V-22 OSPREY AIRCRAFT

Assessments Needed to Address Operational and Cost Concerns to Define Future Investments

What GAO Found

As of January 2009, the 12 MV-22s in Iraq successfully completed all missions assigned in a low-threat theater of operations—using their enhanced speed and range to deliver personnel and internal cargo faster and farther than the legacy helicopters being replaced. However, challenges to operational effectiveness were noted that raise questions about whether the MV-22 is best suited to accomplish the full repertoire of missions of the helicopters it is intended to replace. Additionally, suitability challenges, such as unreliable component parts and supply chain weaknesses, led to low aircraft availability rates.

Additional challenges have been identified with the MV-22’s ability to operate in high-threat environments, carry the required number of combat troops and transport external cargo, operate from Navy ships, and conduct missions in more extreme environments throughout the world. While efforts are underway to address these challenges, it is uncertain how successful they will be as some of them arise from the inherent design of the V-22.

The V-22’s original program cost estimates have changed significantly. From 1986 through 2007, the program’s Research, Development, Test, and Evaluation cost increased over 200 percent—from $4.2 to 12.7 billion—while the cost of procurement increased 24 percent from $34.4 to $42.6 billion. This increase coincided with significant reductions in the number of aircraft being procured—from nearly 1,000 to less than 500—resulting in a 148 percent increase in cost for each V-22. Operations and support costs are expected to rise. An indication is the current cost per flying hour, which is over $11,000—more than double the target estimate for the MV-22.

After more than 20 years in development, the MV-22 experience in Iraq demonstrated that the Osprey can complete missions assigned in low-threat environments. Its speed and range were enhancements. However, challenges may limit its ability to accomplish the full repertoire of missions of the legacy helicopters it is replacing. If so, those tasks will need to be fulfilled by some other alternative. Additionally, the suitability challenges that lower aircraft availability and affect operations and support costs need to be addressed. The V-22 program has already received or requested over $29 billion in development and procurement funds. The estimated funding required to complete development and procure additional V-22s is almost $25 billion (then-year dollars). In addition, the program continues to face a future of high operations and support cost funding needs, currently estimated at $75.4 billion for the life cycle of the program. Before committing to the full costs of completing production and supporting the V-22, the uses, cost, and performance of the V-22 need to be clarified and alternatives should be reconsidered.