



**Statement before the House Appropriations  
Subcommittee on Defense**

***“Future Defense Spending.”***

A Testimony by:

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**WebEx**

Chairwoman McCollum, Ranking Member Calvert, and distinguished members of the Subcommittee, thank you for inviting me to testify today on the future of the defense budget. To understand what lies ahead for the Department of Defense (DoD), we must first look at how we got to where we are. Since the end of World War II, the defense budget has risen and fallen in four complete cycles. In the cycles driven by the Korean War and the Vietnam War, the size of the budget and the size of the force scaled in rough proportion to one another. But after Vietnam, the budget and size of the force began to decouple. From 1979 through the peak in 1985, the defense budget grew by more than 60 percent, adjusting for inflation. But the size of the force, measured in the number of active-duty military personnel, grew by less than 9 percent.

The budget and size of the force became further decoupled in the most recent buildup that started just before 9/11. From the budgetary low of 1998 through the peak in 2010, the total defense budget grew by more than 110 percent, adjusting for inflation, or 62 percent if war-related funding is excluded. Yet the size of the force grew by just 4 percent. Of course, the number of active-duty military personnel is just one measure of the size of the force. But by nearly any other measure, the trends are similar.

In 2016, then candidate Trump called for significant increases in the military: a Navy of 350 ships, an active-duty Army of 540,000 soldiers, a Marine Corps of 36 active component infantry battalions, and an Air Force with 1,200 active component fighter aircraft. Congress passed two budget deals that allowed the defense budget to grow by 13 percent, adjusting for inflation, from 2016 through the high reached in 2019. Despite this increase and the Trump administration's desire for a larger force, the size of the military did not grow in proportion to the budget. Over that time, the number of ships in the Navy grew by 5.5 percent, the number of active-duty soldiers in the Army grew by 1.9 percent, the number of Marine Corps infantry battalions did not change, and the number of aircraft in the Air Force inventory fell by 0.1 percent.

Adjusting for inflation, the defense budget today is higher than it was at the peak of the Reagan buildup in 1985, but the size of the force is smaller by nearly any measure. The number of aircraft in the Air Force inventory today is 43 percent less than in 1985, the number of battle force ships in the Navy is 46 percent lower, and the Army total force is 33 percent smaller. The trend is clear: we are spending more for less. There are two questions we should ask ourselves: what is driving this trend, and is it sustainable over time?

### **Getting Less for More**

In my research, I have looked in depth at the reasons behind the higher costs of a smaller force. It may be tempting to dismiss this trend as a consequence of our forces becoming more technologically sophisticated and capable—the “less is more” argument. This qualitative assertion is difficult to prove. While our military capabilities have certainly improved, one could argue that

our military has merely kept pace with the increasing threats we face. In some areas, such as space, missile defense, and cyber, I would argue that we have not kept pace with threats.

But looking at the budget data, the driving factors behind this trend of getting less for more are clear: our people are costing us more, and the cost of operating and maintaining our weapon systems is steadily increasing over time. A forthcoming report by my CSIS colleague Seamus Daniels notes that from 2000 to 2012, the average cost per active-duty service member grew at a compound annual rate of 3.6 percent above inflation, excluding war-related compensation costs. This figure includes healthcare, housing and subsistence, retirement accruals, and additional pay raises and benefits enacted by Congress. Since 2012, the cost per person has held relatively steady, thanks to reforms enacted by Congress to arrest the growth in healthcare, retirement, and other personnel costs.

We see similar trends in operation and maintenance (O&M) costs. Excluding healthcare and war-related O&M costs, the O&M cost per person in the military has grown at a compound annual rate of 2.6 percent above inflation since the end of World War II. Looking deeper into the data, we see that over the past 20 years, the Air Force's O&M cost per plane grew by 157 percent above inflation, the Army's O&M cost per soldier grew by 117 percent, and the Navy's O&M cost per ship grew by 99 percent.<sup>1</sup> There are many reasons behind the higher O&M costs per platform, such as the higher costs of maintaining older weapon systems and the higher operating costs of maintaining newer, more technologically complex weapon systems. A factor that should not be discounted is the high steady-state operational tempo demanded of forces by the combatant commands. Reductions in the size of the force serve to concentrate this demand on certain platforms and personnel, which stresses the force and ultimately drives up O&M and personnel costs.

When the Subcommittee hears senior civilian and military leaders talking about the need for 3 to 5 percent real annual growth in the defense budget, these are some of the reasons why. If O&M and personnel costs continue to grow faster than inflation, then a defense budget that is flat with inflation forces difficult tradeoffs among readiness, force structure, and modernization.

But this is a false choice. We should not accept steadily growing O&M and personnel costs as a fact of life. It is an unsustainable trend that over time will lead to a progressively smaller and less capable force that is unable to execute our national defense strategy. Increasing the defense budget without addressing this underlying trend merely delays the day of reckoning. We must attack the problem at its core, however painful and unpopular that may be.

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<sup>1</sup> Todd Harrison and Seamus P. Daniels, *Analysis of the FY 2019 Defense Budget*, (Washington, DC: Center for Strategic and International Studies, September 2018), [http://defense360.csis.org/wp-content/uploads/2018/09/180917\\_Harrison\\_DefenseBudget2019\\_WEB\\_FINAL\\_FINAL.pdf](http://defense360.csis.org/wp-content/uploads/2018/09/180917_Harrison_DefenseBudget2019_WEB_FINAL_FINAL.pdf) p 17.

There is no one answer or magic bullet that can fix these problems that have been decades in the making, and I do not pretend to have the solutions. My recommendation is to focus on three priorities going forward that can bring us closer to the answers we need.

### **Improve Readiness Metrics**

The first priority should be improving the way DoD measures and reports readiness. Readiness is a term used to refer to a lot of things. A recent op-ed by Air Force Chief of Staff General Brown and Marine Corps Commandant General Berger raises the valid point that an excessive focus on near-term readiness (the preparedness of units to fight today) discounts the importance of long-term readiness (the preparedness of units to prevail in future battles).<sup>2</sup> But even the way we measure near-term readiness misses the mark by focusing on the availability of units rather than their capability.

Despite previous attempts at reforming the readiness reporting system, the military continues to measure readiness primarily in terms of the resources applied (inputs) rather than the performance achieved (outputs). The inputs certainly affect the outputs, but what is the relationship? If one cuts the flying hours of a squadron in half, does the average distance a bomb misses double? Is there a time lag between cuts in training and drops in performance? Could more skilled maintainers substitute for a shortage of spare parts? We cannot begin to unravel these important questions unless we are measuring both the inputs and the outputs of the readiness system.

DoD's current method for measuring and resourcing readiness leads to circular logic—a lower level of inputs (e.g., less funding for flying hours) becomes a justification for higher inputs (e.g., more funding for flying hours). Moreover, the system is predisposed to favor personnel and O&M accounts. Without proper readiness output metrics, we are operating with significant blind spots when resourcing readiness.

As I have previously written, DoD should develop strategy-based readiness metrics derived from the existing mission essential task lists for each unit.<sup>3</sup> When doing this, it should be careful not to fall into the trap of attempting to aggregate these measures into a single readiness number or color coding for each unit. Just as you cannot assess a person's overall health in a single metric, such as temperature, blood pressure, weight, or cholesterol levels, you cannot assess military readiness in a single metric. It requires a basket of metrics that may be different for different types of units, and these measures should reflect both the long-term and near-term ability of forces to perform the missions and tasks assigned to them.

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<sup>2</sup> Charles Brown, Jr. and David Berger, "To compete with China and Russia, the U.S. military must redefine 'readiness,'" Opinion Editorial, Washington Post, February 1, 2021.

<sup>3</sup> See Todd Harrison, *Rethinking Readiness* (Washington, DC: Center for Strategic and Budgetary Assessments, August 2014), <https://csbaonline.org/research/publications/rethinking-readiness>.

For its part, Congress should require DoD to submit more detailed budget justification documents for O&M accounts. The current O-1 documents submitted by DoD do not provide sufficient detail to show operating costs by platform or unit type, and they do not include cost projections for future years. This lack of transparency limits effective oversight for important matters, such as the projected future costs of legacy weapon systems and force structure. However, requiring DoD to submit O&M justification books with more detail does not mean that Congress should limit DoD's flexibility to move money within and among O&M accounts. Insight and transparency are not the enemy of flexibility.

### **Rethink Roles and Missions**

A second priority should be to conduct a strategically scoped roles and missions review.<sup>4</sup> The allocation of roles and missions among the military services is necessary for effective strategy development and the efficient fielding of forces. Without clearly assigned roles and missions, gaps in capabilities can emerge where no service claims responsibility and precious resources can be wasted on redundancies among the services.

The Key West Agreement of 1948 that allocated roles and missions among the services was needed due to the confluence of three key changes at that time: the establishment of new organizations, advances in new technologies, and the creation of new military missions. Today we are at a similar inflection point with the establishment of the Space Force, rapid advances in new technologies from artificial intelligence to hypersonic weapons, and the creation of new military missions dictated by evolving threats and enabled by new technologies.

The default approach of the Defense Department is to do this in a piecemeal and reactive manner, attempting to resolve roles and missions issues individually as they become pressing problems and deferring decisions whenever possible. A more strategic approach, however, is to address questions about roles and missions in a more holistic way before they create problems. A strategically scoped roles and missions review should be narrowly focused on the gaps, overlaps, and areas of ambiguity among the services that stem specifically from the creation of the Space Force, advances in new technologies, changes in current military missions, and the emergence of new mission areas that are strategically important to DoD.

For example, the military needs to establish better boundaries to delineate the space capabilities and space operators that belong in the Space Force and the residual space expertise that should remain in the other services. Right now, DoD Directive 5100.01 lists the Army, Navy, Air Force, and Space Force as separate providers of space forces responsible for conducting space

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<sup>4</sup> See Todd Harrison, "Rethinking Military Roles and Missions in a New Administration," *Transition46 Series*, CSIS, <https://defense360.csis.org/rethinking-military-roles-and-missions-in-a-new-administration/>.

operations.<sup>5</sup> This overlap will lead to redundancies and the inefficient use of resources—and the last thing Congress intended when creating the Space Force was to end up with four different space forces.

DoD should also consider other realignments, including moving the Air Force’s Intercontinental Ballistic Missiles (ICBMs) to the Army, as well as the security forces and helicopter squadrons that support the ICBM enterprise. The only other silo-based weapon system in the U.S. military is the Army’s Ground-based Midcourse Defense (GMD) system. Moreover, the Army already has forces that specialize in site security, and it operates a variety of helicopter units. Moving the ICBM enterprise to the Army would relieve the Air Force from having to maintain separate helicopter pilot training and maintenance lines, which could be folded into the larger Army rotary-wing aviation structure.

Joint All Domain Command and Control (JADC2) is an example where emerging technology, threats, and strategy have created a mission area that does not neatly fit into any one service. This leaves a gap where no service has the responsibility or authority to design the overall network architecture, protocols, and standards necessary for the level of interoperability the future force requires. Leaving the services to pursue their own approaches to JADC2 or engage in ad hoc partnerships is a recipe for failure. DoD needs to designate lead service for JADC2 if it is serious about building a truly joint architecture and achieving the operational benefits it can provide.

### **Identify Crown Jewels**

A third priority is to identify and build consensus around the crown jewels of the future force. What we can learn from past downturns in the defense budget is that it is difficult to make significant changes in a short period of time. When I was at the Center for Strategic and Budgetary Assessments, we ran dozens of strategic choices exercises with a wide variety of groups to think about how to align the budget and strategy under various levels of constraints. One of my key takeaways from running these exercises is that developing a consensus around the top strategic priorities brings into focus all the other things that are (by definition) lower priorities. Rather than struggling to define what is legacy or not, we should be debating the priorities needed to execute the strategy.

The 2018 National Defense Strategy makes clear that competition with China and Russia is the top strategic priority. While the new administration may tweak the strategy to better emphasize the differences in how we compete with China and Russia, the overall focus is unlikely to change. One of the key enablers needed to prevail in this competition over the next five to ten years is the ability

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<sup>5</sup> Department of Defense, “Functions of the Department of Defense and Its Major Components,” DoD Directive 5100.01, updated September 17, 2020, <https://www.esd.whs.mil/Portals/54/Documents/DD/issuances/dodd/510001p.pdf?ver=2020-09-17-154337-967>.

to share data fluidly across forces on the ground, at sea, in the air, and in orbit to provide a more complete shared picture of the battlespace—what has become known as JADC2. Advances in data analytics and artificial intelligence will enable us to sort through massive amounts of data and identify patterns at speeds that are orders of magnitude beyond human capabilities. The battle network of the future needs to be nonlinear, meshed, and far more difficult for an adversary to disrupt or outpace.

The nodes and connectors of the network are critical to making this a reality, and this is where I believe the crown jewels of the future force can be found. The future force requires: stealthy, long-range aircraft that can penetrate contested airspace and hold targets at risk; resilient communication links that are more resistant to jamming and spoofing; robust space defenses that can protect our critical space assets from attack; highly proliferated constellations of satellites that provide tactical intelligence and surveillance over contested areas; long-range air and missile defense systems that can restrict adversary freedom of action; and special operations and light-footprint ground forces that can operate within contested areas.

In conclusion, the budgetary and strategic challenges we face today are significant. Finding solutions to bend the trends lines in our favor without breaking the force will require a concerted and coordinated effort in both Congress and DoD. But I remain optimistic because the main obstacles to our success are within our control: status quo thinking among strategists, cultural resistance to change within the military, and parochial political interests in Congress. Making the hard choices now will prevent us from having to make even harder choices in the future.