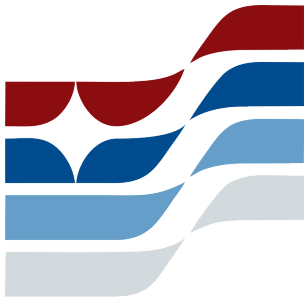




SMI INSIGHT

FROM CONCEPT TO CAPABILITY

SPACE FORCE BUDGET GROWTH SIGNALS OPPORTUNITIES FOR NEW ENTRANTS

By Nick Vance, Vice President and Aerospace & Space Practice Area Lead

KEY POINTS

- The Space Force's FY27 budget request would mark a 286% increase over its first direct appropriation in FY21, underscoring the Service's rapid budget growth and expanding mission scope.
- USSF dedicates a comparatively large share of its budget to RDT&E, reflecting the pace of innovation and threat evolution in the space domain.
- USSF is increasingly using modular architectures, agile acquisition strategies, and flexible contracting tools to accelerate the integration of commercial technologies.
- Major FY27 investment areas—including resilient missile warning and tracking, space domain awareness, and space-based interceptor support—could create meaningful opportunities for new and nontraditional entrants.
- Companies that engage early with USSF acquisition organizations and prime integrators may be best positioned as these programs mature and congressional funding decisions take shape.

Since the Fiscal Year (FY) 2020 National Defense Authorization Act (NDAA) established the U.S. Space Force (USSF), Congress has provided significant, increased funding for the nation's newest military Service.

In the enacted FY21 appropriations bill - the first in which the USSF received substantial direct appropriations - Congress provided \$15.3 billion. In its FY27 budget request (excluding reconciliation funding), USSF is seeking \$59.1 billion - a 286% increase in just seven years. Separately, Congress also provided an additional \$24.4 billion through mandatory funding for Golden Dome and missile defense initiatives, a significant portion of which is being executed by USSF.

The composition of the USSF budget distinguishes it from the other military services. A substantially larger share of its budget is dedicated to Research, Development, Test, and Evaluation (RDT&E) than to procurement or military personnel accounts. As senior USSF leaders emphasized during this year's [congressional posture hearings](#), that funding profile reflects both the rapid pace of technological change in the commercial space sector and the increasingly sophisticated threats posed by U.S. peer adversaries. Maintaining an operational advantage increasingly depends on continuous innovation rather than the slower, incremental modernization cycles of previous decades.

At the same time, the USSF is reshaping how it acquires technology. While continuing to invest in existing national security space systems, USSF is increasingly adopting modular architectures and agile acquisition approaches that accelerate the integration of commercial technologies. It is also reorganizing around mission portfolios, streamlining acquisition authorities, and aligning its budget structure with these decision-making processes to deliver capabilities more rapidly.

For established defense contractors and emerging technology companies alike, this evolution creates meaningful opportunities. The USSF is actively seeking innovative solutions through Commercial Solutions Openings (CSOs) and other flexible acquisition mechanisms from nontraditional vendors and startups capable of addressing emerging operational challenges.

The examples below highlight several areas where the FY27 budget request demonstrates this strategy in action.



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Resilient Missile Warning and Missile Tracking

In its “[Objective Force 2040](#),” a blueprint for meeting strategic objectives, USSF reaffirmed an objective to “field a layered [Missile Warning and Missile Tracking] architecture, purpose-built for persistence and survivability in a contested environment.” Consequently, the USSF [budget request](#) for FY27 includes a substantial RDT&E increase for Resilient Missile Warning and Missile Tracking (MW/MT), a program that “consists of a constellation of low Earth orbit (LEO) and medium Earth orbit (MEO) OPIR (Overhead Persistent Infrared) satellites and their associated ground segments that deliver a resilient, multi-orbit, multi-plane architecture to counter threats such as advanced missiles, hypersonic glide vehicles, and fractional orbital bombardment systems.”

The MW/MT program has already seen its budget double, from \$1.17 billion in FY23 to \$2.37 billion in FY26. Nevertheless, the USSF budget request for FY27 would more than double that funding to nearly \$5 billion (a figure that would rise to \$8.5 billion if related MW/MT capabilities are included). According to the USSF’s budget justification, this increase is aimed at “deploy[ing] space assets in multiple tranches... to allow incremental capability delivery” and ensure continuous tracking of missile threats over time.

Notably, USSF’s acquisition strategy for the LEO explicitly anticipates participation by small businesses, non-traditional defense contractors, and University-Affiliated Research Centers (UARCs), reflecting the USSF’s objective of leveraging a broader industrial base rather than relying exclusively on traditional prime contractors. For MEO, USSF guidance is less explicit. However, it suggests that the agency intends to avoid depending on a single prime contractor and instead will rely on “competition in [America’s] growing space industrial base to rapidly field resilient capabilities at achievable technology readiness levels.”

Space Domain Awareness

Another potential area for new entrants is the rapidly evolving Space Domain Awareness mission area. Specifically, the budget request would provide funding for two new initiatives to strengthen space domain awareness: RG-XX and SG-XX.

RG-XX, which expands ongoing space domain awareness capabilities, is requested as a consolidated new start slated for \$356 million in FY27, with funding programmed to more than \$1 billion in FY29. This program is a next-generation satellite constellation intended to provide reconnaissance of man-made (“resident”) space objects in geosynchronous orbit. According to the [USSE](#), “the RG-XX satellite will require broad industry involvement to ensure... partnerships that have expertise in satellite build and integration, non-Earth imaging electro-optical (EO) payloads, rendezvous and proximity operations (RPO) sensors/algorithms, ranging payloads, and image processing.” Moreover, according to the budget proposal, “RG-XX will use a flexible acquisition construct enabling concurrent and rapid onboarding of multiple new vendors, incorporate allied nation partnerships, and leverage commercial capabilities and services.”

SG-XX, another new proposal, is a “next generation Surveillance Geosynchronous Earth Orbit program” that would provide USSF “capabilities and capacity to detect, track, and characterize threats to high-value U.S. and allied satellites.” The program illustrates the USSF’s broader acquisition strategy of pairing lessons from legacy systems with incremental technology insertion through flexible contracting approaches. While the USSF notes that the program was initiated with mandatory funding in FY26, the USSF requested its first discretionary allotment of \$371 million in FY27, which is programmed to rise to \$496 million in FY29. Additionally, like RG-XX, the acquisition strategy for SG-XX

anticipates involving multiple new vendors.

Both programs are expected to create opportunities across AI, software, advanced manufacturing, ground systems, communications networks, sensor technologies, and related enabling capabilities.

Space-Based Interceptors – Long Range Kill Chains

The budget proposal also requests \$1.4 billion for a Space Data Network (SDN) in support of USSF's Space-Based Interceptors (SBI) – a program designed to develop space-based missile defense capabilities that can counter ballistic missiles and hypersonic glide vehicles. While FY26 reconciliation funds initiated this effort, the proposed FY27 budget includes the first discretionary funding for SBI.

The USSF budget proposal programs an additional \$1.4 billion in FY28 for SBI, and more than \$900 million in FY29. The funds, which will be coordinated between USSF, the Army, Air Force, NORTHCOM, and SPACECOM, will “support the acceleration of the build-out of the [SDN] to support the communication needs of the [SBI] missile defense system.”

Competitive awards for the “adoption of a commercially derived radio frequency (RF) payload and prototypes for its integration” into space vehicles are expected in the second quarter of next year. Because adversaries are rapidly progressing in the threat environment and agile software is a primary focus, USSF is seeking to take advantage of the rapidly expanding and capable U.S. vendor base.

Why it matters

The USSF's shift toward modular architecture, commercial technologies, competitive prototyping, and incremental capability delivery represents a fundamental change in how national security space systems are developed, acquired, and fielded. For both established defense contractors and emerging technology firms, this approach expands opportunities to contribute technologies across the USSF's mission areas.

As space capabilities become increasingly central to military operations and missile defense, USSF is likely to remain one of the fastest-growing segments of the defense budget, although annual funding levels will continue to depend on congressional priorities. Companies that engage early with both USSF acquisition organizations and prime system integrators will be best positioned to compete as these programs mature.

What's next

Congressional action remains ongoing, and funding levels, acquisition direction, and congressional guidance will change before enactment. On June 24, the House Appropriations Committee completed work on its version of the [FY27 Defense Appropriations Bill](#). It included \$3 billion for Resilient MW/MT – LEO and \$1.2 billion for Resilient MW/MT – MEO. Additionally, the bill includes \$1.25 billion for Space Situation Awareness Systems – a level that would fully fund RG-XX – but would reduce the budget request for SG-XX by \$68 million. SBI is fully funded in the bill. The Senate Defense Appropriations Subcommittee has not yet released its version of the FY27 bill.



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