THE P-3 ORION IN RAAF SERVICE – FLEXIBLE AIR POWER IN ACTION

‘Reach today is critical, for it means not only global power, but global presence.’
Richard P. Hallion, USAF Historian, 1991

Introduced into RAAF service with No 11 Squadron in 1968, the Lockheed P-3 Orion has since delivered a versatile, long endurance, maritime and over land surveillance and response capability to the Royal Australian Air Force. Larger and faster than the P-2 Neptunes they replaced, the Orions have provided a far more comfortable crew environment and the opportunity for further capability development as technology has evolved. Ten P-3C Update II Orions replaced No 10 Squadron’s ageing SP2H Neptunes in 1978 while 11 Squadron’s P-3Bs were replaced with 10 P-3C Update II.5 Orions in 1984–85.

While the P-3 was originally fielded as a land-based maritime patrol aircraft, in RAAF service some of its missions, largely conducted from remote bases, have evolved in response to changing threats and national security requirements.

Inheriting the anti-submarine warfare role from the P-2, the Orion’s greater reach and speed saw active RAAF P-3 involvement in Cold War Anti Submarine Warfare (ASW) operations far from home: in the North Pacific, the North Atlantic, the Indian Ocean and elsewhere. After qualifying against ‘tame’ USN submarines, RAAF crews flew from Canada, continental USA and Hawaii, as part of Cold War operations that located, classified and tracked Soviet attack and ballistic missile nuclear submarines. Closer to home, RAAF P-3 crews conducted similar operations against Soviet attack submarines transiting the waters of our region.

Operating the P-3B, with its greater speed and reach, Australia was at last able to fulfil its surveillance obligations under the 1951 Radford-Collins Agreement that provided for the shared responsibility for the protection of shipping and sea lines of communication in the strategically important South Pacific and Indian Ocean areas. Similarly, Australia now had the capability to reconnoitre the maritime expanse associated with its Exclusive Economic Zone declared in 1973, which was an area exceeding Australia’s land territory. Subsequently the P-3’s evolving capabilities have been exploited in a host of ISR operations both in the traditional maritime domain and more recently, over land.

Operation Estes, which commenced in 1980, involved P-3s in round the clock surveillance of Bass Strait oil rigs against an assessed terrorism threat. Further afield, in the wake of the December 1979 Soviet invasion of Afghanistan, Butterworth-based Operation Gateway commenced in February 1981 and is now the ADF’s longest continuously running operation. Throughout Gateway, RAAF P3s have located and tracked submerged submarines operating in their area of responsibility and conducted ISR operations against a variety of surface targets. The sharing of intelligence from these operations with long standing allies and regional partners has firmly established Australia as a trusted member of alliances and arrangements such as ANZUS and the Five Power Defence Arrangements. These operations were not without hazard: RAAF P-3s, while not armed on these missions, were occasionally engaged by small arms. Further, the changing tones routinely heard by RAAF Orion crews of hostile missile radars that had acquired, tracked and locked onto their aircraft were a chilling reminder of the potential for their aircraft to be engaged by more potent weapons.

RAAF P-3 surveillance operations in the South-West Pacific have long fulfilled a broad diplomatic agenda. In safeguarding the natural resources of island states which lack the necessary assets to discharge this role, Operation Solania maritime surveillance by RAAF P-3s
has been a tangible expression of Australia’s standing as a reliable neighbour and regional partner. Strategically, the presence of RAAF P-3s engaged in these patrols has provided a counterweight to the activities of other nations exploiting opportunities in the region.

Over the years Australia’s credentials as a dependable member of the international community have been further reinforced by Orion participation in countless rescues at sea. Prominent among these have been the rescues of solo yachtswoman Isabelle Autissier in 1995, some 900 miles south of South Australia, and even more challenging, the rescues of three yachtsmen, Dinelli, Dubois and Bullimore in the 1996/97 Vendee Globe solo-handled round the world yacht race. In the Vendee case, each had capsized approximately 1200 miles south of Western Australia.

In their long service life with the RAAF, P-3Cs have increased capability and airframe life through a process of continuous upgrades. Least visible of these have been indigenous software upgrades. RAAF crews, comparing their operating software with that used by their USN counterparts were pleasantly surprised to learn that the relatively small size of the RAAF P-3 force was offset by the ability to consult readily and agree to the software changes necessary to increase capability. Such agility is not shared by the much larger, and more dispersed USN P-3 force.

Early in their RAAF service life, the P-3C’s well established surface surveillance capability was enhanced with a maritime strike capability when the aircraft were armed with the AGM-84 Harpoon missile. A P-3C became the first RAAF platform to fire one of these weapons when it engaged an exercise target at sea near Hawaii on Anzac Day 1982. Subsequent upgrade projects have included installation of the advanced Elta ALR-2001 Electronic Support Measures system; and in 1995, a capability assurance program which contributed to the life extension and enhancement of the military capabilities of the renamed AP-3C Orion fleet. Along with the introduction of sophisticated electronic warfare self protection systems and continuing upgrades to the aircraft’s electro optics/infra red system, other enhancements to the aircraft made it a particularly effective ISR platform throughout coalition operations in the Middle East Area of Operations. Between 2003 and 2012, AP-3C crews won great accolades for their operations both over land and in the more traditional maritime role for ISR missions, routinely being tasked in both environments on the same sortie.

In view of the P-3’s design stemming from that of the Lockheed Electra passenger aircraft, no description of RAAF P-3 operations would be complete without reference to the Orion’s air mobility roles. In the nearly 50 years since their arrival at Edinburgh, these have included countless aeromedical evacuations across the region, exploitation of the aircraft’s inherent self-deployment capability to fly to different bases with its own support crew, acting as a navigation and communications platform for long transits by less capable platforms and on occasion, unusual passenger transport tasks. Perhaps the most unusual of these occurred in August 1974 when Russian musician, Georgi Ermolenko, seven colleagues and a DFAT officer were ferried from RAAF Pearce to Singapore in an 11 Squadron P3B. Unions had banned commercial flights from taking Mr Ermolenko out of Australia when he changed his mind after earlier seeking to defect to Australia. Flying to Singapore, the 11 Squadron crew decided they had identified the KGB officer they were convinced would be accompanying Mr Ermolenko. The next day the ‘KGB man’ returned to Australia on the P-3—he was the DFAT officer!

Throughout their long history of service with the RAAF, P-3s, employed in three of the four core air power roles—ISR, strike and air mobility—have epitomised the flexibility of air power.

Key Points

- The RAAF’s P-3 fleet has exhibited the characteristics of speed, reach, and precision in contributing flexibly to Australia’s national interests.
- The decision to continually upgrade the P-3 fleet capabilities over the years has allowed Australia to contribute to combat, air support and humanitarian operations around the globe.
- The P-3’s ability to switch roles, sometimes while airborne, is a significant force multiplier for the ADF.