

Puolustusvoimien tutkimuslaitos Julkaisuja 6

# The Russian demography problem and the armed forces

# Trends and challenges until 2035

Arseniy Svynarenko



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### THE RUSSIAN DEMOGRAPHY PROBLEM AND THE ARMED FORCES

#### TRENDS AND CHALLENGES UNTIL 2035

#### Lic.Soc.Sci. Arseniy Svynarenko



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### Esipuhe

Puolustusvoimien tutkimuslaitos (PVTUTKL) on Pääesikunnan alainen sotilaslaitos. Monitieteinen tutkimuslaitos tuottaa puolustusalan tutkimus-, kehittämis- ja testauspalveluja strategian ja sotataidon, käyttäymistieteiden ja useiden eri teknologioiden alueilla.

Tutkimuslaitoksen doktriiniosasto arvioi tulevaisuuden sotilaallista toimintaympäristöä ja uhkia. Tämän perusteella osasto analysoi vaihtoehtoja, joilla Puolustusvoimat voi vastata tulevaisuuden haasteisiin, sekä samalla kehittää uusia käyttöperiaatteita ja toimintatapoja Puolustusvoimille. Puolustusvoimien strategiseen ennakointiin liittyen doktriiniosasto on tilannut tutkimuksia myös Puolustusvoimien ulkopuolella työskenteleviltä tutkijoilta. Nyt julkaistava Arseniy Svynarenkon tutkimus The Russian demography problem and the armed forces: Trends and challenges until 2035 (Venäjän demografiaongelma ja asevoimat: trendit ja haasteet vuoteen 2035) on osa laajempaa tutkimuslaitoksen strategisen ennakoinnin tutkimuskokonaisuutta.

Kansakunnan tulevaisuutta indikoitaessa väestöpohja on yksi merkittävimmistä menestymisen mahdollisuuksia ennustavista tekijöistä. Poliittisten ja taloudellisten suhdanteiden vaihtelusta huolimatta kansakunnat rakentavat tulevaisuutensa 20–30 vuoden tarkastelujaksolla, ellei merkittävää maahanmuuttoa ja sitä tukevaa politiikkaa ole, pääosin olemassa olevalla väestöllään. Arseniy Svynarenkon tutkimus kohdistuu Venäjän demografiseen ongelmaan ja siihen miten se vaikuttaa asevoimien henkilötäydennyksen mahdollisuuksiin. Palveluskelpoisen 20–24-vuotiaiden miesten ikäluokan koko pienenee nykyisestä noin 4,5 miljoonasta miehestä yli neljänneksen vuoteen 2020 mennessä, ja nykyinen taso saavutetaan vasta 2030-luvun puolivälissä. Venäjällä demografisen ongelman vaikutukset asevoimien täydentämismahdollisuuksiin on tunnustettu. Maassa on ryhdytty toimenpiteisiin syntyvyyden lisäämiseksi, asepalveluksen houkuttelevuuden lisäämiseksi sekä varusmiespalveluksen kutsuntapohjan laajentamiseksi.

Tämän tutkimusraportin näkemykset ovat tutkijan omia, eivätkä näin ollen välttämättä heijasta Puolustusvoimien tutkimuslaitoksen kantaa.

Riihimäellä toukokuussa 2016

Doktriiniosaston päällikkö ev.luutn., sotatieteiden tohtori Petteri Lalu

#### Abstract

The composition of the Russian military forces does not wholly reflect the social composition of Russian society, although it does reflect the demographic changes. Smaller cohorts of young people in 2012–2015 resulted in a lower number of young men being drafted for military service. The biggest cohort of young people born at the end of the 1980s was clearly reflected in 2010 in a very high number of conscripts (549.4 thousand). A rapid drop in fertility rates and high mortality rates during the early 1990s resulted in a 44 per cent decrease in the number of annually drafted young people in 2014.

Between 2015 and 2035 the number of young men of conscription age will grow by around 46 per cent. During the same time period the number of 30- to 34-year-olds will decline by almost 50 per cent. According to UN estimates based on medium fertility, the size of the most significant recruitment resource of 20- to 24-year-olds will be highest in 2015 (4 million 587 thousand), will decline in 2020 (3 million 460 thousand), and will recover in 2035 almost to the same level as in 2015 (4 million 382 thousand). Starting from 2018–2020, the army may experience a lack of human resources comparable to 1965, when the smallest cohort of young people born during the Second World War reached military service age. The cohort born in the late Soviet years and who are 25-30 in 2015 will compose the core of the army reserves in 2035.

The growth of the conscription-age cohort will not make conscription campaigns any easier for the Russian armed forces. The number of urban young people will grow much faster (+53% change between 2015 and 2030) compared to rural young people (+35% change between 2015 and 2030). Young, well-educated urban males are the most reluctant to join the armed forces. The core of contemporary conscripts are from rural areas and small towns. All in all, age, place of residence, income level and level of attained education are all factors that influence respondents' attitudes towards the armed forces. A cross-examination of opinion polls reveals that the more positive people are in their evaluations of the president, the more positive they are about the army in general and military service in particular; and the more contact they have with the army, the more neutral they are in their evaluation of it.

Recently, the number of young people who are fit for military service has been growing mostly due to legal measures and a new definition of "fit for service". In fact, in the past two decades in Russia, young people's health has been deteriorating. One of the most significant factors affecting the poor health condition of today's young people is excessive use of alcohol starting from an early age. Recent studies underline the significance of excessive alcohol consumption as an explanatory factor in the unusually high mortality rate among young Russian men.

The fact that Russia now allows foreigners aged 18–30 to serve five-year contracts in the Russian armed forces indicates that the Russian leadership has a realistic view of the demographic problem facing the armed forces in terms of the quantity and quality of conscripts.

### Tiivistelmä

Tutkimuksen tehtävänä on selvittää Venäjän demografisen kehityksen vaikutuksia joukkotuotantoon vuoteen 2035 asti. Tutkimuksessa tarkastellaan Venäjän palveluskelpoisen ikäluokan kehitykseen vaikuttavia tekijöitä, eritellään tärkeimmät syyt palveluskelpoisuudettomuudelle ja esitetään arvio reservin ikä- ja palveluskelpoisuuden kehityksestä vuoteen 2035. Lisäksi eritellään em. tekijöiden vaikutukset joukkotuotantoon ja demografisen kehityksen sekä aivovuodon vaikutukset Venäjän tutkimukseen, tuotekehittelyyn ja tuotantoon asevoimiin liittyen.

Venäjän väestötilastojen mukaan väestön väheneminen on hidastunut vuoden 2005 jälkeen. Vuonna 2012 rekisteröitiin luonnollinen väestönkasvu ensimmäisen kerran 1990-luvun alun jälkeen. Venäjällä syntyneiden määrä on lähes sama kuin kuolleiden ja on odottavissa, että vuonna 2030 asevelvollisten määrä on edellisvuosia suurempi. Merkittävä väestönkasvuun vaikuttava tekijä on maahanmuutto ulkomailta Venäjälle. Venäjän alueiden väliset erot ovat suuria ja väestön luonnollinen kasvu on suurinta Pohjois-Kaukasuksella sekä joillakin Siperian ja Kaukoidän alueilla. Luonnollinen väestönkasvu tapahtuu ensisijaisesti kaupungeissa ja maaseudulla väestö vähenee edelleen. Ympäristön saastuminen, ruuan laatu, aikainen alkoholin ja tupakan käytön aloittaminen ja alkoholismi ovat merkittäviä yksittäisiä väestönkasvuun vaikuttavia tekijöitä.

Vuosien 2015 ja 2035 välillä palveluskelpoiseen ikäluokkaan kuuluvan osan (20–24 -vuotiaat miehet) arvioidaan kasvavan noin 46 prosenttia. Samaan aikaan 30–34 -vuotiaiden määrä tulee laskemaan puoleen. YK:n tekemän ja hedelmällisyyden keskimääräiseen kasvuun perustuvan arvion mukaan 20–24 -vuotiaiden määrä on korkeimmillaan vuonna 2015 (4,587 milj.), laskien vuonna 2020 (3,460 milj.) ja jälleen palautuen vuonna 2030 likipitäen vuoden 2015 tasolle (4,382 milj.). Demografisen kehityksen valossa voidaan arvioida, edellyttäen ettei lainsäädäntöön tehdä tulevaisuudessa isoja muutoksia, että vuonna 2035 asevelvollisten määrä säilyy lähes nykyisellä tasolla ja on noin 396 000. Reserviläisien ydinjoukon vuonna 2035 muodostavat 1980-luvun lopulla syntyneet suuret ikäluokat, jotka vuonna 2015 ovat 25–30 -vuotiaita.

Palveluskelpoisen ikäluokan kasvu ei itsessään helpota, saatikka ratkaise, Venäjän armeijan ongelmia varusmiesten rekrytoinnissa. Kaupungissa asuvien määrä tulee kasvamaan paljon nopeammin kuin maaseudulla asuvien nuorien määrä. Kuitenkin nimenomaan maalta lähdetään innokkaammin varusmiehiksi. Oletettavasti jatkossakin Venäjän armeijan on vaikeampi houkutella korkeakoulutettuja kaupunkilaisnuoria riveihinsä. Vastikään tehty päätös hyväksyä ulkomaiden kansalaiset ns. sopimussotilaiksi Venäjän armeijaan on yksi merkki ongelmien vakavuudesta.

Tärkeimpiä syitä palveluskelpoisuudettomuudelle ovat yleinen nuorten terveydentilan heikentyminen, erityisesti tuki-, liikunta-, verenkierto- ja ruuansulatuselimistön sairaudet. Myös mielenterveyden häiriöt nuorten ikäluokassa ovat kasvaneet. Sen sijaan nuorten miesten väkivaltaiset kuolemat ja itsemurhat ovat 2000-luvun aikana vähentyneet, vaikka verrattuna esimerkiksi Viroon ja Ukrainaan, luvut ovat korkeita. Tähän ongelmavyyhtiin on pyritty vastaamaan kehittämällä ns. patrioottista koulutusta, jonka toivotaan ylläpitävän nuorten maanpuolustustahtoa, sekä höllentämällä varusmiesten kelpoisuusvaatimuksia.

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### **1** Introduction<sup>1</sup>

In July 2010, Lieutenant-General Vladimir Shamanov publicly addressed the demography problem as a danger to Russia's national interests. According to Shamanov, there is no denying that "the demographic trough we find ourselves in today is an objective reality". Furthermore, he continued, "from the standpoint of our national interests, it constitutes for Russia a great danger that we can no longer ignore".<sup>2</sup> General Shamanov's statement voiced the prevailing feeling at the time that the demography problem had to be addressed.

The policies adopted since 2007 by the Russian government to improve the demographic situation have been partially successful. However, Russia's current fertility rate decline is a typical trend for developed industrial and post-industrial societies. Thus, short-term campaigns and propaganda are unlikely to have major impact to this trend. Consequently, the Russian armed forces have to find other solutions to the demography problem. One option is to make military service more attractive for young people by way of raising pay and improving the conditions of armed service. Consequently, the length of military service was reduced from 24 to 12 months in 2008, the salaries of military personnel were increased, and the mixed system comprising both conscripts and 'professional' soldiers was introduced. However, during the subsequent reform process in the armed forces, the set of systemic problems that impede resolving the demography issue has been identified. The main problems include the poor state of medical services (especially in the regions), a high level of criminality, drug use and other societal ills, and the increasing social inequality.

The purpose of this report is to describe the current demographic situation in Russia, and on that basis, provide an estimate of the development of conscription age (18-30) males in Russia until 2035. The report will also identify the main reasons for non-eligibility for military service, since this is one of the key factors influencing the future size of the Russian armed forces. The following components should be taken into account in this regard: the health of the conscription age population, the functioning of the Russian healthcare system and chronic illness penetration, as well as

<sup>&</sup>lt;sup>1</sup> The author would like to thank senior research fellow, Dr. Katri Pynnöniemi from the Finnish Institute of International Affairs, for helpful comments and criticism on earlier drafts of this report.

<sup>&</sup>lt;sup>2</sup> McDermott, R. N., (2011) The Reform of Russia's Conventional Armed Forces: Problems, Challenges, and Policy Implications, NY: Jamestown Foundation, 93.

changes in the level of alcohol and drug use among the young male population.

When analysing the factors that determine the availability of human resources for the Russian army, it is important to pay attention also to social processes in Russian society. The implementation of patriotic education programmes and young people's attitudes towards, and trust in, the army and military service, reflect both political and social processes in Russia as well as trends in the development of cultural and citizenship identities. The question that is addressed in this report only indirectly concerns the impact of Russian economic development to demography situation and the development of the armed forces in general.

Recent studies indicate that Russia's current economic development model that is mostly based on the extraction and export of raw materials is not sustainable. However, in the short-term perspective, it is unlikely that Russia is able to implement structural reforms required for modernization of the industrial base and adaptation of the society for the needs of post-industrial type development model. Significant changes to the functioning of Russia's political system should be introduced to achieve these objectives. From the viewpoint of this research, this means that many of the problems identified in-above will remain unresolved, at least in the short run. Yet, Russian history has seen many periods of rapid change, and therefore, it cannot be excluded that this pattern of change will be repeated again.

The report is structured as follows. First, previous research on the Russian population growth, demography trends and health situation is reviewed. This includes a presentation of the latest statistical information on demography trends based on information from the United Nations (UN) and from the Russian Federal State Statistics Centre. Second, the demography problem is discussed in the framework of the reform of the Russian armed forces. The second chapter summarizes the main policy options aimed at improving the situation and problems encountered in achieving the preferred objectives. Third, the main factors affecting the quality of conscripts will be examined. Fourth, the report briefly reviews the expected changes in migration trends and reviews the latest developments regarding the ability of the Russian military industrial sector to attract skilled workers, as well as estimations of the future prospects. In the concluding chapter, estimation will be provided on the main development trends among conscript age population and reservists until 2035 and implications of the situation for the Russian armed forces in 2035.

# 2 The current demographic situation in Russia and future trends

### 2.1 Demography and economic transition in Russia

In the 2010s, the Russian Federation entered a new period of demographic transition. This period has been characterised by a slowing down of the natural decrease in population. In 2012 for the first time since the collapse of the Soviet Union, a positive natural population growth was recorded in Russia: the number of deaths per one thousand was 13.3 and equal to, or slightly exceeding, the number of births (Figure 1). In the following year, the birth rate decreased to 13.2, remaining above the level of mortality of 13.0 per one thousand.



*Figure 1. Death rates and birth rates in Russia from 1970 to 2013, illustrating the second demographic transition in Russia. Source: Federal'naya sluzhba gosudarstvennoy statistiki*<sup>3</sup>.

The demographic processes in Russia between the two World Wars and during two decades of post-war reconstruction are referred to in the research literature as Russia's first period of demographic transition. The term *demographic transition* is usually applied to describe a very rapid demographic change in a given society. It is usually accompanied by major development processes such as the transformation of an agricultural society into an industrial one. In Russia, this transition period has been marked by frequent and sudden interruptions in demographic processes

<sup>&</sup>lt;sup>3</sup> The Federal State Statistical Office. The database is available at http://cbsd.gks.ru/, later in this report references are made to this same database if not otherwise indicated.

caused by extreme exogenous shocks, such as wars, waves of mass repressions, and famines.<sup>4</sup>

In the case of Russia's demographic transition, the exogenous impact has been deep and long-lasting. During this period family planning was under significant external pressure. The decline in fertility rates can be explained by the influence of external factors: forced migrations (resettlement of entire ethnic groups) and work-related migration (movement of workers for participation in industrialization projects), the participation of men and women in wars, and a large number of casualties during warfare.

However, the effect of exogenous factors should not be overestimated either. Russia is a large country and demographic trends are very diverse in different areas. These trends do not follow unique paths, but they are part of cross-national regional demographic processes.<sup>5</sup> The western part of Russia is part of a European regional demographic trend (lower fertility



*Figure 2. Population pyramid for Russian Federation on January 1, 2014. Source: Federal'naya sluzhba gosudarstvennoy statistiki.* 

<sup>&</sup>lt;sup>4</sup> Zhitomirskaya, V., (2012) Osnovnie tendentsii demograficheskogo razvitija Rossii v XX veke. Moskva: Kuchkovo Pole.

<sup>&</sup>lt;sup>5</sup> Blum, A., (2004) *Naitre, vivre et mourir en URSS*. Payot & Rivages.

rates), while the southern part of Russia and the republics of North Caucasus, where a greater number of Muslims reside, are part of the Middle-East regional demographic development (higher fertility rates).

The Russian population pyramid reflects the major demographical transitions and barely resembles a pyramid. Due to the above-mentioned factors, Russia's population pyramid (Figure 2) is asymmetrical. From the 1920s until the 1960s, women, and especially young women, outnumbered men and the 'gaps' caused by external factors impacted the population reproduction process.



*Figure 3. Male population of Russian Federation by categories. Source: Federal'naya sluzhba gosudarstvennoy statistiki.* 

Between 1990 and 2014 the most significant reduction was in the size of a cohort of males under working age (0-15). High mortality rates and low life expectancy slowed down working age and elderly male population cohort growth (Figure 3).

### 2.2 The changing patterns of birth and mortality rates

A distorted population pyramid is a significant feature of the demographic transition in Russia. From the 1920s until the 1960s, women, and especially young women, outnumbered men, and these gaps had a great impact on population reproduction. The post-war compensatory years in Western Europe and in Russia are very dissimilar. No post-war baby boom occurred in the Soviet Union. Instead, a minor increase in fertility rates was spread over a longer period of time. Compared to the other European countries in the first part of the 20<sup>th</sup> century, Russia experienced a higher number of children per woman during her child-bearing years. Nonetheless, Russia and the majority of European countries share

a simultaneous trend towards a decline in the fertility rate. Consequently, Russia is undergoing the same European process of demographic transition. $^{6}$ 

The long-term tendency towards a decline in the fertility rate was interrupted in 1981 when the Soviet government adopted certain measures to support families with children. These measures engendered a rapid but short-lived increase in fertility: the cohort born in the 1980s reached the age of 25 to 30 years old in 2014 (see Figure 2). The majority of young men in this cohort did their military service between 2004 and 2009 (20 is the most typical age to be drafted into the army). Postponing starting a family and the use of contraceptives contributed to a further decline in fertility rates by the end of the 1980s. Contraceptives were not readily available in the Soviet Union and this eventually led to a very significant increase in abortions. For example, in 1990 a little over 5 million births were registered in the Soviet Union (of which 2 million were in Russia) and 7 million abortions (of which 4.1 million were in Russia).<sup>7</sup> In comparison, in 2012 1.9 million births and a little over 1 million legal abortions were registered in Russia (Figure 4).



*Figure 4. Abortions, live births, number of live births to women under age 20. Source: TransMonEE database.* 

In 2007, the Russian government adopted policies to stimulate the birth rate. Additional social benefits and subsidies (so-called "mother's capital") for families have had a very short-term effect and have affected

<sup>&</sup>lt;sup>6</sup> Blum (2004).

<sup>&</sup>lt;sup>7</sup> Blum (2004).

no more than 300–400,000 people.<sup>8</sup> "Mother's capital" is a programme of providing subsidies for a family at the birth or adoption of a second or third child, as well as any subsequent children. The programme will come to an end in December 2016 and it remains to be seen whether it will be extended or not. In 2007 the subsidy amounted to 250,000 roubles and by 2015 it had risen to 453,000 roubles.<sup>9</sup> The use of the subsidy is strictly regulated by the state, and can be spent on (a) improving living conditions (paving off a loan, building a house, etc.), (b) education or davcare for children, or (c) supplementing the mother's pension savings. In October 2014, the Ministry of Economic Development of the Russian Federation suggested that Prime Minister Medvedev should abolish "Mother's capital" because it was placing too heavy a burden on the federal budget without solving any demographic problems. The ministry argued that instead of increasing the number of children in families, "Mother's capital" was simply shifting family planning decisions towards the earlier birth of a second child.<sup>10</sup>

According to conducted studies, the effect of the extra benefits decreased significantly within the first three to four years.<sup>11</sup> Therefore the long-term strategy could include varying measures for fertility stimulation: financial support for families with children (similar to the current "Mother's capital" programme), the improvement of daycare facilities for children (at present they are deteriorating), the modification of educational programmes in schools and special programmes for free or subsidized activities after school, accompanied by public campaigns. However, at the moment, the Russian government and authorities at the federal and municipal levels provide virtually no funding for daycare for children under the age of three. For instance, in Moscow all the municipal daycare groups for children aged from three months to three years were wound up after 2011. In most families, parents rely on the help of relatives or private babysitters.<sup>12</sup> The deepening economic crisis in Russia during 2014 and later may have a negative impact, particularly on those families

<sup>&</sup>lt;sup>8</sup> Naselenie Rossii 2012, (2014), Moskva: Izdatelstvo Visshei Shkoli Ekonomiki.

<sup>&</sup>lt;sup>9</sup> Federal'nyi zakon, (2014) N384-FZ "O federal'nom byudzhete na 2014 god i na planovyy period 2015 i 2016 godov", 1.12.2014, Article 8.

<sup>&</sup>lt;sup>10</sup> Shokhina, E., (2014) "Mat kapitalu byt", *Expert Online*, 1.10.2014, URL: http://expert.ru/2014/10/1/matkapitalu-byit/ retrieved 10.3.2015.

<sup>&</sup>lt;sup>11</sup> Sherega, F., Alefiev. A., (eds.) (2010) Chislennost' uchashcheisya molodezhi v obrazovatelnyh uchrezhdeniah Rossiiskoi Federatsii: Srednesrochnyi prognoz do 2014 goda. Moskva: TsSPiM.

<sup>&</sup>lt;sup>12</sup> Neschastlivoe detstvo. Pochemu detei lishayut sadov i yasel', (2013) *Argumenty i Fakty*, N40, 2.12.2013, URL: http://www.aif.ru/society/education/935619, retrieved on 10.12.2014.

planning to have children in the next few years. This, in turn, will affect the size of the cohort that will be eligible for military service in 2035.



Figure 5. Total fertility rate (number of children per woman aged 15–49) for urban and rural population and total between 1990 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Figure 5 shows an increase not only in fertility but also in the average number of children that would be born to a woman aged 15–49. In 2000 it was estimated that on average there were 1.2 children per woman. Thirteen years later, the fertility rate had increased to 1.7. Tendencies in fertility growth are similar for both the urban and rural population, with growth and decline taking place in parallel years. The highest total fertility rate is in rural Russia (2.26 children per woman aged 15–49) and the lowest among women living in towns (1.55). The increase in fertility rates during the past two decades is mostly the result of a greater number of women at the main reproductive age (under 35).<sup>13</sup> In 2012 and 2013 this cohort comprised women who were born between 1978 and 1995. If the average age at first birth is 24, then the most common year of birth for young women in this cohort would be 1989.

The subsequent cohort of women born between 1995 and 2003 is significantly smaller and it can be expected that after 2013 there will be a gradual decline in the number of new births. Due to the overall tendency to postpone the first birth to a later age, the smaller birth rate in this cohort of young women will be compensated for by the postponed child births of women born in the late 1980s. The lowest fertility rates can be expected between 2020 and 2030.

<sup>&</sup>lt;sup>13</sup> Naselenie Rossii 2012 (2014).

The first smallest cohort of men (born between 1995 and 2005) will attain the age of conscription around 2013–2023. The next hypothetical smallest cohort can be expected to be born after 2016. This cohort will reach the requisite age for military service between the years 2034 and 2044.



Figure 6. Total fertility rate (number of children per woman aged 15–49) across federal districts of the Russian Federation between 1990 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Russia's demographic transition has its own special features, as discussed above. However, in general, demographic changes in Russia are part of a larger cross-national European demographic process. Demographic processes in Central, Northwestern, and Southern Federal Districts coincide with European trends, such as mothers deferring the birth of their first child until a later age, and the trend of postponing marriage. Fertility rates in these federal districts are growing but persistently remain lowest in Russia at the level of 1.47, 1.57 and 1.64 children per woman in each district respectively. The situation is very different in the North Caucasian Federal District. This region comprises a predominantly Muslim population and one can observe similar trends as in Middle-Eastern countries. The fertility rate in the North Caucasian Federal District in 2013 was 1.98 children per woman. However, what should be noted is that no demographic data (deaths, births, marriages and divorces) was collected between 1993 and 1994 from the Chechen republic and Ingushetia. A further obstacle for analysis is created by the fact that no

statistical data or even partial data was collected in Chechnya between 1993 and 2003 (Figure 6).  $^{14}$ 



Figure 7. Number of children and young people by age groups in Russia on January 1, 2014. Source: Federal State Statistics Office Bulletin, Population of Russian Federation by gender and age group 2014. Source Federal'naya sluzhba gosudarstvennoy statistiki.

Cohorts of children and young people are very different if we compare urban and rural communities (Figure 7). High fertility rates were the most typical source of natural growth for the urban population between 1980 and 1990. Today, it is the migration of young people from rural areas to towns that has significantly contributed to the growth in the number of young urban men and women aged 20–25, many of whom leave their homes in the countryside in pursuit of an education and jobs in towns.

Another aspect of natural population change is the life expectancy rate (Figure 8.) and mortality rate (Figure 9.). This is influenced by the rapidly changing economic and political circumstances, the polarization of society between extremely low and extremely high incomes, the spread of drugs, and rising crime rates.

Life expectancy for male population in Russia was at the lowest level of 58 years between 1993 and 1995. It slightly improved in 1998 reaching 61 years and demonstrates more stable growth after 2006.

<sup>&</sup>lt;sup>14</sup> Naselenie Rossii 2012 (2014).



*Figure 8. Male and female life expectancy at birth (years). Source: TransMonEE database.* 



Figure 9. Mortality rate due to external causes for population aged 15–19 (includes suicides; per 100,000 relevant population). Source: TransMonEE database.

Figure 9 shows the change in the number of deaths by external causes (unintentional injuries: transport injuries, poisoning, injuries due to a fall, fires, drowning and other causes, as well as intentional injuries: self-inflicted injuries, injuries due to violence, war and other causes), including suicides. This information indicates that young people in Russia live in a potentially more insecure environment compared to post-socialist countries such as Ukraine, Estonia, and Azerbaijan. The mortality rate due to external causes reflects the way in which changes in the political

and social situation influence young people.<sup>15</sup> For instance, the war (the Nagorno-Karabakh War between Azerbaijan and Armenia) and political instability (military coups) in Azerbaijan in 1992–1994 were reflected in a dramatic increase in the mortality rate among young people. The military operations in the Northern Caucasus region had a similar effect on young Russians, as a significant number of young people in the military and civilian population died during the first and second Chechen Wars in 1994–1996 and 2000 due to external injuries. The case of Estonia (see Figure 10) in the 1990s serves as an example of how social alienation influences mortality rates for young people, as studies suggest that the economic crisis and the spread of drugs resulted in increased mortality rates, especially among non-Estonian young people.<sup>16</sup>



*Figure 10. Suicide rate for population aged 15–19, males (deaths per 100 000 average relevant population). Source: TransMonEE database.* 

Suicide rates among male population aged 15–19 peaked in 1995 and 2001 in Russia. The social and economic situation in Russian and Ukraine is generally similar.<sup>17</sup> In comparison to Ukraine and Estonia, significantly greater alcohol consumption and deeper social inequalities (development gap between center and periphery) in Russia may explain higher suicide and mortality rates among young men. In Russia, pure alcohol

<sup>&</sup>lt;sup>15</sup> Zhaksymbaev, M., (2012) "Dinamika smertnosto ot ubiistv v Rossii". *Demoscope Weekly*, No. 535-536, URL: http://demoscope.ru/weekly/2012/0535/analit09.php, retrieved 10.12.2014.

<sup>&</sup>lt;sup>16</sup> Kõlves, K., Sisask, M., Anion, L., Samm, A. and Värnik, A., (2006) "Factors Predicting Suicide among Russians in Estonia in Comparison with Estonians: A Case-Control Study", *Croatian Medical Journal*, 47(6): 869–877.

<sup>&</sup>lt;sup>17</sup> Levchuk, N., (2009) Alcohol and Mortality in Ukraine. *Working paper*, Max Planck Institute for Demographic Research.

consumption per capita has grown from 7.37 in 1990 to 10.12 in 2000 and 11.12 liters in 2010. In Ukraine tendency was somewhat different. Share of spirits is smaller (55.7 % in Ukraine and 63.5% in Russia) and consumption of alcohol declined between 1990 and 2000.



Figure 11. Mortality rate among 15-19 and 20-24-year-old males and females in Russia (deaths per 100,000 average relevant population). Source: TransMonEE database.

As shown in Figure 11 there was a significant increase in the mortality of young men aged 15–19 and 20–24 in 1995 and 2000. There was almost no similar tendencies among female population in the similar cohorts. The mortality peak in 1993–1994 could be explained by the increased alcohol and drug consumption, as well as the war in the Chechen republic. Gender differences in mortality rates in 1995 and 2000 indicate that deterioration in the healthcare system and the decreased ability to pay for, or obtain access to healthcare had limited influence on mortality.

Military campaigns in Chechen republic and losses among both military and especially local civilian population could partially explain high mortality rates among young men in 1995 and in 2000. Official figures put the number of military casualties in the Chechen wars (1994–1995 and 1999–2000) at around 5,500 and 6,000 respectively. However, there is no reliable data on the actual scale of the casualties. But it can be argued that the wars in Chechnya are reflected in the statistics on homicides.<sup>18</sup> What is also important to note is that although the intensive military operations in the Northern Caucasus lasted for rather a short period, the actual instability (causing increased mortality among local

<sup>&</sup>lt;sup>18</sup> Gessen, M., (2014), "The Dying Russians". The New York Review of Books, 2.9.2014, URL: http://www.nybooks.com/blogs/nyrblog/2014/sep/02/dying-russians/, retrieved on 11.12.2014.

population, military and police) in the region has lasted for almost two decades.

# 2.3 Policies aimed at improving the demographic situation in Russia

In 2006, the Russian government launched a large campaign aiming at improving the demographic situation in the country. The central element in this campaign was the federal law adopted on 29 December 2006 on the additional measure of state support for families with children. (See Chapter 2.2.) Another important element concerns the emigrational policies outlined in the State Concept of Migration Policies of the Russian Federation until 2025. There are ongoing discussions in Russia about adopting new healthcare policies. The draft proposal published in 2012 declared that the purpose of healthcare policies was to improve the demographic situation in Russia. The current state programme entitled "Development of Healthcare until 2020" has been criticized for being inadequate and can't be regarded as a strategy.

The federal and regional governments have invested in support for extensive youth policy programmes. The Youth Development Strategy adopted in 2013 places emphasis on patriotism, family, morality, justice, a healthy lifestyle and respect for nature. It takes a clear human capital approach, with emphasis on developing the key competencies of youth including innovation, creativity, entrepreneurship, sociability, solidarity and efficiency. It also has a declared goal of increasing fertility rates, which isn't a typical youth policy mission when compared to other European countries.

Panel studies by the Moscow Higher University of Economics confirm that state support programmes for families with children had little impact on intentions and realizations, especially for those who were planning to have their first child or who already had one child. On the other hand, during the implementation of the state programme most of the changes were for families with two or more children. The studies also showed that the effect of extra benefits for families with two or more children has significantly decreased within the first 3–4 years of this programme.<sup>20</sup>

<sup>&</sup>lt;sup>19</sup> Osnovnyye polozheniya strategii okhrany zdorov'ya naseleniya RF na period 2013-2020 i posleduyushchiye gody (2013), Komitet grazhdanskikh initsiativ A.L.Kudrina, Moscow.

<sup>&</sup>lt;sup>20</sup> Sinyavskaya, O., (2013) Changes in fertility intentions and their realization in 2004-2011: what we can learn from GGS data? *IDEM conference presentation*, 31.10.2013,

The current policy is oriented directly towards an increase in fertility, although a wider set of factors have an influence on this. For example, welfare services (accessibility of day care), as well as pension<sup>21</sup> and labour legislation are inadequate. The most positive outcome of this policy may result in an increase of 0.7 in the current fertility rate of 1.6–1.7 births per female in the cohort born between 1975 and 1979, and the one born between 1985 and 1989.<sup>22</sup>

State support programmes for families with children achieved better results in those regions where the population and culture still have traces of a traditional culture of high fertility rates, where traditional norms assume that a family should comprise many children. High fertility rates in regions where local economies are in stagnation or decline may lead to increasing differentiations between the regions, as well as social tensions.<sup>23</sup>

All in all, fertility policy is partially successful when it concerns financial support for families with two or more children. But fertility rate decline is a typical trend for developed industrial and post-industrial societies. Therefore, trying to improve the demographic situation in Russia by means of financial support or propaganda about traditional values will have a short-term effect (in the case of the former) and will be unsuccessful (in the case of the latter). Most likely, a significant increase in social benefits for families with two or more children, coupled with a drastic improvement in the daycare and educational systems have the potential to make a modest contribution to the demographic situation.

URL: http://www.hse.ru/data/2013/11/08/1282032874/RT1\_Sinyavskaya.pdf, Retrieved on 10.12.2014.

<sup>&</sup>lt;sup>21</sup> The pension accrual for women with higher education and two children is almost half of that for women with a similar education but no children.

<sup>&</sup>lt;sup>22</sup> Naselenie Rossii 2012, (2014).

<sup>&</sup>lt;sup>23</sup> Ibid.

# **3** The demography challenge from the viewpoint of the armed forces

# 3.1 The changing pattern of the recruitment age population

Due to the downward trend in the size of the cohort eligible for military service and the poor quality of the majority of recruits, manpower will remain a key challenge for the armed forces in the future as well. However, as noted in previous studies, information available on manpower constraints is rather unclear and the public statements made by officials tend to underestimate the obstacles preventing Russia from reaching the target figures.<sup>24</sup> This makes the work of outside observers more difficult, but it may also distract the military planners themselves. However, with the introduction of the army reform in autumn 2008, the Russian leadership acknowledged that the problem exists and that it intends to solve it. (see Chapter 3.2 for details).

It is expected that the number of working age males in the population aged 15–59 will gradually decline from 44 million in 2014 to under 37 million in 2035.<sup>25</sup> Studies reveal a trend towards a shortage of males in the recruitment age population (18-27) until 2019. In 1990 over one million males were born in Russia, whereas by 1999 the proportion of males had dropped to 626 000. This was due to the sharp decline in male births by more than 50 per cent between 1987 and 1999.<sup>26</sup> However, demographic studies show that the size of the recruitment age population (18–27) in Russia will be slowly growing (see the key category 20–24, Figure 13) until 2035.

Between 2012 and 2014, there was a 2–5% decline in the number of males in the population aged 18, although the number of draftees had grown by 2.5 per cent in 2013 and 1.6 per cent in 2014. Between 2014 and 2015, the number of 18-year-old men is expected to decline 5 per cent (661,457). The second lowest number of young men will occur in 2017 (653,815) (Figure 12).<sup>27</sup> Due to the current demographic trend,

<sup>&</sup>lt;sup>24</sup> Military Balance 2014, 162; see also McDermott (2011).

<sup>&</sup>lt;sup>25</sup> GKS (2010) Predpolozhitel'naya chislennost' naseleniya Rossiyskoy Federatsii do 2030 goda. Statisticheskiy byulleten', Moskva: Federal'naya sluzhba gosudarstvennoy statistiki.

<sup>&</sup>lt;sup>26</sup> Military Balance 2013, 200.

<sup>&</sup>lt;sup>27</sup> In previous study, it was estimated that between 2013 and 2023 the number of men turning eighteen will be between 660,000 and 760,000 a year, with large variations

between 2008 and 2017 the pool of conscripts is set to decline by twofifths. In April 2009 the deputy Chairman of the Duma Defence Committee, Mikhail Babich, noted that in 2012 there would be a 40 per cent shortfall in the number of conscripts even if everyone, including the medically unfit, did their military service.<sup>28</sup> It was later estimated that in 2010 only 17 per cent of the recruitment age population did military service.<sup>29</sup>



Figure 12. Number of young men aged 18 in Russia on January 1, of reported year. (estimation for 2014–2032 is based on numbers of boys born between 1999 and 2014 and is not adjusted for mortality and migration). Source: Federal State Statistics Office Bulletin, Population of Russian Federation by gender and age, 2014.

Factoring in the deteriorating health situation, the Ministry of Defence will also face problems vis-à-vis its drafting campaigns during these years and at least until 2020 when a trend towards a growth in the number of young men of recruitment age is forecast. However, the number of young rural people is expected to remain at the current level. This is important since most of the conscripts come from lower-middle-class or poor

between the years. See Hedenskog, J., Vendil-Pallin, C., (eds.) (2013), 40. According to most recent estimates by the Russian Federal State Statistics Office on January 1, 2013 there were 735,756 eighteen years olds and on the January 1, 2023 there will be 748,717 eighteen years olds. The lowest number in this cohort will be 653,815 in 2017, See also (Figure 15).

<sup>&</sup>lt;sup>28</sup> Cited in McDermott (2011), 93.

<sup>&</sup>lt;sup>29</sup> Bukkvoll, T., (2015) Ambitions and Resources in Russian Military Policy, conference presentation at Leangkollen Conference 2015: "The Balance of Power", URL: http://new.livestream.com/aktivdebatt/events/3764975/videos/75877873, retrieved on 02.02.2015.

families.<sup>30</sup> A study conducted in 2003 claims that higher-income families are more likely to 'bail out' their sons from the obligation to serve in the armed forces. The same study from 2003 showed that the proportion of conscripts coming from rich families was only 2 per cent and from middle-class families only 13 per cent.<sup>31</sup> Comparing to their peers living in bigger towns, young men living in towns with a population of less than 50,000 have 7 times higher probability for being drafted. Young men living in St Petersburg and Moscow have 11 times lower chances for being drafted comparing with their peers living in rural Russia.

Even if the Russian government makes further legislative reforms related to the proportion of conscripts and contract soldiers, it is anticipated that the number of conscripts won't change significantly in 2015 and 2017. Taking two factors into consideration, namely the decrease in the number of young people of draftable age in 2015–2019 and declarations by the Ministry of Defence to the effect that the number of conscripts will be increasing, we can assume that Ministry of Defence will have to adjust own plans or request further changes in legislation. Sufficient human resources to increase the number of conscripts will be available only in 2020 and thereafter (Figure 12).

Although in Russia the conscription age is from 18 to 27 years, the majority of conscripts are aged 20 or older. The rest of male population under 50 year old and have already served in armed forces belong to army reserves. As small fraction of whom are professional reservists on contract. The size of the most important recruitment resource of 20–24 year olds will change dramatically from present day until 2035 (Figure 13). The number of conscript aged youth will be highest in 2015, it will decline by 2020 and by 2035 will recover to almost the same numbers as in 2015. According to UN prognosis based on medium fertility there will be 4 million 382 thousand young men aged 20–24 in 2035, comparing 4 million 475 thousand young men in 2014.

During the same time period number of 30-34 year olds will decline by almost 50% – the cohort children born in the late soviet years who are

<sup>31</sup> Yemtsov, R., Lokshin, M., (2006) Ekonomicheskoye vremya prizyva na voyennoi sluzhbu v Rossii: rezul'taty mikroekonomicheskogo analiza, (Natsional'noye obsledovaniye blagosostoyaniya domokhozyaystv i ikh uchastiya v sotsial'nykh programmakh (NOBUS), provedennoye Goskomstatom Rossii sovmestno s Vsemirnym bankom), *Voprosy Ekonomiki*, No 1.

<sup>&</sup>lt;sup>30</sup> Carlsson, M., Norberg, J., (2012), "The Armed Forces", in Carolina Vendil Pallin (ed.) Russian military capability in a ten-year perspective, August, FOI, 103.

25–30 in 2015 will remain the biggest cohort through the years composing the core of army reserves in 2035.



Figure 13. Male population by five-year age group (thousands). Estimates based on medium fertility rate. Source: United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York.

Russia is recovering from the crisis of the mid-1990s (Figure 14). Until 2035 number of young men age 20–24 will be significantly below the numbers in the 1990–2010. In 2010 Russian government reported about exceeding the conscription plans because number of available

conscription age young men was higher than planned conscription figures. Correspondingly, the military budgets and staff were most likely planned for smaller number of conscripts. This unpreparedness of Ministry of Defense for greater number of conscripts had dare consequences for situation within army and for image of army.



Figure 14. Male population age 20–24 (in thousands) from 1950 to 2035. Estimate for 2030–2035 based on medium fertility rate. Source: United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York.



Figure 15. Male population of Russian Federation age 20–24 (thousands) from 2015 to 2100. Source: United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York.

An estimate based on medium fertility rate for Russia suggests that the number of young people aged 20–24 begins to decrease after 2035 (Figure 15). Starting from 2018–20 army may experience lack of human resources compatible to 1965, when the smallest cohort of young people born during the Second World War reached the age of military service. After 2035 the situation may follow more positive scenario if in 2015–2017 Russia will be engaged in a larger conflict. It is highly probably that in case of a war the first post-war years will be marked by unusually high fertility, resulting in greater number of young people around year 2040.

# 3.2 The "New Look" army reform and the recruitment problem

The overall objective of the army reform, started in 2008, was geared towards downscaling the oversized military organization Russia had inherited from the Soviet Union and giving it a "New Look" (*Novyi Oblik*) with the capabilities demanded by 21<sup>st</sup>-century warfare. In retrospect, most analysts praise the reform as a success, albeit an incomplete one.<sup>32</sup> One of the main objectives of the reform process was the restructuring of the age-old mobilization system. For years, the Russian armed forces have referred in their plans to the official and symbolic target figure of one million troops under arms. According to recent studies, the armed forces amount to approximately 80 per cent of the planned strength and in 2013 comprised no more than 800,000 men. It is expected that by 2020, the numerical strength may fall to 500,000-600,000.<sup>33</sup> However, the magic figure of one million men is used as a basis for planning. It has been estimated that in order to reach that level, the military needs to draft around 300,000 men annually.<sup>34</sup>

According to recent data, the number of conscripts drafted in 2011 was 354,500 in total, a figure which had declined to 295,710 in 2012 (Figure 16). But in 2013, the number of conscripts had again exceeded the

<sup>32</sup> Carlsson, M., Norberg, J., (2012); Hedenskog, J., Vendil-Pallin, C., (eds.), Russian Military Capability in a Ten-Year Perspective – 2013, the Swedish Defence Research Agency (FOI), December 2013; McDermott (2011); Mikkola, O-M., (2014) *Sotilaspolitiikka Kremlin Olympoksella. Venäjän sotilasreformin diskurssiivinen rakentuminen venäläisessä sanomalehdistössä 2008-2012*, Turku: Turun yliopiston julkaisuja, sarja C.; see also Arbatov, A., Dvorkin, V., (2011) *Novaja Voennaja Reforma Rossii*, Working Paper 2, Carnegie Moscow Center. URL: http://carnegie.endowment.org/files/WP2\_2011\_military\_rus\_pdf\_retrieved.on\_March

http://carnegieendowment.org/files/WP2-2011\_military\_rus.pdf, retrieved on March 5, 2015.

<sup>&</sup>lt;sup>33</sup> Carlsson, M., Norberg, J., (2012), 103.

<sup>&</sup>lt;sup>34</sup> The Future of Russia's Military (2012) Stratfor, Part 5, 31.7.2012.

minimum level, standing at 303,230 men. In spring 2015, the army plans to draft 150,000 young men, a task that will be accomplished as in previous years.



Figure 16. Reported number of young people drafted during the years 2011–2014 compared to the number of servicemen on contract. Source: Ministry of Defence of Russian Federation. Note: \*planned number of servicemen on contract and estimated number of conscripts (estimation based on change in cohort of 18-year-olds).

On the basis of the size of the cohort and assuming that only 37 percent (or less, as mentioned above) of male population in recruitment age cohort will eventually join the army it is possible to make an estimation of the future size of conscript army (Figure 17).

Between 2015 and 2019 the number of young people who will join the compulsory military service will drop from almost 300 thousand to 259 thousand. If by 2024, there will be no significant changes in legislation and political situation in Russia, the number of young people drafted will recover to 298 thousand (the level of 2014–2015) and will continue to grow. By 2035 the number of conscripts may reach 396 thousand.

Russia employs various means in order to attract more young people to the army and improve the quality of conscripts. Some of the older methods are well known from Soviet Union times. Back in the 1960s and 1970s, the Communist Party delegated some state functions connected with providing ageing veterans with basic support to young people (via state youth organizations for young pioneers and Komsomol). Today, the Russian state tasks loyal Cossack organizations with working with young



Figure 17. Reported number of young people drafted during the years 2011–2014 compared to the number of servicemen on contract and the forecast until 2035 of number of young men who most likely will be drafted. Planned number of servicemen on contract until 2017. Estimated number of conscripts until 2035 - estimation is based on expected size of conscript age youth from whom 39.6% will be drafted. Source: Ministry of Defence of Russian Federation; United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York.

people to promote traditional values, prepare future conscripts from Cossack families for military service, and to motivate other young men to join the army. In 1997, a process to institutionalize the Cossack communities and build co-operation between the ministry of defence and the main Cossack societies got underway.

Existing legislation regulates the involvement of Cossack organizations in:

- preparing young people for military service (Cadet Schools, summer camps embracing military themes under the broader umbrella of patriotism)
- assisting the state in conscription (monitoring future conscripts, searching for those who try to dodge military service), mobilization campaigns and the military training of reservists
- assisting the Ministry of Defence in the creation of territorial military units composed mainly of conscripts with a Cossack background who are on contract.<sup>35</sup>

<sup>&</sup>lt;sup>35</sup> *Podgotovka grazhdan Rossiyskoy Federatsii k voyennoy sluzhbe*, URL: http://www.femida.info/14/4-4.htm, retrieved on 20.2.2015; Mukhin, V. (2010)

<sup>&</sup>quot;Atamanov zapisali v mobrezerv", *Nezavisimaya gazeta*, 20.04.2010,

http://www.ng.ru/regions/2010-04-20/5\_kazaki.html, retrieved on 20.02.2015; President

To increase the recruitment efficiency, military commissariats have also intensified their cooperation with local administrations and local self-governance bodies, particularly with the authorities responsible for education policies and schools. For example, schools arrange for pupils to attend an obligatory medical examination on the premises of military commissariats. It is common practice for the armed forces to collect additional information about the future conscripts at the time of the medical examination. Young men are requested to fill in various forms with detailed information about themselves and their relatives, thereby providing commissariats with information useful for tracking down a young person during the recruitment period.<sup>36</sup> In addition, hospitals are required to send medical data on potential conscripts to the military district commissariats throughout the year. As a consequence, "the disqualification of a draftee on medical grounds will become much more difficult to fake".<sup>37</sup>

Although the vast majority of conscripts show up at the military commissariats or conscription offices in good time, some do not. These young men are called deserters (*uklonist*). In the early 2000s, military patrols tried to track down such young men in public places. Since 2010 almost all search activities are in the form of raids on the homes of the young men. Both military personnel and police visit the address where the young men are registered and investigate other possible addresses where they might be found.<sup>38</sup>

All in all, a range of legal measures have been employed to increase number of recruits: limiting grounds for avoiding conscription: loosening medical regulations on fitness, introducing fewer grounds for postponing military service and allowing foreigners to sign up. In March 2015, the

RF (2012a) Vladimir Putin utverdil strategiyu razvitiya rossiyskogo kazachestva, URL: http://state.kremlin.ru/council/16/news/16682, retrieved on 20.02.2015.

<sup>&</sup>lt;sup>36</sup> Interview with Alaksander Peredruk, Soldiers Mothers of Saint Petersburg NGO, 18.12.2014. In the Concept envisaging the system for pre-military training, one of the policy tasks is to create a database containing the medical records of all young people over the age of ten. If implemented, this database will help the military planners to keep track of the general health situation of the conscript age population, and also to keep track of people's whereabouts (at least in theory).

<sup>&</sup>lt;sup>37</sup> Isakova, I., (2006) Russian Defence Reform: Current Trends. *ISS Monograph*, November 2006. URL:

http://www.strategicstudiesinstitute.army.mil/pubs/display.cfm?pubID=740, retrieved 23.02.2015.

<sup>&</sup>lt;sup>38</sup> Interview at with Alaksander Peredruk, Soldiers Mothers of Saint Petersburg NGO, 18.12.2014, Interview with Olga Alekseeva, Soldiers Mothers of Saint Petersburg NGO, 18.12.2014.
Russian State Duma approved new legislation limiting young men's possibilities of travelling abroad, and reducing the number of places for alternative civilian service. The efficiency of these and other rather adhoc measures in resolving the demography problem is difficult to estimate, in part because there are systemic flaws in reporting the number of conscripts drafted into the armed forces annually. Therefore, it is also important to review certain systemic attempts to combat the demographic trough. These include in particular the reorganization of the pre-draft training and reform of the manning system in the armed forces, particularly in the case of contract-employed soldiers.

# 3.3 The reorganization of pre-draft training and the system of contract-employed soldiers

It has been argued that in order to maintain the troop strength demanded by the military planners, the number of conscripts drafted into the military has to be doubled, from approximately 260,000 to 500,000–600,000.<sup>39</sup> This would mean that almost all men of conscription age (almost 90%) would need to serve time in the army, a goal which, given the health factors among others, seem quite impossible. In 2014, the Defence Ministry reported that only 73 per cent of conscripts were fit for military service, while some 20 per cent received deferrals. In a cohort of 20-yearolds, less than 50 per cent actually did military service. The reorganization of the training of the young male population before armed service and the changes made to the system of contract-employment in the armed forces can be regarded as the main policy areas designed to address this challenge.

#### Reorganization of the pre-draft training

The main purpose of the pre-draft training is to improve the physical and mental condition of the conscripts *before* they engage in military service. This policy has long roots in the Soviet period but due to financial and organizational dysfunction it almost ceased to exist during the 1990s and later. In February 2010, a new Concept for the federal-level systemic preparation of the recruitment-age population was accepted and a special

<sup>&</sup>lt;sup>39</sup> Thornton, R. (2011) Military Modernization and the Russian Ground Forces. SSI Monograph, 31. URL:

http://www.strategicstudiesinstitute.army.mil/pubs/display.cfm?pubID=1071, retrieved 23.02.2015, 34. Russian military analyst Alexander Golts puts the figure as high as 750,000, but also argues that the recruitment of soldiers on this scale would be impossible. Golts, Alexander, (2012) "Conscription: a basic question of civil-military relations in Russia", in McDermott, R., Nygren, B., and Pallin, C., (eds.) (2012), 209.

inter-departmental committee<sup>40</sup> was established to facilitate and monitor the implementation of the planned activities. The Concept outlines that the facilitation of the training will be implemented in four phases between 2009 and 2020.

The organization responsible for the actual pre-training as well as the patriotic education of young people is called the Voluntary Association for Assistance to the Army, Air Force, and Navy (Общероссийской общественно-государственной организации "Добровольное общество содействия армии, авиации и флоту России, DOSAAF<sup>41</sup>). In the Soviet period, retired officers used to prepare high school children for conscript service.<sup>42</sup> Currently, the organization is supervised by the Russian Government, the Russian president and the key power ministries. The main tasks of the organization include the development of militarysport education, the training of pilots in selected polytechnic institutions, the military education of reserves, the education of specialists in various technical professions, participation in catastrophe prevention and mergency situations, and the maintenance of the organization during mobilization and wartime.<sup>43</sup>

However, a question mark hangs over the current ability of DOSAAF to fulfil its many responsibilities. According to information provided in the Concept, 47 per cent of the sports facilities owned by DOSAAF need reconstruction and 90 per cent of the military equipment available for training purposes is out of date.<sup>44</sup> The head of DOSAAF, Sergei Maev, noted in an interview in August 2010 that the organization had 'lost' 70 per cent of its facilities during the last two decades. According to Maev,

<sup>&</sup>lt;sup>40</sup> There is little information available on committee meetings or reports the committee is obliged to provide for the Government. The Ministry of Defence publishes a summary of the main targets on its website:

http://recrut.mil.ru/career/conscription/preparation/voluntary.htm.

<sup>&</sup>lt;sup>41</sup> The organization was established in the 1920s and it had important functions in the Soviet military system until the very end of the Soviet Union. In the early 1990s the organization was renamed the Russian Defence Sports-Technical Organization (ROSTO), which undertook responsibility for training the pre-draft-age young men in sports and technical military training. In 2009 the organization regained its original DOSAAF name. In December 2011 it had around 1,000 regional departments and over 300,000 members. Tarviainen, K., (2012) *Venäjän nuorisojärjestöt asevoimien taistelupotentiaalin rakentajina*, Strategian laitos, Esiupseerikurssin tutkielma, 2012, 27; see also *History of DOSAAF*, URL: http://www.dosaaf.ru/home/istoriya, retrieved 26.02.2015.

 $<sup>^{42}</sup>$  Thornton (2011).

<sup>&</sup>lt;sup>43</sup> Tarviainen (2012), 27.

<sup>&</sup>lt;sup>44</sup> Rasporyazhenie Pravitelstvo RF (2010), N 134-p "Kontseptsii federalnoi sistemy podgotovki grazhdan RF k voennoi sluzhbe na period do 2020 goda", 3.2.2010.

the organization owned 16,000 facilities in 1994 and currently manages around 6,500 different types of sports and training centres.<sup>45</sup>

In total. around 200.000 persons should undergo pre-military training yearly, according to the above-mentioned Concept. accepted in 2010.46 This figure is considerably lower than the number of people that were said to have participated in the military-patriotic education events organized by DOSAAF in 2009 (2,450,000 persons).<sup>47</sup> In any case, reaching the target figure (200,000) would effectively mean that almost 50 per cent of conscripts would be pre-trained before entering the armed forces. According to official statistics provided by the Ministry of Defence, in 2014 46.800 persons trained by DOSAAF were drafted and 2,900 underwent professional military training before drafting.<sup>48</sup>

In addition to these courses, DOSSAF provides training for technical specialists, educates pilots and organizes technical education for students in different parts of the country. According to information provided by the organization, in 2010 it trained over 70,000 military specialists in 39 different professions. In an interview in 2010, the head of DOSAAF, Sergei Mayev, stated that 600,000 students went through the organization annually. In the future the organization is planning to provide militarypatriotic education for three million schoolchildren annually.<sup>49</sup>

#### Introduction of civilian service

The introduction of civilian service (AGS-Alternativnava Grazhdanskava Sluzhba) in Russia as an alternative to military service immediately aroused a lot of interest among young people. Some 1,800 young men applied for AGS in 2004, while only 400 actually embarked on it. In the years that followed, the number of places was reduced significantly and in 2014 only 311 young men enrolled for civilian service (Figure 18). The system pertaining to the latter is twofold: local branches of government

<sup>&</sup>lt;sup>45</sup> In the interview. Maev refers to the well-known phenomenon of *reiderstvo* – a violent (and sometimes non-violent) acquisition of property from another party. <sup>46</sup> Rasporyazhenie Pravitelstvo RF (2010).

<sup>&</sup>lt;sup>47</sup> Tarvainen (2012).

<sup>&</sup>lt;sup>48</sup> Ministerstvo oborony Rossiyskoy Federatsii, (2014) Itogi provedeniya osennogo prizyva grazhdan na voyennuyu sluzhbu v 2013 godu i osobennosti komplektovaniya Vooruzhennykh Sil i drugikh voysk v khode vesennego prizyva grazhdan na voyennuyu sluzhbu v 2014 godu, URL:

http://function.mil.ru/recruiting\_campaign/gallery.htm?id=15330@cmsPhotoGallery. accessed 5.1. 2015.

<sup>&</sup>lt;sup>49</sup> Mayev, Sergei, (2010) "Moshenniki ukrali u nas pochti 10 tysyach ob'yektov nedvizhimosti", Komsomol'skava pravda v Voronezhe, 23.08.2010.

and the state employment service report to the Ministry of Defence on the number of places that will be available for conscripts who want to do alternative service. Local commissariats cooperate closely with local civil authorities on issues related to schools (monitoring future conscripts), health (assessing the health condition of young people) and the number of vacant places.



*Figure 18. Civilian service in Russia between 2004 and 2014. Source: Soldiers' Mothers St. Petersburg, Information letter by the Ministry of Defence.* 

An assumption shared by NGOs such as Soldiers' Mothers is that the Ministry of Defence exerts an influence on the general policy at a local level, lobbying for a lower number of positions for civilian service. The overall tendency in Russia is to maintain a low profile for alternative civilian service, coupled with negative information about those who go in for it, as well as cooperation with the civil administration to maintain a very limited number of available places.

#### Contract-employed soldiers

The expected decline in the size of future generations and problems encountered in recruiting well-educated and motivated conscripts, forced the military planners to abandon the system based wholly on conscripts and reservists. The current Russian armed forces are a combination of conscript-based forces and 'professional' troops. The latter are volunteers who may, after their 12-month military service, become contractemployed soldiers (*kontraktniks*) with a salary and better conditions.

However, according to McDermott and others,<sup>50</sup> this system has largely failed to attract volunteers into the armed forces or to increase the

<sup>&</sup>lt;sup>50</sup> Thornton (2011).

predictability required for planning. According to Thornton, Russia does not have enough contract soldiers to serve at certain hotspots in Dagestan and Ingushetia and "operations in Chechnya are conducted only by local troops of the pro-Moscow government in Grozny".<sup>51</sup> Before 2012, the deficit of contract-employed soldiers was due to the fact that the majority of *kontraktniki* did not renew their contracts after three years.<sup>52</sup> Thornton refers to some of the reasons for this situation, such as "the initial promises on pay and housing had not been kept".<sup>53</sup> After 2012, the situation began to change.

In February 2010, it was officially acknowledged that Russia would increase the draft and reduce the contract part.<sup>54</sup> Notwithstanding these difficulties, the original idea of a mixed manning system has been maintained with three components including: conscripts, contract-employed soldiers and non-commissioned officers (NCOs) forming the bulk of the manpower in the armed forces.<sup>55</sup>

The legislation has been reformed in order to facilitate this change and to increase the number of conscripts and contract-employed soldiers in the future. The recent major adjustments to rules on conscription make it possible for foreigners to serve in the Russian army, and obligatory for those Russian citizens who have already served in an army in another country.<sup>56</sup> In addition, amendments have been made to the conditions under which a conscript is allowed to postpone military service (such as undergoing education).<sup>57</sup> There are no reliable sources to assess the importance of the informal practice of forcing the conscripts to sign a

<sup>&</sup>lt;sup>51</sup> Thornton (2011), 31.

<sup>&</sup>lt;sup>52</sup> McDermott (2011), 79–83; Hedenskog, J., Vendil-Pallin, C., (2013). According to information cited by Alexander Golts, in 2009 about one-tenth of all those who signed contracts to serve five years had deserted their units. Golts (2012), 212.

<sup>&</sup>lt;sup>53</sup> Thornton (2011), 32.

<sup>&</sup>lt;sup>54</sup> Thornton (2011), 32.

<sup>&</sup>lt;sup>55</sup> The official target of 425,000 contract servicemen in 2017 has not been formally changed, although most analysts consider this target unattainable due to problems in recruitment. Military Balance 2014, 162.

<sup>&</sup>lt;sup>56</sup> President RF (2013) "Vneseno izmeneniye v zakon o voinskoy obyazannosti i voyennoy sluzhbe", URL http://kremlin.ru/acts/news/18303, retrieved 20.2.2015; President RF (2015a) Ukaz N3 "O vnesenii izmeneniy v Polozheniye o poryadke prokhozhdeniya voyennoy sluzhby", URL: http://kremlin.ru/acts/bank/39338, retrieved 20.2. 2015.

<sup>&</sup>lt;sup>57</sup> For example, students in church schools and children without parents who attend preparatory pre-university training are exempted from the draft. See: Federal'nyi zakon (1998) N 53-FZ "O voinskoy obyazannosti i voennoy sluzhbe", 28.3.1998, URL: http://base.garant.ru/178405/#ixzz3RbjKuFzd, retrieved 20.1.2015.

contract-employed agreement. Yet multiple reports indicate that this method is regularly used in recruitment.<sup>58</sup>

#### Reservists

Russia is implementing a major reform of its military reserve service. According to Russian legislation, a reservist is a member of the military personnel who was trained for military service, resigned from the service and can be mobilized if needed. The period of being in reserve (*zapas*) is defined according to specific categories, including an additional system of "human reserve". It includes persons who can make a fixed-term contract (for three years at first, and then for 3.5 or fewer years<sup>59</sup>) and who will be obliged to participate in a required training programme until such time as their contract expires or they reach the maximum age for being in reserve (maximum age for reserve category 2).<sup>60</sup>

Article 51 in the new law on reserves describes a military reserve that consists of mobilizational human reserves and mobilizational human resources.<sup>61</sup> Mobilizational human reserves<sup>62</sup> (мобилизационный людской резерв) comprise all citizens who are in the reserve and who possess a valid contract for the mobilizational human reserve (мобилизационный людской). Mobilizational human resources are all citizens who are in the reserve, but who are not included in the mobilizational reserve. Mobilizational human reserves are formed by a presidential decree after a request from a representative of the executive power and formed on territorial principles.

The main aim of the reform and the introduction of a category of reservists on contract is to create and maintain a reserve with high preparedness which can be mobilized at short notice and won't require additional combat training. These reserves can be deployed while the rest of the reservists are being called up and trained. Russian MoD failed to

<sup>&</sup>lt;sup>58</sup> During the war in Ukraine, multiple media reports have appeared describing cases where conscripts have been forced to sign a contract with the armed forces and have then been sent to the 'Ukrainian-Russian border'.

<sup>&</sup>lt;sup>59</sup> Federal'nyi zakon (1998).

<sup>&</sup>lt;sup>60</sup> Federal'nyy zakon (2012) N 288-FZ "O vnesenii izmeneniy v otdel'nyye zakonodatel'nyye akty Rossiyskoy Federatsii po voprosam sozdaniya mobilizatsionnogo lyudskogo rezerva", 30.12.2012, URL: http://www.rg.ru/2013/01/11/reserv-dok.html; see also "Rezerv ushel v zapas", *Nezavisimaya Gazeta*, 21.10.2014, URL: http://www.rg.ru/2014/10/21/rezerv.html, retrieved 26.02.2015.

<sup>&</sup>lt;sup>61</sup> Federal'nyy zakon (2012).

<sup>&</sup>lt;sup>62</sup> Rezerv ushel v zapas (2014). The lack of needed resources was a reason why generals had to postpone an experiment with personnel in the Armed Forces before full introduction of mobilization reserve.

implement its plans of recruiting 8600 reservists on contracts by 2015. In 2015 by presidential decree MoD re-launched the process of building a reserve army and it was planned that it would start with an experiment of recruiting 5,000 reservists on contracts.



Figure 19. Distribution of answers to the question did you serve a compulsory military service? Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE.

A recent Russia Longitudinal Monitoring Survey (Data Round 22, 2013) provides some basis for estimation of the general situation. According to the research results, over 80 percent of the men aged 45–49 and 50–54 have served in the military (Figure 19.) From the last cohort (men aged 40–44) that served in the Soviet army 71 percent reported that they went through the compulsory service. This makes striking differences with the training of youth and adults under 40 years old. From the men aged 30-34 only 43 percent reported they have compulsory military training in 1997-2001. As many as 35 percent of young men aged 25–39 took part a compulsory service (they served for 2 or 1.5 years between 2003 and 2007). Some 34 percent of young men aged 20–24 who have already served their term of one year in army.<sup>63</sup> The results of the study are inline with earlier estimations concerning the decreasing level of those going through the military service.

<sup>&</sup>lt;sup>63</sup> Rossiyskiy monitoring ekonomicheskogo polozheniya i zdorov'ya naseleniya NIU-VSHE (2014).

### 3.4. Policies aimed to improve image of the army and effectiveness of military training

Recent studies show that to achieve a positive change in young people's attitude towards the army requires substantive changes. An attitude survey conducted on soldiers and officers in 2010–2011 demonstrated that in 83 out of 100 cases servicemen are not satisfied with their army service. The feeling of dissatisfaction was connected to the following factors: first, their evaluation of the materiel provision in the respective military unit, second, violations of their rights by the leadership of the unit, and third, their stress levels while on duty.<sup>64</sup> Such factors as housing, number of children, income per person in a family, duration of service, age, and type of military unit do not have an impact on servicemen's evaluation of the situation.

The annual report of the Soldier's Mothers organization identifies similar list of problems affecting Russian army servicemen, including: high mortality in military conflicts, torture and cruelty, persecution of servicemen seeking to protect their rights (threats, psychological and physical pressure and violence), failure to provide timely and adequate qualified medical assistance, and finally, high levels of corruption.<sup>65</sup> To address at least some of the above mentioned problems, the military planners formulated a set of policies that were aimed at a) making military service more attractive to young Russian men, and b) improving the effectiveness of military training.

The first step to this direction was the decision to increase salaries of military personnel. The underlying assumption was that it would have a rapid and positive impact on attitudes towards the armed forces, as well as on the military personnel's attitudes towards the state. Research conducted among army personnel between 2007 and 2010 shows that servicemen's salaries have gradually increased. During this period of time, their overall income increased from 8,000 to 10,000 roubles per family member per month. At the same time, the gap between military salaries and the average salary in Russia was widening. The difference in 2007 amounted to -4,553 roubles, and -7,747 roubles in 2011.<sup>66</sup> Irregular

<sup>&</sup>lt;sup>64</sup> Surkova, I., Y., (2012) Udovletvorennosť voinskoi sluzhboi v rossiiskoi armii: faktory i prognozy. Socis, N 3.

<sup>&</sup>lt;sup>65</sup> Soldatskie Materi Sankt Peterburga. Ezhegodnyi Doklad (2014). Sankt peterburg: Soldatskie Materi Sankt Peterburga.

<sup>&</sup>lt;sup>66</sup> Surkova, I., Y., (2012) Udovletvorennost' voinskoi sluzhboi v rossiiskoi armii: faktory i prognozy, *Socis*, N 3. Survey of army personnel in 2007–2010 in 4 military districts:

payment and low salaries in comparison with the civilian sector are mentioned among the problems in this sphere.<sup>67</sup> After 2012, salaries in the armed forces were more than tripled. What should be taken into account in this context is that military personnel incomes depend on the specifics of the region where they serve. Thus, in some regions army servicemen can earn significantly more compared to the civilian population in the same area, and vice versa. The above-mentioned research comes to the conclusion that without a long-term complex support programme for the armed forces, the effect on increased salaries will be short-lived.<sup>68</sup>

This same message emerged from those planning the army reform, who argued that qualitative changes must be implemented throughout the organization. The main problems targeted in this context include the so-called hazing (*dedovshcina*) practice of humiliating initiation rituals that is deeply ingrained in the system and has proved difficult to get rid of.<sup>69</sup> The main policy tools for dealing with the problems include a reduction in the conscript service period, changes introduced to the way in which basic services are organized at military garrisons, and in relation to the quality of trainers, as well as attempts to deal with corruption in the armed forces.

In the opinion of experts at the NGO Soldiers' Mothers of Saint Petersburg, the extent of the corruption at all levels of the army exerts the greatest adverse effect on the support for conscription. Research published in November 2006 argued that "the absence of professionally trained noncommissioned and junior officers, who are most responsible for the educational development, morale, and ethnic assimilation of servicemen, also contributed to deteriorating professionalism in the units".<sup>70</sup> The reform of the contract-employed soldier system that was started in 2008 was aimed at improving this situation. Furthermore, the outsourcing of basic services provided at military garrisons went some way towards resolving the situation. On January 1, 2012, the catering,

<sup>68</sup> Surkova (2012).

<sup>70</sup> Isakova (2006).

Central – 323 persons, Southern – 66 persons, Western – 160 persons, Eastern – 65 persons.

<sup>&</sup>lt;sup>67</sup> Rod Thornton highlights a case reported by *Komsomolskaya Pravda* on May 12, 2006 http://www.kp.ru/daily/23704.4/52923/ whereby low pay was among the reasons why over 2,000 volunteers quit the 76th Pskov Airborne Division in 2005. See Thornton (2011).

<sup>&</sup>lt;sup>69</sup> According to statistics cited by McDermott, during January-May 2010, 1,167 conscripts were subjected to hazing, which is a 50 per cent increase on the same period in 2009, McDermott (2011).

cleaning, electricity, central heating and maintenance of housing and training facilities were transferred to independent commercial companies, many of which were subsidiaries of the state-led company, Oboronservis. The idea was that by relieving the units of non-core functions, such as cleaning and catering, the effectiveness of conscript training (the duration of which was reduced to twelve months) could be enhanced. Other changes were also introduced in the hope of attracting much-needed specialists capable of conducting modern, high-technology combat operations.<sup>71</sup>

Those who choose to reject this part of the reform have emphasized that the outsourcing model was, in itself, detrimental to the military capability and only facilitated the embezzlement of state funds. In his first interview, Minister Shoigu referred to information according to which 35–37 per cent of the 120,000 personnel working in cleaning and catering are "not citizens of Russia", thus implying that the outsourcing contributed to the influx of low-paid immigrant workers. According to the minister, the preference in the future would be to transfer jobs to "those living in the military towns".<sup>72</sup> Reportedly, the responsibility for cleaning the barracks has been transferred back to the soldiers, but in other respects, the changes aimed at 'humanizing' army life will be maintained.<sup>73</sup> All in all, the restructuring of the Oboronservis company will result in changes to the commercial sector will continue.<sup>74</sup>

The housing problem is not an immediate concern for would-beconscripts of the future. Yet the persistent problems with housing for military personnel are doing nothing to increase the attractiveness of the army either. Due to often contradictory or simply unavailable figures, it is difficult to grasp the dimensions of the housing problem with any degree of accuracy. Officers discharged from service may have queued for a

<sup>&</sup>lt;sup>71</sup> Nikolsky, A., (2012) Oboronservis – what awaits Serdyukov's legacy, *Moscow Defence Brief* 6, 2012.

<sup>&</sup>lt;sup>72</sup> One of the main reasons for the low income per person among servicemen is that their family members often have very limited opportunities for employment. The wives of servicemen who live in the military bases and towns have difficulty finding jobs that correspond to their professional training. In addition, in most cases the military bases and towns have only limited or non-existent daycare possibilities for children under school age. See: Surkova (2012).

<sup>&</sup>lt;sup>73</sup> Reforme armii nuzhen zdravyi smysl (2013), *Komsomolskaya Pravda*, 10.2.2013, http://www.kp.ru/print/26030/2947853, retrieved 13.02.2013.

<sup>&</sup>lt;sup>74</sup> Pynnöniemi, K., (2013) "Russia's Defence Reform: Assessing the real 'Serdyukov heritage", *FIIA Briefing Paper* 126, March 2013, URL:

http://www.fiia.fi/en/publication/330/russia\_s\_defence\_reform/, retrieved 10.02.2014.

decade for housing which, according to the law, the state must provide for them within three months. In November 2007, President Putin ordered the then new minister of defence to solve the matter by 2012. Over 330 billion roubles (9 billion euros) were allocated for this task in 2008, and the plan was to build over 300,000 new apartments for the ministry within the three-year time frame, in addition to the already existing pool of 226,000 apartments. According to one estimate, over 130,000 apartments were built between 2008 and 2012.<sup>75</sup>

Nevertheless, in early 2012 almost 80,000 officers were still in the queue for housing. By the end of the year, this number had dropped to 33,000, only to climb again by 24,000 due to people needing an apartment in 2013. In his first interview, Minister Shoigu argued that instead of managing the construction process itself, the ministry should provide those in the queue with a monetary transfer that would allow them to buy an apartment on the property market. A decision has already been made to allow lump-sum payments for officers, which came into effect on January 1, 2014.<sup>76</sup>

Finally, corruption in the armed forces takes many forms, from petty crime to systemic seizure of resources from the military budget.<sup>77</sup> From the viewpoint of this research, corruption inherent in the conscription system itself is of particular interest. Several reports indicate that conscripts coming from rich families are able to buy themselves exemption from military service.<sup>78</sup> On the other hand, earlier reports monitoring the situation show regular attempts by the authorities to overlook the rights of conscripts (e.g. their right to a proper medical examination and diagnosis), although in a number of cases interventions by NGOs have led to positive results.<sup>79</sup>

<sup>&</sup>lt;sup>75</sup> Pynnöniemi (2013).

<sup>&</sup>lt;sup>76</sup> Solovev, V., (2008) Voennaya reforma 2009-2012 godov. *Nezavisimaya Gazeta*, 12.12.2008; Kozichev, E., (2012) Chem zapomnilsya Anatoly Serdyukov na postu ministra oborony, *Kommersant*, 7.11.2012, URL:

http://kommersant.ru/doc/2061562/print, Reforme armii nuzhen zdravyi smysl, *Komsomolskaya Pravda* 10.2.2013.

<sup>&</sup>lt;sup>77</sup> See McDermott (2011), 341.

<sup>&</sup>lt;sup>78</sup> According to information cited by McDermott, the lowest figure in Moscow is around 4,000 USD. There are intermediary services, online and offline, that help those who aspire to avoid conscription to acquire, for example, false medical papers that declare them unfit for service. McDermott (2011), 107.

<sup>&</sup>lt;sup>79</sup> Grazhdanin i Armiya. Monitoring prizyva svodnyy i regional'nyy doklady, URL: http://www.army-

hr.ru/library/category/monitoring\_prizyva\_svodnyy\_i\_regionalnyy\_doklady, retrieved 13.02.2013.

The NGO Soldiers' Mothers of Saint Petersburg registers the most typical cases of corruption in the army. Among them are buying oneself exemption from performing duties or extra work (soldiers are forced to pay money to junior officers if they want to reduce their workload), and regular payments to officers. Military units with low or no corruption are more the exception than the rule. In fact, a report monitoring the situation in 2010 concluded that "due to the difficult demographic situation, the ability of the authorities to fulfil the target set for conscription was possible *only* because of the numerous violations of the rights of the medical centres are rewarded for meeting the recruitment targets annually and struggle to fulfil their quotas. This feeds into practices of abduction of young men and their forced transportation to military units, even those who are actually unfit to enter the service.<sup>81</sup>

# 3.5 Patriotic education as an ideological resource for mobilization

Preparing young people for military service falls within the remit of youth policy in Russia and is formulated in accordance with patriotic upbringing programmes. These programmes extend to almost every school pupil, with each region having a programme funded from both local and federal budgets. For instance, in the Leningrad region tens of thousands of pupils participate in various programmes related to the army (visiting battle sites and war memorials, and participating in military games or training in the use of firearms), while only a few hundred participate in programmes related to citizenship education (participation in local decision-making, learning about the rights of young people). Presumably, patriotic upbringing programmes compensate for some ideological gaps in education and the forming of citizen identities in Russia. The key concepts in this citizenship education are the Motherland, dedication and sacrifice.

The three consecutive federal programmes for patriotic education, the first of which was launched in 2001, are aimed at facilitating the commitment of the younger generations towards the Russian State, and in particular at promoting a positive view of the armed forces among young people. The directions for the programmes are provided in the Concept of patriotic education, approved by the Russian government in 2003. The

<sup>&</sup>lt;sup>80</sup> Grazhdanin i Armiya (2010), *Monitoring prizyva za 2010*, URL: http://www.armyhr.ru/article/6524.html; See also McDermott (2011), 107-108.

<sup>&</sup>lt;sup>81</sup> Thornton (2011), 36.

key component of the patriotic education programme is the militarypatriotic upbringing of citizens in accordance with the federal law on military duty and military service.<sup>82</sup> However, the education is not oriented exclusively towards military affairs but can also be interpreted as an attempt to lay the foundation for national consolidation. A certain shift in the attitudes of young people towards the military can be observed. In the 1990s, and especially during the wars in Chechnya, the Russian army was highly unpopular among young people. More recently, however, the army has been cited among the most trusted institutions in Russia.<sup>83</sup>

Patriotic education includes traditional classroom materials (from schoolbooks to literature) and focus-group events, as well as computer games, films and media outlets. The Concept for pre-military training instructs the responsible authorities to develop new films on militarypatriotic themes, to prepare "touristic routes" to historic sites of Russian military glory, and to create TV programmes that promote the image of the heroic defender of the Fatherland. The development of modern methods of patriotic education, including computer games and other popular media, was supported in the discussion among representatives of the youth organizations.<sup>84</sup> To this end, the Ministry of Defence was granted licences to open the "Military Patriotic TV Channel - Zvezda" nationwide, but it has lost these licences for failing to raise the financing to produce actual programmes.<sup>85</sup> As a result of the war in Ukraine, the Russian authorities have intensified the production of patriotic education material and have become more sensitive towards foreign-made films, music and other forms of popular entertainment.

Analysis of the results of nationwide opinion polls suggests that for the Russian people patriotism today is less about the state and more about "Mother Russia". The people associate Russia with the "Russian World" – a cultural community that extends beyond the administrative borders of the Russian state. At the same time, an important aspect of patriotism in Russia is its association with the notion of a "great power" (*derzhava*).<sup>86</sup> Certain segments of the population associate the idea of great power with stability and welfare. For others, it is a reflection of nostalgia for Soviet

<sup>&</sup>lt;sup>82</sup> Postanovlenie Pravitel'stvo RF (2001).

<sup>&</sup>lt;sup>83</sup> Levada-Tsentr (2015b), 234.

<sup>&</sup>lt;sup>84</sup> Drapov, D., (2010) Komu zashchishchat' Rodinu? Ili Kak vernut' modu sluzhit',

Voyennyy vestnik Yuga Rossii (Rostov-na-Donu) N45, 13.11.2010.

<sup>&</sup>lt;sup>85</sup> Varshavchik S., Kramar, V., (2004) TV stanet bole voennym i menee sportivnym. *Nezavisimaya gazeta*, 26.3.2004.

<sup>&</sup>lt;sup>86</sup> Svynarenko, A., (2001) "Growing to be a Citizen", in Melin, Harri (ed.), *Civic Society in N-W Russia*, Helsinki: Kikimora Publications.

power in the international arena. Yet some respondents also associate this idea with "militarist power".

As the analysis of the results of a study conducted by the All-Russian Public Opinion Research Centre (WCIOM) demonstrates, the number of Russians who definitely consider themselves "patriots" was at the level of 41 per cent in 2004 and has significantly increased to the level of 80% in 2014.<sup>87</sup> At the same time, 10 per cent of respondents declared that they do not consider themselves patriots. For the majority of Russians, patriotism and a patriotic education are about one's "love of the Motherland", "good upbringing and education" and less about ideology, the army, or values previously promoted by Soviet propaganda (e.g. collectivism, altruism). Furthermore, a secondary analysis of the data presented in the reports by the FOM Research Centre and WCIOM shows that patriotism in modern Russia is also a means of being proud of one's own country in the globalized world of free citizens.

Like any other nationalist sentiment, the notion of patriotism is utilized by political organizations for the mobilization of diverse groups of people, across classes, who have few other reasons for consolidation that would have political meaning. It is not likely that this kind of nationalist mobilization of political activity will be drastically different from the nationalist movements of 1990 in other parts of the former USSR. The factors that have contributed to the increase in popularity of patriotic sentiments in the Russian public and politics include at least the following: (a) the military conflicts in the Chechen republic; (b) intensive internal migration, firstly from the South, and secondly from poorer regions to richer ones; (c) immigration from the countries of the CIS; (d) little trust in the state and civil society organizations; (e) the demographic crisis and fear of the depopulation of Russia.

Although the patriotic education policy has been ongoing for several years, the political importance of this issue and the resources directed at the programmes are tied to the general situation in Russia. It can be argued that the longevity of the current conflict with Ukraine and the subsequent developments in Russian domestic politics will determine the political content of this tool in the future. However, the aggressive manipulation of public sentiments during the Ukraine conflict leaves little room for doubt about the ability of the Russian authorities to influence

<sup>&</sup>lt;sup>87</sup> WCIOM (2014) *Patriotizm i grazhdanstvo*. Press-vypusk No. 2541, 19.03.2014; URL: http://wciom.ru/index.php?id=236&uid=114751, retrieved 10.1.2015.

mass public opinion, both within and outside of the country.<sup>88</sup> On the basis of this, it can be argued that in all likelihood the resources allocated to improving the patriotic education programmes will increase. As a result, patriotism may gain in importance as a factor in the recruitment of the young male population into the armed forces. However, it will not be enough if the problems at the systemic level are not solved at least to some extent. The way in which these systemic problems influence recruitment will be discussed in the next section.

# 4 The main factors affecting the quality of conscripts

# 4.1 The quality of life and societal change in Russia: general situation

Before discussing official statistics and previous research into the health of conscripts in detail, it is useful to briefly describe how the situation is defined in the official policy documents that target problems related to the conscript-age population. The concept of pre-draft training approved by the Russian government in February 2010 (see section 3.3) contains an overview of the current situation and outlines some steps to be taken to improve it. The key idea behind the document is expressed very clearly. Without a major change in young people's "way of life", most importantly in terms of their physical and mental health, the needs of the armed forces cannot be met.<sup>89</sup>

According to information cited in the document pertaining to around 13 million schoolchildren, only 21.4 per cent are "absolutely healthy", while 21 per cent have some chronic disease. Another set of data suggests that out of the 400,000 young men currently leaving high school every year, a third are deemed to be unfit for military service.<sup>90</sup> In the course of the last five years (2005–2010) the average sickness rate of the population under 14 years old increased by 9.3 per cent, and by 11.6 per cent in the 15–17 age group. It is also reported that in the same time period, the

<sup>&</sup>lt;sup>88</sup> Pomerantsev, P., (2014) Russia and the Menace of Unreality: How Vladimir Putin is revolutionizing information warfare. *The Atlantic*, URL:

http://www.theatlantic.com/international/archive/2014/09/russia-putin-revolutionizing-information-warfare/379880/, retrieved 12.1.2015.

<sup>&</sup>lt;sup>89</sup> The document is rather vague in its estimation but refers to a situation whereby the armed forces are able to draft only 50 to 60 per cent of the recruitment-age population. Rasporyazhenie Pravitelstvo RF (2010), Article 2.

<sup>&</sup>lt;sup>90</sup> Thornton (2011), 96.

proportion of young people (aged 15–17) that have a serious alcohol problem increased to 28 per cent, and young people with a drug problem to 22 per cent.  $^{91}$ 

The development programme outlined in the Concept was briefly discussed in the previous section. It is targeted at creating conditions for positive change in the physical and ideological upbringing of young people. The main tasks include the following: promotion of physical exercise in schools and as a part of a healthy lifestyle, the modernization of sport facilities at municipal, regional and federal level, and the creation of a system (databank) for monitoring the health of children and young people (from 10 years onwards). The authorities are also instructed to reorganize the facilities and curriculum for the patriotic education programmes.<sup>92</sup>

Interestingly, the concept of the development of pre-recruitment training does not stipulate any significant systemic-level actions related to criminality, drug use, or chronic diseases among young people. In fact, the Concept does not even refer to criminality and drug-related problems among conscripts, although it does note the increasing number of young people (aged 15–17) with such problems. The following three sections will provide more detailed analysis of these and other related problems.

# 4.2 The health of conscripts upon entering service and thereafter

From the viewpoint of the armed forces, the downward trend in the health of young people means that a larger proportion of the men in a particular cohort are unfit for military service. In June 2010, the Prosecutor-General, Yuri Chayka, observed that during the past twenty years, the number of conscripts who were fit for service had declined to around one third.<sup>93</sup> The decrease in the number of young people who were unfit for military service from 35% in 2011 to 27% in 2014 was achieved not through any actual improvement in their health, but through legislative means (shortening the list of medical conditions with which a young person can be regarded as unfit).

<sup>&</sup>lt;sup>91</sup> Rasporyazhenie Pravitelstvo RF (2010), Article 2.

<sup>92</sup> Ibid.

<sup>&</sup>lt;sup>93</sup> Cited in McDermott (2011), 97.

Russian military planners such as Colonel of Medical Service Viktor Krasnikov, the Acting Head of the Central Military Medical Commission, have stated in public that there is clear evidence of the declining health of the conscript pool. In the autumn 2008 recruitment round, less than 40 per cent of the conscripts were completely fit for military service. Of those that were deemed unfit for service, 19.3 per cent had musculoskeletal disorders, 15.7 per cent had mental disorders, and 11.1 per cent had eating disorders. Around 45,000 young people have their service deferred due to eating disorders, while 25,000 of those who are called up are underweight and receive nutritional supplements during the first three months of military service.

As suggested in the Concept discussed in the previous section, the prediction is that in the future, up to 50 to 60 per cent of the conscript pool will be deemed fit for military service. However, at the moment, around 70 per cent of those drafted are deemed fit. For example, in 2014 the Ministry of Defence reported that, by and large, some 73% of conscripts were deemed fit for military service, and just under 30% were regarded as unfit.<sup>95</sup>

Since the 1990s there has been a tendency towards an increasing life expectancy in Russia and a deterioration in the health of all categories of the population.<sup>96</sup> Reforms of public medical services resulted in rapid decrease of number and availability of policlinics and hospitals after 2010 (Figure 20). The rise in the cases of almost all diseases can be attributed to two factors: Firstly, the weakening of the health of the Russian population caused by a deterioration in social and environmental factors, and the lack of policies and information campaigns supporting healthy lifestyles (as mentioned in previous sections, youth programmes focus predominantly on patriotic upbringing, not healthy lifestyles). Secondly, the improved registration of health conditions, especially for young

<sup>&</sup>lt;sup>94</sup> Cited in McDermott (2011), 121. The Concept cites information from the 2009 draft according to which 20.7% of conscripts deemed unfit for the armed forces had musculoskeletal disorders, 13.5% had mental illness, 10.8% eating disorders, and 8.9% problems with their nervous system. The proportion of conscripts declared completely fit for service was 51% in 2009, and those with some minor complications 49 per cent. Rasporyazhenie Pravitelstvo RF (2010).

<sup>&</sup>lt;sup>95</sup> Minoborony RF otmechayet uvelichenie chisla godnyh k sluzhbe prizyvnikov vesnoy etogo goda (2014), *ITAR-TASS*, 17.7.2014, URL: http://itar-tass.com/politika/1324391 retrieved 10.01.2015; for a discussion on this topic, see McDermott (2011), 120.

<sup>&</sup>lt;sup>96</sup> Sabgayda, T., Okunev, O., (2012) Izmeneniye zabolevayemosti rossiyskikh detey, podrostkov i vzroslogo naseleniya boleznyami osnovnykh klassov v postsovetskiy period, *Elektronnyi Zhurnal Sotsialnye Aspekty Zodorovya Naseleniya*, Vol. 23, No. 1, URL: http://vestnik.mednet.ru/content/view/383/30/lang,ru/, retrieved 10.01.2015.

people and children. Between 1990 and 2010 welfare improvements made medicine more accessible to both the middle and lower classes, with people increasingly turning to professional medical practitioners to receive treatment or to prescription medicine instead of relying on more traditional self-treatment (even despite of recent shortages reduction in numbers of hospitals and policlinics).



Figure 20. Change in number of hospitals and polyclinics in Russia between 2000 and 2013 and number of medical personnel (medical personnel in thousands). Source: Ministerstvo zdravookhraneniya Rossiyskoy Federatsii (2014).



Figure 21. Incidence of respiratory diseases in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki



Figure 22. Incidence of digestive organ diseases in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki



Figure 23. Incidence of diseases of the osteomuscular system and connective tissue in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki.



Figure 25. Incidence of mental disorders in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki.



Figure 24. Incidence of diseases of the circulatory system in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki.



Figure 26. Poisonings and trauma in Russia between 1993 and 2010 (per 100,000 of population in each age group) Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Deteriorating environmental conditions (air, water and food quality) have had the most destructive effect on the health of children and young people, causing an increasing number of diseases of the respiratory and digestive organs between the years 1996 and 2010 (Figures 21 and 22).<sup>97</sup> Youth health reports and youth policy papers highlight the problems caused by reduced physical activity among young people (often as a result of ICT developments and accessibility to the internet and computers), the lack or inaccessibility of a sports infrastructure, and overloading pupils with schoolwork. Between the years 1996 and 2010 there was a significant increase in cases relating to diseases of the osteomuscular and

<sup>&</sup>lt;sup>97</sup> Kaganov S., (1996) Problema ekologicheski obuslovlennykh bolezney legkikh u detei, *Rossiyskiy vestnik perinatologii i pediatrii*, Vol 4, 9-13; Quoted in Sabgayda, T., Okunev, O., (2012).

circulatory systems, especially among young people (Figures 23 and 24). The increase in the incidence of mental disorders was particularly sharp between 1997 and 2000 (Figure 25).<sup>98</sup> Steep growth on the number of poisonings and traumas among teenagers is a direct indicator of problems with alcohol abuse (Figure 26).



Figure 27. Life expectancy at birth (years) for Russian men and women between 1990 and 2013 by type of residence. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

One of the most significant factors contributing to the poor health condition of today's young people is excessive consumption of alcohol starting from an early age. The cultural context of Russian society is such that young people quickly learn to drink alcohol and soon move on to hard liquor. Alcohol abuse is the most typical cause of domestic violence, armed fights and unexpected deaths among young people, especially young men. Recent studies underline the significance of excessive alcohol consumption as an explanatory factor in the unusually high mortality rate among young men in Russia (Figure 28). Drinking has been identified as one of the worst and most significant causes of murder and suicide in the country, even though other social and economic factors are under control,

Comparing life in the city and small communities in Siberia, *Social Science & Medicine*, September 2007, vol. 65, no. 6, pp. 1180 - 1191; Arefeev, A. L., (2003) A Generation That Russia Is Losing, *Russian Education and Society*, vol. 45, no. 11, November 2003, pp. 23 - 41; Miller, L., Chan, W., Litvinova, A., Rubin, A., Tirella, L., and Cermak, S., (2007) Medical diagnoses and growth of children residing in Russian orphanages, *Acta Paediatrica*, December 2007, vol. 96, no. 12, pp. 1765 - 1769; Zashikhina, A., & Hagglof, B., (2007) Mental health in adolescents with chronic physical illness versus controls in Northern Russia, *Acta Paediatrica*, June 2007, vol. 96, no. 6, pp. 890 - 896.

<sup>&</sup>lt;sup>98</sup> Glendinning, A., West, P., (2007) Young people's mental health in context:

and the general trend for alcohol-related deaths is in decline.<sup>99</sup> Official statistics show that in 2012 there was a total of 22 million men aged 20–40 years old. Out of that figure, 700 thousand men were in detention, 2.1 million were registered alcohol abusers, and 500 thousand were drug users. The real number of drug users in Russia is closer to 2.5 million, a figure comprised mainly of men under 40 years old. The fact that some 10 per cent of men aged 20–40 are registered alcohol abusers suggests that the problem is highly significant and has a huge impact on the quality of conscripts and the reserve.



*Figure 28. Alcoholism and narcotic dependency among 15- to 17-yearolds. Source: TransMoNEE database.* 

The Russian authorities have implemented several campaigns to address these problems, especially among the young male population. For example, the Federal Drug Control Service of the Russian Federation (FDCS) has a special programme for young people called *Healthy Youth* – *Russia's Richness*. Together with the Federal Youth Agency and other youth organizations (including Rossiya Molodaya), the FDCS runs several educational projects on drug abuse prevention aimed at informing young people about their legal responsibility and the health consequences of drug abuse.<sup>100</sup> Twice a year (at the end of spring and in autumn), the FDCS organizes an anti-drug campaign called *Prizyvnik* (Conscript), which is targeted at young men of conscription age in particular. The campaign aims "to implement a complex of measures directed at patriotic upbringing, promotion of a healthy lifestyle and prevention of drug addiction among conscripts". The campaign also aims to prevent and

<sup>&</sup>lt;sup>99</sup> Molodozh' v Rossii. Obzor literatury, (2010) Moskva: OON.

<sup>&</sup>lt;sup>100</sup> FSKN, (2015) "Zdorovaya molodezh' - bogatstvo Rossii", URL:

http://fskn.gov.ru/pages/main/prevent/3941/13641/index.shtml\_retrieved 20.01.2015.

reduce drug use in the armed forces.<sup>101</sup> The existence of this programme may indirectly indicate a growing problem of drug addiction among soldiers, as conscripts are drafted from a society where an estimated 8.5 million drug addicts reside.<sup>102</sup>

Only 6% of young men describe own health as perfect (Figure 29). Every third young man describes own health as average, not good not bad.<sup>103</sup> This indicates that they recognize that they have some problems with own health and own health condition cannot be regarded as good. Most often these diseases sufficient for qualifying a young man unfit for military service.



Figure 29. How would you evaluate youth health? Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE.

The older respondent is the more negatively he evaluates his health, only 36% of 45–79 year olds - the oldest category of army reserves (in the rank of soldier).

It is important to mention that those men who served in army have better evaluation of their health and this tendency persists also in older cohorts until the age of 44 despite of overall deterioration of health with age (Figure 30).

<sup>&</sup>lt;sup>101</sup> FSKN, (2014a) "Antinarkoticheskiye aktsii i proyekty. V period osennego prizyva", URL: http://fskn.gov.ru/includes/periodics/akcii/2014/1027/133032988/detail.shtml\_retrieved 20.01.2015.

<sup>&</sup>lt;sup>102</sup> FSKN (2014b) "Informatsionno-analiticheskaya spravka o narkosituatsii v Rossiyskoy Federatsii i rezul'tatakh bor'by s nezakonnym oborotom narkotikov za 9 mesyatsev 2014 goda",

http://www.fskn.gov.ru/pages/main/prevent/3939/4052/index.shtml, retrieved 20.01.2015

<sup>&</sup>lt;sup>103</sup> Rossiyskiy monitoring ekonomicheskogo polozheniya i zdorov'ya naseleniya NIU-VSHE (2014).



Figure 30. How would you evaluate youth health? Comparisons of those respondents who served in army and those who didn't. Source: Russia Longitudinal Monitoring survey, RLMS-HSE.



*Figure 31. Main diseases across cohorts of Russian men. Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE.* 

The Russia Longitudinal Monitoring Survey confirms that the most common diseases among younger cohorts and older categories of reservists are diseases of digestion system, spinal cord (Figure 31).

It is rather noteworthy that those who served in army have slightly better health (Figure 32). This means that health or reservists is slightly better comparing to the whole male population in respective cohorts.



Figure 32. Main diseases across the cohorts of Russian men comparing those who serve and who didn't serve in army. Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE.

To conclude this section, a list of factors identified in the abovementioned concept, suggest how the general pattern of decline in young people's health and well-being affects the efficiency of the military training, and subsequently, capability of the armed forces. First, the level of combat readiness in units and subdivisions is decreasing because a significant proportion of conscripts cannot handle the rapid increase in physical loads during the first months of service. Second, difficulties have been encountered in manning units and subdivisions which place higher demands on servicemen (Airborne Forces, the Navy, internal troops of the Ministry of Internal Affairs of the Russian Federation, and other special units). Third, the adaptation of conscripts to military service causes moral and psychological trauma and stress. Fourth, during the first months of military service, conscripts have a high rate of disease and injuries.<sup>104</sup>

#### 4.3 Criminality and drug abuse among young people

From the viewpoint of the armed forces, the demography problem is aggravated by a high level of mortality among the young male population. According to research published in 2010, mortality among the young

<sup>&</sup>lt;sup>104</sup> Razporyazhenie Pravitelstvo RF, (2010), Article 2. The last point is linked to the organization of conscription on an "extra-territorial basis", meaning that the conscripts are sent to any part of the country. In studies conducted by military doctors, it has been observed that those conscripts who serve in a climatic zone different from the one where they have lived previously are more vulnerable to disease in the first 28 days of their service. This is especially the case with men sent from southern Russia to serve in the North.

male population of active age is 5 times higher compared with the mortality of women.<sup>105</sup> Moreover, on the basis of official statistics on the registered number of alcohol abusers and drug users, it can be estimated that in the age cohort of 20- to 40-year-old men, about 5.3 million drop out of active life annually.

Alcohol and substance abuse are among the main reasons for youth delinquency. Some 10 per cent of conscripts have a criminal record, which has a significant impact on the situation in the army units. Russia has abolished the Soviet system whereby conscripts with a criminal record were enrolled in special military units, the so-called *stroybat*, instead of receiving training in the use of weapons. Nowadays, they spend most of their time in the role of builders. At present, there is discussion about renewing such special units for young men with criminal records, or who are prone to violence.

Published statistics on criminality in the army are rare. In various interviews with representatives from the military prosecutor's office, it was reported that 30% of crimes in the army are committed by officers, 30% by conscripts, and the rest by contract soldiers and civil specialists. In an interview in 2012, chief military prosecutor Sergei Fridrinskiy mentioned that "the crime situation among conscripts depends on the contingent of young men who enter the army".<sup>106</sup> Ethnic conflicts often lead to crime. For example, there are cases where conscripts from the Caucasus region (Ingushentia) humiliated conscripts of Slavic origin. The situation was partially resolved by creating mono-ethnic military units, which were first established in 2010. Military police were then enlisted in 2011 to improve discipline in the army,<sup>107</sup> and the first 2,500 strong brigade of military police was formed in 2012. Two years later in 2014, President Putin passed a law to regulate the work of the military police within the army.<sup>108</sup> Recent estimates put the total number of servicemen

<sup>&</sup>lt;sup>105</sup> Rassadin,V., (2010) Pervoosnova oboronnoy dostatochnosti: vozmozhnyye i real'nyye parametry, *Natsional'nye interesy, prioritety i bezopasnost*, No. 2.

<sup>&</sup>lt;sup>106</sup> Sladkov, A., (2012) Korruptsiya i drugiye prestupleniya v Vooruzhennyh Silah Rossiskoy Federatsii [Television series episode]. In Vergasov, G. (Executive Producer) Voyennaya programma Aleksandra Sladkova, Moscow: Rossiya 1. URL: http://youtu.be/O80tiQoCdKs, retrieved 5.12.2014.

<sup>&</sup>lt;sup>107</sup> Glavnoye upravleniye voyennoy politsii Ministerstva oborony Rossiyskoy Federatsii, http://structure.mil.ru/structure/ministry\_of\_defence/details.htm?id=11260@egOrganizat ion.

<sup>&</sup>lt;sup>108</sup> Putin podpisal zakon o voyennoy politsii, *Vedomosti* 2.4.2014, URL: http://www.vedomosti.ru/politics/news/2014/02/04/putin-podpisal-zakon-o-voennoj-policii, retrieved 4.4.14.



in the military police at about 20 thousand, most of whom are on contract.  $^{109}\,$ 

Figure 33. Mortality rate due to external causes and registered number of crimes (thousands) in army between 2000 and 2013. Sourse: Kommersant daily, 12.02.2015, N 24 (3770).

According to the *Kommersant* daily, between 2000 and 2013 the number of personnel in the Russian armed forces was reduced from 1.2 million to 766 thousand (Figure 33).<sup>110</sup> In addition, there has been a general decline in the number of crimes registered in the army, down from 15 thousand crimes reported in 2000 to 7.9 thousand in 2013. There is no specific regulation governing the documentation of the number of personnel losses in the Russian army, and for this reason crime statistics are published irregularly and by different governmental bodies. In 2007, Defence Minister Sergei Ivanov reported over 300 fatalities related to crimes.<sup>111</sup> After 2007, some limited information was published by the office of the military prosecutor, and up to 2013 the number of deaths gradually decreased. According to the Soldiers' Mothers non-governmental organization in St. Petersburg, army officials in various military districts refused to provide information on casualties registered in 2013 and 2014.<sup>112</sup>

In an interview with *Rossiiskaya Gazeta*, Head of the Military Investigative Committee, Colonel-General Aleksandr Sorochkin, reported

 <sup>&</sup>lt;sup>109</sup> Pervaya brigada voyennoy politsii sostavit 2.5 tysyachi chelovek, *Argumenti i fakty*, 26.3.2012, URL: http://www.aif.ru/society/army/32102 26/03/2012, retrieved 20.2.2015.

<sup>&</sup>lt;sup>110</sup> Voiny-pobegonostsy, Kommersant, 17.02.2015, URL:

http://www.kommersant.ru/doc/2668258, retrieved 20.02.2015.

<sup>&</sup>lt;sup>111</sup> Voyskovyye chasti otkazalis' predostavit' informatsiyu po pogibshim za 2013-2014 gody voyennosluzhashchim, *Vedomosti*, 12.02.2015, URL:

http://www.vedomosti.ru/politics/news/39321061/tajnye-poteri.

<sup>&</sup>lt;sup>112</sup> Ibid.

on the increase in crimes committed in the army in 2013. According to Sorochkin, there were 7,997 criminal cases altogether, including 2,300 cases of bullying (*dedovshina*) of conscripts, with every third crime being committed by an officer (their implication in crimes has been on the rise). In addition, there has been an increase in the number of property crimes, including larceny (a 13% increase) and fraud (a 12% increase). The number of registered crimes related to drugs also increased by 5% in comparison to the previous year.<sup>113</sup>

#### 4.4 Young people's attitudes towards the armed forces

Taken together, the army reform, increase in salaries, patriotic education, and effective propaganda through the likes of *Zvezda* to build a positive image of military service (*vezhlivye liudi*) have had a significant impact on improving attitudes towards the military. Interestingly, it is not so much young people but more the older generations who are most receptive to this propaganda.<sup>114</sup>

The army is one of the most trusted institutions in Russia. Public opinion polls show a longer-term positive trend in the way in which the army is perceived by society (Table 34). Referring to the situation in the early 2000s, the director of the Levada Center, Lev Gudkov, argued that the positive perception of the army indicates that "the army is not an effective and efficient institution, but an embodiment of the most important national symbols, the key values for mass consciousness, and the reference point of mass identity".<sup>115</sup>

Since late 2013, namely during the crisis in Ukraine, the proportion of the population that does *not* trust the army has started to decline. It is also noticeable that the proportion of those who are "undecided" about the issue has likewise declined since 2008. These changes can be traced back both to the actualization of an alleged "external threat" during the Ukraine conflict and to the longer-term impact of several soft power tools, such as the positive representation of the armed forces in a series of new Russian films, and the patriotic education of young people. The salary increase for military personnel during the army reform process is a positive factor, although it cannot neutralize all the negative perceptions towards the armed forces in general, and military service in particular.

<sup>114</sup> Isakova (2006).

<sup>&</sup>lt;sup>113</sup> Generaly ugolovnykh del, *Rossiyskaya gazeta*, 27.02.2014, URL: http://www.rg.ru/2014/02/27/generali.html, retrieved 20.02.2015.

<sup>&</sup>lt;sup>115</sup> Cited in Golts (2012), 217.

The widely shared perception of the systemic corruption in the armed forces can be regarded as a factor that has a negative overall effect on young people's trust towards the army. However, this aspect has not been thoroughly studied in opinion polls conducted in Russia. Sociological studies pay little attention to the theme of corruption during conscription, focusing instead on violence in the army and the issue of trust.



Figure 34. Distribution of answers to the question "To what degree army is trustworthy?" between 1997 and 2014 (1997–2008 N=2100, 2009 N=1600) Source: Levada-Tsentr (2015b).

Public trust towards army is fluctuating greatly depending on public perceptions of processes in army and on external factors, such as perceived role of Russian army in domestic conflicts or war against other states (Figure 34). The poll taken in September 2006 after the Andrey Sychev hazing case showed worsened attitudes towards army (26% of respondents supported statement that army was trustworthy, while another 35% said that army was not fully trustworthy). The 2008 poll was carried out in March, before the August military intervention in Georgia.<sup>116</sup> Shortly before and during Russian military campaigns against Georgia and Ukraine public attitudes towards army improved considerably, reaching a historical maximum of 53% in September 2014.

Attitudes towards military service changed considerably after 2000. According to polls conducted in July 2000, only 24 per cent of respondents regarded army service as a duty to be paid to the state. In 2014 the number of respondents supporting obligatory military service had grown to 40 per cent (Figure 35). Simultaneously, the proportion of those supporting avoidance of military service by every available means

<sup>&</sup>lt;sup>116</sup> Levada-Tsentr (2015b).

has consistently declined. All in all, the overall number of respondents arguing that "every real man should undergo military service" is less than 50 per cent of respondents.



Figure 35. Distribution of answers to the question "What is your attitude towards military service?" between 1997 and 2014 Source: Levada-Tsentr (2015a).



Figure 36. Distribution of answers to the question "What is your attitude towards military service?" Answers by age groups. Source: Levada-Tsentr (2015a).

However, when the opinion poll results are organized according to age groups, the situation becomes more complex. Only one in four young respondents aged 18–24 agree that every real man should serve in the army. Yet, 41 per cent of this age group say that it is one's duty to serve even if it doesn't meet one's own interests. Interestingly, the older generation of 25- to 39-year-olds are less certain regarding this point, most likely because many of them already have families and jobs. Only

one-third (33 per cent) agree that they could give up their own interests for military service. The oldest generation consists predominantly of those who were born after the war, and they are the most supportive of the army (Figure 36).



*Figure 37. Attitudes towards military service. Distribution of answers for Moscow, other towns and village residents. Source: Levada-Tsentr* (2015b).

The location of respondents reveals interesting differences between regions (Figure 37). The Moscow residents attached less importance to military service as an element of masculine identity (26 per cent said that "Every real man should undergo military service"). Instead, for them, military service was perceived as an obligation (46 per cent agreed with the statement "military service – a duty that we owe to the state, even if it does not meet our own interests"). On the other hand, residents of small towns viewed the army as an element of socialization into the masculine culture (47 per cent of respondents in towns with less than 100 thousand residents agreed that "Every real man should undergo military service") and a duty served on behalf of the nation.

Attitudes towards military service also vary across social classes. Representatives of the lower social classes are more likely to perceive military service as an important element for building masculinity (48 per cent of respondents in the "poor" category agreed that "Every real man should undergo military service"). In fact, income level and perceived wealth are in direct correlation with negative attitudes towards military service. The 33 per cent of rich respondents consider military service to

be senseless, and hence, something to be avoided. For the rest of the population, including those who are most likely to belong to the ("wealthy") middle and upper-middle classes, military service is both a duty and a part of the masculine identity (Figure 38).



Figure 38. Attitudes towards military service. Distribution of answers for respondents in four income categories: poor, respondents with middle sized incomes, wealthy, rich. Source: Levada-Tsentr (2015b).

The general consensus among Russian respondents corresponds with the changes implemented during the army reform. Most young people support the idea that both paid professional soldiers and conscripts should serve in the army. However, older generations (55 years or older) are clearly in favour of the mixed system, whereas among the younger generation support for an army consisting of only contract soldiers is significantly higher – 42 per cent of respondents among 18- to 24-year-olds (Figure 39).<sup>117</sup>

Age, place of residence, income level and level of attained education are all factors that influence respondents' trust towards the armed forces. A cross-examination of opinion polls also reveals that the more positive people are in their evaluations of President Putin, the more positive they are about the army in general and military service in particular.<sup>118</sup> It can be argued that the perception of military service is formed largely through the mass media and is associated with the outcomes of reforms conducted

<sup>&</sup>lt;sup>117</sup> Levada-Tsentr (2015a).

<sup>&</sup>lt;sup>118</sup> See also FOM, (2014) "O polozhenii del v armii i srochnoy sluzhbe", 15.04.2014, URL: http://fom.ru/Bezopasnost-i-pravo/11458\_retrieved 5.2.2015.



Figure 39. Distribution of answers to the question: "In your opinion who should serve in the army?" Comparisons across age groups. Source: Levada-Tsentr (2015a).

under President Putin's leadership. Interestingly, those respondents who have direct contacts with the army (e.g. relatives serving in the armed forces) generally maintain a neutral opinion about the army, but those who have no contacts are confident that the army's image is a positive one.<sup>119</sup>

What is more, many young people in the provincial towns see military service as a possibility to advance in society and they are more in favour of a longer duration of conscription service.<sup>120</sup> The recently announced plan to provide war veterans with state-sponsored access to higher education institutions can be interpreted as an attempt to foster positive sentiments among certain segments of young people, who are already favourably disposed towards military service.<sup>121</sup> However, when they have actually been enlisted as conscripts, and possibly later as contract soldiers, positive expectations often go unrealized.

On the basis of the evidence from opinion polls and recent research, it can be concluded that in general the level of trust towards the army has continuously increased, yet there are significant differences between age

<sup>&</sup>lt;sup>119</sup> FOM, (2011) "Otnosheniye k deystvuyushchey sisteme prizyva na voyennuyu sluzhbu", Moskva: Fond Obshchestvennoye Mneniye.

<sup>&</sup>lt;sup>120</sup> At the age of 38, most officers reach the 20-year service mark and become eligible for a good pension and various social benefits. Surkova (2012).

<sup>&</sup>lt;sup>121</sup> During the meeting with Russian war veteran organizations on February 15, 2015, President Putin approved their suggestion to prepare amendments to the Russian legislation allowing war veterans free access to higher education institutions. The timing of the proposal suggests that it is aimed at boosting the number of volunteers participating in the war in Ukraine. President RF (2015b).

groups and social groups. One of the main challenges for the armed forces is the recruitment of well-educated men from higher-income families. To this end, raising the salaries of servicemen or promising access to higher education does not offer a solution. The policies promoted during the *New Look* reform (see section 3,2) concerning the humanization of the armed forces are on the right track. If implemented on the planned scale, future conscripts in 2035 could enter an army that is at least considerably changed, albeit not entirely reformed. However, most of the previous research results indicate that the chances of success in this regard are rather slim.

#### 5 Migration: policies and trends

# 5.1 Mobility patterns in Russia and between Russia and the CIS countries

The decision made in January 2015 allowing foreigners aged 18–30 to serve five-year contracts in the Russian military indicates that the Russian leadership itself does not believe in a quick fix for the armed forces. Instead, they have their eye on migrants, for whom the salary of 500 USD that will be paid by Russia's "Foreign Legion" is above the average wage of a migrant labourer.<sup>122</sup> The next section will examine the opportunities and problems related to migration in more detail.

It is expected that there will be over 10 million immigrants living in Russia by 2025.<sup>123</sup> During the past two decades, immigrants have compensated for more than a half of the natural population decline. This is also the declared aim of Russia's migration policy, as it is geared towards facilitating a population increase and towards ensuring that the economy benefits from sufficient labour resources in the future. The main objectives and tasks of the state-level policy are outlined in the project for the federal Concept on migration policy until 2025.<sup>124</sup>

<sup>&</sup>lt;sup>122</sup> Vinson, M., (2015) Russia's Failing Economy Likely to Drive Migrant Labourers Into Foreign Legion, *Eurasia Daily Monitor*, Vol. 12, Issue 33. URL:

http://www.jamestown.org/single/?tx\_ttnews%5Btt\_news%5D=43575&tx\_ttnews%5Bb ackPid%5D=7&cHash=f723fc4d7a0d2a7b571d6bb06e951e01#.VOw02010270 retrieved 23.02.2015.

<sup>&</sup>lt;sup>123</sup> Kostin V., Kostina A., (2015) *Natsional'naya bezopasnost' v Rossii*, Moskva: LENAND.

<sup>&</sup>lt;sup>124</sup> President RF (2012b) Kontseptsiya gosudarstvennoy migratsionnoy politiki Rossiyskoy Federatsii na period do 2025 goda, 13.6.2012, URL:

http://www.fms.gov.ru/upload/iblock/07c/kgmp.pdf, retrieved 23.02.2015.

It is doubtful whether the envisioned objectives will be met, especially regarding the labour markets. It is expected that the majority of immigrants arriving in Russia will come from countries belonging to the Commonwealth of Independent States (CIS). In general, they have a low level of education, poor knowledge of the Russian language, and lack professional training. Furthermore, the existing set of policies on migration, education and other social spheres are not oriented towards promoting the settlement and integration of immigrants within society at large. Instead, they are oriented towards attracting short-term labour migrants. As a result, an increasing number of conflicts between local residents and immigrants has been observed. The role of the national-patriotic education programmes in promoting an intolerant attitude towards other ethnic and religious groups should not be underestimated. In this context, veiled Russian ethnocentrism can be regarded as an example of Soviet-style "internationalism".<sup>125</sup>

With regard to internal mobility trends, there is a persistent trend of migration away from the regions in the Russian Far North and Eastern Siberia into the Central Federal district and the Moscow region.<sup>126</sup> Young people are the most mobile cohort. Up to 70 per cent (from the 1988–1992 birth cohort) move away from the villages and towns in the countryside after leaving school.<sup>127</sup> The migration of young people to bigger towns and cities aggravates the situation in the countryside. According to previous studies, the radius of the zone from where young people gravitate towards the centre varies depending on the city. For example, this radius is 500 km for Moscow, 200–250 km for St. Petersburg, from 100 to 120 km for Barnaul, and 150 km for Ekaterinburg.<sup>128</sup>

The problem is that there is no compensatory return migration of young adults to the villages and towns on the periphery. The incoming immigrants from abroad or from other regions are primarily attracted to the bigger cities, although this pattern may be changing due to the worsening economic situation in Russia in 2014 and 2015. The most depressed peripheral municipalities continue to lose the working age population (young adults) due to the massive outflow of school-leavers.

<sup>&</sup>lt;sup>125</sup> Svynarenko (2001).

<sup>&</sup>lt;sup>126</sup> Kostin & Kostina (2015).

 <sup>&</sup>lt;sup>127</sup> Kashnitsky I., Mkrtchyan N. V., (2014) Russian periphery is dying in movement: A cohort assessment of Russian internal youth migration based on census data, *NIDI Working papers*, Netherlands Interdisciplinary Demographic Institute.
<sup>128</sup> Ibid

According to recent research, some 40% of school-leavers intend to move away from their home towns or regions.  $^{129}$ 



*Figure 40. Age structure of internal migration in four different groups of regions in Russia. Source: Kashnitsky I., Mkrtchyan (2014).* 

Figure 40 above shows the current trends during a one-year period of mobility in selected regions of Russia for different age cohorts. Group 1 includes Moscow, St. Petersburg, and the Krasnodar regions, which are experiencing an inflow of young people and people aged 25–30. Group 2 includes the Komi Republic, and the Orienburg and Zabaikalskava regions. They are undergoing an outflow of migration, especially young people. In the Central Russian regions of Ryazan and Novgorod (Group 3), the situation is mixed. There is a simultaneous outflow of young people and an inflow of older generations of 55- to 75-year-olds. The fourth group comprises the Far North and Eastern Siberian regions, including Khanty-Mansiysk, Sverdlovsk, Tomsk, Novosibirsk, Kemerovo, Samara, Yamalo Nenets and Krasnovarsk, 130 which are subject to an inflow of young people and an outflow of retirement-age persons. Presumably, the oil and gas extracting industries attract young specialists, while retiring workers move back to their home regions or to regions with better facilities.

<sup>&</sup>lt;sup>129</sup> Ibid.

<sup>&</sup>lt;sup>130</sup> Mkrtchyan, N. V., (2014) O vliyanii migratsii na vozrastnoy sostav naseleniya regionov, gorodov i rayonov Rossi. In A. G. Korovkin (ed.) Nauchnyye trudy instituta narodnokhozyaystvennogo prognozirovaniya RAN. Moscow: MAKS Press, 2014. pp. 381-396.

The regions belonging to Groups 2 and 3 experience the most difficulties in fulfilling the conscription campaigns. Young people are leaving these regions with intentions of obtaining an education or employment in other parts of Russia. When it comes to the regions of the Russian Far North, their special status is duly acknowledged in the federal law "On Military Duty and Military Service": "Citizens living in certain areas of the Far North or separate areas equivalent to the Far North are called up for military service from 1 May to 15 July or from 1 November to 31 December. The list of these regions and areas, as well as the terms of conscription of citizens living in these regions and localities are determined by the General Staff of the Armed Forces of the Russian Federation".<sup>131</sup>

The situation is no less complicated in the regions belonging to Group 3, namely the Central Russian regions of Novgorod and Ryazan. Those who have left the region are usually better educated and in better physical shape than those young people who have decided to stay. In 2000, NTV reported that only 3 young men out of 20 had passed the medical examination and were deemed fit for military service in the city of Novgorod, many of whom were very poorly educated.<sup>132</sup> The lower levels of education and poor health of conscripts from these regions has a negative effect both on military preparedness (the health of conscripts) and the psychological situation in the armed forces.

In the Western military district in autumn 2014, out of 221 thousand citizens subject to military conscription, only 51 thousand were actually drafted. During the work of the drafting commissions, about 50 thousand citizens were exempt from military service (in most cases due to their poor health), while over 120 thousand obtained deferrals. Of these, the majority, numbering about 100 thousand, obtained a deferral for education reasons, and the rest because of family and other circumstances.133 Of the 51 thousand drafted young men, 12 thousand were from Moscow and 3 thousand from St. Petersburg. On the other hand, the research conducted on the adaptation of conscripts to different climatic zone are particularly prone to encountering health problems during the adaptation period. The results suggest that in order to

<sup>&</sup>lt;sup>131</sup> Federal'nyy zakon (1998).

<sup>&</sup>lt;sup>132</sup> NTV TV-Channel, (2000) V Rossii nachalsya prizyv v armiyu, URL:

http://www.newsru.com/russia/03oct2000/enlistmentgoingon.html, retrieved 20.1.2015. <sup>133</sup> V Zapadnom voyennom okruge zavershilsya osenniy prizyv - 50 tysyach novobrantsev, (2014), *IA Regnum* 29.12.2014, URL:

http://www.regnum.ru/news/1881483.html, retrieved 20.1.2015.
reduce the number of epidemics in the military as well as the number of accidents and other problems during the initial months of military service, the current system (the extra-territorial principle) should be reviewed.

# 5.2 The brain drain from the viewpoint of the militaryindustrial complex

Official Russian statistics have strong methodological gaps when it comes to quantifying emigration from Russia to other countries. In most cases, the statistics collected in the receiving countries demonstrate a significantly higher number of persons arriving in these countries from Russia.<sup>134</sup>

There are two major implications to consider here. First, the reform of the Russian Academy of Science and the stagnation in the development of the higher education system (Russian universities remain in a very low position in international university rankings) make attaining an education or starting academic and research careers abroad more tempting. Second, the lack of trained professionals is a problem that has been raised by the management of many enterprises in the defence sector.

Industrial enterprises in the military-industrial complex in Russia are experiencing a lack of personnel, particularly engineers and skilled professionals.<sup>135</sup> For this reason, many enterprises have established joint educational programmes with local universities and professionals schools. For instance, the Omsktransmash engineering company has already established such programmes with Omsk State University and also pays the tuition fees for 170 students, expecting them to work at the company after graduation.<sup>136</sup> In 2015, the enterprise expected to hire some 200 new workers (up from 4,800 in 2014 to 5,000 in 2015). Similarly, in 2013, the United Ship Building Corporation established cooperation with St. Petersburg State Marine Technical University, harbouring plans to develop educational programmes and prepare specialists or re-train skilled workers for their own needs.<sup>137</sup>

 <sup>&</sup>lt;sup>134</sup> Savinov, L.V., (2012) Mezhetnicheskiye otnosheniya v armii, *Sotsis* No. 7, p. 143.
 <sup>135</sup> Livanov, D., (2014) Podgotovka kadrov dlya OPK dolzhna byt orientirovana na

praktiku, 11.10.2014, URL: http://profiok.com/about/news/detail.php?ID=2099.

<sup>&</sup>lt;sup>136</sup> Lobov, Igor (2014), V 2015 my natsnem vosstanavlivat sobstvennoe proizvodstvo detalei dlya transmissii, *Kommercheskie vesti*, URL:

http://kvnews.ru/gazeta/2014/oktyabr/-37/igor-lobov-.

<sup>&</sup>lt;sup>137</sup> Antonov, Evgenii (2014), Dlya nas katsestvo vypuskaemyh spetsialistov, 8.10.2014, URL: http://profiok.com/about/news/detail.php?ID=2054.

In 2014, acting upon a request from the Military Industrial Commission of Russia, the Ministry of Education launched a programme called "New Cadres For the Military-Industrial Complex".<sup>138</sup> The declared aims include measures for improving the quality of professional training programmes for universities and vocational schools, enhancing the quality of governmental planning for science workers and specialists to fulfil the needs of the military-industrial complex, widening practices, and intensifying corporate influence on educational programmes. A grant support scheme was developed for this programme and implemented for the first time in autumn 2014 when 12 universities received grants to cover the training of an agreed number of specialists and the development of the educational infrastructure.<sup>139</sup>

Recent reform of Russian Academy of Science has resulted in rapid reduction of university graduates employed by research organizations (Figure 41) and in reduction of overall number of researchers (Figure 42). First of all reduction of researchers was done by cutting the number of 50-59 year old researchers (Figure 43).



Figure 41. Number of new university graduates. employed by research organizations between 2001 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.



Figure 42. Number of researchers in the Russian. Federation between 2000 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

<sup>&</sup>lt;sup>138</sup> Minobrnauki, (2014b).

<sup>&</sup>lt;sup>139</sup> Minobrnauki, (2014a).



Figure 43. Number of researchers in the Russian Federation between 2000 and 2013 by age groups. Source: Federal'naya sluzhba gosudarstvennoy statistiki.



Figure 44. Planned numbers of university level students and vocational school students who concluded contracts with defence industrial companies for targeted training. Source: Gosudarstvennaya programma Rossiyskoy Federatsii "Razvitiye obrazovaniya" na 2013 - 2020 gody.

Rapid reduction of university graduates employed by research organizations may motivate some of young people who are oriented on research career to seek employment abroad. At the same time Russian Government has launched a program for support of students who study disciplines related needed by Russian defence industries. According to the "Development of Education" program there will be rapid increase especially in the numbers of university level students who will conclude contracts with defence industrial companies for targeted training (Figure 44). The priority is set for university education and it reflect the concerns highlighted by management of many companies about lack of welltrained young specialist. According to government plan of straining for specialties needed by defence industries is expected that the overall number of university students in these specialities will grow from 13728 in 2014 to 18830 students in 2020. At the same time lower priority is given to vocational school training where the number of student will reduce from 5112 in 2014 to 3050 in 2020.



Figure 45. Overall number of students training for specialties needed by defence industries. Sourse: Gosudarstvennyy plan podgotovki nauchnykh rabotnikov i spetsialistov dlya organizatsiy oboronno-promyshlennogo kompleksa na 2011-2015 gody/ Gosudarstvennyy plan podgotovki kadrov so srednim professional'nym i vysshim obrazovaniyem dlya organizatsiy oboronno-promyshlennogo kompleksa na 2016 - 2020 gody.

#### 6 Conclusion

A distorted population pyramid is a significant feature of the demographic transition in Russia. It reflects exogenous shocks, such as wars, waves of mass repression, and famine, as well as the economic crisis of the 1990s. The lack and quality of human resources are among the key problems facing the Russian armed forces. It is expected that the number of working age males in the population aged 15–59 will gradually decline from 44 million in 2014 to under 37 million in 2035.<sup>140</sup> Nonetheless, a positive trend has been observed with regard to natural population growth. The economic growth in Russia in the 2000s resulted in higher in-bound migration flows to Russia (mainly from the neighbouring CIS countries) and contributed positively to population growth in general. For the first time since the early 1990s, natural population growth was recorded in 2012. Drawing on this trend, it is expected that in 2035 the number of 18- to 30-year-old men will be higher compared to previous years. However, inter-regional differences remain

<sup>&</sup>lt;sup>140</sup> GKS (2010) Predpolozhitel'naya chislennost' naseleniya Rossiyskoy Federatsii do 2030 goda. Statisticheskiy byulleten', Moskva: Federal'naya sluzhba gosudarstvennoy statistiki.

significant. Natural population growth is highest in the North Caucasus, as well as in some Siberian and Far Eastern regions. Natural population growth takes place primarily in urban areas, while the rural population continues to decline. Environmental pollution, food quality, initiation of alcohol and tobacco use at an early age, and alcoholism are significant individual factors influencing the growth of the population and the health of all age cohorts. In the case of Russia, a combination of these and other above-mentioned factors, together with an inherently unstable political system, has contributed to a deepening of the problems within the armed forces. The main demography trends and resulting from this development challenges for the Russian armed forces will be outlined in below.

The campaign to improve the demographic situation in Russia has been partially successful. In Soviet Russia, the long-term tendency towards a decline in the fertility rate was interrupted for a short time in the 1980s when the Soviet government adopted additional measures to support families with children. More recently, Russian government have adopted policies aimed at stimulating birthrates for the period between 2007 and 2016. However, Russia's current fertility rate decline is a typical trend for developed industrial and post-industrial societies. Therefore, trying to improve the demographic situation in Russia by means of financial support or propaganda about traditional values will have a short-term effect (in the case of the former) and will be unsuccessful (in the case of the latter). A study conducted by the Moscow Higher University of Economics confirms that state support programmes for families with children had little impact on intentions and realizations, especially for those who were planning to have their first child or who already had one child. Most likely, a significant increase in social benefits for families with two or more children, coupled with a drastic improvement in the daycare and educational systems have the potential to make a modest contribution to the demographic situation.

*Natural growth in population is accompanied by significant differences at the regional level.* Russia is a large country and demographic trends are very diverse in different parts of the country. In the past decade fertility rates have grown across Russia's regions (an average of 1.3 children per woman in 2005 and 1.7 in 2013) and the highest rates were registered in the republics of the North Caucasus and the Urals, almost reaching 2 children per woman. The lowest rates are in the Central and North-Western federal districts (around 1.5 children per woman aged 15-49). These demographic trends do not have their own unique paths, but follow cross-national regional demographic processes instead. The European

regional demographic trend with lower fertility rates and late first births is more typical in the western regions of Russia. On the other hand, the republics in the North Caucasus, where a greater number of Muslims reside, are part of the Middle-Eastern regional demographic development with higher fertility rates and an early age at first birth.

By 2035, the number of 18-year-old men may grow by 46% compared to 2015. For the first time in two decades, the number of births exceeded the number of deaths in Russia in 2013. Fertility is steadily growing, while the mortality rate among young men is rapidly declining (by almost 50%) since 1993). Mortality due to external causes has dropped by 60 per cent with the result that life expectancy for young men is on the increase. A very modest decline in suicide rates among Russian males may indicate that security is improving (fewer fatal incidents and homicides), but the social situation at the family level remains very tense. Most suicides among young people are directly or indirectly related to problems within the family and social deprivation: alcoholic parents, conflicts and domestic violence (up to 40% of felony cases are related to domestic violence in Russia). Suicide rates among the rural population are almost double compared to urban populations. When participating in obligatory military service, young men bring to the army those social problems they grew up with, including domestic violence, alcohol consumption at an early age and drug abuse.

The demographic changes are reflected in the composition of the Russian military forces. Smaller cohorts of young people in 2012–2015 resulted in a lower number of young men being drafted for military service. The biggest cohort of young people born at the end of the 1980s during high fertility years in the Soviet Union and new Russia was clearly reflected in 2010 in a very high number of conscripts: as many as 549.4 thousand young men were drafted for compulsory service that year. The Russian armed forces were unprepared for this rapid increase in young men enrolled for military service during these years and this partially contributed to the increased level of violence and accidents in the army. These themes dominated the public discourse about conscription and contributed to the growing unwillingness to serve in the army among young people in the rapidly shrinking cohorts born in the 1990s. After 2010, army officials reported on the steep decline in bullying in the army.

<sup>&</sup>lt;sup>141</sup> Voiny-pobegonostsy, Kommersant, 17.02.2015, URL:

http://www.kommersant.ru/doc/2668258, retrieved 20.2.2015.

However, soon after, in 2011 and 2012, the lack of young people caused by a rapid drop in fertility rates and high mortality rates during the first years of Russia's independence at the beginning of the 1990s saw conscript numbers drop to 357 and 295 thousand respectively. Between 2010 and 2014, the number of annually drafted young people had decreased by 44 per cent (from 549 to 307 thousand). If there are no significant changes in the legislation regulating conscription until 2019, there will be no or very little change in the number of conscripts at around 310–320 thousand per year. Between 2015 and 2030 the number of young men of conscription age will grow by around 46 per cent, but this will not make conscription campaigns any easier. The number of urban young people will grow much faster (+53% in 2030) compared to rural young people (+35% in 2030). Young urban males are the most reluctant to join the armed forces and the core of contemporary conscripts are from rural areas and small towns.

The "New Look" army reform is facing both old and new problems: *quality, image and corruption.* The composition of the army does not reflect the class and educational composition of the rest of society. Residents of smaller towns and rural regions are over-represented in the conscript army, while residents of bigger towns and young men who have completed higher education are evidently under-represented. As a report by the Russian Ministry of Defence suggests, the Russian conscript army resembles a "peasants and workers Red Army, formed on a class basis" with tension evident between representatives of the polar social cases.<sup>142</sup> More than 75 per cent of conscripts come from working-class or lowincome families. In towns in particular, military commissariats face huge challenges in drafting a sufficient number of young men. A set of special measures are in place to monitor future conscripts and their families. During medical examinations of school-age boys, military commissariats collect information together with schools about future conscripts and their families. The widening gap between the poorest and richest strata of Russian society has become more apparent since 2010–2012. Violence and abuse are gradually being replaced by corruption. Russian NGOs report that it is becoming more common for young soldiers to buy their way out of performing duties or extra work by making regular payments to officers (soldiers are forced to pay money to junior officers if they want to reduce their workload). Military units with low or no corruption are the exception rather than the rule.

<sup>&</sup>lt;sup>142</sup> Ministerstvo oborony RF (2015).

Despite the fact that the living standards and salaries of soldiers on contract are improving, the image and prestige of military service remain rather low in young people's eyes. As many as 20 per cent of young conscripts underwent DOSAAF professional training and attained an army-related professional qualification before conscription. It is evident that this category was consciously preparing for military service well in advance. Preparing young people for military service is one of the tasks of youth policy in Russia and it is incorporated into the patriotic upbringing programmes. These programmes were developed on the initiative of the Ministry of Defence with the central aim of improving the image of military service, promoting dedication to the state and attracting more young people to the army. The programmes have produced results, as a definite improvement in the attitudes of young people towards the military can be observed. In the 1990s and especially during the wars in Chechnya, the Russian army was highly unpopular among young people. More recently, however, the army has been named among the most trusted institutions in Russia.

The number of young people who are fit for military service is growing mostly due to legal measures and a new definition of "fit for service". In the past two decades in Russia, young people's health has been deteriorating. The increase in the number of registered cases of almost all diseases has two explanations: first, an improvement in the registration of health conditions, especially for young people and children (people more often turn to professional medical care to receive treatment or prescription medicine instead of relying on more traditional self-treatment); and secondly, a weakening in the health of the Russian population caused by worsened social and environmental factors, and a lack of policies supporting healthy lifestyles. One of the most significant factors affecting the poor health condition of today's young people is excessive use of alcohol starting from an early age. Recent studies underline the significance of excessive alcohol consumption as an explanatory factor in the unusually high mortality rate among young men in Russia.

Young people's health is a major concern for the Russian conscript army, as many young people can't withstand the stress of the first few weeks in the army and fall ill. In one year the health of conscripts did not improve despite reports by the Ministry of Defence that in 2014 there were 5 per cent fewer young people unfit for service comparing to 2013. The number of those who are unfit for health reasons remains rather stable or is declining slightly, although it is caused in part by draft commissions relaxing the health examination rules by shortening the list of illnesses that are regarded as incompatible with military service. Among school-

children only 21.4 per cent are "absolutely healthy", which implies that the majority of conscripts serving in the army have various kinds of health problems. Of those that were deemed unfit for service, 17–20 per cent had musculoskeletal disorders, 13–15 percent had mental disorders, 9–11 per cent had digestive disorders, and 9–10 per cent had problems with their nervous system.

Age, place of residence, income level and level of attained education are all factors that influence respondents' attitudes towards the armed forces. A cross-examination of opinion polls reveals that the more positive people are in their evaluations of the president Vladimir Putin, the more positive they are about the army in general and military service in particular. It can be argued that the perception of military service is formed largely through the mass media, and a positive evaluation of the army is associated with how people perceive the outcomes of reforms and President Putin's leadership. Those respondents who have direct contact with the army (e.g. relatives serving in the military) generally have a neutral image of the army, but those who have no contact with the army are confident that the image of the army is positive.

Attitudes towards military service vary across social classes. Representatives of the lower social classes are more likely to perceive military service as an important element in the construction of masculinity. On the other hand, a higher income level and perceived wealth are in direct correlation with negative attitudes towards military service. Many young people in the provincial towns see military service as a possibility to advance in society and they are more in favour of a longer duration of military service. Young men with higher incomes and education attainment goals are less oriented towards conscription, however.

The Russian leadership does not believe in a quick solution to the demographic problem of the armed forces. It is expected that by 2025 there will be over 10 million immigrants living in Russia. Immigrants have long been considered an important source of labour in Russia, compensating for the decline in the number of local people of working age. The majority of immigrants arriving in Russia come from the countries of the Commonwealth of Independent States: Ukraine, Uzbekistan, and Tajikistan. The change of legislation allowing foreigners aged 18–30 to serve five-year contracts in the Russian armed forces is targeted at immigrants from these countries. The information available is insufficient to estimate the importance of this change in the long-term

perspective. However, it can be interpreted as yet another indication of the problems involved in recruiting young people into the armed forces.

The current policies aimed at supporting domestic R&D and the modernization of the defence industry seem inadequate in resolving the major challenges in this sphere. The deficit of high-quality workers in the defence industry has been acknowledged. To address this situation, the Russian government has facilitated cooperation between universities and defence enterprises. Yet, many young people receiving their education in bigger towns emigrate abroad. The most talented and qualified do not regard the existing situation in Russian science very highly, while many young people are dissatisfied with the 30–35 thousand roubles monthly salary for qualified personnel in the defence industries and choose other career paths. In addition to outward migration, there is a persistent trend of migration from the regions in the Russian Far North and Eastern Siberia into the Central Federal district and the Moscow region. The most depressed peripheral municipalities continue to lose the working-age population (young people and young adults) due to the massive outflow of school-leavers.

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#### Interviews

Interview at with Alaksander Peredruk, Soldiers Mothers of Saint Petersburg NGO,18.12.2014

Interview at with Olga Alekseeva, Soldiers Mothers of Saint Petersburg NGO,18.12.2014

# Appendices

Table 1. Death rates and birth rates in Russia from 1970 to 2013, illustrating the second demographic transition in Russia. Source:Federal'naya sluzhba gosudarstvennoy statistiki.

Year	1970	1975	1980	1985	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Deaths per 1000 during 1 year	8.7	9.8	11	11.3	11.2	11.4	12.2	14.5	15.7	15	14.2	13.7	13.6	14.7	15.3	15.6	16.2	16.4	15.9	16.1	15.1	14.6	14.5	14.1	14.2	13.5	13.3	13
Births per 1000 during 1 year	14.6	15.7	15.9	16.6	13.4	12.1	10.7	9.4	9.6	9.3	8.9	8.6	8.8	8.3	8.7	9	9.7	10.2	10.4	10.2	10.3	11.3	12	12.3	12.5	12.6	13.3	13.2

Table 2. Overall age composition of Russian population from 2002 to 2014. UNICEF Regional Office for CEE/CIS, TransMonEE 2014
Database (www.transmonee.org).

Age\Year	2002	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
0-4		6660	6916	7066	7234	7433	7671	7968	8051	8380	8687	8899
5-9	6941	6762	6583	6511	6503	6638	6783	7091	7117	7261	7441	7662
10-14	10406	9314	8604	7940	7458	7056	6891	6610	6601	6567	6689	6823
15-19	12801	12544	12212	11852	11244	10485	9650	8389	8237	7631	7152	6956
20-24	11466	11870	12081	12098	12298	12457	12389	12169	12122	11599	10849	9971
25-29	10613	10797	10879	11054	11130	11358	11667	11982	12012	12328	12556	12522
30-34	9836	10030	10228	10316	10466	10537	10696	10980	11016	11116	11346	11661
35-39	10216	9665	9416	9427	9485	9705	9885	10172	10211	10380	10459	10614
40-44	12546	12155	11641	10925	10325	9800	9409	9241	9251	9340	9563	9751
45-49	11606	11891	11906	12070	12084	11929	11634	10672	10561	10023	9545	9187
50-54	10071	10447	10576	10738	10887	11037	11272	11483	11509	11560	11436	11184
55-59	5347	6466	7737	8724	9164	9501	9755	10022	10063	10215	10382	10634
60-64	7983	6387	5213	4458	4408	5014	5916	7832	7982	8380	8690	8948
65-69	6345	7021	7567	7699	7572	6687	5565	4002	3913	3896	4453	5269
70 and more	12469	12325	12242	12358	12605	13111	13554	14210	14219	14380	14099	13587

							-	-	-		
Category\Year	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Working age male population	43 421 673	43 414 562	43 417 306	43 482 581	43 688 928	44 024 084	44 098 004	44 148 897	44 126 577	44 195 640	44 277 970
Elderly male population (60+)	7 340 792	7 701 348	7 953 554	8 172 535	8 189 203	8 165 769	8 272 193	8 467 239	8 796 438	9 098 669	9 314 807
Under working age (0-15)	18 353 015	18 340 141	18 229 044	18 007 275	17 707 278	17 469 299	17 147 668	16 729 612	16 287 694	15 764 450	15 105 507
Cont	•					•		•			•

Table 3. Male population of Russian Federation by categories. Source: Federal'naya sluzhba gosudarstvennoy statistiki

Cont.

Category\Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011
Working age											
male	44 425 951	44 556 132	44 962 190	45 424 204	45 767 255	45 948 173	45 974 137	45 890 845	45 752 247	45 441 128	45 186 234
population											
Elderly male											
population	9 411 819	9 429 448	9 182 206	8 793 864	8 471 589	8 247 020	8 285 994	8 398 219	8 505 108	8 750 265	8 978 471
(60+)											
Under											
working age	14 501 185	13 936 394	13 346 266	12 853 431	12 457 377	12 106 511	11 791 614	11 686 783	11 703 473	11 824 490	11 885 550
(0-15)											
Cont.											

Category\Year	2012	2013	2014
Working age male population	44 896 157	44 545 556	44 186 786
Elderly male population (60+)	9 205 402	9 451 678	9 690 176
Under working age (0-15)	12 074 724	12 356 293	12 669 926

Year\abortions, births	Number of legally induced abortions	Number of live births	Number of live births to women under age 20
1989	4 427 713	2 160 559	255 766
1990	4 103 425	1 988 858	275 547
1991	3 608 412	1 794 626	275 912
1992	3 436 695	1 587 644	261 206
1993	3 243 957	1 378 983	243 527
1994	3 060 237	1 408 159	256 540
1995	2 766 362	1 363 806	238 019
1996	2 652 038	1 304 638	209 531
1997	2 498 140	1 259 943	195 959
1998	2 346 138	1 283 292	189 012
1999	2 181 153	1 214 689	167 765
2000	2 138 750	1 266 800	162 997
2001	2 014 710	1 311 604	165 600
2002	1 944 481	1 396 967	169 919
2003	1 864 647	1 477 301	170 308
2004	1 797 567	1 502 477	171 940
2005	1 732 289	1 457 376	162 053
2006	1 582 398	1 479 637	160 424
2007	1 479 010	1 610 122	151 837
2008	1 385 600	1 713 947	145 459
2009	1 292 389	1 761 687	131 442
2010	1 186 108	1 788 948	113 849
2011	1 124 880	1 796 629	103 884
2012	1 063 982	1 902 084	98 924

Table 4 Abortions, live births, number of live births to women under age 20. Source: TransMonEE database

Table 5. Total fertility rate (number of children per woman aged 15–49) for urban and rural population and total between 1990 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Type of population\Year	1960- 1961	1970- 1971	1980- 1981	1990	1995	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Urban population	2	1.8	1.7	1.7	1.2	1.1	1.1	1.2	1.2	1.3	1.2	1.2	1.3	1.4	1.4	1.4	1.4	1.5	1.6
Tural population	3.3	2.6	2.6	2.6	1.8	1.6	1.6	1.6	1.7	1.7	1.6	1.6	1.8	1.9	1.9	2	2.1	2.2	2.3
Total	2.5	2	1.9	1.9	1.3	1.2	1.2	1.3	1.3	1.3	1.3	1.3	1.4	1.5	1.5	1.6	1.6	1.7	1.7

 Table 6. Total fertility rate (number of children per woman aged 15–49) across federal districts of the Russian Federation between 1990 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki

District\Yea r	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Central Federal District	1.6	1.5	1.3	1.2	1.2	1.2	1.1	1.1	1.1	1	1.1	1.1	1.1	1.2	1.2	1.2	1.2	1.2	1.3	1.3	1.4	1.4	1.5	1.5
North- Western Federal District	1.7	1.5	1.3	1.2	1.2	1.2	1.1	1.1	1.1	1	1.1	1.1	1.2	1.2	1.3	1.2	1.2	1.3	1.4	1.4	1.4	1.5	1.6	1.6
Southern Federal District	2.2	2.1	1.9	1.6	1.7	1.6	1.5	1.4	1.4	1.3	1.3	1.3	1.4	1.4	1.5	1.4	1.4	1.6	1.7	1.7	1.5	1.5	1.6	1.6
Volga Federal District	2	1.8	1.6	1.4	1.5	1.4	1.3	1.3	1.3	1.2	1.2	1.2	1.3	1.3	1.3	1.3	1.3	1.4	1.5	1.5	1.6	1.6	1.7	1.8
Ural Federal District	1.9	1.7	1.5	1.3	1.4	1.3	1.3	1.2	1.3	1.2	1.2	1.3	1.4	1.4	1.4	1.4	1.4	1.5	1.6	1.7	1.7	1.7	1.9	1.9
Siberian Federal District	2	1.9	1.6	1.4	1.5	1.4	1.3	1.3	1.3	1.2	1.3	1.3	1.4	1.4	1.4	1.4	1.4	1.5	1.7	1.7	1.7	1.7	1.9	1.9
Far Eastern Federal District	2.1	1.9	1.6	1.5	1.5	1.4	1.3	1.3	1.3	1.2	1.3	1.3	1.4	1.4	1.5	1.4	1.4	1.5	1.6	1.6	1.6	1.7	1.8	1.8
North Caucasian Federal District														1.5	1.7	1.6	1.6	1.8	2	2	2	2	2	2

Table 7. Number of children and young people in Russia on January 1, 2014. Source: Federal State Statistics Office Bulletin, Population of Russian Federation by gender and age group 2014. Source Federal'naya sluzhba gosudarstvennoy statistiki.

	Urb	an	Rur	al
Age\ gender	men	women	men	women
0-4	3 250 026.00	3 076 202.00	1 319 163.00	1 253 758.00
5-9	2 771 204.00	2 641 982.00	1 150 351.00	1 098 576.00
10-14	2 443 990.00	2 325 665.00	1 052 782.00	1 000 109.00
15-19	2 544 655.00	2 459 858.00	1 015 236.00	935 663.00
20-24	3 891 938.00	3 868 175.00	1 190 121.00	1 020 643.00
25-29	4 791 700.00	4 845 496.00	1 528 434.00	1 356 840.00

Table 8. Male and female life expectancy at birth (years). Source: TransMonEE

Life expectancy\Year	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Male life expectancy at birth	64	64	63	62	59	58	58	60	61	61	60	59	59	59	59	59	59	60	61	62	63	63	64	65
Female life expectancy at birth	75	75	75	74	74	73	73	73	73	74	74	74	74	74	74	74	74	74	74	74	75	76	76	76

Table 9. Mortality rate due to external causes for population aged 15–19 (includes suicides; per 100,000 relevant population). Source: TransMonEE

Country\ Year	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
<b>Russian Federation</b>	79	82	84	92	109	110	125	110	95	98	102	107	100	96	92	89	86	82	80	76	67	63	61	60
Ukraine	61	59	58	64	62	71	70	65	58	58	57	62	59	55	54	48	52	51	58	49	42	42	41	39
Azerbaijan	16	27	27	134	127	175	40	28	25	27	26	19	18	16	15	15	20	21	21	22	23	26	18	17
Estonia	83	93	93	80	87	104	88	57	84	56	79	58	61	72	57	56	55	59	40	46	29	33	31	29

Table 10. Suicide rate for population aged 15–19, males (deaths per 100 000 average relevant population). Source: TransMonEE

	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Country\Year																								
Estonian males	33	23	24	19	29	27	24	20	22	23	36	25	23	25	17	25	19	17	10	19	16	20	14	9
Russian males	18	23	24	25	32	35	36	35	34	33	33	36	38	37	34	33	32	31	31	31	29	25	24	22
Ukrainian males	12	12	12	13	16	18	18	17	16	17	17	-	19	15	16	16	14	13	16	13	16	15	19	18
Estonian females	8	4	6	8	8	12	6	10	8	4	12	2	4	2	6	0	6	8	2	7	5	5	9	0
Russian females	6	6	7	7	8	9	9	8	8	8	9	8	8	8	7	8	7	7	8	8	8	7	8	7
Ukrainian females	5	4	4	6	4	5	5	4	4	5	4	-	4	3	3	3	4	3	3	3	4	6	6	4

Table 11. Mortality rate among 15-19 and 20-24-year-old males and females in Russia (deaths per 100,000 average relevant population).Source: TransMonEE

Population category\ Year	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
15-19 year old males	15 4	16 2	16 6	18 0	20 9	21 1	23 8	21 2	18 5	18 5	19 5	20 9	18 8	17 9	17 2	16 7	16 1	15 6	14 8	14 4	12 8	11 8	11 4	11 1
15-19 year old females	64	63	66	72	78	80	84	80	74	78	79	79	74	70	69	67	68	62	64	60	57	52	52	50
20-24 year old males	26 0	26 0	27 3	31 9	37 5	40 2	42 8	41 1	38 2	39 8	44 1	48 6	42 7	38 8	38 6	39 0	38 4	35 1	32 8	29 8	26 7	25 3	23 9	23 6
20-24 year old females	70	71	74	83	96	99	10 3	97	98	99	11 1	11 2	11 0	10 4	10 4	10 0	10 4	96	92	84	80	78	74	69

Table 12. Number of young men aged 18 in Russia (estimation for 2014–2032 is based on numbers of boys born between 1999 and 2014 and is not adjusted for mortality and migration). Source: Federal State Statistics Office Bulletin, Population of Russian F Federation by gender and age, 2014

Year when male			
person is 18	Urban	Rural	Total
2012	572 747	201 974	774 721
2013	523 239	212 517	735 756
2014	485 443	211 325	696 768
2015	451 220	210 237	661 457
2016	465 449	216 220	681 669
2017	449 802	204 013	653 815
2018	483 762	210 136	693 898
2019	472 088	204 754	676 842
2020	507 171	214 674	721 845
2021	527 370	219 875	747 245
2022	532 693	221 299	753 992
2023	533 558	215 159	748 717
2024	528 913	218 522	747 435
2025	567 271	244 715	811 986
2026	599 326	256 595	855 921
2027	610 685	251 268	861 953
2028	605 562	246 241	851 803
2029	646 039	270 786	916 825
2030	689 988	280 902	970 890

 Table 13. Male population by five-year age group (thousands). Estimates based on medium fertility rate. Source: United Nations,

 Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York

Age\ Reference date (as of 1 July)	2015	2020	2025	2030	2035
0-4	4 316	4 092	3 641	3 380	3 430
5-9	4 103	4 315	4 089	3 639	3 379
10-14	3 573	4 103	4 312	4 087	3 638
15-19	3 376	3 629	4 135	4 344	4 117
20-24	4 587	3 460	3 674	4 178	4 382
25-29	6 282	4 573	3 448	3 664	4 162
30-34	5 943	6 161	4 492	3 403	3 620
35-39	5 232	5 783	5 997	4 392	3 341
40-44	4 786	5 039	5 573	5 797	4 262
45-49	4 057	4 525	4 774	5 299	5 530
50-54	4 892	3 739	4 181	4 4 3 0	4 936

Table 14. Male population age 20-24 (in thousands) from 1950 to 2035. Estimate for 2030-2035 based on medium fertility rate. Source: United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York

Year	1950	1955	1960	1965	1970	1975	1980	1985	1990	1995	2000	2005	2010	2015	2020	2025	2030	2035
Male population age 20-24	5 747	4 927	6 206	3 401	5 313	6 192	6 666	5 955	4 846	5 256	5 563	6 203	6 324	4587	3460	3674	4178	4382

Table 15. Male population of Russian Federation age 20-24 (thousands) from 2015 to 2100. Source: United Nations, Department ofEconomic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York

Year	2015	2020	2025	2030	2035	2040	2045	2050	2055	2060	2065	2070	2075	2080	2085	2090	2095	2100
20-24 medium fertility	4587	3460	3674	4178	4382	4147	3698	3442	3489	3632	3635	3478	3307	3238	3252	3255	3193	3092
20-24 high fertility	4587	3460	3674	4178	5073	5150	4778	4442	4625	5109	5453	5470	5358	5412	5681	5984	6156	6210
20-24 low fertility	4587	3460	3674	4178	3691	3143	2617	2453	2427	2366	2179	1944	1770	1672	1599	1504	1383	1263

 Table 16. Reported number of young people drafted during the years 2011–2014 compared to the number of servicemen on contract.

 Source: Ministry of Defence of Russian Federation.

<b>Year</b> \Category	On contract	Drafted
2011		354 500
2012	186 400	295 710
2013	240 000	303 230
2014	295 000	307 100
2015*	350 000	291 537
2016*	400 000	300 445
2017*	425 000	288 168

Note: \*planned number of servicemen on contract and estimated number of conscripts (estimation based on change in cohort of 18-year-olds).

Table 17. Reported number of young people drafted during the years 2011–2014 compared to the number of servicemen on contract and the forecast until 2035 of number of young men who most likely will be drafted. Planned number of servicemen on contract until 2017. Estimated number of conscripts until 2035 - estimation is based on expected size of conscript age youth from whom 39.6% will be drafted. (Source: Ministry of Defence of Russian Federation; United Nations, Department of Economic and Social Affairs, Population Division (2013): World Population Prospects: The 2012 Revision. New York)

<b>Year</b> \ <b>Category</b>	On contract	Drafted/Will be drafted
2011		354500
2012	186400	295710
2013	240000	303230
2014	295000	307100
2015	350000	291536
2016	400000	300445
2017	425000	288168
2018		269941
2019		258911
2020		274784
2021		268029
2022		285851
2023		295909
2024		298581
2025		296492
2026		295984
2027		321546
2028		338945
2029		341590
2030		337532
2031		363156
2032		384130
2033		382992
2034		396000
2035		396000

# Table 18. Civilian service in Russia between 2004 and 2014. Source: Soldiers' Mothers St. Petersburg, Information letter by the Ministry of Defence

<b>Category</b> \Year	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Applied for civilian service	1800	854	319	439	443	473	730	879	836	756	835
<b>Received decision</b>	1275	547	275	400	420	463	682	797	785	707	823
Reported on duty (according to executuve authority)	401	257	257	240	279	391	547	578	576	584	311

 Table 19. Distribution of answers to the question did you serve a compulsory military service? Sourse: Rossiyskiy monitoring ekonomicheskogo polozheniya i zdorov'ya naseleniya

Age\Category	Served in army	Didn't serve in army	No answer
18-19	5%	88%	7%
20-24	34%	66%	0%
25-29	35%	64%	1%
30-34	43%	56%	1%
35-39	56%	42%	2%
40-44	71%	28%	1%
45-49	82%	17%	1%
50-54	80%	19%	1%
55+	76%	23%	1%

Table 20. Change in number of hospitals and polyclinics in Russia between 2000 and 2013 and number of medical personnel (medical personnel in thousands). Source: Ministry of Health

Category\Year	2000	2005	2010	2011	2012	2013
All hospital type	9946	8859	5705	5508	5268	5006
Hospitals	8862	7835	4963	4800	4623	4398
Policlinics	6306	5854	2147	3099	2718	2294
Dispensary	1084	1024	742	708	645	608
Medical personnel						
(thousands)	1397.4	1351.2	1327.8	1320	1299.3	1295.7
No of beds	1573900	1394245	1250120	1225370	1202590	1167709

Tables 21-26 omitted. Graphs only.

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Table 27. Life expectancy at birth (years) for Russian men and women between 1990 and 2013 by type of residence. Source: Federal'naya	
sluzhba gosudarstvennoy statistiki	

Category\ Year	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Urban Males	64.3	64	62.4	59.1	57.7	58.3	60.1	61.5	61.8	60.3	59.4	59.2	59.1	59	59.4	59.6	61.1	62.2	62.7	63.7	63.8	64.7	65.1	65.6
Rural Males	62	61.7	60.6	57.8	56.7	57.6	58.4	59.2	59.8	58.7	58.1	58.1	57.5	57.3	57.6	57.2	58.7	59.6	60	60.9	61.2	62.4	63.1	63.7
Urban Females	74.3	74.3	73.7	71.9	71.2	71.6	72.6	73.2	73.4	72.6	72.5	72.4	72.2	72.2	72.7	73	73.9	74.5	74.8	75.3	75.4	76.1	76.3	76.7
Rural Females	74	73.8	73.3	71.4	70.7	71.4	71.8	71.9	72.4	71.7	71.7	71.6	71.1	70.9	71.3	71.1	71.9	72.6	72.8	73.3	73.4	74.2	74.7	75.1

Table 28. Alcoholism and narcotic dependency among 15- to 17-year-olds. Source: TransMoNEE database

Category\Year	1989	1990	1991	1992	1993	1994	1995	1996	1997	1998	1999	2000
Number of registered 15- to 17-year-olds with alcoholism and alcoholic psychosis, at the end of the year	878	571	1 117	825	1 512	2 205	2 416	3 101	2 095	2 155	2 656	2 758
Number of registered 15- to 17-year-olds with dependency upon narcotic and psychoactive substances, at the end of the year	432	354	577	568	1 550	3 018	5 567	9 023	10 698	11 909	15 920	6 122

Cont.

Category\Year	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012
Number of registered 15- to 17-year-olds with alcoholism and alcoholic psychosis, at the end of the year	3 635	4 415	4 555	4 205	1 283	1 057	823	660	577	482	391	230
Number of registered 15- to 17-year-olds with dependency upon narcotic and psychoactive substances, at the end of the year	4 016	1 305	827	1 034	750	877	864	643	507	333	208	143

#### Table 29. How would you evaluate youth health? Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE

<b>Health</b> \Age	18-19	20-24	25-29	30-34	35-39	40-44	45-49	50-54	55+
Very good	6%	6%	5%	4%	1%	2%	2%	0%	0%
Good	67%	64%	58%	56%	50%	44%	36%	26%	14%
Average, neither good nor bad	26%	27%	34%	37%	43%	49%	54%	62%	60%
Poor	1%	1%	2%	3%	5%	4%	7%	10%	21%
Very poor	0%	0%	1%		0%	0%		1%	4%
No answer	1%	2%	1%	2%	2%	2%	2%	3%	2%

Table 30. How would you evaluate youth health? Comparisons of those respondents who served in army and those who didn't. Source:Russia Longitudinal Monitoring survey, RLMS-HSE

Age	18-	-19	20-	-24	25-	-29	30-	-34	35-39		40-	-44	45	-49	50	-54	55	5+
Health	serve d	didn't serve																
Very good	10%	7%	10%	4%	6%	4%	6%	3%	1%	2%	1%	2%	2%	1%	0%		0%	0%
Good	40%	61%	70%	61%	66%	53%	57%	55%	57%	41%	48%	33%	36%	37%	26%	26%	14%	14%
Averag e, neither good nor bad	50%	29%	19%	31%	27%	38%	35%	38%	38%	48%	46%	59%	56%	46%	64%	54%	62%	55%
Poor		1%		1%	1%	3%	1%	4%	2%	7%	3%	5%	6%	13%	8%	15%	20%	24%
Very poor				0%		1%			1%		1%				0%	1%	3%	6%
No answer	0%	2%	1%	2%	0%	1%	1%	1%	1%	1%	1%	1%	1%	3%	1%	4%	1%	2%

Table 31. Main diseases across cohorts of Russian men. Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE

Diseases\ age	18-19	20-24	25-29	30-34	35-39	40-44	45-49	50-54	55+
heart diseases	3%	5%	4%	3%	3%	4%	10%	12%	29%
digestion system diseases	4%	7%	10%	10%	12%	15%	18%	18%	22%
spinal cord diseases	4%	8%	9%	9%	12%	13%	18%	20%	27%
high blood pressure	2%	4%	3%	6%	7%	13%	17%	22%	43%

 Table 32. Main diseases across the cohorts of Russian men comparing those who serve and who didn't serve in army. Sourse: Russia Longitudinal Monitoring survey, RLMS-HSE

Age	18-	-19	20-	-24	25-	-29	30-	-34	35-	39	40	-44	45-	-49	50-	-54	55	5+
	served in	didn't																
Diseases	army	serve																
heart		5%	1%	7%	3%	4%	2%	4%	0%	7%	3%	9%	9%	14%	11%	14%	28%	34%
diseases		570	1 /0	//0	570	4/0	2/0	4/0	070	/ /0	570	9/0	9/0	14/0	11/0	14/0	20/0	5470
digestion																		
system		8%	4%	9%	7%	11%	7%	12%	10%	16%	13%	22%	19%	17%	18%	20%	22%	23%
diseases																		
spinal cord	10%	10%	2%	11%	5%	11%	5%	11%	12%	13%	12%	17%	18%	20%	20%	19%	27%	28%
disiases	1070	1070		11/0	0,0	11/0	0,0	11/0	12/0	1070	12/0	1770	10/0	2070	2070	1970		-070
high blood pressure		4%	3%	5%	2%	4%	4%	8%	5%	9%	11%	20%	16%	18%	22%	22%	42%	46%

Table 34. Distribution of answers to the question "To what degree army is trustworthy?" between 1997 and 2014 (1997-2008 N=2100, 2009 N=1600) (in %). Source: Levada-Tsentr (2015b).

	1997	1998	1999	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013	2014
Trust\Year	Sept	March	Oct	Oct	April	June	Sept	Sept										
Army is																		
trustworthy	28	28	35	35	33	28	28	30	30	26	30	37	37	36	34	39	43	53
Army isn't fully																		
trustworthy	36	34	31	35	31	36	32	34	33	35	33	33	33	35	39	38	34	30
Army is not																		
trustworthy	16	19	16	16	18	21	22	20	21	23	19	12	16	16	17	15	13	9
Difficult to say	20	19	17	15	19	15	19	16	17	15	18	18	13	13	11	8	10	8

Table 35. Distribution of answers to the question "What is your attitude towards military service?" between 1997 and 2014 (in %). Source: Levada-Tsentr (2015a).

Statement\Year	August 1997	July 2000	June 2011	September 2014
Every real man should undergo military				
service	40	44	44	41
Military service – a duty that we owe to				
the state, even if it does not meet our own				
interests	28	24	30	40
Military service – senseless and				
dangerous business that one should try to				
avoid by every available means	24	23	19	15
Difficult to say	8	9	8	4

Table 36. Distribution of answers to the question "What is your attitude towards military service?" Answers by age groups (in %). Source: Levada-Tsentr (2015a).

Statement\Age	18-24	25-39	40-54	55 and older
Every real man should undergo military	27.7	42.1	40.4	11.0
service	27.7	43.1	40.4	44.6
Military service – a duty that we owe to				
the state, even if it does not meet our own				
interests	41.9	33.7	39.6	47
Military service – senseless and				
dangerous business that one should try to				
avoid by every available means	26.6	18.9	16	5
Difficult to say	3.9	4.3	4.1	3.5

Table 37. Attitudes towards military service. Distribution of answers for Moscow, other towns and village residents (in %). Source: Levada-Tsentr (2015b).

Statement\Location	Moscow	more than 500 thousand residents	from 100 to 500 thousand residents	towns with less than 100 thousand residents	villages
Every real man should undergo military					
service	26.1	40.1	40.4	47.2	40.1
Military service – a duty that we owe to					
the state, even if it does not meet our own					
interests	46.3	35.8	42.9	41.5	40.3
Military service – senseless and					
dangerous business that one should try to					
avoid by every available means	22.1	18.9	12.2	8.9	16.3
Difficult to say	5.4	5.2	4.5	2.3	3.4

Table 38. Attitudes towards military service. Distribution of answers for respondents in four income categories: poor, respondents with middle sized incomes, wealthy, rich (in %). Source: Levada-Tsentr (2015b).

Statement\Income	poor	middle sized incomes	wealthy	rich
Every real man should undergo military service	48.6	41.5	37.9	24.6
Military service – a duty that we owe to the state, even if it does not meet our own interests	42	42	38.3	34.6
Military service – senseless and dangerous business that one should try to				
avoid by every available means Difficult to say	8.1 1.3	11.7 4.8	20.5 3.3	<u> </u>

Table 39. Distribution of answers to the question: "In your opinion who should serve in the army?" Comparisons across age groups (in%). Source: Obshchestvennoye mneniye – 2014 (2015) Moskva: Levada-Tsentr.

Statement\Age	18-24	25-39	40-54	55 and older
Only conscripts according to conscription				
law	6.9	5.9	5.4	10.8
Only contracted soldiers who serve for				
money	41.8	34.3	22.6	19.4
Both conscripts and contracted soldiers	46.2	55.2	65.7	66.4
Difficult to say	5.1	4.6	6.2	3.5

Table 41. Number of new university graduate employed by research organizations between 2001 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Category\Year	2001	2003	2005	2007	2009	2011	2013
university graduates employed by research organizations in Russia	14 122	13 777	13 495	14 150	13 235	13 725	11 075

Table 42. Number of researchers in the Russian Federation between 2000 and 2013. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Category\Year	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Reserchers	425 954	422 176	414 676	409 775	401 425	391 121	388 939	392 849	375 804	369 237	368 915	374 746	372 620	369 015

Table 43. Number of researchers in the Russian Federation between 2000 and 2013 by age groups. Source: Federal'naya sluzhba gosudarstvennoy statistiki.

Researchers\Year	2008	2010	2011	2012	2013
Aged under 30	66 191	71 194	75 612	75 498	73 869
30-39	53 364	59 910	64 970	68 415	74 961
40-49	62 733	54 113	52 168	50 122	50 149
50-59	98 756	88 362	85 249	81 612	75 995
60-69	64 528	60 997	61 173	61 863	60 952
Aged 70 and older	30 232	34 339	35 574	35 110	33 089

Table 44. Planned numbers of university level students and vocational school students who concluded contracts with defense industrial companies for targeted training. Source: Gosudarstvennaya programma Rossiyskoy Federatsii "Razvitiye obrazovaniya" na 2013 - 2020 gody.

Category\Year	2015	2016	2017	2018	2019	2020
University level students	500	2 000	5 000	8 000	11 000	15 000
Vocational school students	500	1 000	2 500	3 500	4 500	6 000

Table 45. Overall number of students training for specialties needed by defense industries. Sourse: Gosudarstvennyy plan podgotovki nauchnykh rabotnikov i spetsialistov dlya organizatsiy oboronno-promyshlennogo kompleksa na 2011-2015 gody/ Gosudarstvennyy plan podgotovki kadrov so srednim professional'nym i vysshim obrazovaniyem dlya organizatsiy oboronno-promyshlennogo kompleksa na 2016 - 2020 gody.

Category\Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Higher professional training	13917	13690	13725	13728	14347	15100	15010	15095	16700	18830
Vocational school training	5085	5114	5128	5112	6169	2850	2950	2950	2970	3050

1996 1991 1992 1993 1994 1995 1997 1998 **Category**\Year 1990 1999 2000 2001 712 919 549 545 633 099 478 809 494 725 478 961 462 841 448 546 457 073 435 050 457 680 478 483 Urban 308 329 290 220 267 212 229 880 230 093 221 230 208 589 199 649 203 769 191 099 195 466 197 267 Rural 700 191 671 430 Total 1 021 248 923 319 816 757 708 689 724 818 648 195 660 842 626 149 653 146 675 750

Table 46. Number of boys born in reported year Source: Federal'naya sluzhba gosudarstvennoy statistiki

Cont.

<b>Category</b> \Year	2002	2003	2004	2005	2006	2007	2008	2009	2010	2011	2012	2013
Urban	514 497	541 670	553 389	533 758	537 786	577 242	614 182	636 022	650 166	653 384	698 235	697 732
Rural	205 014	219 264	219 584	215 796	223 045	251 530	266 361	269 358	269 473	270 420	280 292	276 571
Total	719 511	760 934	772 973	749 554	760 831	828 772	880 543	905 380	919 639	923 804	978 527	974 303