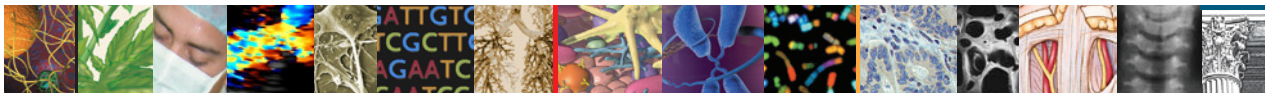

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Perspective

Caring for Our Transgender Troops — The Negligible Cost of Transition-Related Care

Aaron Belkin, Ph.D.

On July 13, 2015, U.S. Defense Secretary Ashton Carter announced that the military anticipates lifting its ban on service by transgender persons, those whose gender identity does not match the sex that they were assigned at birth. Although an estimated 12,800 transgender personnel currently serve in the U.S. armed forces (see table for explanations of estimates), they must conceal their gender identity because military policy bans them from serving and prohibits military doctors from providing transition-related care. Although some transgender people do not change their bodies to match their gender identities, government agencies, courts, and scientists agree that for many, transition-related care (gender-affirming surgery, cross-sex hormone therapy, or both) is medically necessary, and state regulators have found medical exclusions to be indefensible and in some cases unlawfully discriminatory. Yet in response to Carter's announcement, opponents in the Pentagon and beyond expressed concerns about the costs of providing such care.

Having analyzed the cost that the military will incur by providing transition-related care, I am convinced that it is too low to warrant consideration in the current policy debate. Specifically, I estimate that the provision of transition-related care will cost the military $5.6 million annually, or 22 cents per member per month. Of course, the cost will depend on how many transgender personnel serve and utilize care, and estimates are sensitive to certain assumptions, such as the expectation that the military will not become a "magnet" employer for transgender people seeking health care benefits. Though my utilization and cost estimates are quite close to actual data provided by an allied military force, it seems clear that under any plausible estimation method, the cost amounts to little more than a rounding error in the military's $47.8 billion annual health care budget.

My calculations are as follows. In 2014, scholars estimated that 15,500 transgender personnel served in the military out of a total force of 2,581,000, but they included troops who were ineligible for health benefits.[1] Moreover, the military has become smaller in recent years: as

Estimating the Cost to the U.S. Military of Providing Transition-Related Care for Transgender Personnel.*

Variable	Estimate for U.S. Military	Calculation	Australian Military (accuracy check)
No. of transgender troops	12,800	2,136,799 (2015 force size) ÷ 2,581,000 (2012 force size) × 15,500 (estimated no. of transgender troops in 2012) = 12,832	
Overrepresentation of transgender persons in the military	×2	12,800 ÷ 2,136,799 = 0.6%; among U.S. civilian adults, 700,000, or 0.3% of the population, are transgender; 0.6 ÷ 0.3 = 2	
No. expected to utilize transition-related care per yr	188	0.000044 (employee utilization rate for transition-related care at large civilian employers) × 2,136,799 × 2 (overrepresentation of transgender persons in the military)	13 (persons receiving transition-related care) over 30 mo = 5.2 persons per yr; 5.2 ÷ 58,000 (total force size) = 1 person per 11,154 troops; 2,136,779 ÷ 11,154 = 192
Cost			
Per person receiving transition-related care	$29,929	Cost per University of California claimant receiving transition-related care	
Total	$5.6 million per yr	$29,929 × 188	$287,710 (cost over 30 mo) ÷ 30 × 12 = $115,084; 2,136,779 (U.S. troops) ÷ 58,000 (Australian troops) × $115,084 = $4.2 million per year
Per transgender service member	$438 per yr	$5.6 million ÷ 12,800	
Per member of the military	$2.62 per yr (22 cents per mo)	$5.6 million ÷ 2,136,779	

* Data are from the Defense Manpower Data Center; Gates and Herman[1]; Herman[2]; 9News[3]; and State of California Department of Insurance.[4]

of May 31, 2015, a total of 2,136,779 troops served in the Active and Selected Reserve components and were thus eligible for health benefits. Assuming that the number of transgender personnel has declined along with the overall force size, and excluding those serving in Reserve components whose members are ineligible for medical benefits, I estimate that 12,800 transgender troops serve currently and are eligible for health care.

As for the expected utilization of transition-related care, the latest research suggests that among large civilian employers whose insurance plans offer transition-related care including surgery and hormones, an average of 0.044 per thousand employees (one of every 22,727) file claims for such care annually.[2] On the basis of this utilization rate, the military could expect that 94 transgender service members will require transition-related care annually. However, transgender persons are overrepresented in the military by a factor of two — possibly in part because, before attaining self-acceptance, many transgender women (people born biologically male who identify as female) seek to prove to themselves that they are not transgender by joining the military and trying to fit into its hypermasculine culture.[5]

If transgender people are twice as likely to serve in the military as to work for the civilian firms from which the 0.044 figure was derived, then an estimated 188 transgender service members would be expected to require some type of transition-related care annually. It is not possible, on the basis of the available data, to estimate how many will require hormones only, surgery only, or hormones plus surgery.

As an accuracy check, consider the Australian military, which covers the cost of transition-related care: over a 30-month period, 13 Australian troops out of a full-time force of 58,000 underwent gender transition — an average of 1 service member out of 11,154 per year.[3] If the Australian rate were applicable to the U.S. military, the Pentagon could expect 192 service members to undergo gender transition annually.

To estimate the cost of care, note that under insurance plans offered to University of California employees and their dependents, the average cost of transition-related care (surgery, hormones, or both) per person needing treatment was $29,929 over 6.5 years.[4] This estimate was derived from 690,316 total person-years of cov-

erage, a sample arguably large enough to justify extrapolation to other settings.[4] By comparison, over a 30-month period, the Australian military paid U.S. $287,710 for transition-related care for 13 service members, or $22,132 per person requiring care.[3]

Under these utilization-rate and cost-per-claimant estimates, providing transition-related care to the 188 military personnel expected to require it annually would cost an estimated $5.6 million per year, or $438 per transgender service member per year, or 22 cents per member per month. If the Australian military's annual cost of transition-related care were applied to the U.S. armed forces, the Pentagon could expect to pay $4.2 million per year to provide such care.

Actual costs could be lower than expected, because transition-related care has been proven to mitigate serious conditions including suicidality that, left untreated, impose costs on the military, and addressing symptoms might conceivably improve job performance as well. There are costs, in other words, of *not* providing transition-related care, due to potential medical and psychological consequences of its denial, paired with the requirement to live a closeted life. In addition, the $29,929 cost-per-claimant estimate was derived from private-sector care, but the military provides care more efficiently than civilian systems do. Although the military might outsource some transition surgeries to private providers, many transition surgeries are well within the skill set of its reconstructive surgeons. Finally, transgender service members may be less likely than civilians to seek transition-related care, owing to hostile command climates or an unwillingness to interrupt military service.

In contrast, actual costs will be higher if the military covers more procedures than the insurance plans from which the $29,929 estimate was derived. In addition, costs will be higher if transition-related care is offered to family members and dependents. Finally, if transgender civilians join the military in order to obtain care, costs will be higher than estimated. Military recruiters have used the promise of health care benefits to entice civilians to enlist, and if transition-related coverage motivates outstanding transgender candidates to serve, that is not necessarily problematic. That said, civilian insurance plans increasingly cover transition-related care, which reduces the incentive to join the armed forces to obtain care. And low utilization rates reported by civilian firms offering such care may suggest that few transgender persons obtain civilian employment for that purpose. If so, it would be difficult to imagine that large numbers would seek to join the military to obtain such care, given the multiyear service obligations they would incur.

Some observers may object to the concept that the military should pay for transition-related care, but doctors agree that such care is medically necessary. And though costs can be high per treated person, they are low as a percentage of total health spending, similar to the cost of many other treatments that the military provides. Even if actual costs exceed these estimates on a per-capita basis for persons requiring care, the total cost of providing transition-related care will always have a negligible effect on the military health budget because of the small number treated and the cost savings that the provision of such care will yield. The financial cost of transition-related care, in short, is too low to matter.

Disclosure forms provided by the author are available with the full text of this article at NEJM.org.

From the University of California, Hastings College of the Law, San Francisco.

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