Pharmaceutical cluster of St. Petersburg in the last 5 years has developed into the one of the most important instruments for economic growth:

- Founded in 2009

- More than 120 companies

- 28 percent of growth in the last year

- More than 100 different drugs, such as generics, biosimilar and original products.

- Engineering Centre of microreactor synthesis of active pharmaceutical ingredients for the development of innovative medicines, pharmaceutical substances and specialist training for the pharmaceutical industry
OVERALL PRODUCTION OF PHARMACEUTICAL PRODUCTS (MLN.RUB)

OVERALL PRODUCTION OF PHARMACEUTICAL PRODUCTS IN ST. PETERSBURG RELATIVE TO OVERALL PRODUCTION FOR THE RUSSIAN FEDERATION (%)

2013 2014 2015

<table>
<thead>
<tr>
<th>Year</th>
<th>St. Petersburg</th>
<th>Total Volume for the Russian Federation</th>
</tr>
</thead>
<tbody>
<tr>
<td>2013</td>
<td>15 332,44</td>
<td>250 000</td>
</tr>
<tr>
<td>2014</td>
<td>14 491,40</td>
<td>200 000</td>
</tr>
<tr>
<td>2015</td>
<td>19 396,77</td>
<td>150 000</td>
</tr>
<tr>
<td></td>
<td>8,52</td>
<td>8,07</td>
</tr>
</tbody>
</table>
## Drug manufacturing in the Federal districts of the Russian Federation

<table>
<thead>
<tr>
<th>Overall drug production (mln rub) ¹</th>
<th>2013</th>
<th>2014</th>
<th>2015</th>
<th>Growth rate 2013/2014 (%)</th>
<th>Growth rate 2014/2015 (%)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Central federal district</td>
<td>90 495,72</td>
<td>111 104,58</td>
<td>137 447,70</td>
<td>22,77</td>
<td>23,71</td>
</tr>
<tr>
<td>Northwest federal district</td>
<td>10 767,18</td>
<td>13 503,83</td>
<td>15 245,75</td>
<td>25,41</td>
<td>12,90</td>
</tr>
<tr>
<td>Southern federal district</td>
<td>381,52</td>
<td>409,19</td>
<td>600,49</td>
<td>7,25</td>
<td>46,75</td>
</tr>
<tr>
<td>North-Caucasian federal district</td>
<td>3 770,30</td>
<td>2 744,59</td>
<td>3 226,29</td>
<td>-27,20</td>
<td>17,55</td>
</tr>
<tr>
<td>Privolzhsky (Volga) federal district</td>
<td>45 804,70</td>
<td>38 127,75</td>
<td>46 521,20</td>
<td>-16,76</td>
<td>22,01</td>
</tr>
<tr>
<td>Urals federal district</td>
<td>10 465,98</td>
<td>12 510,77</td>
<td>15 292,80</td>
<td>19,54</td>
<td>22,23</td>
</tr>
<tr>
<td>Siberian federal district</td>
<td>16 380,07</td>
<td>17 934,37</td>
<td>20 838,31</td>
<td>9,49</td>
<td>16,19</td>
</tr>
<tr>
<td>Far eastern federal district</td>
<td>1 906,33</td>
<td>2 113,73</td>
<td>2 482,69</td>
<td>10,88</td>
<td>17,46</td>
</tr>
<tr>
<td>Crimerian federal district</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
<td>-</td>
</tr>
</tbody>
</table>
Saint-Petersburg State Chemical Pharmaceutical Academy (SPCPA) was founded in 1919 and is now the oldest institution of higher pharmaceutical education in Russia.

- The Academy has been training international students for over 50 years.
- The graduates of the Academy work in more than 30 countries of Europe, Asia, Africa and Latin America.
The Academy has available necessary classroom facilities and laboratories, nurseries of medicinal plants, reading rooms, up-to-date apparatus and equipment for research, computer classes, hooked up to the Internet.

At present foreign citizens from 21 countries are taught at the Academy, making up 25% of the whole number of students. They include students from Syria, Morocco, Egypt, Tunis, Lebanon, Jordan, Israel, Greece, Turkey, Pakistan, Tanzania, Kenya, Venezuela, Peru, China, and others.
BIOCAD is a global leading innovative biotechnology company in Russia. The company provides original and generic drug products to treat complex health conditions, such as cancer, HIV, multiple sclerosis, Hepatitis C infections and other disorders. The company employs about 1300 workers, including more than 450 researchers. In 2016, the revenue of the company exceeded 14 billion roubles, c. €230 million. The company plans to enter European market through partnership in Finland.

June 2016 witnessed the opening of the first R & D complex in Russia aimed at developing innovative medicines for advanced therapy. This modern medicine field includes gene and cell therapy for curing diseases, previously not responding to treatment, i.e. congenital genetic abnormalities, last stages of cancer, and many others.

In July 2016 "BIOCAD" created an innovative drug for rheumatoid arthritis treatment. The new drug (VSD-121) improves therapy efficiency up to 15-20% compared to its predecessors. Today there is no registered drug with therapy similar mechanism in the world.
• In October 2016 within the framework of XIII-th Forum of interregional cooperation of Kazakhstan and Russia presided over by the heads of states "BIOCAD" and Karaganda pharmaceutical complex (Kazakhstan) signed an agreement on the implementation of technology transfer for the complete production cycle of biosimilars rituximab, bevacizumab and trastuzumab, including marketing. The agreement amounted to more than 100 million dollars.

• In September 2016 the construction of a 24 000 sq.m scientific and production center began on "Neudorf" site, SEZ "St. Petersburg". The project develop and start manufacturing more than 30 drugs from the vital and essential medicines list. Investment in the project amounts to about 4 billion rubles.

• In May 2017 Global biotechnological company BIOCAD expands its operations to Finland. The company will establish a production line in Turku and begin collaboration with the University of Turku and Åbo Akademi University. The partner program covers collaboration in education, fundamental sciences and commercial manufacturing. Total investment over 7 years will exceed €25 million.
In March 2016 "GEROPHARM" group obtained a license for conducting international multicentre clinical trial of a new oral "Evo glyptin" drug for treating type 2 diabetes. Today glyptins (DPP-4 inhibitors) represent more than half of the world market of oral antidiabetic drugs, the Russian market alone amounting to about 2.5 billion rubles. In Russia, this drugs class includes only 5 drugs.

In June 2016 St. Petersburg and "GEROPHARM" Group signed an agreement within the framework of St. Petersburg international economic forum-2016 focusing on the cooperation for the implementation of "GEROPHARM" investment project in the Pushkin district of St. Petersburg for the development and production organization of insulin, insulin analogs, pharmaceutical substances and medicinal products based on them. This agreement is unrivalled in the matter of localization in the Russian Federation.

In August 2016 "GEROPHARM" group became the "Company of the year-2016" according to "Business Petersburg", it was the first time the award was rewarded. "GEROPHARM" won the award in several categories - "modernization", contribution to technological development and "Best Employer" for creating an inclusive working environment and Innovation" for new products developing categories.
In January 2016 "Scientific and pharmaceutical company "POLYSAN", LLC and Pfizer biopharmaceutical company signed a contract for production of three Pfizer drugs on POLYSAN factories: the original dyslipidemia drug, new tableted drug with a unique action mechanism rheumatoid arthritis treatment and an oxazolidinone class antimicrobial drug. These drugs help people suffering from atherosclerosis, rheumatoid arthritis, and Staphylococcus aureus.

In March 2016 "Scientific and pharmaceutical company "POLYSAN", LLC became a member of National Committee for Economic Cooperation with Latin America countries (CEPLA NC) which provides more opportunities for conducting targeted activities to enter Latin America pharmaceutical market interested in original drugs developed by the company.

On June 16, 2016 during SPIEF-2016 St. Petersburg and "Scientific and pharmaceutical company" POLYSAN", LLC signed an agreement on the implementation of pharmaceutical products manufacturing investment project. Under the agreement, an infrastructure for training and professional development of qualified professionals in the pharmaceutical industry will be created on the POLYSAN premises.

In September 2016 "Scientific and pharmaceutical company "POLYSAN", LLC shipped its first batch of Reamberin to Bolivia. Preceding this event was the successful registration procedure of "Reamberin" and obtaining permits from Ministry of Health of the Republic of Bolivia for marketing the drug in Bolivia.
Company foundation: 2001
Main Office: St. Petersburg (HQ)
Branch Offices: Moscow, Novosibirsk, Rostov-on-Don and Astana (KZ)
Sales Rep Offices: Nizhniy Novgorod, Ufa, Kazan, Yekaterinburg, Chelyabinsk, Krasnodar, Khabarovsk, Vladivostok and Alma-Ata (KZ),
Professionals: over 260 employees on board
Our customers: health, education, research centers
Distribution network: over 900 companies

- Diagnostics
- Life Science
- Distribution
- Manufacturing
- Software development
• Vital Development Corporation JSC was founded in 1999 by a group of experienced biochemistry and management specialists, working together since 1994.

• For the moment, Vital Development Corp. is a leading manufacturing company in the field of IVD reagent kits in CIS countries and Russia.

• Company is marketing their products in domestic and international sectors through the direct sales staff and a broad network of distributors, covering more than 5000 clinical laboratories.

• Original products are already brought to the African and Asian markets. Today the distribution network consists of more than 500 companies, which is expected to increase significantly in the coming quarters.
Thank you for your attention!