Recruiting effective soldiers: Comparing Danish conscripts and volunteers deployed to peace-keeping and peace-enforcing missions

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October 5, 2022

Abstract

Since the end of the Cold War, several countries have abolished conscription in favor of an all-volunteer military. However, very little is known about the effectiveness of conscript soldiers compared to volunteers. Denmark is one of the few countries that both recruits conscripts and volunteers to military service, and one of the few countries assigning conscripts through a randomized selection mechanism— a uniquely informative combination. While the deployment to a military mission is voluntary, we use the initial assignment mechanism to estimate causal relationships between recruitment method and a variety of military and post-military deployment outcomes. We find that, while at recruitment conscripts have lower socioeconomic status than volunteers, they are more likely to achieve the rank of officer. We find no difference between conscripts and volunteers in terms of number and length of deployments. Concerning the civilian outcomes of ex-soldiers after military deployment or after leaving the military, while ex-conscripts are less likely to be enrolled on a study program than ex-volunteers, we find no differences in terms of unemployment, or mortality.

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1 Introduction

Since the end of the Cold War, and especially since the start of the Global War on Terrorism (GWOT) in 2001, European armed forces have changed their function from mass civil defense to deployment in international operations. To adapt to these changes several countries have abolished conscription in favor of an all-volunteer force. Despite this change in recruitment and types of missions, very little is known about how conscripts compare to volunteers in terms of performance while deployed or career outcomes.

Denmark is one of the few countries that recruits both conscripts and volunteers for military service, and one of the few countries that recruits conscripts through a randomized selection mechanism—300,000 men since records were computerized in 1994. While deployment to peace-enforcing (PE) or peace-keeping (PK) missions is voluntary, initial recruitment for military service relies partially on volunteers and partially on random assignment of conscripts, and this assignment mechanism is key. This mixed initial recruitment combined with comprehensive data collected by the military makes Denmark uniquely informative for investigating soldiers' outcomes on the basis of recruitment type, not least because unique civil registration numbers enable us to link soldier military records to administrative records from Statistics Denmark. To estimate the causal relationship between initial recruitment method and soldiers' outcomes, we exploit the random assignment mechanism in our econometric approach.

When studying effects of mode of recruitment, it is important to account for why soldiers choose to serve. In an influential study of soldiers' motivation for serving, Moskos and Wood (1988) distinguished between institutional motivation[1] and occupational motivation [2]. Battistelli (1997) adds a third motivation of self-benefit[3]. Using this trichotomy, studies of service and deployment motivations in the US, Sweden and Denmark have found support for occupational motivations (Eighmey, 2006), self-benefit motivations (Hedlund, 2011), and a mixture of

[1] Institutional motivation refers to how organizational practices, norms, and values create and sustain a personal sense of obligation, loyalty, and a sense of duty.

[2] Occupational motivation refers to considering a military occupation as a civilian job

[3] Self-benefit is often associated with a desire of adventure

institutional and self-benefit motivations (Lyk-Jensen and Glad, 2018). As soldiers are not a representative sample of the population, to study the recruitment effects on soldiers' performance outcomes, it is important to account for self-selection issues, as who serves in the military and whom is deployed depend on individual service motivations and selection processes.

Much has been written about the merits of conscription versus an all-volunteer force (Warner and Asch, 2001). The inequities of conscription have long been debated. Franklin (1818) wrote about "impressed" (conscripted) navy sailors' foregone earnings in the merchant fleet. Friedman (1962) was an eloquent opponent of military conscription, viewing the draft as an in-kind tax paid only by those who serve, and economic analyses clarified the viability of an all-volunteer force in the Vietnam War era (Commission et al., 1970). In contrast to these traditional economic concerns of efficiency and equity in the context of the mass mobilizations of "old wars", we focus on the relative comparison of type of recruits in the context of "new wars" of counterinsurgency: the GWOT.

While much of the literature on the quality of military recruitment focuses on the levels of schooling and the Armed Forces Qualification Test scores as correlates of general task performance (Golding (2007), no studies have provided the effect of type of recruitment on a larger set of military and civilian outcomes and in a single setting.

In this paper, using the Instrumental Variable (IV) weights from initial random assignment in a system of mixed recruitment, we compare military and civilian outcomes of volunteers and conscripts. We find that compared to volunteers, conscripts have lower socioeconomic status, as measured by family background at age 15. However, conscripts are more likely to advance to the rank of officer, and less likely to be wounded or injured compared to volunteers. We find no difference between conscripts and volunteers in terms of number and length of deployments on military missions. Concerning civilian outcomes after deployment or after existing the military, conscripts are less likely to have enrolled on a study program than volunteers, and are more likely to receive disability pension. However, we find no differences in terms of unemployment, or mortality.

The paper proceeds as follows. Section 2 explains the institutional setting in Denmark. Section 3 describes the data we use, and Section 4 presents our empirical approach. Section 5 presents our results, and Section 6 concludes.

2 The Danish military system

While conscription has declined among OECD and NATO countries—half of the 24 countries that conscripted in 1995 no longer do so—Denmark has maintained a mixed conscription and volunteer military, following recommendations from Bruun et al. (2003).[4] Upon turning 18 years, men in Denmark must participate in an Armed Forces Day (AFD), military recruitment event, during which they undergo a variety of tests.[5]

[Figure 1 about here]

Each year, about two thirds of a cohort are assessed to be fit for military service and these men randomly draw a lottery number that is used in the aforementioned randomized recruitment mechanism for conscripts. Regardless of the lottery outcome, at the AFD any man declared fit for service can volunteer to serve; volunteers' preferences for service type and location are prioritized. Each six months, the Danish Ministry of Defense announces a lottery number threshold for that period's cohort of potential conscripts. Men who have drown a lottery number below the threshold are assigned to serve (drafted). About one quarter of drafted men do not serve in the military because of subsequent poor health, criminal convictions or conscientious objections. We therefore also consider the service status independently of the draft status.

After the mandatory period of military service, eligible men who volunteer to join the military and obtain a contract can be deployed on missions. As military capacity is limited, not all men who want to join necessarily obtain a contract. Although men volunteer to sign the contract, they cannot volunteer for a deployment to a specific country. On average, between 1994-2010, 7,000 men performed their military service each year. During 1992-2009, 2,000–4,000 soldiers annually were deployed on international missions. These soldiers sign contracts of varying lengths.[6] Figure 1 illustrates the selection process before deployment and shows that about three percent of men from cohorts born between 1974-1990 have been deployed.

Since the 1990s there have been several changes in the recruitment of soldiers and types of missions they are deployed on. The missions have changed from being mainly peace-keeping

[4] see the World Fact Book- Central Intelligence Agency available at https://www.cia.gov/library/publications/the-world-factbook/fields/333.html

[5] Since 2004 around 15–20% of recruits have been women (Ministry of Defense Personnel Administration).

[6] In Denmark soldiers can serve short-term contracts (e.g., three years) and then return to civilian life after only one deployment.

to peace-enforcing. Deployments and engagements in combat situations have become a part of the norm for Danish soldiers. From 1994 to 2005, the Danish International Brigade (DIB) was a peace-keeping force that offered soldiers a three-year contract for international missions.[7] Most of the soldiers deployed during 1994–2009 were recruited through this DIB contracts.

Since 2005, the recruits have undergone basic Army training (Hærens Basisuddannelse, HBU) for four months.[8] After having completed the HBU basic training, soldiers can apply for Army Reaction Forces Training (Hærens Reaktionsstyrke Uddannelse, HRU) which last eight months.[9] This training constitutes the principal foundation for later deployment, and deployments are typically of six months duration.

During HBU, the military group leaders evaluate the soldiers who want to continue in HRU (informal screening) and can reject some candidates. Soldiers are also screened during the HRU, to see if they react as expected and to check their physical ability. The intensity and extent of the screening differs according to the groups of personnel—privates, non-commissioned officers (NCO) (e.g. sergeant) and officers. While HRU prepares soldiers for deployment to international military missions as privates, officers tend to bypass HRU, going straight to a military training college for four years. Importantly, only personnel who volunteer for deployment can be deployed. Figure 2 illustrates the recruitment process and shows that deployed soldiers are from either Hærens Reaktionsstyrkeuddannelse (HRU), or professional soldiers from the Army Standing Reaction Force (Haerens Staaende ReaktionsStyrke, SRS). Deployed soldiers in the army have had at least had 12 months military training before they are deployed.

[Figure 2 about here]

From 2006, the Danish media reported extensively on increased numbers of wounded and killed Danish soldiers in Afghanistan, highlighting the danger of these missions. The financial crisis of 2008 worsened civilian job opportunities in Denmark, especially for the young and unskilled, making an army career relatively more attractive to this group. Both the media coverage

[7] DIB was established in 1994 and disbanded on February 15, 2005.

[8] HBU standard training includes different modules: basic military education, field training, fire training, combat training, help in civil society (environment tasks or rescue techniques), and an introduction to peacekeeping operations. The military basic education means that the soldiers can succeed in an uncertain environment, provide first aid, operate handguns and use other equipment and supplies.

[9] HRU training encompasses 34 training weeks including fire training for handguns and for light machine guns. Afterwards there is a unit-related training in the platoon and the company including a number of days in the shooting camp, where the focus is on the cooperation between the different weapon types.

and the crisis likely influenced military recruitment, making a military career more appealing for some and less appealing for others.

As described by Tresch et al. (2008), the main purpose of drafting young men is to provide the army with a natural reservoir for voluntary commitments. In 2008, the Danish Military authorities estimate that they could recruit about 13 percent of the conscripts (those who were not volunteers) through subsequent voluntary applications to join the army and be deployed.[10].

Between 2006 and 2012, the percentage of volunteers for military service increased from 76 to 96 percent, along with an increase in number of deployments. Before 2005, the percentage of volunteers was much lower than 76 percent. Both the reduction in length of military service from about eight to four months and the decision to reduce the number of conscripts can explain this increasing tendency in the number of volunteers for military service. By 2011 and 2012, the draft lottery had in practice become almost obsolete. Despite public discussions about whether the lottery should be abolished, the Danish government decided to keep it but to reduce the number of conscripts.

In November 2012, a majority in the Danish Parliament reduced the annual number of conscripts from about 5,000 to 4,200. By retaining the lottery, the military can draft more conscripts if the economic cycle changes and fewer people volunteer.

3 Data

Military administrative registers contain longitudinal information on the population of fit-for-service men and on the population of deployed men. The AFD data set includes the AFQT score for men born between 1974 and 1990.[11] For the deployed men, the data set includes the date, location, and type of mission in the period 1992-2012. The date of the deployment allows us to determine the pre- and post-deployment periods. The unique Danish civil registration number assigned to each individual allow us to link the administrative military records to a range of

[10]Note on increasing the annual number of conscripts [Notat om Forøgelse af det årlige antal værnepligt], Defense Commission of 2008, 26 January 2009

[11]We denote by AFQT the Børge Priev-Prøven, i.e. the Danish Armed Forces intelligence test. The test has been used since 1957. See Teasdale (2009) for psychometric properties of the Børg Prien Pr/ove and a review of its applications. Mortensen et al. (1989) show that the Børg Prien Prøve is correlated 0.82 with the Wechsler Adult Intelligence Scale.

socio-demographic characteristics for each indivicual in the general administrative registers curated by Statistics Denmark.

[Table 1 about here]

Table 1 describes our data. Column 1 describes the population of men born 1974-1990 who were Danish citizens and resident in Denmark on January 1 of the year they turn 18, while column 2 describes the fit-for-service (FFS) men in this population. Then column 3 describes the FFS men who served, while column 4 shows the population of the deployed on missions. We have standardized AFQT scores (mean equals to zero, and standard deviation equals to one) for the FFS men and can see that the deployed men are positively selected in terms of these scores. The deployed men have slightly lower household family income measured at age 15, and their mother is less likely to have been married, both compared to the FFS men, and the FFS men who served in the military.

4 Empirical strategy

Studies of the effect of service on military personnel and their subsequent outcomes across a variety of parameters account for selection into service by using quasi-experimental variation in service probability; for example this has been done by comparing cohorts in Germany (Bauer et al., 2012), the Netherlands (Hubers and Webbink, 2015) and the UK (Grenet et al., 2011); and by using Vietnam-era draft lotteries in Australia (Siminski and Ville, 2011) and the US (Angrist, 1991). Draft lotteries help to identify unbiased service effects in the presence of volunteers and refusers because draft status (low lottery number or not) can be used as an Instrumental Variable —drafted men are more likely to serve than non-drafted men—- the IV purges estimates of the bias due to men who will not serve regardless of draft status (never-takers, NTs) and due to men who serve regardless of draft status (always-takers, ATs). An IV can also provide a deeper understanding of the selection process, allowing characterization of response types into groups of compliers (those who follow instructions), NTs and ATs (Imbens and Rubin, 1997).

Among fit-for-service men, Table 2 shows the several groups according to their response to draft assignment, in the terminology of Imbens and Rubin (1997) In the analysis we assume

that we do not have defiers, i.e. individuals that will always do the opposite of what they are assigned to.

[Table 2 about here]

In a statistical sense, even though we do not know which individuals are compliers, we can describe them by using a probability weighting scheme. The key insight is that the first-stage regression of a two-stage least squares implementation of IV provides all of the weights necessary for computing response probabilities.[12]. Characterizing volunteers, as ATs, and conscripts as draft compliers who serve (C1), we can calculate the distribution of expected outcomes for men who serve, in relation to how they were recruited. Hence, we can compare outcomes by mode of initial recruitment for our population of deployed men born 1974-1990.

We consider several cohorts of the men who were deployed during 1992-2012 for peacekeeping (PK) missions in the Balkans and peace-enforcing (PE) missions in Afghanistan and Iraq. Opportunity cost arguments suggest that, for a given wage, higher ability personnel will be easier to recruit through conscription because they are less likely to volunteer. However, there are no studies of the effect of recruitment mode within a single setting. Denmark provides a unique opportunity to make this comparison because we can estimate IV weights from the random assignment to service in a system of mixed recruitment (i.e., the previously described recruitment mix of conscripts(recruited by using a random selection mechanism) and volunteers to military service).[13] Moreover, while much of the literature on the quality of military recruitment focuses on levels of schooling and AFQT scores as correlates of general task performance (Golding, 2007), no studies look at individual effectiveness.

To measure this individual effectiveness, we investigate the number of deployments, casualties, injuries, the soldier's rank and whether the soldiers return prematurely from missions (repatriations). By defining as 'top profile' individuals who obtain the maximum score (fourth quartile) for the health assessment and for the AFQT scores measured at the AFD, we can also investigate the quality of the recruit. In other words, for each complier type, we can see the share of soldiers with top scores in both physical health and AFQT. Moreover, thanks to the

[12] see Appendix B for the compliers analysis calculations

[13] see Appendix B for the compliers analysis calculations

general administrative registers, we can follow the deployed soldiers and investigate their current status in terms of employment and education and see how long they had a career in the military.

[Table 3 about here]

Table 3 shows the first-stage estimates of the effect of draft status on actual military service (service status). To do so we regress draft status on service status (whether or not they serve). Being drafted (low lottery number) increases the probability of service by 54 percentage points and the effect is highly significant. Adding control variables in column 2-4 has very little impact on the estimated effect of the draft, as would be expected when the draft is balanced on individuals' characteristics. These individuals' characteristics (controls) should only matter for increasing the precision of the estimates.

[Table 4 about here]

Table 4 and Figure 4 confirm that the draft is balanced on individuals' characteristics. To assess whether the lottery randomization is balanced, we use tests taken on the AFD, which took place before the draft lottery, together with other preassignement variables listed in Table 4. Table 4 and Figure 4 show coefficients from three separate ordinary least squares (OLS) regressions explaining the draft status by the lottery, and, as expected, no covariates predict the draft status. The F-statistics across all specifications are insignificant (p-values larger than 19%). Figure 4 provides a graphical presentation of the balancing tests showing both small and insignificant coefficients for the pre-assignment variables. These results confirm that the lottery is a balanced random assignment.

Thus, draft status is a very relevant instrument for service status and as shown in Figure 1 and Table1, on average about 41% of the FFS men considered in this study do their military service, regardless of their complier type.

[Figure 4 about here]

5 Results

Our first compliers analysis of background characteristics is presented in Table 5. From the raw data we can see differences between the first two columns—according to draft status for men who serve. We know that all men who serve but were not drafted are always-takers (ATs, volunteers). However, the column of drafted men who serve contains compliers who serve (C1, conscripts) as well as some always-takers (AT, volunteers). Hence, calculating the difference between columns (1) and (2) would not be informative about the differences between conscripts and volunteers because of this overlap. In order to describe conscripts we need to net out volunteers from draftees who serve (conscripts) by calculating a weighted average (see Appendix B). This weighted average describing conscripts is presented in column (4) under the heading "complier served (C1)". The rightmost column (column 5) shows expected differences in characteristics for conscripts minus volunteers.

From the compliers analysis in Table 5, we can see that, before initial recruitment conscripts have on average lower socio-economic status than volunteers, with lower birth weight, (15 percent) lower household income at age 15, parents less likely to have a high school diploma, and mothers less likely to have a college degree. At recruitment assessment, we can see that conscripts have four percentage points higher AFQT scores than volunteers, are 0.6cm less tall, and are six percentage points (23 percent at the mean) less likely to be in the highest fitness quartile among the FFS men. In our data, conscripts are on average four years older than volunteers, likely because the risk of being drafted was higher for the older cohorts. Finally, and most importantly, we can see that those recruited as conscripts for military service are less than half as likely to be deployed on missions, when compared with those recruited as volunteers (five versus 12 percentage point probability).

[Table 5 about here]

Turning to Table 6, we focus on only the deployed men and contrast background characteristics for this group between recruitment types, i.e. ATs (volunteers), versus C1 (conscripts). It is still the case among the deployed men that conscripts have on average lower socio-economic status than volunteers, with (12 percent) lower household income at age 15, lower birth weight

and now both parents less likely to have a college degree. For the men who were deployed, when we examine their recruitment assessments, conscripts are three percentage points less likely than volunteers to be in the highest fitness group, but otherwise there are no differences in height and AFQT scores. Finally, among the deployed men, conscripts are three years older than volunteers, corresponding with the declining trend in drafted compliers shown in Figure 3.

[Table 6 about here]

In Table 7, we present a compliers analysis of outcomes measured during and after deployment. Conscripts are more likely to be officers (by two percentage points, or 40 percent at the mean), and are more likely to be deployed to peace-keeping rather than peace-enforcing missions. Conscripts are also less likely to be wounded (one percentage point, or 77 percent at the mean) and have fewer injuries (one percentage point, or 69 percent at the mean). There are no significant differences between conscripts and volunteers in terms of number and length of deployments. While conscripts are less likely than volunteers to be repatriated before the end of a mission, differences are only borderline statistically significant.[14]

[Table 7 about here]

A conscript is less likely to still be in the military several years after the conscript's first deployment when compared to a volunteer' s length of service after the first deployment—after two years the difference is eight percentage points (13 percent at the mean), and after four years the difference is 10 percentage points (21 percent at the mean).

Concerning civilian outcomes after deployment or after leaving the military, conscripts are much less likely than volunteers to be enrolled on a study program (three percentage points), and more likely to be receiving disability pension (two percentage points). However, we find no differences between conscripts and volunteers in terms of unemployment, or mortality. [15]

[14] In the Appendix, we show results from Tables 4 to 6 by splitting the cohorts in two samples see Tables A.1-A.3.

[15] In Denmark suicide attempt can be identified from the National Patient register and Psychiatric Central Research Register. We find suicide attempts in the registers either by using the International Classification for Diseases (ICD)-10 codes X60-X84 or if the reason for contact to hospital is coded as suicide attempt or self-harm. As these episodes of suicide attempts are under-reported in the register (Nordentoft, 2007; Helweg-Larsen, 2006), we include a definition for possible suicide attempts including self-harm regardless of intent, such as poisoning, as well as injuries to the hand and, or for-arm in combination with a primary diagnosis of a mental illness. We distinguish two group of 'probable suicide attempts' (1) a primary psychiatric diagnosis in combination with secondary diagnoses: cutting of sharp objects (S51, S55, S59, S61, S65, S69), poisoning of drugs (T36-T50), (poisoning of non-pharmaceutical substances(T52 -T60 ; (2) a primary diagnosis of poisoning by mild analgesics (T39, T40).

As both soldiers deployed to the Balkans were more likely to buy mental health medication and to be registered with a psychiatric diagnoses (Lyk-Jensen and Pedersen (2019), and at the same time the share of compliers was higher when soldiers were deployed to the Balkans, it is difficult to disentangle whether this result on disability pension is explained by the type of recruit or the type of exposure during the missions.

6 Conclusion

Since the end of the Cold War, NATO armed forces have largely changed function from mass civil defense to deployment in international operations. At the same time, and partially because of these changed demands, several countries have abolished conscription in favor of an all-volunteer military. Despite a long history of variation in how personnel are recruited to the military, very little is known about how conscripts compare to volunteers as effective soldiers.

To make this comparison, we use the uniquely informative case of Denmark, because it is one of the few countries that recruits a mix of conscripts and volunteers, and it is one of the few countries that uses a randomly assigning mechanism to draft men into military service––300,000 men since the 1990's. Although, being deployed on a military mission is a choice soldiers make subsequent to their initial recruitment for military service in Denmark, we can use random assignment at this initial recruitment to estimate the relationship between recruitment method (conscript vs. volunteer) and soldiers' outcomes.

We find that conscripts have lower socioeconomic status than volunteers, in terms of lower household income at age 15, and less parental schooling. These socioeconomic status differences exist both for all men serving in the military and for deployed men when compared to FFS men regardless of the FFS men's service status. While conscripts and volunteers differ at recruitment assessment in terms of AFQT scores, height and the proportion with the highest fitness profile, with volunteers scoring less, being taller and more likely belonging to the top fitness quartile, only the top fitness differences remain when we compare men who have been deployed as conscripts or volunteers.

Despite differences in initial socioeconomic status, conscripts that subsequently choose to be deployed are more likely than deployed volunteers to have the rank of officer. Conscripts

that subsequently choose to be deployed are also less likely than volunteers to be wounded or injured, though they are more likely to receive a disability pension post-deployment. While there are no differences between conscripts and volunteers in terms of number and length of deployments, we find that soldiers initially recruited as conscripts stay in the Danish Armed Forces after their missions for a shorter time than soldiers recruited as volunteers.

Our findings show that Denmark—with its mixture of conscripts and volunteers in the initial recruitment process—has been able to recruit effective soldiers (no difference in the number or length of deployments among conscripts and volunteers) by retaining and deploying soldiers initially recruited as conscripts in a period when volunteering for military service was relatively low.

Declaration of competing interest

The authors declare that they have no conflict of interest.

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7 Tables

Table 1: Summary statistics, men born 1974-1990

	Population	FFS	Served	Deployed
No. of brothers	0.7306	0.7244	0.7201	0.7281
	(0.7109)	(0.7055)	(0.7053)	(0.7094)
No. of sisters	0.6917	0.6879	0.6943	0.7118
	(0.6867)	(0.6821)	(0.6839)	(0.6870)
No. of half-siblings	0.4792	0.4464	0.4686	0.5415
	(0.9067)	(0.8775)	(0.8982)	(0.9519)
Mother married	0.7082	0.7285	0.7234	0.6973
Living in urban area	0.2955	0.2933	0.2995	0.3329
Living in rural area	0.1810	0.1805	0.1743	0.1579
Household income at age 15 (1,000 USD)	28.7237	29.3712	28.6415	27.4068
	(14.4072)	(14.5174)	(13.7734)	(11.1300)
Mother with college education	0.2291	0.2499	0.2290	0.2031
Father with college education	0.2345	0.2549	0.2367	0.2183
Mother with high school education	0.4133	0.4252	0.4275	0.4337
Father with high school education	0.4618	0.4699	0.4761	0.4866
Birth weight lowest quartile	0.2759	0.2610	0.2835	0.2982
Birth weight top quartile	0.2405	0.2490	0.2367	0.2308
Standardized AFQT score		0.0000	-0.0062	0.0152
		(1.0000)	(0.9772)	(0.9404)
Height (cm)		180.4585	180.4962	180.4587
		(6.5860)	(6.5263)	(6.5431)
Draft status=1		0.3504	0.6495	0.5163
Service status=1		0.4068	1.0000	1.0000
Individuals	472,851	292,022	118,794	10,131

NOTE.—Means, standard deviations in parentheses. The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18. Brothers, sisters and half-siblings are counts, top-coded at 2, 2 and 3. Urban and rural indicates living in a municipality with the highest or lowest third population density respectively. Disposable income at 15 is equivalized according to the formula (sum of income in the household plus transfers minus taxes)/(1*first_adult+0.7*second_adult+0.5*number_of_children) and deflated to 2018 prices by the CPI and converted to '000 USD at exchange rate 1DKK=0.147USD. AFQT score, height and draft status are observed on the AFD. AFQT scores are standardized for the fit-for-service sample. Service status is observed at the latest in 2010. Birth weight is measured by the midwife. Missing birth weight is due to births outside Denmark. Mother's and father's schooling are observed on 1 January of the year the son turns age 15, and may be missing if parents have no qualifications obtained in Denmark or the parents are unregistered.

Table 2: Draft status, service status and complier types

	Served=0	Served=1
Drafted=0	Never-takers and compliers	Always-takers and defiers
Drafted=1	Never-takers and defiers	Always-takers and compliers

NOTE.—Fit-for-service men are grouped into four different complier types, each corresponding to two combinations of draft and service status. Always-takers serve and may or may not be drafted. Never-takers do not serve and may or may not be drafted. Compliers serve if drafted and do not serve if not drafted. Defiers do not serve if drafted and serve if not drafted.

Table 3: First-stage regressions

	(1) None	(2) Basic	(3) Extended I	(4) Extended II
Draft status=1	0.535***	0.539***	0.539***	0.539***
	(0.00165)	(0.00184)	(0.00184)	(0.00184)
Adjusted R2	0.270	0.298	0.299	0.300
Mean of dep var	0.407	0.407	0.407	0.407
Std dev of dep var	0.491	0.491	0.491	0.491
Individuals	292,022	292,022	292,022	292,022

NOTE.— Columns differ according to the set of other explanatory variables included. Columns 1 uses no covariates. Column 2 uses a basic specification including year-of-birth dummies, month-of-birth dummies, and quadratic function of AFQT scores. Columns 3 uses an extended specification which also includes quadratic function of height and controls for family composition (no. of brothers, no. of sisters, half-siblings), mother marital status, household income when individual age 15, dummies for urban or rural residence. Columns 4 additionally includes type of education for mother and father and birth weight top and lowest quartile dummies. Standard errors are in parentheses. All specifications also control for year and month of birth, half-year for service and AFD year. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table 4: Balancing check

	(1) Basic	(2) Extended I	(3) Extended II
Height (cm)	-0.0061	-0.0061	-0.0062
	(0.0044)	(0.0044)	(0.0044)
Height squared	0.0000	0.0000	0.0000
	(0.0000)	(0.0000)	(0.0000)
Standardized AFQT score	0.0014	0.0013	0.0014
	(0.0008)	(0.0008)	(0.0008)
Standardized AFQT score square	-0.0003	-0.0003	-0.0003
	(0.0006)	(0.0006)	(0.0006)
No. of brothers		-0.0002	-0.0001
		(0.0012)	(0.0012)
No. of sisters		0.0007	0.0009
		(0.0012)	(0.0012)
No. of half-siblings		-0.0000	-0.0000
		(0.0009)	(0.0009)
Mother married		0.0021	0.0017
		(0.0018)	(0.0018)
Living in urban area		0.0021	0.0021
		(0.0018)	(0.0018)
Living in rural area		0.0050*	0.0051*
		(0.0021)	(0.0021)
Household income at age 15 (1,000 USD)			0.0001
			(0.0001)
Mother with college education			-0.0019
			(0.0023)
Father with college education			0.0013
			(0.0023)
Mother with high school education			-0.0014
			(0.0019)
Father with high school education			0.0021
			(0.0019)
Birth weight lowest quartile			-0.0012
			(0.0020)
Birth weight top quartile			-0.0010
			(0.0019)
F-Statistic	1.4416	1.3615	1.0058
F-Stat p-value	0.2173	0.1913	0.4477
Partial-R2	0.0000	0.0000	0.0001
Observations	292,022	292,022	292,022

NOTE.— Columns differ according to the set of other explanatory variables included. Column 1 uses a basic specification including quadratic function of AFQT scores and height. Columns 3 uses an extended specification which also includes controls for family composition (no. of brothers, no. of sisters, half-siblings), mother marital status, household income when individual age 15, dummies for urban or rural residence. Columns 4 additionally includes dummies for birth weight and type of education for mother and father. All regression control for year of birth dummies, month of birth dummies, and dummies for half-year of service and AFD year. Standard errors are in parentheses. * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$.

Table 5: Compliers analysis - Background for all men who served by complier types

	(1) Drafted served	(2) Not Drafted served (AT)	(3) (1)-(2)	(4) Complier served (C1)	(5) C1-AT	(6) Significance level
Year of birth	1981	1984	-2.9651	1979	-4.1823	***
	0.0154	0.0220	0.0266	0.0.252	0.0.0386	
Standardized AFQT score	0.0049	-0.0267	0.0316	0.0179	0.0446	***
	0.0034	0.0050	0.0057	0.0050	0.0080	
Height (m)	1.8036	1.8075	-0.0039	1.8020	-0.0055	***
	0.0002	0.0003	0.0004	0.0004	0.0006	
Top profile AFD	0.2258	0.2676	-0.0418	0.2087	-0.0590	***
	0.0062	0.0068	0.0087	0.0140	0.0179	
No. brothers	0.7183	0.7236	-0.0053	0.7161	-0.0074	
	0.0027	0.0033	0.0039	0.0038	0.0055	
No. sisters	0.6857	0.7101	-0.0244	0.6757	-0.0344	***
	0.0028	0.0036	0.0045	0.0042	0.0064	
No. of half-siblings	0.4562	0.4917	-0.0355	0.4416	-0.0501	***
	0.0032	0.0045	0.0051	0.0046	0.0072	
Mother married	0.7266	0.7176	0.0090	0.7303	0.0128	***
	0.0017	0.0023	0.0029	0.0026	0.0040	
Living in urban area	0.2936	0.3105	-0.0169	0.2866	-0.0239	***
	0.0018	0.0022	0.0028	0.0026	0.0039	
Living in rural area	0.1795	0.1647	0.0148	0.1855	0.0208	***
	0.0013	0.0018	0.0022	0.0020	0.0031	
Household income at age 15 (1.000 USD)	28.1684	29.5169	-1.3486	27.6147	-1.9022	***
	0.0524	0.0749	0.0921	0.0806	0.1302	
Birth weight lowest quartile	0.3041	0.2453	0.0588	0.3282	0.0829	***
	0.0014	0.0019	0.0023	0.0021	0.0032	
Birth weight top quartile	0.2237	0.2607	-0.0370	0.2086	-0.0522	***
	0.0015	0.0021	0.0026	0.0023	0.0036	
Mother college	0.2272	0.2325	-0.0053	0.2250	-0.0075	**
	0.0014	0.0022	0.0026	0.0022	0.0037	
Father college	0.2382	0.2340	0.0042	0.2399	0.0059	
	0.0016	0.0021	0.0026	0.0024	0.0037	
Mother high school	0.4156	0.4496	-0.0340	0.4016	-0.0479	***
	0.0015	0.0023	0.0029	0.0024	0.0041	
Father high school	0.4722	0.4833	-0.0111	0.4677	-0.0157	***
	0.0019	0.0025	0.0031	0.0028	0.0044	
Deployed	0.0678	0.1177	-0.0499	0.0473	-0.0704	***
	0.0008	0.0014	0.0016	0.0013	0.0023	
Individuals	77,151	41,639	118,790	54,697	118,790	

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18. Brothers, sisters and half-siblings are counts, top-coded at 2, 2 and 3. Urban and rural indicate living in a municipality with the highest ot lowest third population density respectively. Disposable income at 15 is equivalized according to the formula (sum of income in the household plus transfers minus taxes)/(1*first_adult+0.7*second_adult+0.5*number_of_children) and deflated to 2018 prices by the CPI and converted to '000 USD at exchange rate 1DKK=0.147USD. AFQT score, height and draft status are observed on the AFD. AFQT scores are standardized for the fit-for-service sample. All men has served and their service status is observed at the latest in 2010. Birth weight is measured by the midwife. Mother's and father's type of education schooling are observed on January 1 of the year the son turns age 15. Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Table 6: Compliers analysis - Background for all men deployed by complier types

	(1) Drafted served	(2) Not Drafted served (AT)	(3) (1)-(2)	(4) Complier served (C1)	(5) C1-AT	(6) Significance level
Year of birth	1980	1982	-1.569	1979	-3.0652	***
	0.0591	0.0662	0.0882	0.1400	0.1796	
Standardized AFQT score	0.0008	0.0305	-0.0297	-0.0295	-0.0600	
	0.0166	0.0109	0.0195	0.0272	0.0393	
Height (m)	1.8038	1.8054	-0.0016	1.8021	-0.0033	
	0.0009	0.0008	0.0012	0.0019	0.0025	
Top profile AFD	0.2743	0.2931	-0.0187	0.2552	-0.0379	**
	0.0062	0.0068	0.0087	0.0140	0.0179	
No. Brothers	0.7180	0.7388	-0.0207	0.6968	-0.0419	
	0.0107	0.0093	0.0138	0.0214	0.0280	
No. sisters	0.7199	0.7031	0.0169	0.7372	0.0341	
	0.0095	0.0099	0.0136	0.0221	0.0275	
No. Of half-siblings	0.5536	0.5286	0.0251	0.5792	0.0506	
	0.0150	0.0124	0.0196	0.0298	0.0398	
Mother married	0.6851	0.7102	-0.0251	0.6596	-0.0506	***
	0.0062	0.0058	0.0084	0.0134	0.0171	
Living in urban area	0.3240	0.3424	-0.0184	0.3052	-0.0372	**
	0.0061	0.0067	0.0088	0.0146	0.0178	
Living in rural area	0.1619	0.1537	0.0082	0.1703	0.0167	
	0.0056	0.0046	0.0069	0.0105	0.0140	
Household income at age 15 (1.000 USD)	26.8549	27.9960	-1.1411	25.6902	-2.3059	***
	0.1511	0.1381	0.2090	0.3250	0.4201	
Birth weight lowest quartile	0.3143	0.2810	0.0333	0.3482	0.0672	***
	0.0060	0.0061	0.0097	0.0154	0.0196	
Birth weight top quartile	0.2254	0.2365	-0.0111	0.2140	-0.0225	
	0.0055	0.0059	0.0086	0.0139	0.0174	
Mother college	0.1835	0.2241	-0.0406	0.1421	-0.0820	***
	0.0056	0.0052	0.0077	0.0123	0.0158	
Father college	0.2059	0.2316	-0.0257	0.1796	-0.0520	***
	0.0067	0.0057	0.0094	0.0142	0.0190	
Mother high school	0.4297	0.4380	-0.0082	0.4214	-0.0166	
	0.0070	0.0066	0.0098	0.0154	0.0199	
Father high school	0.4930	0.4798	0.0132	0.5065	0.0267	
	0.0073	0.0065	0.0107	0.0164	0.0217	
Individuals	5,231	4,900		2,589	10,131	

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18 and who have been deployed in the period 1992-2012. Variable definitions are as in Table 5. Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Table 7: Summary statistics - Outcomes

	(1) Drafted served	(2) Not Drafted served (AT)	(3) (1)-(2)	(4) Complier served (C1)	(5) C1-AT	(6) Significance level
No. Deployments	1.6131	1.5978	0.0153	1.6287	0.0310	
	0.0125	0.0144	0.0193	0.0295	0.0390	
Log(days deployed)	5.2655	5.2672	-0.0017	5.2638	-0.0035	
	0.0072	0.0084	0.0114	0.0172	0.0229	
No. injuries	0.0113	0.0171	-0.0059	0.0053	-0.0118	***
	0.0017	0.0019	0.0024	0.0038	0.0049	
No. repatriations	0.0325	0.0388	-0.0063	0.0261	-0.0127	*
	0.0024	0.0026	0.0037	0.0057	0.0074	
Wounded	0.0105	0.0169	-0.0064	0.0040	-0.0130	***
Repatriated	0.0315	0.0384	-0.0068	0.0246	-0.0138	*
KIA	0.0025	0.0029	-0.0004	0.0021	-0.0008	
PE missions	0.2781	0.3435	-0.0653	0.2115	-0.1320	***
PE and PK missions	0.1631	0.1710	-0.0080	0.1549	-0.0161	
PK missions	0.4724	0.4143	0.0581	0.5317	0.1174	***
Officer	0.0505	0.0420	0.0084	0.0591	0.0170	**
Sergeant	0.1568	0.1741	-0.0173	0.1391	-0.0350	**
Private	0.5462	0.5976	-0.0514	0.4937	-0.1038	***
Still in the Army 2y after mission	0.5722	0.6108	-0.0387	0.53278	–0.0781	***
Still in the Army 4y after mission	0.4338	0.4843	-0.05053	0.3822	-0.1021	***
Employment length (army)	6.5174	6.6481	-0.1307	6.3834	-0.2647	
Suicide attempts 1995-2018	0.0216	0.0184	0.0032	0.0249	0.0065	
Death	0.0105	0.0110	-0.0005	0.0100	-0.0010	
Job in 2019	0.8796	0.8812	-0.0017	0.8779	-0.0034	
Studying in 2019	0.0189	0.0333	-0.0143	0.0043	-0.0290	***
Unemployed in 2019	0.0411	0.0382	0.0029	0.0441	0.0059	
Disability pension in 2019	0.0185	0.0094	0.0092	0.0279	0.0185	***
Individuals	5,231	4,900		2,589	10,131	

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18 and were deployed in the period 1992-2012. No. deployments is the number of times a soldiers was deployed in the period 1992-2012. Log(days deployed) is the logarithm of the total numbers of days they were deployed for all the missions. No. injuries and no. repatriations report the number of injuries and repatriations for each soldier, while Wounded and Repatriated are dummy variables indicating if the soldier has been wounded or repatriated. KIA is a killed in action dummy. PE (peace-enforcing) and PK (peace-keeping) indicate the type of mission the soldiers have been deployed on. Rank (officer, sergeant, and privates) is the rank recorded for the first/last mission. Still in the army 2(4) years after the mission indicates whether the soldier is still employed in the Army two or four years after the beginning of his mission. Employment length is the number of years the soldiers has been employed in the Army. Suicide attempts is a dummy indicating whether the soldiers is classified with a suicide attempts in the Danish registers. We use the Danish algorithm for the identification of suicide attempts and self-harm from the National Registry and the Danish Psychiatric Central Registry, see Table 1 in Gasse et al. (2018).Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

8 Figures

Figure 1: Flow chart of the selection process for being deployed to missions. Numbers inside the shapes denote average percentages of birth cohorts 1974-90. Numbers beside the arrows denote average percentages for taking each route conditional on reaching the junction. The AFD includes test-taking and drawing lottery numbers. Our data set contains information on all those who drew a lottery number and those who attended the AFD and all the males from birth cohorts 1974-1990 subsequently deployed (dep.) on missions. The strikethrough drafted and dep. means not drafted, not deployed respectively.

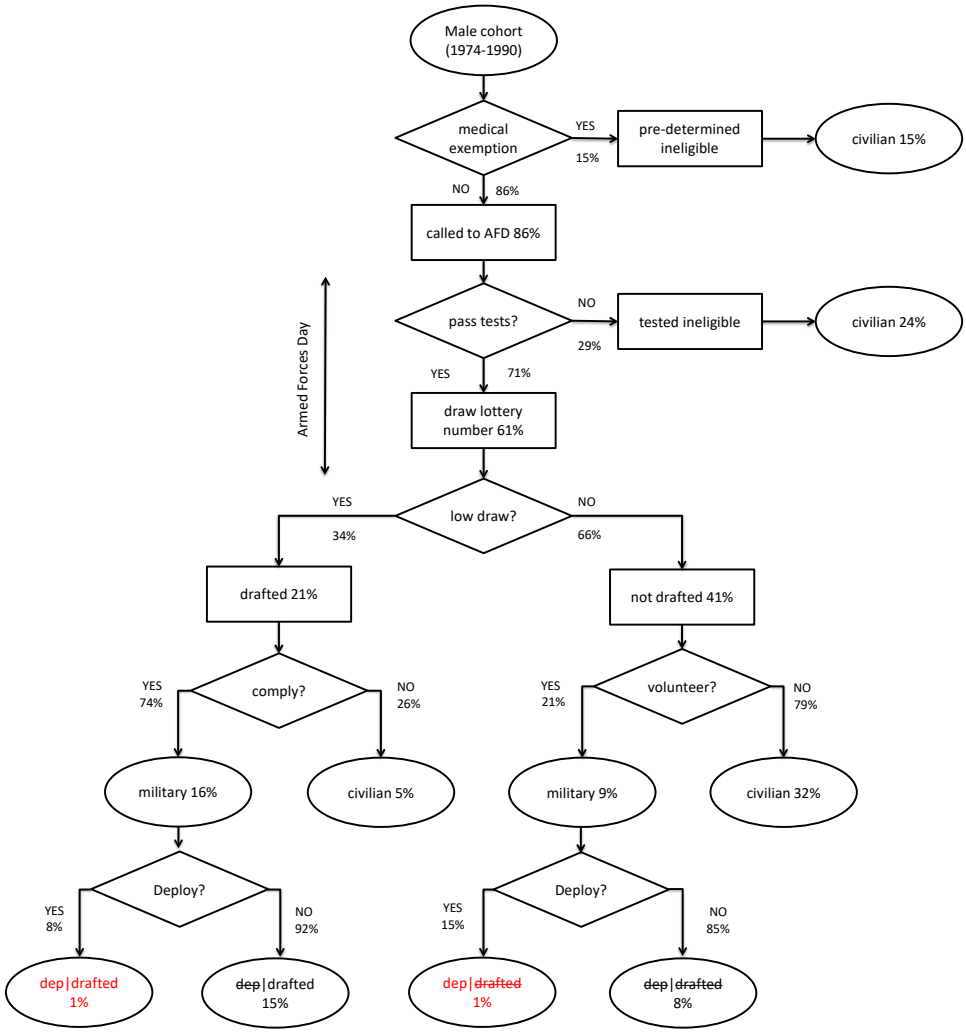


Figure 2: Recruitment

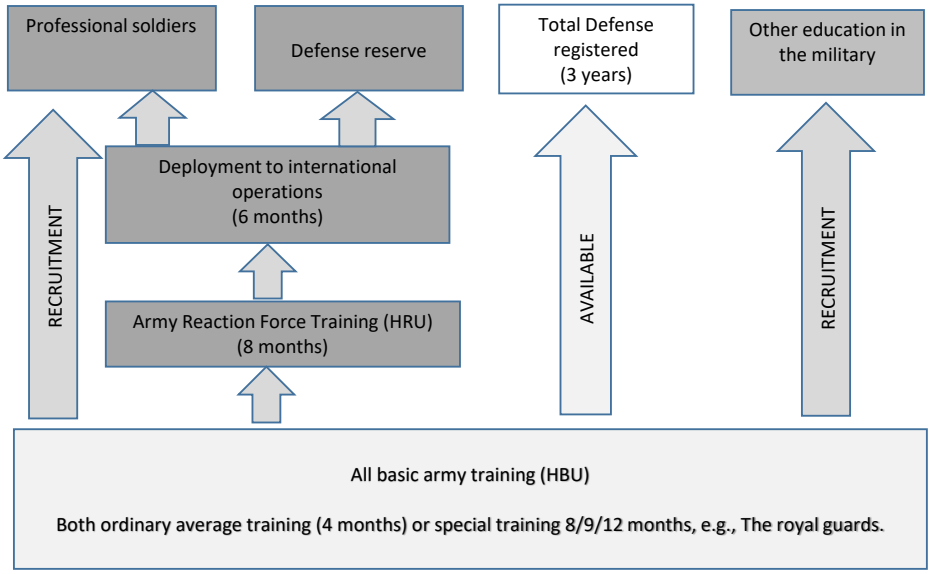


Figure 3: Share of compliers by some selected missions.

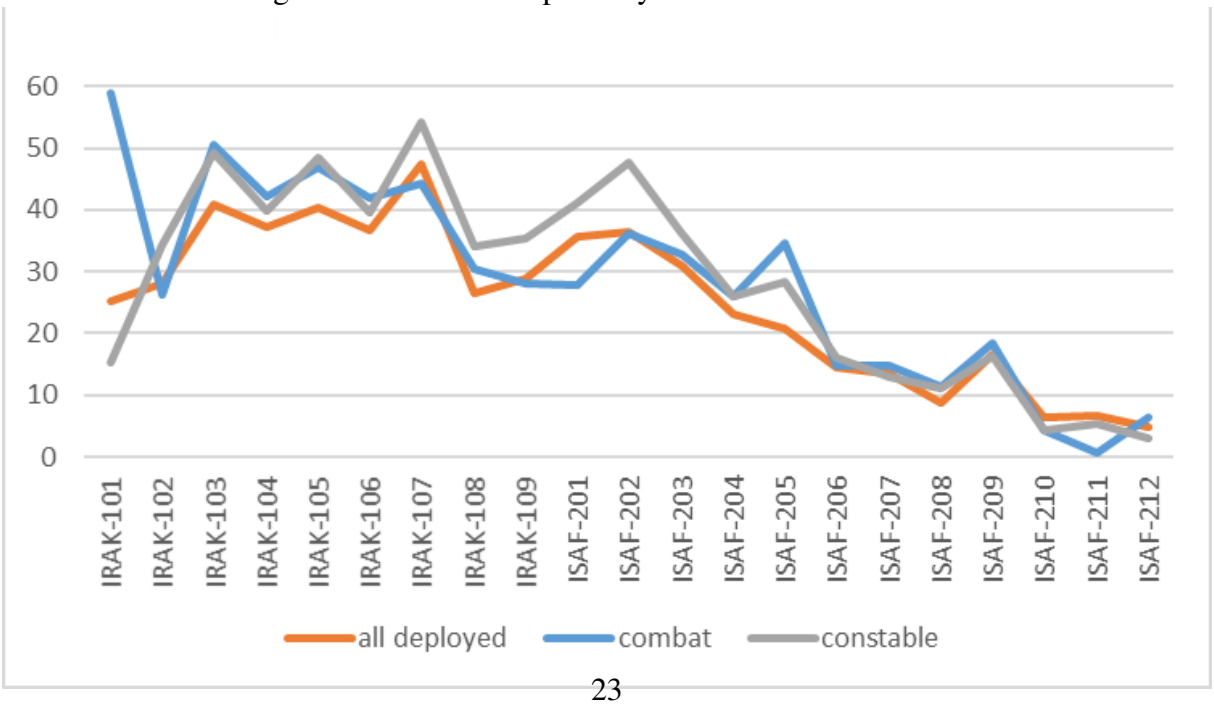
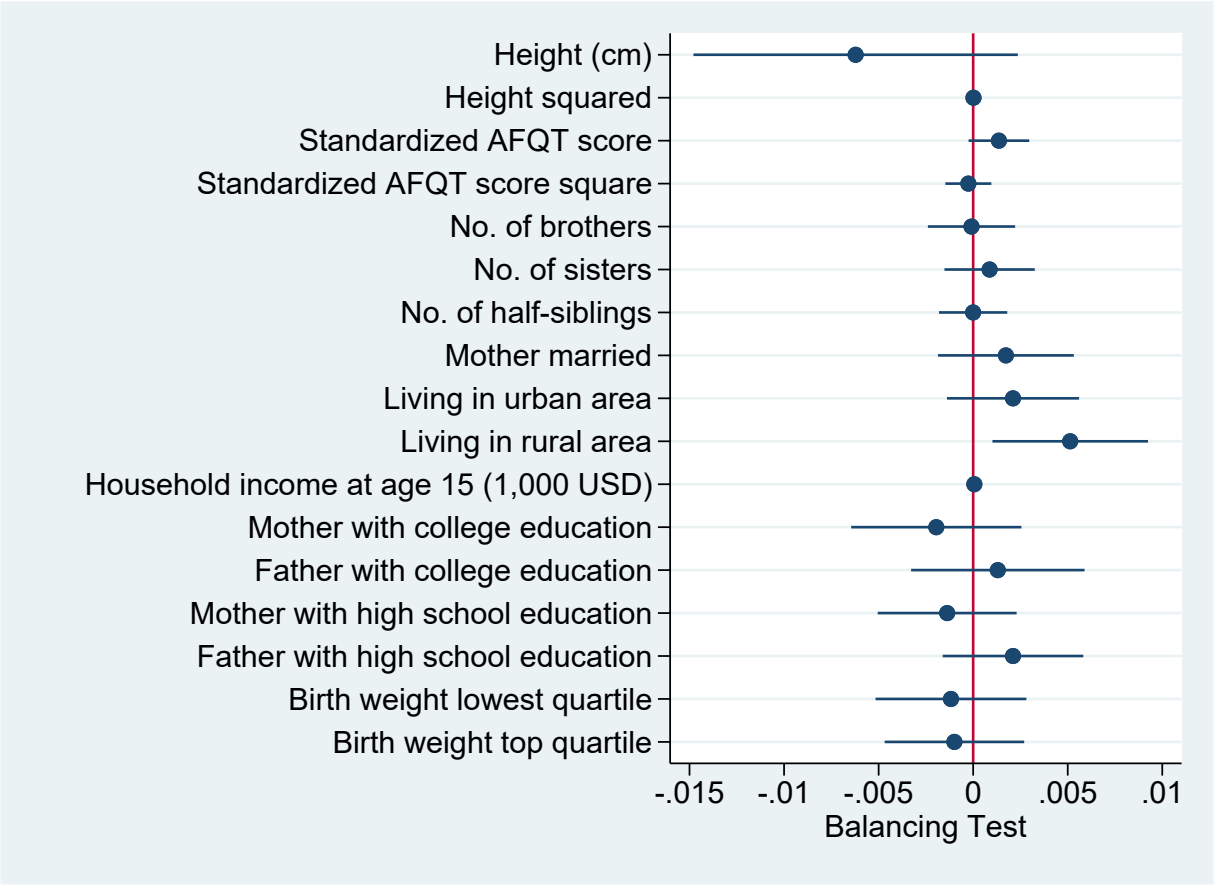


Figure 4: Balancing test coefficients.



Appendix

A Additional tables and figures

A.1 Tables

Table A.1: Background for all men FFS by cohort

	FFS born 1974-1982						FFS born 1983-1990					
	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level
Year of birth	1978	1978	0.0041	1978	0.0057		1985	1987	-1.9663	1985	-2.8083	***
	0.0106	0.0179	0.0219	0.0168	0.0302		0.0116	0.0148	0.0184	0.0208	0.0289	
Standardized AFQT score	0.0087	0.0182	-0.0095	0.0052	-0.0131		-0.0023	-0.0573	0.0550	0.0212	0.0785	***
	0.0039	0.0077	0.0089	0.0063	0.0123		0.0058	0.0059	0.0081	0.0086	0.0116	
Height (m)	1.8029	1.8078	-0.0049	1.8010	-0.0068	***	1.8050	1.8073	-0.0023	1.8040	-0.0033	***
	0.0003	0.0004	0.0005	0.0004	0.0007		0.0004	0.0005	0.0006	0.0006	0.0008	
Top profile	0.2337	0.2903	-0.0566	0.2122	-0.0780	***	0.2111	0.2522	-0.0412	0.1935	-0.0588	***
No. Brothers	0.7032	0.6996	0.0036	0.7046	0.0050		0.7466	0.7398	0.0067	0.7495	0.0096	
	0.0028	0.0054	0.0063	0.0045	0.0087		0.0037	0.0045	0.0056	0.0055	0.0080	
No. sisters	0.6728	0.6779	-0.0051	0.6709	-0.0070		0.7098	0.7320	-0.0222	0.7003	-0.0317	***
	0.0034	0.0045	0.0058	0.0051	0.0080		0.0043	0.0043	0.0064	0.0066	0.0091	
No. Of half-siblings	0.4296	0.4498	-0.0202	0.4219	-0.0279	***	0.5061	0.5201	-0.0141	0.5000	-0.0201	*
	0.0041	0.0074	0.0084	0.0063	0.0116		0.0058	0.0058	0.0082	0.0086	0.0117	
Mother married	0.7388	0.7422	-0.0034	0.7375	-0.0047		0.7038	0.7008	0.0030	0.7051	0.0042	
Living in urban area	0.2979	0.3205	-0.0226	0.2894	-0.0312	***	0.2853	0.3036	-0.0183	0.2775	-0.0262	***
Living in rural area	0.1746	0.1561	0.0185	0.1817	0.0256	***	0.1885	0.1706	0.0179	0.1962	0.0256	***
Household income at age 15 (1.000 USD)	26.8432	26.5505	0.2927	26.9541	0.4036	***	30.6534	31.5333	-0.8799	30.2766	-1.2567	***
	0.0546	0.0883	0.1050	0.0834	0.1450		0.0920	0.0903	0.1344	0.1398	0.1912	
Birth weight lowest quartile	0.3772	0.3681	0.0091	0.3806	0.0125	**	0.1670	0.1618	0.0051	0.1691	0.0073	
Birth weight top quartile	0.1891	0.1993	-0.0102	0.1853	-0.0140	***	0.2887	0.3025	-0.0138	0.2828	-0.0197	***
Mother college	0.2034	0.1900	0.0134	0.2085	0.0184	***	0.2718	0.2613	0.0105	0.2762	0.0150	***
Father college	0.2247	0.2081	0.0165	0.2309	0.0228	***	0.2636	0.2516	0.0120	0.2687	0.0171	***
Mother high school	0.4061	0.4117	-0.0056	0.4040	-0.0077		0.4332	0.4753	-0.0421	0.4152	-0.0601	***
Father high school	0.4773	0.4849	-0.0076	0.4744	-0.0105		0.4628	0.4823	-0.0196	0.4544	-0.0279	***
Deployed	0.0691	0.1533	-0.0842	0.0371	-0.1162	***	0.0654	0.0935	-0.0280	0.0534	-0.0400	***
Individuals	50318	16850		36482			26833	24789		18788		

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18 and who have been deployed in the period 1992-2012. Brothers, sisters and half-siblings are counts, top-coded at 2, 2 and 3. Urban and rural indicates living in a municipality with the highest or lowest third population density respectively. Disposable income at 15 is equivalized according to the formula (sum of income in the household plus transfers minus taxes)/(1*first_adult+0.7*second_adult+0.5*number_of_children) and deflated to 2018 prices by the CPI and converted to '000 USD at exchange rate 1DKK=0.147USD. AFQT score, height and draft status are observed on the AFD. AFQT scores are standardized for the fit-for-service sample. Service status is observed at the latest in 2010. Birth weight is measured by the midwife. Mother's and father's type of education schooling are observed on 1 January of the year the son turns age 15, and may be missing if parents have no qualifications obtained in Denmark or the parents are unregistered.Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Table A.2: Background for all men deployed by cohort

	FFS born 1974-1982						FFS born 1983-1990					
	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level
Year of birth	1978	1978	0.0407	1978	0.1045		1985	1986	-1.3485	1984	-2.3584	***
	0.0412	0.0428	0.0548	0.1174	0.1412		0.0402	0.039	0.0565	0.0925	0.11	
Standardized AFQT score	-0.0183	0.0231	-0.0415	-0.0833	-0.1064		0.0387	0.0388	0	0.0387	0	
	0.0181	0.0164	0.0252	0.0552	0.0655		0.0231	0.0176	0.0272	0.0409	0.0476	
Height (m)	1.8032	1.8049	-0.0016	1.8007	-0.0042		1.8049	1.8061	-0.0011	1.8041	-0.002	
	0.0011	0.0012	0.0017	0.0034	0.0043		0.0014	0.0015	0.0021	0.0028	0.0038	
Top profile	0.2814	0.2935	-0.012	0.2626	-0.0308		0.2603	0.2926	-0.0324	0.236	-0.0566	***
No. Brothers	0.7111	0.7077	0.0034	0.7164	0.0087		0.7318	0.7734	-0.0416	0.7006	-0.0728	*
	0.0122	0.0136	0.0181	0.038	0.047		0.0178	0.016	0.0234	0.0333	0.0413	
No. sisters	0.7027	0.6938	0.009	0.7168	0.023		0.754	0.7134	0.0406	0.7844	0.0709	*
	0.0106	0.0142	0.0168	0.0336	0.0436		0.0157	0.0157	0.0218	0.0294	0.0381	
No. Of half-siblings	0.5318	0.5196	0.0122	0.551	0.0314		0.5968	0.5386	0.0582	0.6404	0.1018	*
	0.0173	0.0188	0.023	0.0492	0.0598		0.0244	0.0189	0.0318	0.0457	0.0555	
Mother married	0.695	0.7213	-0.0263	0.6538	-0.0675	**	0.6657	0.6979	-0.0322	0.6416	-0.0563	***
Living in urban area	0.3275	0.3306	-0.0031	0.3226	-0.0081		0.3172	0.3556	-0.0384	0.2884	-0.0672	***
Living in rural area	0.1612	0.1603	0.0009	0.1625	0.0022		0.1634	0.1463	0.0171	0.1763	0.03	
Household income at age 15 (1.000 USD)	25.9802	25.7363	0.2438	26.3621	0.6257		28.5861	30.5151	-1.9291	27.1413	-3.3738	***
	0.1637	0.192	0.2555	0.5304	0.6633		0.2493	0.2833	0.3914	0.4952	0.681	
Birth weight lowest quartile	0.3896	0.3751	0.0145	0.4123	0.0372		0.1651	0.1761	-0.0109	0.157	-0.0191	
Birth weight top quartile	0.1871	0.1971	-0.01	0.1714	-0.0257		0.3013	0.2805	0.0207	0.3168	0.0362	
Mother college	0.1583	0.1897	-0.0314	0.109	-0.0807	***	0.2335	0.2624	-0.0289	0.2118	-0.0506	***
Father college	0.1928	0.2153	-0.0224	0.1576	-0.0576	**	0.2318	0.2499	-0.0181	0.2182	-0.0317	
Mother high school	0.4135	0.4026	0.0109	0.4306	0.028		0.4618	0.4773	-0.0155	0.4502	-0.0271	
Father high school	0.4981	0.4832	0.015	0.5216	0.0384		0.4829	0.476	0.0069	0.4881	0.012	
Individuals	3475	2583		1354			1756	2317		1004		

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18 and who have been deployed in the period 1992-2012. Brothers, sisters and half-siblings are counts, top-coded at 2, 2 and 3. Urban and rural indicate living in a municipality with the highest or lowest third population density respectively. Disposable income at 15 is equivalized according to the formula (sum of income in the household plus transfers minus taxes)/(1*first_adult+0.7*second_adult+0.5*number_of_children) and deflated to 2018 prices by the CPI and converted to '000 USD at exchange rate 1DKK=0.147USD. AFQT score, height and draft status are observed on the AFD. AFQT scores are standardized for the fit-for-service sample. Service status is observed at the latest in 2010. Birth weight is measured by the midwife. Mother's and father's type of education schooling are observed on 1 January of the year the son turns age 15, and may be missing if parents have no qualifications obtained in Denmark or the parents are unregistered.Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

Table A.3: Summary statistics - Outcomes

	FFS born 1974-1982						FFS born 1983-1990					
	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level	Drafted served	Not Drafted served	DS-NDS	Complier served	C1-AT	Sign. level
No. Deployments	1.6832	1.7758	-0.0927	1.538	-0.2378	***	1.4744	1.3992	0.0752	1.5307	0.1314	***
	0.0164	0.0239	0.0308	0.0617	0.0803		0.0172	0.0146	0.0215	0.0318	0.0384	
Log(days deployed)	5.3155	5.3511	-0.0357	5.2596	-0.0915	**	5.1667	5.1737	-0.007	5.1615	-0.0122	
	0.0113	0.0135	0.0174	0.036	0.0451		0.0087	0.0079	0.0118	0.0164	0.0206	
Wounded	0.0046	0.0054	-0.0008	0.0033	-0.0021		0.0222	0.0298	-0.0076	0.0165	-0.0132	
Repatriated	0.0199	0.0163	0.0036	0.0255	0.0092		0.0547	0.063	-0.0083	0.0484	-0.0146	
PE missions	0.1655	0.1452	0.0203	0.1972	0.0521	**	0.5011	0.5645	-0.0634	0.4537	-0.1109	***
PE and PK missions	0.1801	0.1971	-0.0169	0.1536	-0.0434		0.1293	0.142	-0.0127	0.1197	-0.0223	
PK missions	0.5804	0.5811	-0.0007	0.5794	-0.0017		0.2585	0.2283	0.0302	0.2812	0.0529	**
Officer	0.0671	0.0759	-0.0088	0.0532	-0.0227		0.0177	0.0043	0.0133	0.0276	0.0233	***
Sergeant	0.1525	0.1893	-0.0368	0.0949	-0.0944	***	0.1651	0.1571	0.008	0.1712	0.0141	
Privates	0.4132	0.3887	0.0245	0.4517	0.063	*	0.8092	0.8304	-0.0212	0.7934	-0.037	*
Still army 2y after mission	0.5799	0.6117	-0.0318	0.53	-0.0817	**	0.5569	0.6098	-0.0529	0.5173	-0.0925	***
Still army 4y after mission	0.4268	0.458	-0.0312	0.3778	-0.0802	***	0.4476	0.5136	-0.066	0.3982	-0.1154	***
Employment length (army)	6.9866	7.5711	-0.5845	6.0715	-1.4996	***	5.5989	5.6321	-0.0332	5.5739	-0.0582	
	0.0931	0.111	0.1407	0.289	0.361		0.1057	0.0857	0.1336	0.1933	0.2335	
Suicide attempts 1995-2018	0.0222	0.0186	0.0036	0.0278	0.0092		0.0205	0.0181	0.0024	0.0223	0.0042	
Death	0.0115	0.0132	-0.0017	0.0089	-0.0042		0.0085	0.0086	-0.0001	0.0085	-0.0002	
Job in 2019	0.8889	0.9013	-0.0124	0.8696	-0.0317		0.861	0.8589	0.0022	0.8627	0.0038	
Studying in 19	0.0083	0.007	0.0014	0.0105	0.0035		0.0399	0.0626	-0.0227	0.0228	-0.0397	***
Unemployed in 2019	0.0403	0.0422	-0.0019	0.0373	-0.0049		0.0427	0.0337	0.009	0.0495	0.0158	
Disability pension in 2019	0.0222	0.0128	0.0094	0.0369	0.0241	***	0.0114	0.0056	0.0058	0.0157	0.0101	*
Individuals	3475	2583		1354			1756	2317		1004		

NOTE.—The population covers men born 1974-1990 who are Danish citizens and resident in Denmark on 1 January of the year they turn 18 and were deployed in the period 1992-2012. No. deployments is the number of times a soldiers was deployed in the period 1992-2012. Log(days deployed) is the logarithm of the total numbers of days they were deployed for all the missions. No. injuries and no. repatriations report the number of injuries and repatriations for each soldier, while Wounded and Repatriated are dummy variable indicating if the soldier has been wounded or repatriated. KIA is killed in action dummy. PE (peace-enforcing) and PK (peace-keeping) indicate the type of mission the soldiers have been deployed on. Rank (officer, sergeant, and privates) is the rank recorded for the first/last mission. Still in the army 2(4) years after the mission indicates whether the soldier is still employed in the Army two or four years after the beginning of his mission. Employment length is the number of years the soldiers has been employed in the Army. Suicide attempts is a dummy indicating whether the soldiers is classified with a suicide attempts in the Danish registers. We use the Danish algorithm for the identification of suicide attempts and self-harm from the National Registry and the Danish Psychiatric Central Registry, see Table 1 in Gasse et al. (2018).Standard errors are in parentheses * $p < 0.10$, ** $p < 0.05$, *** $p < 0.01$

B Compliers analysis calculations

This Appendix shows the calculations made for the compliers analysis, by applying the notation of Imbens and Rubin (1997) to our context. Define treatment indicator S_s for service status s (taking the value 0 or 1), and instrument D_d for draft status d (taking the value 0 or 1). We split the population into response types R_r where $r = NT$ indicates never-takers, $r = AT$ indicates always-takers and $r = C$ indicates compliers. Because of randomization, D is independent of R and we can compute the population frequencies of these response types. The fraction of men who do not serve among the sub-sample of men who are drafted, estimates the population share of never-takers:

$$\phi_{NT} = P[S_0 \mid D_1] \tag{A.1}$$

The fraction of men who serve among the sub-sample of men who are not drafted, estimates the population share of always-takers:

$$\phi_{AT} = P[S_1 \mid D_0] \tag{A.2}$$

The fraction of men who serve among the sub-sample of men who are drafted, estimates the combined population share of always-takers and compliers:

$$\phi_{AT} + \phi_C = P[S_1 \mid D_1] \tag{A.3}$$

The fraction of men who do not serve among the sub-sample of men who are not drafted, estimates the combined population share of never-takers and compliers:

$$\phi_{NT} + \phi_C = P[S_0 \mid D_0] \tag{A.4}$$

Subtracting (A.2) from (A.3) we obtain the population share of compliers:

$$\phi_C = P[S_1 \mid D_1] - P[S_1 \mid D_0] \tag{A.5}$$

Distinguishing among compliers those who serve, *C1*, and those who do not serve, *C0*,

the expectation of covariates, V, given draft status and service status can be estimated directly. Men who are not drafted and do not serve are a mixture of compliers who do not serve and never-takers, with mixing probabilities the relative proportions of these two sub-populations:

$$E[V \mid D_0 S_0] = \frac{\phi_C}{\phi_{NT} + \phi_C} E[V \mid R_{C0}] + \frac{\phi_{NT}}{\phi_{NT} + \phi_C} E[V \mid R_{NT}] \tag{A.6}$$

Men who are not drafted and serve correspond to always-takers:

$$E[V \mid D_0 S_1] = E[V \mid R_{AT}] \tag{A.7}$$

Men who are drafted and do not serve correspond to never-takers:

$$E[V \mid D_1 S_0] = E[V \mid R_{NT}] \tag{A.8}$$

Men who are drafted and serve are a mixture of compliers who serve and always-takers, with mixing probabilities the relative proportions of these two sub-populations:

$$E[V \mid D_1 S_1] = \frac{\phi_C}{\phi_{AT} + \phi_C} E[V \mid R_{C1}] + \frac{\phi_{AT}}{\phi_{AT} + \phi_C} E[V \mid R_{AT}] \tag{A.9}$$

Inverting equation (A.6) and substituting from equation (A.8) we can express expectations of covariates conditional on complying by not serving:

$$E[V \mid R_{C0}] = \frac{\phi_{NT} + \phi_C}{\phi_C} E[V \mid D_0 S_0] - \frac{\phi_{NT}}{\phi_C} E[V \mid D_1 S_0] \tag{A.10}$$

Substituting from equations (A.1), (A.4) and (A.5) in equation (A.10) we obtain a function of objects that can be estimated directly:

$$E[V \mid R_{C0}] = \frac{P[S_0 \mid D_0] E[V \mid D_0 S_0] - P[S_0 \mid D_1] E[V \mid D_1 S_0]}{P[S_1 \mid D_1] - P[S_1 \mid D_0]} \tag{A.11}$$

Inverting equation (A.9) and substituting from equation (A.7) we can express expectations

of covariates conditional on complying by serving:

$$E[V \mid R_{C1}] = \frac{\phi_{AT} + \phi_C}{\phi_C} E[V \mid D_1 S_1] - \frac{\phi_{AT}}{\phi_C} E[V \mid D_0 S_1] \tag{A.12}$$

Substituting from equations (A.2), (A.3) and (A.5) in equation (A.12) we obtain a function of objects that can be estimated directly:

$$E[V \mid R_{C1}] = \frac{P[S_1 \mid D_1] E[V \mid D_1 S_1] - P[S_1 \mid D_0] E[V \mid D_0 S_1]}{P[S_1 \mid D_1] - P[S_1 \mid D_0]} \tag{A.13}$$

Hence we have obtained the expectation of covariates given the four response types (always-takers, compliers who serve, compliers who do not serve, and never-takers) as a function of objects that can be estimated directly. When applying the above insight of Imbens and Rubin (1997) to our context, we obtain expectations of compliers who serve and compliers who do not serve *separately*, instead of just their difference, as would be the case with the IV estimator.

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