

Department of Defense Funding for Fiscal Year 2023

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On my honor as a University Student, I have neither given nor received unauthorized aid on this assignment as defined by the Honor Guidelines for Thesis-Related Assignments

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Introduction

In 2023, \$820 billion was spent on the U.S. military, or about 13.3% of the total federal budget (How Much Does the US Spend on the Military?, 2024). A monumental amount of taxpayer money is spent each year on defense, and it is important to understand how it gets allocated. This money helps create jobs, technologies, and protects national security through the Research, Development, Test, and Evaluation (RDT&E) sector of the Department of Defense (DoD). The RDT&E is one of five major funding appropriations of the DoD. The RDT&E sector of the DoD is responsible for the development of equipment, material, or computer application software and its required evaluation and testing done by federal contractors or government organizations (AcqNotes LLC, 2021). Of all federal Research and Development (R&D) funding, the DoD has typically received more than half annually (Seelarbokus, 2021).

The defense R&D program also helps fund the military-industrial complex, which is a network of individuals and institutions involved in the production of weapons and military technologies (Weber, 2019). Military R&D programs are “outsourced to private business companies, which are tasked with weapons production and other military applications, and which also exert a significant role in advocating for specific production programs” (Seelarbokus, 2021). A prominent figure who gave warning to the military-industrial complex was President Dwight D. Eisenhower in his farewell address in 1961. He warned that, “In the councils of government, we must guard against the acquisition of unwarranted influence” of the military industrial complex, and continues, “The potential for the disastrous rise of misplaced power exists and will persist” (Bucholz, 2008). There are concerns that the military-industrial complex uses their growing influence to “corrupt budget and policy processes,” and could propose military solutions that are not in the country’s best interest but rather in the interest of the industry (Freeman &

Hartung, 2023). The military-industrial complex also “exhausts huge human and intellectual capital” (Seelarbokus, 2021). Some critics of the DoD’s R&D sector argue that “defense-related R&D might displace private R&D and therefore could even have a negative impact on the total amount of innovation” (Steinwender et. al., 2019). Taking resources away from the private and commercial sectors in order to fund military operations could stifle technological innovation for the sake of military advancement.

While there are many arguments for the decrease of funding of the R&D sector of the DoD, there are also some arguments saying that the continued increase of funding for the R&D sector is beneficial. Some argue that the many inventions and technological innovations that the department has created over the years has an overall positive impact on the commercial market as well as for national security. Over the years, the DoD’s R&D sector’s technological advancements have been crucial for the commercial success of jet engines, computers, radar, nuclear power, semiconductors, GPS, and the internet (Steinwender et. al., 2019). Some also say that without enough funding for R&D and the ability to produce new technologies the United States will be left in a place of vulnerability and disadvantaged compared to other adversaries who are investing in their defense technology (Pfaff, 2020).

If the federal government gives too much funding to the R&D defense program, they could give growing power to the military-industrial complex while taking away resources from the private sector, however, if they do not give enough funding, they could stifle steady innovation and leave national security in a place of vulnerability. An important case to look at in order to explore how this process is decided is the 2023 federal budget. In 2022, Congress was facing midterm elections that coming fall, as well as growing concerns about global military conflicts, which in turn made the budget process a distinct one. The 2023 fiscal year was unique

and marks an important case for understanding defense budget allocation because of the desire for innovative military technologies, lobbying efforts from industries, and political motivations of Congress members amidst international conflicts. I review different defense technologies that Congress invests in, the presence of defense lobbying in the budget, as well as a brief overview of how the budget process works and politics behind it. Through looking at financial datasets as well as C-SPAN video footage of committee hearings, I understand how the defense funding got allocated in the fiscal year 2023. Through researching the budget process, I came to the conclusion that in 2023 defense funding was allocated in a way to solidify the United States' stance as an ally and a key global power.

Literature Review

One of the leading reasons that the R&D sector continues to get more funding is to invest in different innovative technologies. Defense R&D spending can, “drive overall innovation by producing knowledge and technologies that themselves go on to enhance subsequent innovative outputs” (Schmid, 2018, p. 597). Innovations from the R&D sector spill out into the commercial sector and allow for an increase in the overall innovation output of the country. Examples of military-funded technologies from the past are the internet, semiconductors, nuclear reactors and stealth technology, which have all had different levels of impact on overall productive innovation (Schmid, 2018). The budget for the RDT&E sector of the DoD increased 17% in fiscal year 2023 to \$144 billion (Thomas, 2023). Another reason that the R&D sector is increasing funding each year is because the federal government wants the technology of the United States military to compete with the likes of China and Russia who are continuing to pour money into their research and development sectors, and they want to keep national security secure (Phillips, 2023).

Another way the DoD is creating innovation is through the Defense Innovation Unit, which is a way for the DoD to build relationships with companies outside of the Defense sector, who received a big increase in funding in 2023, going from \$43 million the previous year to \$112 million (Thomas, 2023). Federal contractors are a big part of the funding for the R&D sector as most of the actual development is outsourced to different defense industry companies. These federal contractors can provide things that Congress is looking to invest in such as high performance computing, biomanufacturing, mobile nuclear power, nuclear propulsion, and missile early warning (Thomas, 2023). Through giving funding to the R&D, federal contractors get more funding to continue to research and develop technologies for the military.

The defense contractors that the federal government funds also gave significant financial contributions to members of Congress during the 2022 election cycle. The growing influence of the military-industrial complex as mentioned by Eisenhower has always been a topic for discussion surrounding the defense industry (Fallows, 2012). As more money gets poured into Congress from these defense companies and in return more contracts being awarded to them, the more this relationship's power continues to grow. A budget analyst for the Pentagon uses the term "political engineering" to describe "the parceling out of defense subcontracts to the districts of influential members of Congress," and that "the more senators and representatives are dealt into the arrangements, the harder it is for them to exercise independent judgment" (Fallows, 2012). House and Senate Armed Services Committees are targeted by defense contractors because they are responsible for passing the National Defense Authorization Act (Wooten & Claypool, 2022). This specific committee and its subcommittees are responsible for how much funding the R&D gets and for providing contracts so they are continually targeted by defense companies.

While financial contributions do play a part in politics, there are many different political motivations for defense spending. Since the 2022 election, Republicans are the head of the House Armed Services Committee and the House Appropriations Committee's defense subcommittee (Hartung, 2023). It is not always the case that both parties want funding, some right wing members also want to decrease some defense spending which have to do with things such as defunding alternative fuel research (Hartung, 2023). Some progressives are against increased defense spending, in 2022 two Democratic representatives introduced a bill that would cut \$100 billion a year from the department's budget (Hartung, 2023). In a study done about the 112th U.S. House of Representatives, it was found that legislators', "party affiliation and the demographics of their districts account for differences in the legislative vote on military spending" (Why Do U.S. Congress Members Vote for Military Spending?, 2022). The same study found that Republicans are more likely to favor military spending (Seigle & Xiang, 2021). The differences between and even within parties are resolved in debates in the House and Senate.

Once all the debates and committee hearings have happened, and a budget has been proposed, there is a congressional vote in order to pass the budget. There are 12 appropriations within the House and Senate, and the Defense subcommittee is responsible for funding for the Defense sector (The federal budget process, 2023). The Armed Services Committee is the main subcommittee that handles this, and in each house there are many subcommittees that help with deciding where the money is going to go for that fiscal year. There is debate within the House and Senate in order for their two proposed budgets to be exactly the same before the budgets gets passed onto the President (Saturno & Lynch, 2023). This is the last step before the president signs off on the budget, and it is put into effect for the next fiscal year.

I researched defense R&D funding through the lens of Pinch & Bijker's social construction of technology (SCOT) framework. The main concept from SCOT that I employed through my research is that different social groups influence the way a technology is developed and used, and the idea that technology and society go hand in hand. The development of technology is described as an "alteration of variation and selection," by different relevant social groups (Pinch and Bijker, 1984, p. 411). Relevant social groups are groups that organize around a shared meaning of a technology. I used this framework to analyze the relevant social groups that have an influence on how the budget is developed in order to determine how the money is allocated. Relevant social groups would be groups such as industry groups, defense contractors, and Congress members. I analyzed the different backgrounds and motivations of these social groups for each argument I made and demonstrated how understanding these social groups allowed me to better conduct my research.

Methods

I chose to research the 2023 fiscal year budget because this year was an exception in the budget process due to the election cycle happening in 2022 and the military conflict in Ukraine. Choosing this year gave me a unique insight to the process. In order to research my question I started by looking at primary sources. For my primary sources, I looked at datasets of financial contributions, letters from congress members, congressional hearings and debates, as well as the actual budget proposal itself. One main primary source was looking at CSPAN to find relevant videos and articles about the process. I looked at the congressional hearings of the Armed Services committee of the House and Senate specifically. Specific hearings that I looked at to find evidence for my research was the April 2022 hearing on the Defense Department Fiscal Year 2023 Budget Request, as well as the hearing that took place in May 2022, specifically about

how aid to Ukraine affects the budget. For my secondary sources, I looked at academic journal articles about the budget and the DoD, as well as, media/journalistic accounts that report on the specific budget proposal.

Analysis

Lobbying played a significant role for defense funding in 2023, and its role was underscored by the midterm elections that took place in 2022. The defense sector contributed around \$5.8 million to the combined 84 members of the House and Senate Armed Services Committees who create the annual defense budget (Giorno, 2023). Defense contractors helped fund politicians campaigns which created a feedback loop, further deepening the military industrial complex (Wooten & Claypool, 2022). In 2022, the biggest donor to politicians in general was Lockheed Martin, donating a total of \$3,143,709 (Defense Sector Summary, 2023). The biggest defense contractors have received an abundant amount of money from the federal government which demonstrates their importance to Congress. Contract awards at the Department of Defense rose by 11.5 percent from \$422 billion in FY 2022 to \$470 billion in 2023 (Edwards, 2024). Defense contractors are the main producers of the military technology that Congress funds. Analyzing the motivations behind why the defense industry donates so much money to Congress helps paint a clearer picture of the military technology produced. Federal contractors donated money to Congress in order to ensure that their companies get funding for their projects, and to keep their companies profitable and workers employed. Because of this relationship that federal contractors have with congress members it draws questions about the motivations behind the production of military technologies.

Some may argue that just because defense companies are giving money to certain politicians that does not imply a direct correlation between the contribution and funding, and that

politicians still act in the best interest of the country, as lobbying is a common practice in every industry. However, that does not eliminate the influence that money has over politicians in power and the conflict of interest that arises, especially in an industry as powerful as the defense.

Danielle Brian, an executive director from the nonprofit Project on Government Oversight, stated that, “Contractors have profit motive, and should not be driving the funding plans of agencies” (Palmer, 2006). The members of the House and Senate Armed Service Committee who favored increasing the FY23 defense budget average contribution was 3x that of members who did not want to increase the budget (Wooten & Claypool, 2022). This disparity highlights that the reasoning behind their decisions was not solely what was in the best interest of the country, but could have also been influenced by money. Lobbying has always been a common practice, but since 2022 was an election year, a significant amount of money was donated in order to ensure the defense contractors funding.

While lobbying has always secured more money for federal contractors, this year was unique in the push for more funding for the R&D sector because of concerns of keeping up with the advancing technology of adversary world powers. In 2023, the DoD’s RDT&E sector received more funding in order to continue to modernize military technology. The FY 2023 RDT&E budget of \$130.1 billion is the largest ever requested by the Department and an increase of 9.5 percent over the FY 2022 enacted level (United States Department Of Defense, 2022). Requesting the most amount of funding in history demonstrates how important the continued advanced research and development of technology is to Congress. In 2021, the National Security Commission on AI warned that the United States’, “technical prowess is being challenged, especially by China and Russia,” and continued that, “if current trend lines are not altered, the U.S. military will lose its military-technical superiority in the coming years” (Phillips, 2023). As

China and Russia continued to grow in their technical power, it put the United States in a more vulnerable position, which was a big part of the reason that the R&D budget has continued to grow. In the opening statement for the Defense Department Fiscal Year 2023 Budget Request hearing, Senator Jack Reed states that this budget request focused on key areas including, “prioritizing China as a key strategic competitor, addressing the threats posed by Russia and other adversaries and modernizing the defense department” (Defense Department Fiscal Year 2023 Budget Request, 2022). Stating this at the opening of the hearing emphasizes the importance of modernizing the military in order to maintain a competitive position with adversaries. The budget for the RDT&E increased 17% in fiscal year 2023, which follows a trend of rapid growth that has led to a doubling of spending over the past six years in this sector (Thomas, 2023). Putting more money into competitive technology allowed the United States to assert themselves in maintaining their role as the superior military power globally.

In order to uphold the country’s status as a world power, Congress felt as if they had to allocate even more money than previous years to project strength. As tensions rise between the United States and Russia, it can be a reminder of conflicts with Russia in the past. The average age of a House member is 57.9 and a Senate member is 65.3 (Blazina & DeSilver, 2023). Many of the members of Congress are old enough to understand the political tensions between the Soviet Union and the United States during the Cold War, and understand the importance of the need for competitive technology. The Cold War led to the Space Race, which rapidly developed rocket and space technology. This era was also responsible for the development of nuclear technologies. Technological superiority was essential in the United States coming out on top during the Cold War, and as China and Russia are pouring money into their military technology, it can be viewed as a threat from Congress. Congress members' experience with past geopolitical

conflicts allows for a better understanding for the push for more innovative technologies during the 2023 fiscal year.

Another reason that this specific budget was significant was because there was bipartisan support for raising funding. Through the debates within the committees, it seemed that the issue of spending on defense was not a very polarized issue for the 2023 fiscal year. Republicans used their “leverage in the Senate and impending control over the House” in order to negotiate an increase in defense spending (Thomas et al., 2022). However, during the discussions for the federal budget for fiscal year 2023, there did not seem to be much differing opinions on the increase in funding. During the committee sessions for funding for the defense budget FY23 where there was an increase in spending, a democratic committee member said, “There was almost no debate” (O’Brien, 2022). This demonstrates the similar stances both Republicans and Democrats took that year. A letter from Republicans of the House and Senate Armed Service Committees to Joe Biden cited the fact that in the 2022 fiscal year there were “overwhelming bipartisan majorities” to reject members of the left proposal to cut funding for defense. They continue to say that they believe that demonstrates that there is, “overwhelming political support,” for “increasing immediate investing in our national defense” (GOP Armed Services Committee Members Press Biden to Boost Defense Budget by 5% above Inflation, 2022). Republican members communicated that they believed that there was enough of an overall widespread support from members of Congress for an increase in defense funding for 2023 that overpowered the views of some on the left.

Part of what made this fiscal year so significant was how the ongoing military conflict in Ukraine affected the support for increased funding. Including \$319 million from the Ukraine supplement, the budget for RDT&E programs increased 17% to \$144 billion (Thomas et al.,

2022). The war going on in Ukraine had a major influence on the DoD budget, as more money was given to the budget in order to provide military aid. Senator Jack Reed stated that, “We need to be there for the Ukrainians in the midst of this long slog,” and continues that, “We need to address those fears and provide Ukraine what they need to win” (Defense Department Fiscal Year 2023 Budget Request, 2022). The fear of war and the need to help Ukraine against an enemy power was a major influence in the push for increased military funding in 2023. The war in Ukraine allowed for the Congress members to be united politically under the strong sense of patriotism and the need to help protect an ally. The letter from Republicans of the House and Senate Armed Service Committees to Joe Biden drew concerns about national security stating that, “Putin’s aggression against Ukraine has already left us and our NATO allies less secure, and his appetite and erratic behavior is likely to grow” (GOP Armed Services Committee Members Press Biden to Boost Defense Budget by 5% above Inflation, 2022). Using words such as “aggression” and “erratic” emphasize the magnitude of the perceived threat from Russia and creates a sense of urgency in addressing it, which further shows why there was such a push for funding from both sides of the aisle. Political analyst, Julia Gledhill, stated, “Democrats just don’t want to look weak on defense ahead of an expected red wave this fall, especially given the war in Ukraine and record inflation.” (O’Brien, 2022). This quote demonstrates how part of the reason Democrats voted for an increase in spending in order to protect their place in Congress and to show strength as a political party. It also shows how during global conflicts, Congress wants to show a united front in providing aid, and how increasing funding for the military was one way to show that to the American public.

Conclusion

A variety of factors played into the role of funding for the R&D sector of the DoD during the fiscal year 2023 that made it a unique and important case to be studied, including lobbying efforts, modernizing technology, and political motivations amidst military conflicts in Ukraine. These factors together demonstrate how this year's fiscal budget was a reflection on the United States' need to uphold its status as a global power. Funding to the R&D sector can serve as a strategic tool for projecting strength and creating a unified and robust national image to both domestic and international audiences. There can be future research done in the process for understanding how to effectively allocate enough resources to this sector to optimize the efficiency of the technology developed for military use. In different geopolitical climates, there are different motivations for funding military technology, and that should be studied so there can be a more complete understanding of the process. Possible interventions would include Congress, academia, industry, and public interest groups collaborating to research past funding strategies to ensure effective and informed decisions on future allocations. It is important to understand why and how the United States is funding military technologies in order to ensure that they are doing so in the best interest of the country and its citizens, especially in times of geopolitical tension. Understanding the interplay of factors that occur in funding military research and development is crucial in ensuring the integrity of the budget process and protecting the country's national security interests.

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