



MLDC Research Areas

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Propensity to Serve in the Armed Forces

Racial/Ethnic and Gender Differences, Trends, and Causes

Abstract

The United States relies on a volunteer military force, and, since the mid-1970s, DoD has sought to monitor youths' inclination to serve by surveying young people about their attitudes toward military service. This issue paper summarizes racial/ethnic and gender differences in youths' propensity to serve in the U.S. military. It also presents current trends in youths' propensity to serve. Data from surveys of youth attitudes toward military service suggest that gender differences in propensity to serve tend to produce cohorts of recruits that are mostly male. The propensity to serve is especially high among the Hispanic population, which may work in favor of Hispanic military representation (all else being equal) but not necessarily against non-Hispanic black or Asian representation. Nonwhite propensity to serve has generally fallen in the years before 2008, a trend that should be examined in future studies.

Because the United States relies on an all-volunteer military force, the Department of Defense (DoD) has a vested interest in knowing how many potential enlistees may be considering service at any given time. As a result, DoD has, since 1970, been collecting data to measure youths' propensity to serve by surveying young people about their attitudes toward military service. This issue paper describes the current recruiting market by identifying racial/ethnic and gender differences in youths' propensity to enlist in the military.

How Propensity to Serve Is Measured

Propensity to serve refers to whether an individual indicates an interest in military service. It is not an estimation of who will ultimately join the military; rather, it more broadly measures individuals' attitudes

toward the military and whether their future career plans might include military service.

Propensity to serve is primarily measured by two surveys: DoD's *Youth Poll* and the University of Michigan's *Monitoring the Future—A Continuing Study of American Youth* (MTF).¹ Both of these surveys ask respondents how likely it is that they will serve in the military, with the response options including “definitely,” “probably,” “probably not,” and “definitely not.” Anyone who responds with “definitely” or “probably” is considered to have demonstrated an “aided propensity to serve.” *Youth Poll* also collects information on “unaided propensity,” which is demonstrated by mentioning military service in response to an open-ended question about future career plans.² All of the data presented in this issue paper are from studies that draw their data from these two surveys.

The Relationship Between Propensity and Actual Service

Youth Poll and MTF frame survey questions in terms of the likelihood that an individual will serve in the military, implicitly acknowledging that not all who say they will likely serve will ultimately do so and that some who say they do not intend to serve may eventually join.

The relationship between propensity to serve and actual service is significant. Several studies have shown that a large number of those who indicate a positive propensity to serve will ultimately join the military. Using data from *Youth Attitude Tracking Survey* surveys from fiscal years 1985–1994,³ Orvis and Asch (2001) find a “strong, statistically significant relationship between propensity and enlistment” (p. 20). Specifically, over half of those who demonstrated an unaided propensity later took the Armed Services Vocational Aptitude Battery (ASVAB), a test that determines how qualified an applicant is for certain military occupational specialties.

One third of these youths eventually enlisted. Among those who demonstrated a positive propensity (with no unaided mention), 28 percent took the ASVAB, and 13 percent of those enlisted. By contrast, only 14 percent of those who indicated a negative propensity later took the ASVAB, and only 5 percent eventually enlisted.

However, studies suggest that propensity to serve does not perfectly correlate with actual enlistment numbers. In particular, the decline in enlistments is much smaller than the decline in propensity because some of those who indicate negative propensity in the surveys end up enlisting anyway. For example, Orvis and Asch (2001) estimate that about half of those who enlist are in the negative-propensity group; the other half are in the positive-propensity group. Overall, they estimate that a 10-percent decrease in propensity from 25 percent to 22.5 percent translates into about a 4-percent decrease in actual enlistments.

An important consideration in understanding propensity to enlist by race/ethnicity and gender is that the relationship between propensity and actual enlistment may not be the same for each group.⁴ Evidence from MTF data indicates that there are, in fact, group differences in the correspondence between propensity and enlistment. Bachman, Freedman-Doan, Segal, and O'Malley (1997) use MTF data from 1984–1991 to show that female youths who indicate positive propensity are much less likely to actually enlist than males. Young white men and women who indicate a propensity to serve are slightly more likely to enlist than nonwhite young men and women, although these differences are much smaller than those between the genders. Table 1 shows the race/ethnicity- and gender-specific rates of enlistment among those who indicated a positive propensity to serve (i.e., responded with “definitely” or “probably”).

Table 1. Percentage of High School Seniors in Class Years 1984–1991 Who Indicated a Positive Propensity to Serve and Enlisted Within Six Years, by Race/Ethnicity and Gender

	Male	Female
White (non-Hispanic)	53%	22%
Black (non-Hispanic)	44%	18%
Hispanic	44%	16%

SOURCE: Author’s calculations based on Bachman et al., 1997.

NOTE: These estimates relate to older data, so they may not be directly applicable to recent trends in propensity.

Finally, it is unclear whether propensity data are applicable in similar ways to decisions both to serve in the enlisted ranks and to serve in the officer corps. Although the propensity measure has primarily been applied to enlisted recruiting, there is nothing explicit in the question that limits its applicability in this way.

Racial/Ethnic and Gender Differences in Propensity to Serve from Recent Data⁵

The biannual *Youth Poll* data from 2004–2008 reveal several important differences in race/ethnicity and gender groups’ propensity to serve. The numbers constitute averages from the surveys and reveal the following trends:

- Hispanic men were the most likely to indicate an interest in service (25 percent).
- Non-Hispanic white, black, and Asian men demonstrated lower levels of service propensity (16 percent, 16 percent, and 14 percent, respectively) than Hispanic men.
- Hispanic and non-Hispanic black and Asian women demonstrated similar levels of service propensity (12 percent, 10 percent, and 9 percent, respectively).
- White women were the least likely of any group to show an interest in service (5 percent).

MTF data from 2005–2008 suggest that non-Hispanic blacks have a higher propensity for service than the non-Hispanic blacks surveyed by *Youth Poll*. Beyond this difference, however, MTF data are consistent with the findings of *Youth Poll*. The MTF data reveal the following trends.

- Hispanic men had the highest propensity for service (21 percent), and white women had the lowest (5 percent).
- Non-Hispanic black, Asian/Other,⁶ and white men demonstrated lower levels of service propensity (20 percent, 17 percent, and 13 percent, respectively) than Hispanic men.
- Hispanic, non-Hispanic black, and Asian/Other women demonstrated similar levels of service propensity (12 percent, 9 percent, and 7 percent, respectively).
- White men and women had a lower propensity for service than men and women in other racial/ethnic groups.

Trends in Propensity to Serve Since 2000: *Youth Poll* Data Race/Ethnicity.

Historically, members of nonwhite racial/ethnic groups have tended to have a higher propensity to serve than their white counterparts. However, recent years have seen the gap between nonwhites and whites grow narrower, especially in 2006 and 2007. Propensity fell among all groups in these years, but the decline was much faster among non-Hispanic black youths and Hispanic youths than among white youths.

Gender. *Youth Poll* data show that propensity to serve among men increased between 2000 and 2003 at an average rate of 2.1 percent per year. Male propensity held steady in 2004 and 2005 and then began a steep decline in 2006, dropping 7 percent between December 2005 and June 2006. According to the most-recent data, male propensity increased in June 2008 and December 2008, although these increases are statistically insignificant. Similarly, propensity increased for

women through 2003 and then decreased from 2004 until 2007. Female propensity increased significantly in 2008.

The trends in male and female propensity vary somewhat between different racial/ethnic groups.⁷ Although the trends for white youth mirror the aggregate trends, propensity appears to have declined more rapidly for black youth (among both males and females), beginning in 2004. Additionally, although the trends for Hispanic youth mirror the overall trend, the swings in that group were slightly more extreme. Hispanic male propensity increased at an average rate of 8.4 percent per year between 2001 and 2003 and declined by 15 percent between December 2005 and June 2006. Hispanic female propensity also declined between 2004 and 2007, but at a much steeper rate than the overall female decline. The appendix to this issue paper provides some figures taken from *Youth Poll* that show propensity trends by gender and race/ethnicity.

Non-Hispanic Black Propensity vs. White Propensity in the Post-Iraq War Period: MTF Data

MTF data show trends that are similar to those revealed by *Youth Poll* data, although MTF did not publish information on Hispanic youths prior to 2005. Despite this limitation, MTF data do permit some investigation of differences between non-Hispanic black and white youths over the past decade. Please refer to Figure 1.

Among women, MTF data show that non-Hispanic black propensity was higher than non-Hispanic white propensity for all of 2000–2008, and the difference between the two measures stayed fairly constant throughout the period. The difference decreased significantly (compared with the previous year) only once: in 2006, when the non-Hispanic black female propensity decreased 4 percent relative to non-Hispanic white female propensity.

Among men, non-Hispanic black propensity started out well above non-Hispanic white propensity. However, because of significant decreases in black propensity relative to white

propensity in 2003 (8 percent), 2006 (12 percent), and 2007 (5 percent), black propensity fell below white propensity in 2007.

These decreases in black male propensity anecdotally correspond to the invasion of Iraq and the growing sectarian violence leading up to the deployment of additional troops in 2007 (the “troop surge”). In 2008, black male propensity relative to white male propensity significantly increased (by 6 percent), thus essentially erasing the 2007 drop and making black male propensity once again higher than white male propensity.

Overall, average propensity was lower during the postinvasion period than the average during 2000–2002 for each racial/ethnic and gender group. For males, being a non-Hispanic black translated into an additional 6-percent loss in average propensity after 2003 beyond what was expected for white youths. The postinvasion decrease in average propensity among non-Hispanic black females was 9-percent more than the corresponding drop for white females. Both these differences are statistically significant.

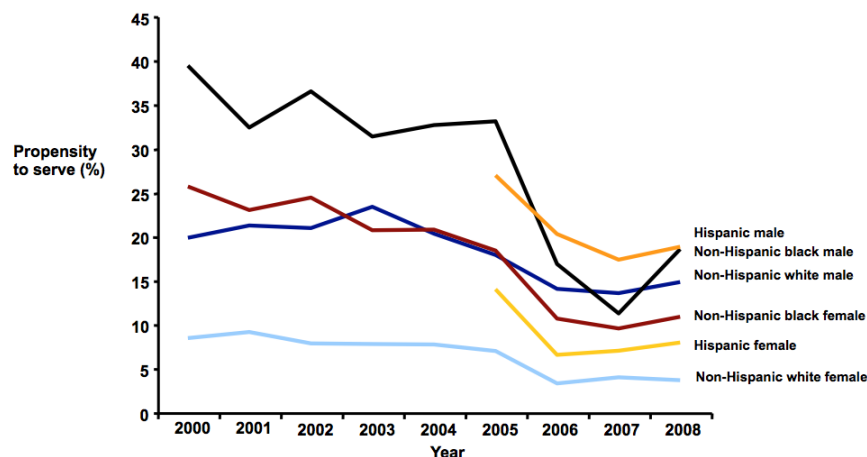
Implications Drawn from the Data

The data suggest that, in recent years, men have tended to demonstrate a greater propensity to serve. This may have produced cohorts of recruits that are mostly male (by a ratio of about 2:1).⁸

The data do not indicate that whites have a greater propensity to serve than do members of other groups. Thus, group-specific propensities are not likely to contribute to overrepresentation of whites in new accession cohorts. Rather, differences in propensity to serve suggest greater Hispanic representation overall but not necessarily lower non-Hispanic black or Asian representation.

In addition, the historically high propensity among non-Hispanic black youths decreased sharply in comparison with white youths in 2006 and 2007 but has since rebounded slightly. Without knowing the reasons for the decreases in

Figure 1. Propensity to Serve by Race/Ethnicity and Gender— MTF Data



black propensity, however, it is impossible to draw firm conclusions about what they imply for future efforts to achieve greater black representation in the military.

The numbers presented in this paper do not speak to attitudes among those groups that demonstrate a lower propensity for military service—groups from which a large portion of recruits eventually emerge. Thus, the implications of these results for accessions are unclear. Other issue papers will address trends in accessions more directly.

Finally, it is important to note that nonwhite propensity has fallen in recent years. This may be partly the result of the situation in Iraq, although many other factors likely affect group propensity. The most recent data available show an upswing after 2007, suggesting that further study is needed.

Notes

¹*Youth Poll* is a telephone survey of people ages 16–21 who have never served in the armed forces and are not enrolled in the Reserve Officers' Training Corps. It is conducted twice a year, and respondents are selected through stratified random sampling, which is designed to oversample minority populations. MTF data are collected annually via a questionnaire. Respondents are selected through a multistage probability sample of geographic areas, schools within those areas, and seniors within those schools.

²*Youth Poll* asks respondents how likely it is that they will serve in each individual service as well as in the National Guard and Reserve. Similarly, MTF asks respondents which branch of service they will enter; however, it does not ask a separate propensity question for each. MTF also asks respondents other information about military-service plans, including whether they expect to be an officer and whether they expect to have a career in the armed forces.

³*Youth Poll* was called the *Youth Attitude Tracking Survey* until 1999.

⁴The relationship between propensity and enlistment may differ by race/ethnicity and gender due to different rates of eligibility between groups. See MLDC Issue Paper #5, "How Eligibility Requirements Shape the Demographic Profile of the Eligible Population."

⁵The percentages in this section average all the percentages included in the biannual *Youth Poll* surveys from 2004–2008.

⁶In MTF data, this residual category includes Asian, American Indian/Alaska Native, Pacific Islander, and those who indicated more than one race/ethnicity.

⁷*Youth Poll* reports do not report trends in Asian propensity over time, presumably because of insufficient data.

⁸According to the raw propensity numbers. Given that females with positive propensity may be less likely to join than males with positive propensity, this ratio is probably too low.

References

Bachman, J. G., Freedman-Doan, P., Segal, D. R., & O'Malley, P. (1997). *Trends in military propensity and the propensity-enlistment relationship*. Monitoring the Future Occasional Paper No. 40. Ann Arbor, MI: University of Michigan Institute for Social Research.

Carvalho, R., Turner, S., Marsh, S., Yanosky, T., Zucker, A., & Boehmer, M. (2008). *Department of Defense Youth Poll Wave 15: June 2008 overview report*. Arlington, VA: Department of Defense.

Johnston, L. D., Bachman, J. G., O'Malley, P. M., & Schulenberg, J. E. (2009). *Monitoring the future: A continuing study of American youth (12th-grade survey), 2000–2008* [Computer file]. Ann Arbor, MI: Inter-University Consortium for Political and Social Research.

Orvis, B., & Asch, B. (2001). *Military recruiting: Trends, outlook, and implications* [MR-902-A/OSD]. Santa Monica, CA: RAND Corporation.