important to the Air National Guard?

The RPA mission, with its reach-back RSO concept of operations and capability for domestic support, provides the ANG both a long-term mission and the stability necessary to recruit and retain top-notch crews. RPA unit members “deploy in place,” facilitating combat operations in support of any MAJCOM from home, while preserving a concurrent domestic operations capability. Having been on the leading edge of RPA operations from the start, and by maintaining our rated force requirement, the ANG is well postured to maintain a viable and highly experienced aviation force capable of operating any follow-on and increasingly sophisticated manned, unmanned or optionally manned aircraft.