Considerations on new Rosstat data on the contribution of Russia's military goods sector to GDP growth in recent years
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Abstract

This policy brief considers the newly clarified contributions of the military goods sector to economic growth in Russia from 2011 to 2015. The discussion is based on Rosstat’s recently released official data on disaggregated sectoral value-added.

Keywords: Russia, military goods, growth, GDP, manufacturing

JEL codes: F51, F52, H56, L64
Introduction

The exposure of Russian economic growth to changes in international oil prices is well recognized. However, it now appears that the economic impact on Russia’s economy from a decline in world oil prices from over $120 a barrel in 2011 to below $40 in 2015 was partly offset by a manufacturing stimulus. The growth impetus largely came from increased output of military goods, a sector where Russia enjoys fairly high competitiveness in the global arms market. The short analysis below stems from insights provided by newly released official data on disaggregated sectoral value-added.

What the new GDP data tell us about the value-added of Russian military goods

On April 4, 2016, Russia’s Federal State Statistics Service (Rosstat) posted on their website a new series of overall current GDP at market prices, as well as sectoral value-added at basic prices. Rosstat made large upward revisions of current GDP and sectoral value-added for the period 2011–2015. Looking at the disaggregated version of sectoral value-added, we are struck by Rosstat’s reclassification of two disaggregated sectors. Russian sector classification code, introduced in 2003, follows an international code (NACE version 1.1). Two of Russian disaggregated sectors prior to April 4, 2016 consisted of the following:

- **A1**: Other transport equipment (Code 35), and
- **A2**: Other manufacturing (Codes 37 + 23.3 + 24.61 + 29.6).

More specifically,

**Code 35**: Manufacture of other transport equipment, including

- 35.1 Building and repairing of ships and boats;
- 35.2 Manufacture of railway and tramway locomotives and rolling stock;
- 35.3 Manufacture of aircraft and spacecraft;
- 35.4 Manufacture of motorcycles and bicycles, and
- 35.5 Manufacture of other transport equipment and not elsewhere classified items.

**Code 23.3**: Processing of nuclear fuel,

**Code 24.61**: Manufacture of explosives (gunpowder etc.),

**Code 29.6**: Manufacture of weapons and ammunition, and

**Code 37**: Recycling.

Since April 4, 2016, these have been reclassified into two new sectors:

- **B1**: Codes 35 + 23.3 + 24.61 + 29.6, and
- **B2**: Code 37.

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1 Cooper (2016) provides an outline of Russian military development from 1991 to 2015. Unfortunately, his analysis could not take advantage of the new evidence on the contribution of military goods in the national accounting.
Obviously, goods under codes 23.3, 24.61 and 29.6 are military manufacturing goods. Code 35 can also be considered military goods, even though about 20% of the goods of Code 35 are for civilian or mixed uses. Thus, the new classification clearly aggregates military goods into a single sector (B1), while non-military recycling is classified into another sector (B2). This may imply that Russian authorities recognize the important role and position of the military goods in the national accounting and economic growth, and seek to make clear the existence of their globally competitive military goods sector and the wide range of products offered.

In any case, the military goods sector (B1) essentially covers all goods produced by the giant Russian military conglomerates, including Almaz-Antey (anti-aircraft defense systems, missiles, etc.), United Aircraft Corp3 (Sukhoi, MiG, etc.), Russian Helicopters, Uralvagonzavod6 (battle tanks, etc.), RTI (military hardware and information and security systems), as well as many other smaller defense manufacturers.

Table 1 presents data on the military goods (sector B1) based on Rosstat’s recently released breakdown of Russian GDP.

### Table 1. Value-added of Russian military goods

<table>
<thead>
<tr>
<th></th>
<th>2011</th>
<th>2012</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
</tr>
</thead>
<tbody>
<tr>
<td>Current value-added</td>
<td>453.9</td>
<td>589.1</td>
<td>658.7</td>
<td>838.9</td>
<td>944.0</td>
</tr>
<tr>
<td>% real change</td>
<td>-11.73</td>
<td>7.58</td>
<td>7.61</td>
<td>-4.85</td>
<td></td>
</tr>
<tr>
<td>Share in GDP %</td>
<td>0.8</td>
<td>0.9</td>
<td>0.9</td>
<td>1.1</td>
<td>1.2</td>
</tr>
<tr>
<td>Share in manufacturing value-added %</td>
<td>6.6</td>
<td>7.7</td>
<td>8.0</td>
<td>9.1</td>
<td>9.2</td>
</tr>
<tr>
<td>Contribution to GDP growth rate %</td>
<td>-0.09</td>
<td>0.07</td>
<td>0.07</td>
<td></td>
<td>-0.05</td>
</tr>
<tr>
<td>Contribution to manufacturing value-added growth rate %</td>
<td>-0.78</td>
<td>0.58</td>
<td>0.61</td>
<td></td>
<td>-0.44</td>
</tr>
<tr>
<td>Current GDP</td>
<td>59698</td>
<td>66927</td>
<td>71017</td>
<td>77945</td>
<td>80804</td>
</tr>
<tr>
<td>% real change</td>
<td>4.26</td>
<td>3.52</td>
<td>1.28</td>
<td>0.71</td>
<td>-3.73</td>
</tr>
<tr>
<td>Current manufacturing value-added</td>
<td>6830</td>
<td>7693</td>
<td>8282</td>
<td>9209</td>
<td>10245</td>
</tr>
<tr>
<td>% real change</td>
<td>6.28</td>
<td>5.44</td>
<td>4.40</td>
<td>0.58</td>
<td>-5.06</td>
</tr>
<tr>
<td>Budgetary defence expenditure (% GDP)</td>
<td>2.5</td>
<td>2.7</td>
<td>3.0</td>
<td>3.2</td>
<td>3.9</td>
</tr>
</tbody>
</table>

**Sources:** Author’s calculations based on new Rosstat figures (www.gks.ru) from April 4, 2016.

**Notes:** Value-added is given here in basic prices, which excludes net taxes on products. GDP is given in market prices, which includes net taxes on products.

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2 The *Defense News* Top 100 rankings for 2012–2016 ([http://people.defensenews.com/top-100/](http://people.defensenews.com/top-100/)), consistently include six or seven Russian military companies among the world’s top 100 military corporations, defined as companies that receive on average at least 80% of their revenues from sales of equipment for military uses.
We see the share of value-added of the military goods sector at basic prices in overall GDP increased from 0.8% in 2011 to 1.1% in 2014, and to 1.2% in 2015 (a share larger than automobiles). If we measure value added of the military goods industry at market prices, the share exceeds 2% of GDP. The share of military goods in overall manufacturing value-added at basic prices amounted to 7% in 2011, rising to 9% in 2014 and 2015. Military goods value-added in real terms grew at a rate between 8% and 12% a year during 2012–2014, then contracted by 5% in 2015.

Figure 1 presents the contribution of military goods manufacturing value-added to overall GDP growth. Figure 2 shows the overall growth of manufacturing value-added.

Figure 1. Contribution of military goods to GDP growth (%).

![Figure 1](image1)

Sources: Author’s calculation based on data posted by Rosstat on April 4, 2016.

Figure 2. Contribution of military goods to manufacturing value-added (%).

![Figure 2](image2)

Sources: Author’s calculation based on Rosstat data posted on April 4, 2016.

Figure 1 shows the contribution of military goods to GDP growth rose from 2.5% in 2012 to 10% in 2014. In 2015, the contribution of military goods to the GDP contraction was rather small, just 1.4%. Figure 2 indicates the substantial contribution of the military goods industry to overall manufacturing. In 2014, military goods production accounted entirely for the 0.6% growth in manufacturing value-added. Similarly, the contribution of military goods production to the 5% contraction in manufacturing in 2015 was less than for the rest of manufacturing. In other words, the expansion in military goods manufacturing was sufficient to keep GDP growth positive up to 2014.
Military goods production is an exceptional export-oriented manufacturing industry in Russia’s case. Not only are there few manufactured Russian products in the global market, but unlike oil products, which also go to Europe, military goods are generally exported to emerging or developing economies in Asia (India, China, etc.), the Middle East, Latin America, and Africa. Russian defense manufacturers have enjoyed bumper export sales of military goods despite EU and US sanctions and lower oil prices. In real terms, revenue growth of Russian military corporations that made the Defense News Top 100 (based on the 2015 deflator for military goods value-added given in Table 1, i.e. 18.3 %), revenues of the military goods actually grew 5 % in 2015. Russian military goods exports in current US dollars increased from $10.7 billion (0.53 % of GDP) in 2011 to $13.2 billion (0.65 % of GDP) in 2014, and $14.5 billion (1.1 % in GDP) in 2015. Moreover, if these figures reflected the actual situation of the Russian military sector, the share of the military goods value-added at market prices would be considerably larger than shown in Table 1.

These observations suggest that the Russian military industry has managed to grow in the face of low oil prices and sanctions. As is shown by Table 1, defense expenditures from Russian federal budget as a percentage of GDP also increased for 2011–2015. As Russian federal budget revenue heavily depends on oil prices, the cut in defense spending was expected. State orders (goszakaz) for military goods were also expected to be cut, forcing the military goods sector to rely more on export revenues. However, an article in the Moscow Times and Duma discussions indicate that Russia’s federal government has decided the increase in budgetary defense spending for the sake of social protection, including pensions. Faced with stagnant oil prices, Mr. Putin may see military expansion as a sustainable means of supporting economic recovery and a robust military presence.

Outstanding issues

A quick assessment of the new Rosstat data on Russia’s military goods sector and their impacts on growth of GDP and manufacturing suggest that the recent military expansion was sufficient to offset the downturn in Russian growth in 2012–2014 caused by falling oil prices and sanctions, but was insufficient to overcome Russia’s growth challenges in 2015. Given the lack of a 2011 benchmark disaggregated input-output system with supplementary tables for distribution margins and net taxes on products, it is impossible to generate a complete picture of the contributions of the military goods sector. For example, we cannot say whether the foreign trade revenues of military export giant Rosoboronexport, the subsidiary of state-owned Rostec that holds monopoly control over defense exports, are recorded as trade margins or as the value-added of military goods producers. Moreover, we do not know whether the export and domestic taxes on military goods are given as sectoral value-added at basic prices (i.e. not including net taxes on products). To investigate the actual size of the contribution of military goods to GDP would require disaggregated input-output data with supplementary tables.

Whatever the case, Mr. Putin’s aspiration to a structural export reform that increases the export share of machinery & equipment to over 20 % by 2020 has yet to be adequately implemented by the defense industry (Ministry of Economic Development and Trade of the Russian Federation, 2007). Unlike the world’s oil and gas giants, or consumer product manufacturers like Toyota and Apple, Russia’s defense industry only has a small number of potential customers, and demand relies

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4 Based on the information in footnote 3, military goods represented 2.4 % of overall exports in 2014 and 3.7 % in 2015 ([www.gks.ru](http://www.gks.ru)).
extensively on geopolitical tensions. Thus, even with a military expansion, Putin has yet to establish a sustainable platform for restructuring Russia’s export structure.

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