UDMURTIA ON THE MAP OF RUSSIA

41,200 SQ KM
Area
(56th/85*)

1.5 M
Population
(30th/85*)

RUB 622.7 BILLION¹
GRP
(33rd/85*)

RUB 412,300²
GRP per capita
(42nd/85*)

UDMURTIA’S LARGEST CITIES

IZHEVSK 650,000

SARAPUL 98,000

VOTKINSK 98,000

GLAZOV 93,000

970 KM
Distance from Izhevsk to Moscow:
2 hours

18 hours (1200 km)

KEY TRANSPORT INFRASTRUCTURE:

Trans-Siberian Railway (Balezino Station, Glazov Station)
P320 Elabuga-Izhevsk regional highway, connection to M7 Volga
Udmurt Republic
Volga Federal District (VFD)

¹ Preliminary data for 2018, Ministry of Economy of the Udmurt Republic
² Ranking among Russian regions in 2017
³ Source: PwC analysis on the basis of Rosstat data and geodata
Chairman of VEB.RF
IGOR SHUVALOV

financing tools.

“VEB.RF, the Russian Export Centre, DOM.RF and the SME Corporation are providing the people of Udmurtia with essential tools to attract investors, open new manufacturing sites, create new jobs, upgrade existing enterprises and promote goods made in Udmurtia in foreign markets. VEB.RF has forged a comprehensive partnership with the regional administration. We are ready to participate in the region’s priority investment projects on transport infrastructure and urban development, including a major upgrade of public transportation networks. Another economic priority is the diversification of Udmurtia’s defence sector. The region’s highly educated population and human capital resources provide Udmurtia with the opportunity to enhance existing manufacturing capacities and produce highly competitive civilian-use goods using low-cost financing tools.”

Mikhail Oreskhin
Minister of Economic Development of the Russian Federation

“Udmurtia’s focus on driving non-resource-based exports, training entrepreneurs and promoting entrepreneurship, enhancing productivity and adopting best practices from other regions, with the proper implementation, is definitely the right way to develop the region’s economy.”

Denis Manturov
Minister of Industry and Trade of the Russian Federation

“Udmurtia is a region with enormous investment potential and ambitious goals to develop the manufacturing sector. There is intense demand for investment among companies in Udmurtia and strong collaboration between the regional administration and the Industrial Development Fund established by the Russian Ministry of Industry and Trade. Regional companies are participating in joint modernisation initiatives and setting up new production lines and import-substitution products. As a result, Udmurtia today is one of the 10 leading Russian regions in terms of prowess. An amount raised via the Industrial Development Fund. In 2018, companies filed RUB 1 billion worth of requests with the Fund and signed RUB 500 million worth of contracts. In 2019, Udmurtia plans to attract around RUB 750 million via the Industrial Development Fund to develop manufacturing projects.

The region’s cluster of oil and gas equipment manufacturers is going to be a powerful driver in developing the oil and gas sector. Furthermore, the region is successfully facilitating the conversion of military enterprises to civilian-use manufacturing, and, in the process, creating jobs and demand for further investment.”

Dmitry Patrushev
Minister of Agriculture of the Russian Federation

“Udmurtia’s climate and environment provide an excellent foundation for the further development of the agribusiness, food, raw materials and consumer goods sectors. Fast growth has helped to drive promising investments in Udmurtia’s agricultural sector, where there are vast opportunities on both the Russian and international market.”

DMITRY PATRUSHEV

THE REGIONAL ADMINISTRATION HAS INITIATED AN INVESTMENT AUDIT TO SUPPORT UDMURTIA’S LONG-TERM ECONOMIC DEVELOPMENT

2014

Investment strategy

Udmurtia’s 2025 Investment Strategy is aimed at enhancing the republic’s investment appeal and nurturing a favourable environment for investment projects.

The strategy’s main objectives are to:

— improve the competitiveness of regional manufacturing;
— ensure a better quality of life for the people;
— retain and develop human capital;
— develop small and medium enterprises;
— drive well-balanced regional development.

Map of investment opportunities

The Udmurt Republic undertook a massive stock-taking of its investment resources and developed a map of investment opportunities: madeinudmurtia.ru

Investment audit

An investment audit of the Udmurt Republic has been conducted, resulting in the following outcomes:

— the leading factors promoting the investment attractiveness of the Udmurt Republic have been confirmed, including in the five industries selected for an in-depth audit;
— based on an analysis of the market and resources in the Udmurt Republic, 10 priority areas have been identified (out of 100) to attract strategic investors to the Udmurt Republic; and related areas have been determined for further investment;
— the advantages of the Udmurt Republic have been identified to attract strategic investors to the 10 priority areas, including a list of potential regional partners;

Udmurt Republic 2027 Social and Economic Strategy

The strategy will be based on growth areas identified during the investment audit.

ALEXANDER BRECHALOV
Governor of the Udmurt Republic

“We will use the results of PwC’s investment audit to build a new strategy to develop the regional economy through 2027.”
THE FIRST RESULTS OF THE INVESTMENT AUDIT OF THE UDMURT REPUBLIC

ESTABLISHMENT OF OOO SOFTLINE OUTSOURCING

SOFTLINE IS OPENING AN OFFICE IN UDMURTIA TO OUTSOURCE ACCOUNTING SERVICES

UP TO **400 JOBS**

**Project Description:** Establishment of OOO Softline Outsourcing, which provides a range of staffing and accounting outsourcing services.

**Investor:** Softline

**Number of jobs:** up to 400

**Taxes to the Consolidated Budget of Udmurtia:** RUB 46 million a year

**Status:** The office has been launched and the first employees hired.

---

ESTABLISHMENT OF A RUSSIAN POST R&D CENTRE

THE RUSSIAN POST IS OPENING AN R&D CENTRE TO DEVELOP END-TO-END TECHNOLOGIES

**300 JOBS**

**Project Description:** Establishment of a Russian Post R&D Centre to develop end-to-end digital technologies.

**Investor:** Russian Post

**Number of jobs:** up to 300

**Taxes to the Consolidated Budget of Udmurtia:** RUB 44 million a year

**Status:** Office is being arranged and advance team hired.

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IZHEVSK AIRPORT RENOVATION

NEGOTIATIONS WITH A STRATEGIC INVESTOR ARE UNDERWAY TO ATTRACT PRIVATE INVESTMENT TO A PROJECT ON RENOVATING THE IZHEVSK AIRPORT

**RUB 3.4 BILLION IN PRIVATE INVESTMENT**

**Project Description:** Izhevsk Airport renovation

**Implementation term:** 2019-2024 (2019-2020: design and price audit, 2021-2014: reconstruction and construction)

**Total investments:**
- RUB 6.8 billion, including:
  - Federal budget funds, RUB 3.4 billion
  - Private investments, RUB 3.4 billion

**Status:** Negotiations with the strategic investor are underway.

Source: Development Corporation of the Udmurt Republic
**Key objectives of the investment audit:**

1. Identify the competitive advantages of Udmurtia for direct investment
2. Identify direct investment growth points in Udmurtia
3. Prepare recommendations on the development of regional infrastructure
4. Develop a roadmap for priority investment areas

**Key advantages of Udmurtia identified in the investment audit:**

1. Our retrospective analysis has demonstrated that the region’s favourable business climate can already be credited with fostering investment successes.
2. The regional administration is highly accessible for everyday work with investors.
3. The regional administration has taken special measures to focus on important dimensions of social and economic development.
4. Udmurtia provides investors with relevant information about opportunities in the region via the modern communication channels.
5. The consumer market in and around Udmurtia is more than RUB 2 trillion.
6. PwC analysis has identified investment appeal factors across five industries selected for an in-depth audit.
7. PwC analysis has identified ten top priority investment opportunities to attract strategic investors to the Udmurt Republic.
8. The transport infrastructure in Udmurtia offers significant advantages to investors.
1. WHERE TO INVEST IN UDMURTIA — 11 P.

1.1 High-potential investment areas in Udmurtia — 12 p.
1.2 Investment opportunities in Udmurtia — 14 p.
1.3 PPP opportunities in Udmurtia — 36 p.

2. REGIONAL SUPPORT FOR INVESTORS IN UDMURTIA — 39 P.

2.1 Tax incentives — 40 p.
2.2 Financial incentives — 42 p.
2.3 Infrastructure incentives — 48 p.
2.4 Administrative incentives — 51 p.

3. BENEFITS FOR INVESTORS IN UDMURTIA — 53 P.

3.1 Rankings — 54 p.
3.2 Transport infrastructure — 56 p.
3.3 Human capital — 60 p.
3.4 Investment sites and industrial parks — 62 p.

4. APPENDICES — 79 P.

4.1 Business success stories in Udmurtia — 80 p.
4.2 Advantages of investing in five industries selected for an in-depth audit — 95 p.
4.2.1 Dairy farming — 96 p.
4.2.2 Wood — 100 p.
4.2.3 Machinery — 104 p.
4.2.4 Food production — 108 p.
4.2.5 Petroleum refining — 110 p.
4.3 Investment projects of the Udmurt Republic proposed for joint implementation — 113 p.

Key contacts in the regional administration — 136 p.
WHERE TO INVEST IN UDMURTIA
PWC analysis identified the investment appeal factors across five industries selected for an in-depth audit.

**Economic Performance and Industrial Productivity**

<table>
<thead>
<tr>
<th>Industry</th>
<th>Key Figures</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Dairy Farming</strong></td>
<td>4%</td>
</tr>
<tr>
<td><strong>Petroleum Refining</strong></td>
<td>9%</td>
</tr>
<tr>
<td><strong>Wood</strong></td>
<td>9%</td>
</tr>
<tr>
<td><strong>Machinery</strong></td>
<td>2%</td>
</tr>
<tr>
<td><strong>Food Production</strong></td>
<td>2%</td>
</tr>
<tr>
<td><strong>Other</strong></td>
<td>&gt;10%</td>
</tr>
<tr>
<td><strong>Other</strong></td>
<td>&gt;80%</td>
</tr>
</tbody>
</table>

**Human Capital**

- **Izhevsk State Agricultural Academy**: A field-specific university that provides education programmes specialised for the agricultural sector.
- **Gutseriev Oil and Gas Institute**: A field-specific university that provides specialised education programmes for the oil and gas sector.
- **Kalashnikov Izhevsk State Technical University**: A field-specific university that provides education for machine building industries.

**Business Expenses**

- **Udmurtneft Bolshennik**: Annual oil production in Udmurtia is 11 million tonnes.
- **Priority industry in the Sarapul PSEDA**
- **Priority industry in the Glazov and Sarapul PSEDAs**

**Other**

- **Livestock breeding makes up a larger share of regional company revenues in Udmurtia than in other leading milk production regions.**
- **Investment as a share of company revenues is higher than the national average.**
- **Machine building as a share of company revenues is higher than the national average.**
- **The employment rate in the sector is higher than the national average and at the level of leading peer regions.**
- **The average cost of acquiring industrial land is lower than in comparable leading regions. The total cost of connecting a standard production facility to utilities (electricity, water, waste disposal, heating) in the Udmurt Republic is lower than in four out of five comparable regions.**
- **Companies have signed specialist education contracts with the university.**

**Sources:** Refer to Appendix 4.2
The second stage of the project will include production of pharmaceuticals for specified items.

- **General Machinery**
  - Development of Metal-Processing Machines
    - Processing centers:
      - Metals-processing presses
      - Small presses for solid municipal waste processing
      - Turning machines
    - The second stage of the project may include localisation of additional niche products, including industrial robots and 3D printers for handling metal.
  - Expansion and Localisation of Pump and Compressor Production
    - Rotor pumps
    - Screw compressors
    - Cryogenic pumps
    - Product pumps
    - Block oil pump stations
    - Other types of products in accordance with the sectoral plan for import substitution issued by the Ministry of Industry and Trade of Russia for the oil and gas sector

- **Electronics**
  - Launch of Device and Sensor Production, Including Smart City Solutions
    - Pollution emission control devices at enterprises (part of automatic emission control systems)
    - Smart city devices and sensors (noise and temperature sensors, smart lighting, smart traffic lights)
    - Smart utility meters (electricity, water, gas)

- **Electronics**
  - Launch of Medical Equipment Production
    - Equipment for oncological diagnostics
    - Equipment for cardiovascular treatments
    - Medical robots
    - Portable medical devices
    - Implantable items

- **Chemicals**
  - Launch of Industrial Paints and Varnishes Production
    - Industrial paints and varnishes:
      - for protection of metals and pipes
      - paints for automobile production
      - paints for shipbuilding
      - paints for furniture production
      - paints for rail transport

- **Pharmaceuticals**
  - Launch of Pharmaceutical Production with Subsequent Deepening of Localisation and Substances Production
    - Antibiotics
    - Hormonal drugs
    - Vitamins
    - Insulin-based drugs
    - Other drugs that are currently imported to Russia
    - The second stage of the project will include production of pharmaceuticals for specified items.

- **Food Products**
  - Launch of Serum Production for Dry Infant Milk Formulas and Construction of Dairy Farms
    - Dry infant milk formulas with subsequent deepening of localisation and serum production for dry milk formulas and dry milk
    - Creation of dairy farms that will meet the needs of new projects for processing raw materials
OPPORTUNITY DESCRIPTION
Creation of a joint venture by expanding the current production of Kalashnikov Engineering with the involvement of a foreign strategic partner or creating a new production using the AO Bummash metal processing enterprise. Partners in project development could be attracted, including the Votkinsk plant or OAO NITI Progress.

POTENTIAL PRODUCTS
- Processing centres
- Metal-processing presses
- Small presses for solid municipal waste processing (up to 3 tonnes)
- Turning machines

Kalashnikov Engineering (part of the Rostec Group) manufactures its own machines. OAO NITI Progress and the Votkinsk Factory manufacture metalworking machines and parts upon individual orders, including internally-designed machines.

The project may be implemented using the production facilities of Kalashnikov Engineering or AO Bummash, or at the Sarapul or Glazov PSEDAs, with appropriate benefits.

Graduates of Izhevsk State Technical University with a degree in design and technological support for engineering production (1,784 students in 2018), as well as graduates of Votkinsk Industrial and Izhevsk Engineering Schools with a degree in adjuster of machines and equipment in machining (49 and 90 students, respectively, in 2018) could be involved.

AO Bummash and Votkinsk Factory

Casting metal parts of machines

Enterprises from the Ural Federal District

Supply of metals to Udmurtia

Potentially strategic partners in the region
Kalashnikov Engineering (part of the Rostec Group) manufactures manufactures its own machines. OAO NITI Progress and the Votkinsk Factory manufacture metalworking machines and parts upon individual orders, including internally-designed machines.

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY

Consumers of the machines may include enterprises engaged in metalworking, machine building and automobile manufacturing. Udmurtia is favourably located in the Volga Federal District and near the Ural Federal District, which are key engineering centres. In the region, machines are purchased by Kalashnikov Concern, Uralmash Concern, Votkinsk Plant, Izhmetprom, IzhSpets, Izhneftemash, Izhstal, LADA Izhevsk, etc. In the Volga Federal District and closely located areas in the Ural Federal District, potential consumers include ChTZ, ChTPZ, Uralskaya Kuznitsa (Chelyabinsk Region), Uralmashzavod and Uralvagonzavod (Sverdlovsk Region), AvtoVAZ and RCC Progress (Samara Region), KAMAZ and KVZ (Republic of Tatarstan), and GAZ and Sokol (Nizhny Novgorod Region).

INVESTMENT OPPORTUNITY

Key Project Parameters
- RUB 0.5-3.0 billion potential investment volume
- 10.7-27.4% range of potential profitability

Market Prerequisites for New Project Implementation

Key Project Prerequisites
- RUB 95 billion Machines market in Russia in 2018.
- RUB 42.1 billion Niche market for import substitution in Russia in 2018.

High moral and physical depreciation of capital assets in Russian machine building (about 50%). Digitalisation of enterprises requires renovation of a vast amount of machines.

Imported machines accounted for 96% of purchases in 2018.

Legislation stimulating localisation is being updated, including the import substitution plan of the Ministry of Industry and Trade of Russia as of 2015, soft lending (at 5% rate since 2018) by the Industrial Development Fund for launching machine-tool building projects, and prohibition on purchasing foreign machines if there are Russian analogues (since March 2019).

POTENTIAL MARKET
Consumers of the machines may include enterprises engaged in metal working, machine building and automobile manufacturing. Udmurtia is favourably located in the Volga Federal District and near the Ural Federal District, which are key engineering centres. In the region, machines are purchased by Kalashnikov Concern, Uralmash Concern, Votkinsk Plant, Izhmetprom, IzhSpets, Izhneftemash, Izhstal, LADA Izhevsk, etc. In the Volga Federal District and closely located areas in the Ural Federal District, potential consumers include ChTZ, ChTPZ, Uralskaya Kuznitsa (Chelyabinsk Region), Uralmashzavod and Uralvagonzavod (Sverdlovsk Region), AvtoVAZ and RCC Progress (Samara Region), KAMAZ and KVZ (Republic of Tatarstan), and GAZ and Sokol (Nizhny Novgorod Region).

INVESTMENT OPPORTUNITIES IN UDMURTIA

17

Made in Udmurtia

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry

ADVANTAGES OF THE UDMURT REPUBLIC

Potential Strategic Partners in the Region
Kalashnikov Engineering (part of the Rostec Group) manufactures manufactures its own machines. OAO NITI Progress and the Votkinsk Factory manufacture metalworking machines and parts upon individual orders, including internally-designed machines.

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY

AO Bummash and Votkinsk Factory

Cast metal parts of machines

Enterprises from the Ural Federal District

Supply of metals to Udmurtia

Site and Regional Preferences
The project may be implemented using the production facilities of Kalashnikov Engineering or AO Bummash, or at the Sarapul or Glazov PSEDAs, with appropriate benefits.

Human Capital
Graduates of Izhevsk State Technical University with a degree in design and technological support for engineering production (1,784 students in 2018), as well as graduates of Votkinsk Industrial and Izhevsk Engineering Schools with a degree in adjuster of machines and equipment in machining (49 and 90 students, respectively, in 2018) could be involved.
OPPORTUNITY DESCRIPTION
The launch of production of separator equipment for automated waste sorting with the involvement of a foreign partner (technology owner). Localisation is possible at facilities operated by Kalashnikov Engineering, AO SEGZ (part of the Rostec Group) and NITI Progress. The production of non-technology-intensive components on contract for waste sorting facilities is possible at facilities operated by OOO IzhMSK, AO Bummash, OOO Donvard Hydraulic Systems, OMO Izhneftemash, OOO NPO Gidrosistemy, Votkinsk Factory and NITI Progress.

POTENTIAL PRODUCTS
- Separators for automatic waste sorting
- Non-technology-intensive components for waste sorting complexes, including conveyors, hydraulic drives, metal structures, grinders (shafts and knives), presses, tanks and storage containers, etc.

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY
As part of the National Ecology Project, Russia is planning to increase the share of sorted municipal solid waste from 7% to 60% by 2024. The Russian Environmental Operator (REO) plans to stimulate localisation of equipment for sorting plants. By 2024, it is planned to achieve reduction in the share of equipment imported to process municipal solid waste from 50% in 2018 to 22% in 2024. The REO also plans to stimulate consumption of domestic equipment among regional municipal solid waste operators by providing beneficial loans and leasing.

POTENTIAL MARKET
The territorial distribution of 220 plants is assumed to be proportional to the volume of municipal solid waste generated in the regions. In Udmurtia, the launch of two waste sorting facilities and eight waste sorting stations is expected. Since separators are expensive products, Russia as a whole and the Volga Federal District in particular may form a market for them. Udmurtia and neighbouring regions should become a market for non-technology-intensive components, since the production of such components is planned to be concentrated in close proximity to the plant under construction.

MARKET PREPREREQUISITES FOR NEW PROJECT IMPLEMENTATION
- 70 MILLION TONNES
  the amount of municipal solid waste generated in Russia in 2018
- 220 PLANTS
  for municipal solid waste processing and disposal are planned to be built by 2024 in Russia

- As part of the National Ecology Project, Russia is planning to increase the share of sorted municipal solid waste from 7% to 60% by 2024.
- The Russian Environmental Operator (REO) plans to stimulate localisation of equipment for sorting plants. By 2024, it is planned to achieve reduction in the share of equipment imported to process municipal solid waste from 50% in 2018 to 22% in 2024.
- The REO also plans to stimulate consumption of domestic equipment among regional municipal solid waste operators by providing beneficial loans and leasing.

ADVANTAGES OF THE UDMURT REPUBLIC
- Separator production could be implemented at sites operated by Kalashnikov Engineering, AO SEGZ, NITI Progress, or at the Sarapul and Glazov PSEDAs, which offer tax and other benefits.

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY
- OOOGSpetsavtohohozyaystvo is the regional municipal solid waste management operator responsible for establishing waste sorting facilities in the Udmurt Republic. Kalashnikov Engineering, AO SEGZ and NITI Progress have facilities for tool production and machine building (localisation of separators is possible).

- OOO IzhMSK
  Conveyors
  AO Bummash, Votkinsk Factory
  Shaped casting, metal structures, metal processing
  OAO Izhneftemash, OMO Izhneftemash, OOO NPO Gidrosistemy
  Hydraulic equipment

SITE AND REGIONAL PREFERENCES
Separator production could be implemented at sites operated by Kalashnikov Engineering, AO SEGZ, NITI Progress, or at the Sarapul and Glazov PSEDAs, which offer tax and other benefits.

HUMAN CAPITAL
Graduates of Izhevsk State Technical University with a degree in engineering, technological machinery and equipment, design and technological support for engineering production (2,418 students in 2018) may be involved. Graduates of technical schools with a degree in Engineering Technology (1,075 students in 2018) could also be involved.1

1 Dragunov Izhevsk Industrial College, Izhevsk Polytechnic College, Sadovnikov Votkinsk Engineering College, Glazov Polytechnic College, Sarapul College of Mechanical Engineering and Information Technology, Izhevsk Assembly College and Shutov Radiomechanical College.
**INVESTMENT OPPORTUNITY**

Expansion of the current production of pumps, pumping equipment and compressors for the oil and gas and utilities sectors and the localisation of new products using existing enterprises with the participation of a foreign partner (technology owner). Localisation is possible at facilities operated by OAO Izhneftemash, Izhdril Holding, GP Reduktor, OOO Donvard Hydraulic Systems, NPO Gidrosistemy and OOO ORION.

**POTENTIAL PRODUCTS**
- Rotor pumps
- Screw compressors
- Cryogenic pumps
- Product pumps
- Block oil pump stations
- Other types of products, in accordance with the sectoral plan for import substitution issued by the Ministry of Industry and Trade of Russia for the oil and gas sector adopted on 16 April 2019 (Order No. 1329)

OAO Izhneftemash, AO Votkinsk Factory, Izhdril Holding, AO IEMZ Kupol and GP Reduktor produce rotor, drilling and electric pumps, and pumping assemblies.

OOO Donvard Hydraulic Systems, NPO Gidrosistemy and OOO ORION produce hydraulic equipment, including pumps and pumping stations.

The project may be implemented at facilities operated by specified enterprises in the region or at the Sarapul and Glazov PSEDAs with tax and other benefits.

**HUMAN CAPITAL**

Graduates of Izhevsk State Technical University with a degree in power engineering may be involved (74 students in 2018).

**MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION**

**POTENTIAL STRATEGIC PARTNERS IN THE REGION**
- OAO Izhneftemash, AO Votkinsk Factory, Izhdril Holding, AO IEMZ Kupol and GP Reduktor produce rotor, drilling and electric pumps, and pumping assemblies.
- OOO Donvard Hydraulic Systems, NPO Gidrosistemy and OOO ORION produce hydraulic equipment, including pumps and pumping stations.

**INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY**

The above mentioned companies

Components for pumps and compressors

**SITE AND REGIONAL PREFERENCES**

The project may be implemented at facilities operated by specified enterprises in the region or at the Sarapul and Glazov PSEDAs with tax and other benefits.

**ADVANTAGES OF THE UDMURT REPUBLIC**

**POTENTIAL MARKET**

The potential consumers of pumps and pumping equipment may include oil producers in the Republic of Tatarstan, Republic of Bashkortostan and Perm Territory, as well as water treatment companies.

Oil production is developed in the Udmurt Republic. The key consumers of pumps and compressors include OAO Udmurtneft (Rosneft), OOO UDS Neft (UDS Group), AO Belkamneft (AO NK Neftisa). High margins would enable the region to send supplies throughout Russia.

**SITE AND REGIONAL PREFERENCES**

The project may be implemented at facilities operated by specified enterprises in the region or at the Sarapul and Glazov PSEDAs with tax and other benefits.

**INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY**

The above mentioned companies

Components for pumps and compressors

**SITE AND REGIONAL PREFERENCES**

The project may be implemented at facilities operated by specified enterprises in the region or at the Sarapul and Glazov PSEDAs with tax and other benefits.

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**LAUNCH OF PRODUCTION OF DIGITAL EQUIPMENT AND EXPANSION OF LOW-VOLTAGE DISTRIBUTION EQUIPMENT PRODUCTION**

**INVESTMENT OPPORTUNITY**

Launch of production of digital distribution equipment and solutions for smart grids through localisation of foreign technology could be done in partnership with local manufacturers, including AO SEGZ, OOO ETZ Vektor, OOO ENKO Plant of Electrotechnical Equipment and OOO Sarapul Electromechanical Plant, as well as expansion of the current capacity of low-voltage distribution equipment production companies.

**POTENTIAL PRODUCTS**

1. Equipment for electrical grid digitalisation:
   - Digital substations with automatic control systems
   - Digital current and voltage transformers

2. Low-voltage devices (circuit breakers and relays)

3. Low-voltage equipment sets

AO SEGZ produces electrical equipment, electric motors, etc. OOO ETZ Vektor and OOO ZETO ENKO are engaged in the production of low-voltage switchgears and transformers. OOO SEMZ is implementing a project in Sarapul PSEDA on the production of complete transformer substations.

The project may be implemented at sites operated by AO SEGZ, OOO ETZ Vektor, OOO ZETO ENKO or OOO SEMZ or at the Glazov and Sarapul PSEDAs with tax and other preferences.

Graduates of the Izhevsk State Technical University and Udmurt State University with a degree in electrical engineering and electrical equipment (633 number of students in 2018) may be involved, as well as graduates of the Izhevsk Assembly and Radio-Mechanical Technical schools may also be involved with specialisations in technical operation of electrical equipment, electrician, and installation and operation of industrial equipment (1,095 people).

**INVESTMENT OPPORTUNITIES IN UDMURTIA**

**MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION**

**KEY PROJECT PREREQUISITES**

- **RUB 269 BILLION**
  - Electrical equipment market in Russia in 2018
- **RUB 97 BILLION**
  - Market size for low-voltage equipment import substitution in Russia in 2018

**POTENTIAL PRODUCTS**

- Imports account for 48% of low-voltage equipment sales in Russia (RUB 2.3 billion) and 77% of low-voltage sets (RUB 69.9 billion). At the same time, low-voltage devices have been included in the import substitution programme under the Ministry of Industry and Trade of Russia (as of 2015)
- By 2030, PAO Rosseti is planning to modernise and digitalise power grids by investing over RUB 1 trillion (“Digital Transformation 2030”), which will create demand for smart transformers and substations.

**POTENTIAL MARKET**

Low-voltage equipment can satisfy the demand from network companies, power supply network service companies, industrial companies, construction companies in the construction of residential areas and the population in the Volga Federal District.

Under the digitalisation programme for electric grids, PAO Rosseti and its subsidiaries (in particular PAO FGC UES) may become consumers of equipment for smart grids. AO Udmurtenergo, a branch of PAO FGC of Centre and Volga Region (a subsidiary of PAO Rosseti), is located in the Udmurt Republic, which could become a pilot training ground for testing and marketing of equipment.

**INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY**

AO IMZ Axion-holding
- Automated systems for electro-radio equipment monitoring and diagnostics

AO IRZ
- Production of cable products and winding products

**SITE AND REGIONAL PREFERENCES**

The project may be implemented at sites operated by AO SEGZ, OOO ETZ Vektor, OOO ZETO ENKO or OOO SEMZ or at the Glazov and Sarapul PSEDAs with tax and other preferences.

**HUMAN CAPITAL**

Graduates of the Izhevsk State Technical University and Udmurt State University with a degree in electrical engineering and electrical equipment (633 number of students in 2018) may be involved, as well as graduates of the Izhevsk Assembly and Radio-Mechanical Technical schools may also be involved with specialisations in technical operation of electrical equipment, electrician, and installation and operation of industrial equipment (1,095 people).

**KEY PROJECT PARAMETERS**

- **RUB 0.6-1.5 BILLION**
  - potential investment volume
- **19.2-27.8%**
  - range of potential profitability

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry.
Pollutant emission control devices: The 300 largest enterprises included in the list of the Ministry of Natural Resources of Russia through 2026 and then all first-category pollution facilities (7,406) through 2029.¹

Smart city devices: Purchases will be made by Russian regions (implementation is planned in 58 pilot cities, including Sarapul and Izhevsk), as well as by companies that are launching smart city pilot projects (PAO Rostelecom, Rostec GK, Cisco).

Smart electricity meters: PAO Rosseti is planning to independently purchase and install meters (and to invest RUB 120 billion through 2022).

**OPPORTUNITY DESCRIPTION**

Launch of measuring device and sensor production, including smart city solutions and ecological instrument engineering. A joint venture may be established in partnership with Izhevsk Radio Plant (IRZ), Sarapul Radio Plant, and AO IMZ Axion Holding.

**POTENTIAL PRODUCTS**
- Pollutant emission control devices at enterprises (part of automatic emission control systems)
- Smart city devices and sensors (noise and temperature sensors, smart lighting, smart traffic lights)
- Smart utility meters (electricity, water, gas)

**POTENTIAL MARKET**
- Pollutant emission control devices: 300 largest enterprises included in the list of the Ministry of Natural Resources of Russia through 2026 and then all first-category pollution facilities (7,406) through 2029.¹
  - In January 2019, emission fines were increased by four times and the Ministry of Natural Resources of Russia ordered the largest enterprises to install automatic systems to control pollutant emissions.
  - Russia has launched a smart city project that involves the introduction of smart solutions in 58 pilot cities, with an emphasis on Internet of Things technology.
  - Starting from 1 July 2020, installation of smart electricity meters will be mandatory. PAO Rosseti will install about 22 million smart meters by 2025.

**KEY PROJECT PREREQUISITES**
- RUB 120 BILLION: PAO Rosseti investments in smart meter production through 2022
- RUB 239 BILLION: Funds for Smart City project in Moscow through 2021

**POTENTIAL STRATEGIC PARTNERS IN THE REGION**
AO Izhevsk Radio Plant (communication and navigation equipment, visual control devices), AO Sarapul Radio Plant (gyrostabilizers, communication equipment), AO Axion Holding IMZ (printed circuit boards, energy-saving technologies) provide an existing manufacturing base for the innovative production of instruments.

**INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY**
OOO AMMOLIT, OOO Izhprest, OOO High Technology Centre, etc.

**SITE AND REGIONAL PREFERENCES**
The project may be implemented at facilities operated by the Izhevsk and Sarapul Radio Plants, AO IMZ Axion-Holding, or at the Sarapul and Glazov PSEDAs with tax and other benefits.

**HUMAN CAPITAL**
Graduates of Izhevsk State Technical University with a degree in instrumentation may be involved (176 students in 2018), as well as graduates of the Sarapul Technical School of Mechanical Engineering and Information Technology and the Shutov Radiomechanical Technical School with a degree in radio equipment engineering (563 students in 2018).
LAUNCH OF TELECOMMUNICATION EQUIPMENT PRODUCTION

OPPORTUNITY DESCRIPTION
Launch of telecommunication equipment production with involvement of a global technological market leader. New production can be organised using existing production capacities at AO Izhevsk Radio Plant, OAO Elekond or AO Sarapul Radio Plant, or established separately. At the initial stage, equipment may be assembled with a subsequent increase in the degree of localisation.

POTENTIAL PRODUCTS
- Traditional telecommunication equipment, including base stations, switches and routers
- Equipment for 5G new generation networks, including micro- and macrobase stations and 5G modules

ZAO NPO Telecom manufactures a wide range of telecommunication equipment on contract. AO Izhevsk Radio Plant produces special communication equipment (DMR standard). AO Sarapul Systems produces switching equipment.

The project may be implemented at facilities operated by the Izhevsk Radio Plant, OAO Elekond or at the Glasov and Sarapul PSEDAs with tax and other benefits.

GRADUATES OF Izhevsk State Technical University with a degree in information technologies and communication systems and radio engineering (463 students in 2018) may be involved, as well as graduates of the Sarapul Technical School of Mechanical Engineering and Information Technology and the Shutov and Voskresensky technical schools with a degree in radiomechanics or radio equipment engineering (350 students in 2018).

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY
According to a concept developed by the Rostec Group, by 2030, the share of domestic equipment consumed in Russia should increase from the current 8% to 30%, and up to 50% of equipment for mobile operators core networks.

The expected key equipment consumers for new generation networks in Russia include mobile operators such as PAO VimpelCom, PAO MTS, OOO T2 Mobile and PAO Megafon.

Traditional telecommunication equipment may be used to create Wi-Fi networks in public transport (Smart City project). Exports to the CIS and Asian and African countries is also possible.

SITE AND REGIONAL PREFERENCES
The project may be implemented at facilities operated by the Izhevsk Radio Plant, OAO Elekond or at the Glasov and Sarapul PSEDAs with tax and other benefits.

HUMAN CAPITAL
Graduates of Izhevsk State Technical University with a degree in information technologies and communication systems and radio engineering (463 students in 2018 was 463) may be involved, as well as graduates of the Sarapul Technical School of Mechanical Engineering and Information Technology and the Shutov and Voskresensky technical schools with a degree in radiomechanics or radio equipment engineering (350 students in 2018).
INVESTMENT OPPORTUNITY

OPPORTUNITY DESCRIPTION
Launch of medical equipment production with involvement of a foreign strategic partner (technology owner). A joint venture may be established with existing companies, including AO Izhevsk Mechanical Plant, AO IMZ Axion-Holding or Kalashnikov GK).

POTENTIAL PRODUCTS
- Equipment for oncology diseases diagnostics
- Equipment for cardiovascular diseases treatment
- Medical robots
- Portable medical devices
- Implantable items

AO Izhevsk Mechanical Plant produces implantable cardiac pacemakers. AO Izhevsk Motor Plant Axion-Holding produces cardiographs that transmit information over wireless networks, as well as portable defibrillators. Kalashnikov GK produces single-chamber and two-chamber pacemakers and devices for therapeutic hypothermia.

The project may be implemented at facilities operated by Izhevsk Mechanical Plant, AO IMZ Axion-Holding or at Sarapul and Glazov PSEDAs, with tax and other benefits.

Graduates of the Izhevsk State Technical University and Udmurt State University with a degree in radioelectronic systems and complexes, nanotechnologies and nanosystem engineering, and the design and technology of electrical devices (780 students in 2018) may be involved.

AO Chepetsk Mechanical Plant
Titanium powders (component base for implantable devices)

INVESTMENT OPPORTUNITY MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION

KEY PROJECT PREREQUISITES

RUB 281 BILLION
Medical equipment market in Russia in 2018

RUB 219 BILLION
Market niche for import substitution in Russia in 2018

- The market is dynamic, with growth of 5.4% per year between 2011 and 2018.
- At the same time, growth in demand is expected to reach 7.5% on average from 2019 to 2030 following implementation of the National Healthcare Project, which provides for the large-scale upgrading of equipment at medical facilities.
- Imports accounted for 77.8% of the market in 2018. Since 2015, foreign-produced medical devices have faced restrictions in the state procurement process, which has helped to support localisation. The list of equipment affected by such restrictions is constantly expanding.

POTENTIAL MARKET
State procurements currently make up more than 80% of the market, and up to 95% for medical equipment for diagnosis and treatment of cancer and cardiovascular diseases. Sales of portable devices are possible through pharmacy chains and household appliances stores. Transport expenses make up a small share of the cost of medical equipment, so the deliveries may extend beyond 1,000 km.

RUB 0.2-1.7 BILLION
Potential investment volume

12.1-20.5%
Range of potential profitability

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry

ADVANTAGES OF THE UDMURT REPUBLIC

POTENTIAL STRATEGIC PARTNERS IN THE REGION
AO Izhevsk Mechanical Plant produces implantable cardiac pacemakers.
AO Izhevsk Motor Plant Axion-Holding produces cardiographs that transmit information over wireless networks, as well as portable defibrillators. Kalashnikov GK produces single-chamber and two-chamber pacemakers and devices for therapeutic hypothermia.

INTEGRATION OF THE NEW PROJECT IN THE REGIONAL ECONOMY
AO Chepetsk Mechanical Plant
Titanium powders

SITE AND REGIONAL PREFERENCES
The project may be implemented at facilities operated by Izhevsk Mechanical Plant, AO IMZ Axion-Holding or at Sarapul and Glazov PSEDAs, with tax and other benefits.

HUMAN CAPITAL
Graduates of the Izhevsk State Technical University and Udmurt State University with a degree in radioelectronic systems and complexes, nanotechnologies and nanosystem engineering, and the design and technology of electrical devices (780 students in 2018) may be involved.
**LAUNCH OF PHARMACEUTICAL PRODUCTION WITH SUBSEQUENT DEEPENING OF LOCALISATION AND SUBSTANCES PRODUCTION**

**OPPORTUNITY DESCRIPTION**
Creation of new medical drugs production by localising a foreign manufacturer in the Udmurt Republic. A joint venture may be established in partnership with ZAO Rester, a manufacturer of infusion solutions. The second stage of the project may include deepening of localisation and launch of pharmaceuticals production to meet the needs of enterprises.

**POTENTIAL PRODUCTS**
- Antibiotics
- Hormonal drugs
- Vitamins
- Insulin-based drugs
- Other drugs that account for a significant share of imports to Russia

At the second stage of the project, pharmaceuticals for specified items will be manufactured.

**ZAO Rester (a subsidiary of the defence enterprise AO IEMZ Kupol).**
Production of full-cycle infusion solutions was organised in 2008 jointly with the world leading Fresenius Medical Care. Manufacturing of other dosage forms (tablets, capsules) is one of the priorities for the company.

The project may be implemented at the Sarapul PSEDA with relevant benefits.

Graduates of Udmurt State University with a degree in pharmaceutical biotechnology, general biochemistry, immunobiotechnology, biotechnology (43 students in 2018) and chemistry (108 people) may be involved.

Graduates of higher educational institutions in the Volga Federal District (Perm State Pharmaceutical Academy, Samara State Medical University) may also be involved.

**INVESTMENT OPPORTUNITY**

**MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION**

**KEY PROJECT PREREQUISITES**

- **RUB 958 BILLION**
  Pharmaceutical market in Russia in 2018
- **RUB 424 BILLION**
  Niche market for import substitution in Russia in 2018
  - The market is characterised by the high share held by imports (66% in 2018).
  - At the same time, measures to stimulate localisation came into force in January 2019, for example, 25% price preference in public procurement for domestic producers.
  - The industry is also characterised by highly dynamic demand (real aggregate average annual market growth rate was 5.5% in 2008-2018).
  - An increase in demand for drugs is expected during implementation of the National Healthcare project (for treatment of cancer, cardiovascular and children’s diseases).

**POTENTIAL MARKET**

The Volga Federal District is the second largest medical drug market in Russia, as it covers 29.9 million people. The District accounted for RUB 12.2 billion of imports (2018) and RUB 16.6 billion of deliveries from other regions (2016). The largest markets include Nizhny Novgorod Region, the Republic of Bashkortostan and the Republic of Tatarstan, which together accounted for 94.6% of imports. Medical drugs are a high-margin product, so all of Russia could be considered a market (the niche for import substitution amounted to RUB 424 billion in 2018).

**INTEGRABILITY OF THE NEW PROJECT IN THE REGION’S ECONOMY**

<table>
<thead>
<tr>
<th>Potential Strategic Partners in the Region</th>
</tr>
</thead>
<tbody>
<tr>
<td>ZAO Rester (a subsidiary of the defence enterprise AO IEMZ Kupol).</td>
</tr>
<tr>
<td>Production of full-cycle infusion solutions was organised in 2008 jointly with the world leading Fresenius Medical Care. Manufacturing of other dosage forms (tablets, capsules) is one of the priorities for the company.</td>
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</tbody>
</table>

**HUMAN CAPITAL**

Grades of Udmurt State University with a degree in pharmaceutical biotechnology, general biochemistry, immunobiotechnology, biotechnology (43 students in 2018) and chemistry (108 people) may be involved.

Graduates of higher educational institutions in the Volga Federal District (Perm State Pharmaceutical Academy, Samara State Medical University) may also be involved.

**SITE AND REGIONAL PREFERENCES**
The project may be implemented at the Sarapul PSEDA with relevant benefits.

**INVESTMENT OPPORTUNITIES IN UDMURTIA**

**KEY PROJECT PARAMETERS**

<table>
<thead>
<tr>
<th>RUB 0.2-15.5 BILLION</th>
<th>potential investment volume</th>
</tr>
</thead>
<tbody>
<tr>
<td>20.1-43.0%</td>
<td>range of potential profitability</td>
</tr>
</tbody>
</table>

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry
OPPORTUNITY DESCRIPTION
Launch of industrial varnish and paint production with participation of a foreign company (technology owner) in partnership with existing manufacturers in the Udmurt Republic or as a separate plant.

POTENTIAL PRODUCTS
Industrial paints and varnishes:

- for metal and pipe protection
- for automobile production
- for shipbuilding
- for furniture production
- for rail transport

OOO Nort: production of paints and varnishes for corrosion and fire protection of wood and concrete.

OOO Novy Dom: production of decorative paints and varnishes.

Stena GK: production of innovative paints and varnishes with its own R&D centre. The company’s paint produced with nanoparticles was the only one in its niche to receive approval from Roskachestvo.

The project may be implemented at facilities operated by OOO Nort, OOO Novy Dom and Stena GK, or at Sarapul PSEDA with tax and other benefits.

Graduates of Udmurt State University with a degree in chemistry, as well as in chemistry, physics and mechanics of materials (214 students in 2018) may be involved.

OOO Arteko
Colorants and industrial pigment concentrates

OOO Novy Dom
Colorants and pigment pastes

KEY PROJECT PREREQUISITES

RUB 112 BILLION
Industrial paint and varnish market in Russia in 2018

RUB 50 BILLION
Market niche for industrial paint and varnish (import substitution) in Russia in 2018

- In 2014-2017, the industrial paint and varnish market grew by 8.8% per year, which could drive dynamic growth for the project in the future.
- Localization of production takes place mainly in the decorative paint segment, while industrial paints and varnishes account for almost all imports. In 2018, imports account for 10% of the decorative paint market and up to 45% of the industrial paint market.
- Industrial paints are more expensive and marginal, with the cost per tonne exceeding the cost of decorative paints by a factor of three or four.

POTENTIAL MARKET
Key consumers of industrial paints and varnishes in Udmurtia included machine-building and metallurgical enterprises such as Izhevsk Automobile Plant, Proustina PNTs, Izhstal, Axion-Holding, Izhviss-Mechanical Plant, Izhviss Plant of Plastics, SELEZ and CHNZZ.

Enterprises located in the Volga and Ural Federal Districts may also constitute a market, including AvtoVAZ (automobile production), KAMAZ (truck manufacturing), Ural-WagonZavod (railway engineering), CHTPZ (pipe industry), AMK (metallurgy), and aviation enterprises in Tatarstan and the Ulyanovsk and Sverdlovsk regions.

INVESTMENT OPPORTUNITY
MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION

KEY PROJECT PARAMETERS

RUB 0.5-2.0 BILLION
potential investment volume

22.0-29.3%
range of potential profitability

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry

ADVANTAGES OF THE UMURT REPUBLIC

POTENTIAL STRATEGIC PARTNERS IN THE REGION
OOO Nort: production of paints and varnishes for corrosion and fire protection of wood and concrete.

OOO Novy Dom: production of decorative paints and varnishes.

Stena GK: production of innovative paints and varnishes with its own R&D centre. The company’s paint produced with nanoparticles was the only one in its niche to receive approval from Roskachestvo.

INTEGRABILITY OF THE NEW PROJECT IN THE REGION’S ECONOMY

OOO Arteko
Colorants and industrial pigment concentrates

OOO Novy Dom
Colorants and pigment pastes

SITE AND REGIONAL PREFERENCES
The project may be implemented at facilities operated by OOO Nort, OOO Novy Dom and Stena GK, or at Sarapul PSEDA with tax and other benefits.

HUMAN CAPITAL
Graduates of Udmurt State University with a degree in chemistry, as well as in chemistry, physics and mechanics of materials (214 students in 2018) may be involved.
OPPORTUNITY DESCRIPTION

Launch of production of demineralised serum and dry milk for dry infant formula in partnership with a foreign company to localise production of breast milk substitutes (BMS) in Russia.

Creation of dairy farms to provide raw materials for new milk processing projects in the Udmurt Republic expected to be implemented in 2019-2028.

POTENTIAL PRODUCTS

- Demineralised serum D90 for dry infant formulas
- Dry milk
- Dry infant milk formulas
- Raw milk for further processing

The Udmurt Republic is the third largest milk-producing region in Russia and one of the largest milk processors.

The project could be implemented at the Glasov and Sarapul PSEDAs with relevant tax benefits.

Graduates of the Izhevsk State Agricultural Academy with a degree in technology of production and processing of agricultural products and in the technology of production and organisation of food production (625 students in 2018 was 625 people) may be involved. Graduates of the Izhevsk Trade and Economic College and the Sarapul Industrial College with a degree in Technology of Milk and Dairy Products (69 people) may also be involved.

OAO MILKOM (Sarapul-moloko, Izhmoloko, Glazov-moloko)

OOO Uva-Moloko

OOO DMS Vostok

PP Glazov-Moloko (OAO MILKOM)

Dry milk, D70 serum

OOO Uva-Moloko

Dry milk products

OOO DMS Vostok

INVESTMENT OPPORTUNITY

INVESTMENT OPPORTUNITY

MARKET PREREQUISITES FOR NEW PROJECT IMPLEMENTATION

KEY PROJECT PREREQUISITES

- Imports account for a share of dry milk formulas in Russia

- More than 90% of breast milk substitutes in the Russian market are imports. A number of measures to stimulate localisation in Russia is expected.

- In November 2018, a Russian Government Decree was issued on providing compensation of up to 20% of the costs to construct BMS plants in Russian regions.

- Since June 2019, proposals to increase import duties from 5% to 15% on formulas have been under consideration.

- In Udmurtia, the demand for raw milk is expected to grow by 23% (180,000 tonnes) by 2021, with a subsequent increase due to new processing projects in the region.


- Modernisation of four OAO MILKOM processing facilities in 2018-2024.

POTENTIAL MANUFACTURERS OF D90 SERUM:

PP Glazov-Moloko (OAO MILKOM)

Dry milk, D70 serum

OOO Uva-Moloko

Dry milk products

OOO DMS Vostok

SITE AND REGIONAL PREFERENCES

The project could be implemented at the Glasov and Sarapul PSEDAs with relevant tax benefits.

HUMAN CAPITAL

Graduates of the Izhevsk State Agricultural Academy with a degree in technology of production and processing of agricultural products and in the technology of production and organisation of food production (625 students in 2018 was 625 people) may be involved. Graduates of the Izhevsk Trade and Economic College and the Sarapul Industrial College with a degree in Technology of Milk and Dairy Products (69 people) may also be involved.

ADVANTAGES OF THE UDMURT REPUBLIC

POTENTIAL STRATEGIC PARTNERS IN THE REGION

The Udmurt Republic is the third largest milk-producing region in Russia and one of the largest milk processors.

KEY CONSUMERS OF RAW MILK:

- OAO MILKOM (Sarapul-moloko, Izhmoloko, Glazov-moloko)

- OOO Uva-Moloko

- OOO DMS Vostok

- Potential investors and BMS producers in Russia.

POTENTIAL MARKET

One of the key consumers of D90 serum would be the potential investor and BMS producer in Russia. The total niche market for BMS import substitution in Russia is RUB 15.2 billion. The target market is CFD (99% of imports).

The dry milk markets include several new projects involving OAO MILKOM, OOO DMS Vostok, OOO Uva-Moloko and the D90 serum production project.

INVESTMENT OPPORTUNITIES IN UDMURTIA

LAUNCH OF SERUM PRODUCTION FOR DRY INFANT MILK FORMULAS AND NEW DAIRY FARMS IN THE REGION

RUB 8.7-10.0 BILLION

potential investment volume

19.8-36.6%

range of potential profitability

* Audience of serum production for dry infant milk formulas

Source: PwC analysis based on data from similar investment projects implemented in Russia over the past five years and the profitability of Russian and foreign companies in this industry.
UDMURTIA IS ONE OF THE 20 LEADING REGIONS IN TERMS OF PPP MATURITY, WITH TESTED INVESTOR SUPPORT MEASURES AND A SUCCESSFUL PPP TRACK RECORD

PPP OPPORTUNITIES IN UDMURTIA

A sports centre with a swimming pool in the village of Pirogovo

This sports centre has a swimming pool, gym, athletics track and a cafeteria. The 25-metre pool was built in compliance with FINA standards. The centre’s capacity is 2,500 people per day. A total of RUB 200m in private investments was raised.

Nephrology and dialysis departments in Izhevsk and Sarapul

A project has made dialysis services more accessible to the public. Next generation services are provided under OHI (obligatory health insurance) policies. A total of RUB 90m was raised in private investments.

MAKSIM TKACHENKO
Executive Director of ANO PPP National Centre

"The Udmurt Republic is one of the leaders in terms of development of its PPP institutional, regulatory and legal framework. In particular, the region has enacted a comprehensive and extensive PPP project support system for all project stages. Under this system, functions are allocated between dedicated structures. The Ministry of Economics coordinates and monitors PPP projects on an interdepartmental level; the Development Corporation provides comprehensive PPP project support and the Investment Activity and Competition Policy Council makes decisions on PPP projects and developments. In addition, a wide range of private investor support measures has been adopted in Udmurtia, and the regional administration has a highly qualified team of PPP subject-matter experts.

According to the PPP development rating of Russian regions as at 2019, 36 PPP projects with a total of RUB 21.8bn (including 17.8bn in private investments) in investments are underway in Udmurtia. Social infrastructure projects raised RUB 1.2bn in private equity, including three sports facilities (RUB 800m) and three dialysis centres (RUB 200m). Most projects are focused on utilities infrastructure, with 25 raising a total of RUB 6bn in private investments."

Sources: ANO PPP National Centre, Development Corporation of the Udmurt Republic

PPP IN UDMURTIA IN NUMBERS

19

out of 85 regions in the PPP development rating of Russian regions (2018-2019)

36

projects with private investments over RUB 1 million as at the beginning of 2019

21.8

RUB BILLION

total PPP investments as at the beginning of 2019

17.8

RUB BILLION

PPP private investments as at the beginning of 2019

BEST PRACTICES

Heating supplies in Izhevsk

Thanks to a city-wide project, all residential buildings and public buildings are connected to centralised heating and hot water. The frequency of downtimes in heating networks and other public utilities has been reduced. The total investment in the centralised heating system is RUB 5.16 billion.

In 2018, the Russian Ministry of Construction of recognised this project as one of the most effective in the country.
REGIONAL SUPPORT FOR INVESTORS IN UDMURTIA
**TAX INCENTIVES**

**UDMURTIA OFFERS A WIDE RANGE OF TAX PREFERENCES AND OTHER BENEFITS TO INVESTORS, INCLUDING SPECIAL TAX INCENTIVES FOR INVESTORS IN PRIORITY SOCIAL AND ECONOMIC DEVELOPMENT AREAS (PSEDAS)**

<table>
<thead>
<tr>
<th>TAX TYPE</th>
<th>STANDARD REGIME</th>
<th>INVESTMENT PROJECTS</th>
<th>PPP</th>
<th>INDUSTRIAL PARKS</th>
<th>PSEDA 4</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Income tax</strong></td>
<td>20% including 2% federal 17% regional</td>
<td>0% under federal special investment contracts</td>
<td>13.5% over five tax periods (for PPPs involving social and cultural facilities, no more than 10 tax periods)</td>
<td>Standard regime</td>
<td>0% years 1-10</td>
</tr>
<tr>
<td></td>
<td>18% regional</td>
<td>10% under regional investment contracts</td>
<td>(2.5% to 2020)</td>
<td>Standard regime</td>
<td>5% for five tax periods</td>
</tr>
<tr>
<td></td>
<td></td>
<td>13.5% under special investment contracts</td>
<td></td>
<td>Standard regime</td>
<td>10% for the following five tax periods</td>
</tr>
<tr>
<td><strong>Land tax</strong></td>
<td>1.5%</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>0% for the first ten years</td>
</tr>
<tr>
<td><strong>Insurance contributions</strong></td>
<td>30% 32% for the Pension Fund, 2.5% for the Social Insurance Fund and 5.1% for the Medical Insurance Fund</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>7.6% for the first ten years</td>
</tr>
<tr>
<td><strong>Property tax</strong></td>
<td>2.2%</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>0% years 1-5</td>
</tr>
<tr>
<td><strong>MET</strong></td>
<td>5.5% (rock, sand, clay)</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>Standard regime</td>
<td>up to 0.8% (rock, sand, clay)</td>
</tr>
<tr>
<td><strong>Transport tax</strong></td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td><strong>Investment tax deduction</strong></td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
</tbody>
</table>

1 RUB 50 million for the cities of Izhevsk, Glazov, Votkinsk, Sarapul, Mozhga and Kambarskoye
2 RUB 10 million for the cities of Izhevsk, Glazov, Votkinsk, Sarapul and Mozhga and the municipal settlements of Kambarskoye and Zavyalovsky
3 RUB 10 million for the cities of Glazov, Votkinsk, Sarapul and Mozhga and the Zavyalovsky District municipal settlement; RUB 50 million for the cities of Izhevsk, Votkinsk, Sarapul and Mozhga and the Zavyalovsky District municipal settlement; RUB 100 million for Izhevsk

**CATEGORIES OF REDUCED RATE RECIPIENTS**

- Land plot lease without bidding
- Application criteria (minimum investment volume):
  - Agriculture, forestry, hunting, fishing and fish farming: from RUB 3 to 10 million.
  - Food production and beverages production: from RUB 10 to 50 million.
  - Other types of activities: from RUB 10 to 100 million.

**TYPE OF BENEFIT**

- Land plots: 75% of the annual rent amount from the date of the decision to provide the benefit until the date of the commissioning permit
- Real estate: Preferential rental rate for the payback period of the investment project, but no more than five years from the date of the decision

**INSTALLATION OF SOCIAL, CULTURAL OR UTILITY FACILITIES**

- Land plots: 75% of the annual rent amount from the date of the decision to provide the benefit until the date of the commissioning permit

**Made in Udmurtia**

Source: PwC analysis based on federal and regional laws, April 2019.

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1 RUB 5 million for municipal districts; RUB 80 million for Izhevsk, Glazov, Votkinsk, Sarapul, Mozhga and Kambarskoye
2 RUB 10 million for municipal districts (except for Zavyalovsky District); RUB 50 million for the cities of Izhevsk, Glazov, Votkinsk, Sarapul and Mozhga and the municipal settlements of Kambarskoye and Zavyalovsky
3 RUB 10 million for municipal districts (except for Zavyalovsky District); RUB 50 million for the cities of Glazov, Votkinsk, Sarapul and Mozhga and the Zavyalovsky District municipal settlement; RUB 100 million for Izhevsk
4 There are two PSEDAs in Udmurtia (Glazov and Sarapul) and the support measures are similar. See the list of permitted activities in PSEDAs on p. 76-77.
OVER THE LAST THREE YEARS, UDMURTIA-BASED COMPANIES HAVE RECEIVED MORE THAN RUB 2.5BN FROM COLLABORATIONS BETWEEN THE REGIONAL GOVERNMENT AND FEDERAL SUPPORT INSTITUTES

FEDERAL SUPPORT INSTITUTIONS

<table>
<thead>
<tr>
<th>ORGANISATION</th>
<th>SUPPORT MEASURES</th>
<th>CATEGORY OF RECIPIENT</th>
<th>RESULTS</th>
<th>PLANS</th>
</tr>
</thead>
<tbody>
<tr>
<td>SME Corporation and SME Bank</td>
<td>— Loan and guarantee support for SMEs</td>
<td>Small- and medium-sized enterprises</td>
<td>RUB 1.5 BN</td>
<td>Include three more SMEs in the large supplier cultivation programme</td>
</tr>
<tr>
<td></td>
<td>— Implementation of Programme 1764*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Implementation of a reduced-rate leasing programme</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Measures aimed at increasing the share of purchasing from SMEs, including a programme to cultivate large suppliers</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Property support for SMEs</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>— Educational programmes</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Federal Industry Development Fund</td>
<td>— Financing for industrial projects in cooperation with the Udmurtia Fund for Entrepreneurship Development</td>
<td>Small- and medium-sized enterprises</td>
<td>RUB &gt;1.1 BN</td>
<td>Collaboration with the Industry Development Fund to implement the national Productivity and Employment Support programme</td>
</tr>
<tr>
<td></td>
<td>— Interest-free loans for project implementation</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

* Programme 1764 provides reduced-rate loans to SMEs in accordance with Russian Government Resolution No. 1764 of 30 December 2018. The programme is overseen by the Russian Ministry of Economic Development together with the SME Corporation.

Sources: Ministry of Economy of the Udmurt Republic, Ministry of Industry and Trade of the Udmurt Republic, Development Corporation of the Udmurt Republic
“The regional administration understands that the state may not always be the most efficient owner and is actively exploring growth areas and existing assets that can be further developed and enhanced. The regional administration is strongly committed to supporting investment and expects investors to be a key resource for the republic’s development. The administration is open to any form of mutually beneficial cooperation, be it privatisation, PPP or support of private investment projects.”

“Companies in Udmurtia work extensively with the Industrial Development Fund to obtain reduced-rate loans. As of today, the fund has financed eight projects for a total of RUB 850m. An additional RUB 1.5bn in private equity has been raised for these projects. The total volume of private equity investment in the Republic will be more than RUB 2.3 billion. The implementation of projects funded by the Industrial Development Fund will create more than 300 jobs and more than RUB 1.6bn in tax payments. Three enterprises have already launched new manufacturing lines enabled by loans from the Industrial Development Fund.

Our achievements have been a collective effort. However, a significant role was played by the governor and regional administration. They have worked hard to find high-potential projects and raise awareness about the opportunities offered by the Industrial Development Fund among producers. The governor’s team has placed a particular focus on developing manufacturing and raising investments in the region.

We strongly believe that Udmurtia’s manufacturing sector and regional administration will continue their intense and fruitful cooperation with the Industrial Development Fund.”

“MONOGORODA.RF has a reliable partner in Udmurtia. Our joint efforts have resulted in two large investment projects that have created more than 400 jobs in Udmurtia. I have no doubt that the region can easily scale up similar projects. The region has an appealing business climate, with two Priority Social and Economic Development Areas (PSEDAs) that provide investors with key benefits. Supported by the region’s expert team, these zones are a colossal resource for fuelling Udmurtia’s development.”
## Organisations

### Regional Support Institutions

<table>
<thead>
<tr>
<th>Organisation</th>
<th>Support Measures</th>
<th>Category of Recipient</th>
<th>Results</th>
<th>Plans for 2020</th>
</tr>
</thead>
</table>
| Udmurtia Fund for Entrepreneurship Development (UFED) | - Reduced-rate financing for entities through microloans at rates from 3%  
- Acts as a regional industrial development fund in cooperation with the Federal Industrial Development Fund | Small- and medium-sized enterprises | **RUB 714.5 M**  
Amount of microloans issued from the year start to 18 November 2019  
**3RD PLACE** in Russia by the volume of microloans | Issue microloans for RUB 900m |
| Guarantee Fund for SME Lending Support of the Udmurt Republic | Providing guarantees for liabilities of SMEs at a rate of 1% per year | Small- and medium-sized enterprises | **RUB 3.9 BN**  
In guarantees from the beginning of 2010 to 18 November 2019 | **RUB 10.4 BN**  
Raised by SMEs from beginning of 2010 to 18 November 2019  
**13TH PLACE** in terms of issued guarantees among 85 regional guarantee organisations  
**9X** growth in the guarantees portfolio since 2012 | Additionally capitalise the Guarantee Fund for SME Lending Support from the budget for RUB 25m for the purpose of guarantee support provision |

### Municipal Support Institutions

<table>
<thead>
<tr>
<th>Organisation</th>
<th>Support Measures</th>
<th>Category of Recipient</th>
<th>Results</th>
<th>Status</th>
</tr>
</thead>
</table>
| Municipal small businesses support funds | Soft-term financing of SMEs located in the municipality | Small- and medium-sized enterprises | **RUB 655 M**  
In microloans issued in 2016–2018 | Since 2019, municipal support institutions have become standalone departments of the Udmurtia Fund for Entrepreneurship Development (became part of the Udmurtia Fund for Entrepreneurship Development) |

Source: Ministry of Economy of the Udmurt Republic
UDMURTIA IS WORKING TO REDUCE THE ADMINISTRATIVE BARRIERS TO OBTAINING CONSTRUCTION PERMITS

<table>
<thead>
<tr>
<th>SUPPORTED PARTY</th>
<th>MEASURE</th>
</tr>
</thead>
</table>
| Investors applying for a construction permit | Reduce the time required to obtain a construction permit in terms of:
- obtaining a development plan for a land plot from 20 business days to 15 business days
- undergoing an expert evaluation from 40-55 calendar days to 22 business days
- obtaining a construction permit from 7 business days to 5 business days |
| Investors applying for utility connections | Reduce the time required for utility connections:
- gas from 40 business days to 25 business days
- electricity less than 20 business days
- water and waste disposal from 44 business days to 25 business days
- heating and hot water from 30 business days to 20 business days |

The estimated target time for these procedures is based on the following parameters:
- The length of networks under construction is less than 200 metres; network construction does not entail land disputes on routing feasibility;
- The client ensures provision of documents and materials required for the procedures in the full amount;
- The facility is connected to the electric lines for the first time;
- Connection to the lines via an individual tariff is not required;
- Construction of a transformer substation is not required for connecting the facility.

The time required to complete the procedures for obtaining a construction permit is less than 67 days (subject to concurrent utility connections).

Source: Ministry of Construction of the Udmurt Republic
**TIMELINE FOR INTRODUCING CHANGES IN LAND-USE PLANNING DOCUMENTS IN UDMURTIA’S MUNICIPALITIES HAS BEEN CONSIDERABLY REDUCED**

<table>
<thead>
<tr>
<th>REVIEW STAGE</th>
<th>DEADLINE UNTIL 1 OCTOBER 2019</th>
<th>DEADLINE FROM 1 OCTOBER 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Request reviewed by the Administration, directive to prepare draft changes to Master Plan prepared*</td>
<td>60 days</td>
<td>25 days</td>
</tr>
<tr>
<td>Draft changes to Master Plan prepared</td>
<td></td>
<td>The term is set in the contract with the contractor</td>
</tr>
<tr>
<td>Project materials uploaded to the Federal State Territorial Planning Information System, access provided, public hearings conducted</td>
<td>90 days (less term to remedy noted flaws)</td>
<td></td>
</tr>
<tr>
<td>Draft Master Plan approved and signed-off</td>
<td>41 working days</td>
<td>18 working days</td>
</tr>
<tr>
<td>Total days</td>
<td>225 DAYS</td>
<td>145 DAYS</td>
</tr>
</tbody>
</table>

* Provided that there is public financing for the specified work or non-public funds raised (at the requester’s expense)

---

**INTRODUCTION OF CHANGES TO MUNICIPAL ENTITY LAND USE AND DEVELOPMENT RULES**

<table>
<thead>
<tr>
<th>REVIEW STAGE</th>
<th>DEADLINE UNTIL 1 OCTOBER 2019</th>
<th>DEADLINE FROM 1 OCTOBER 2019</th>
</tr>
</thead>
<tbody>
<tr>
<td>Request reviewed by the Administration, instruction to prepare draft changes to Land Use and Development Rules prepared</td>
<td>66 days</td>
<td>25 days</td>
</tr>
<tr>
<td>Draft changes to Land Use and Development Rules prepared</td>
<td></td>
<td>The term is set in the contract with the contractor</td>
</tr>
<tr>
<td>Public hearings conducted</td>
<td>120 working days</td>
<td>70 working days</td>
</tr>
<tr>
<td>Draft Land Use and Development Rules compliance checked, draft changes to Land Use and Development Rules approved and signed-off</td>
<td>41 working days</td>
<td>18 working days</td>
</tr>
<tr>
<td>Total days</td>
<td>232 DAYS</td>
<td>125 DAYS</td>
</tr>
</tbody>
</table>

---

**ORGANISATIONS SPECIALISED IN ATTRACTING INVESTMENT**

**INVESTOR SUPPORT MEASURES**

- Provide a one-stop shop to support investor engagement with government agencies.
- Facilitate engagement of investors and project initiators with investment and venture funds, financial organisations, etc.
- Organise investors meetings with the Head of the Udmurt Republic and Head of the Udmurt Republic Government.
- Selection of a land plot, buildings or premises to locate a project upon the investor’s specification.
- Interaction with public authorities and network organisations regarding allocation of land plots, receiving construction permits, connection to networks.
- Development Corporation of the Udmurt Republic

**RECOVERABLE INVESTOR SUPPORT MEASURES**

- Organise, carry out and participate in business missions, conferences and festivals.
- Help to draft applications for co-financing from the Industry Development Fund, the Foundation for the Development of Single-Industry Cities, SME Corporation and other development institutes.
- Set up investment project delivery arrangements based on PPPs, including concession agreements.
- Provide advisory services on financial, economic and legal matters.

---

**INVESTORS AND THEIR PROJECTS RECEIVE TURN-KEY SUPPORT IN UDMURTIA ACROSS KEY AREAS, LARGELY FREE OF CHARGE**

Source: Ministry of Construction of the Udmurt Republic
BENEFITS FOR INVESTORS IN UDMURTIA
IZHEVSK

Capital

42,100 KM²

Total area

1.5 M

Population

72.5 YEARS

Average life expectancy (72.9 in Russia on average)

PEOPLE

701,000

Average annual number of those employed

RUB 31,800

Average monthly salary (rub 43,700 in Russia on average)

Gross regional product (GRP)

PPP DEVELOPMENT RATING OF RUSSIAN REGIONS 2018-2019:

19TH PLACE / 85

RATINGS OF REGIONAL INNOVATIVE ECOSYSTEMS

29TH PLACE / 85

INDUSTRIAL PRODUCTION INDEX

2013 2014 2015 2016 2017 2018

102 103 100 102

RUB 622.7 BN

RUB 4.8%

Unemployment rate (4.8% in Russia on average)

PROFILE OF UDMURTIA


1. Regional Engineering Centre of the Udmurt Republic
   Works to enhance the technical capacity of small- and medium-sized companies to help them develop innovative products.

2. IzhevskTech Engineering Centre (Kalashnikov Izhevsk State Technical University)
   Provides a full range of engineering services for the manufacturing industry; commercialises R&D output of the university; supports an institutional environment and tools to implement complex technical projects; promotes innovative solutions and technologies.

3. Engineering Centre of Innovative Research and Expert Review, Udmurt State University
   Provides engineering, advisory and expert services, develops and implements projects, facilitates the rapid commercialisation of market-oriented projects; conducts employee trainings for institutions, organisations and enterprises and fosters the establishment of new SMEs.

4. Technology Transfer Centre, Udmurt State University
   Enables the development and promotion of innovative projects; conducts expert reviews of the innovative potential of projects and prepares expert opinions, helps to find financing for innovative projects.

5. Technology Transfer Centre, Izhevsk State Medical Academy
   Conducts patent research and provides advice on patentability; prepares applications for inventions; performs expert reviews of innovation proposals; prepares innovation proposal certificates.

6. Centre for Shared Instrument Use, Udmurt State University
   Offers shared use of expensive instruments, technical and process equipment and measurement techniques.

7. Centre for Shared Use of Scientific Equipment Centre of Physical and Physicochemical Analysis Methods, Investigation of Properties of Surfaces, Nanostructures, Materials and Products, Udmurt Federal Research Centre, Ural Branch of the Russian Academy of Sciences
   Conducts fundamental and applied research; develops and implements new experimental techniques.
THE CONSUMER MARKET AROUND UDMURTIA IS RUB 2.24 TRILLION

Transport Infrastructure in Udmurtia

Large Russian Cities Closest to Udmurtia

Population, Million People

<table>
<thead>
<tr>
<th>City</th>
<th>Population, Million People</th>
</tr>
</thead>
<tbody>
<tr>
<td>Moscow</td>
<td>12.6</td>
</tr>
<tr>
<td>Ekaterinburg</td>
<td>1.4</td>
</tr>
<tr>
<td>Nizhny Novgorod</td>
<td>1.3</td>
</tr>
<tr>
<td>Kazan</td>
<td>1.2</td>
</tr>
<tr>
<td>Chelyabinsk</td>
<td>1.2</td>
</tr>
<tr>
<td>Samara</td>
<td>1.2</td>
</tr>
<tr>
<td>Ufa</td>
<td>1.1</td>
</tr>
<tr>
<td>Perm</td>
<td>1.1</td>
</tr>
</tbody>
</table>

Within 600 km from Izhevsk: 44 million permanent residents

Within 1000 km from Izhevsk: 88 million permanent residents

7 Cities

Cities with a million-plus population

RUB 904 BN

Per month spent by the local population on consumer goods and services

RUB 2.24 TRILLION

Per month spent by the local population on consumer goods and services

Source: PwC analysis on the basis of Rosstat (2017) data and geodata
The transport infrastructure in Udmurtia offers significant advantages to investors. Izhevsk Federal Airport can land Embraer, Sukhoi Superjet 100, Airbus A-319, Airbus A-320 and all lighter aircraft. Passenger traffic in 2018 was 352,000 passengers, with 885 tonnes of cargo traffic.

Major transport corridors connect Udmurtia to neighbouring regions:
- The P242 Perm-Ekaterinburg federal highway connects Udmurtia to the Urals.
- The P320 Yelabuga-Izhevsk regional highway connects Izhevsk to other large cities in the Volga Region via the M7 Volga Federal Highway, which is part of the European E22 route.

The airport is undergoing a major overhaul to be able to land new types of aircraft (Boeing). By 2024, the Izhevsk Airport will have been renovated, including the runway, and a new terminal will have been built. The federal budget allocated RUB 3.4 billion to renovate the airport.

By 2021, 35 km of roads will have been built and renovated including reconstruction of the highway to Kirov Oblast (to be completed in 2020). Total funds are RUB 252m.

By 2020, the city of Mozhga will see a new transport interchange hub that will link the existing railway station to the bus hub, enhancing the region’s transport accessibility and commuting possibilities. Investment: RUB 300m with co-financing from the regional budget and OAO RZD. By 2024, the Balezino Station will have been renovated (Trans-Siberian Railway Network), improving throughput capacity by 50%. The total investment is RUB 4bn including OAO RZD funds.

Projects in Udmurtia to develop and modernise the transport infrastructure are improving the region’s accessibility. The region has direct access to the Trans-Siberian Railway, with a large railway hub in Glazov. In 2017, a total of 2,098,000 tonnes of goods were shipped by rail.

The region’s river routes are 180 km long, enabling access to the Baltic Sea, the Black Sea and the Caspian Sea via the Kambarka Cargo Port. The port facilitates shipments to Turkey, Romania, Bulgaria and further to Central and Western Europe. The total volume of cargo shipped in 2017 was 373,000 tonnes.

Source: Ministry of Transport of the Udmurt Republic
UDMURTIA HAS HIGHLY EDUCATED POPULATION TO REALISE INVESTMENT PROJECTS: THERE ARE 7 HIGHER EDUCATIONAL INSTITUTIONS AND 9 BRANCH CAMPUSES...

Key Education and Science Indicators

- 16 higher education institutions in Udmurtia, including 9 university branches, offer education programmes and training (incl. 9 university branches)
- 30 students per 1,000 residents (29 in Russia on average)

Distribution of university students across fields of study

- Humanities
- Arts and culture
- Mathematics and natural sciences
- Engineering, technology and industrial sciences
- Healthcare and medical sciences
- Agriculture and agricultural sciences
- Social sciences
- Education and pedagogy

- 20,544* full-time students
- 28%
- 10%
- 5%
- 2%
- 4%
- 34%
- 8%
- 8%
- 8%

Distribution of employed individuals across economic sectors

- Education
- Healthcare and social services
- Public administration
- Transportation and storage
- Culture, sports and leisure
- Professional, scientific and technical activities
- Agriculture, forestry, hunting
- Mining and extraction
- Manufacturing
- Construction
- Wholesale and retail
- Other

- 12,544* full-time students
- 26%
- 12%
- 5%
- 4%
- 7%
- 3%
- 7%
- 3%
- 15%
- 10%
- 9%
- 1%

- 24,744* employed individuals
- 1%
- 3%
- 7%
- 4%
- 7%
- 2%
- 9%
- 10%
- 12%
- 15%
- 18%
- 60%

- 20,544* students per 1,000 residents
- 26%
- 12%
- 5%
- 4%
- 7%
- 3%
- 7%
- 3%
- 15%
- 10%
- 9%
- 1%

- 24,744* employed individuals per 1,000 residents
- 26%
- 12%
- 5%
- 4%
- 7%
- 3%
- 7%
- 3%
- 15%
- 10%
- 9%
- 1%

... IN THE REPUBLIC THAT TRAIN SPECIALISTS IN ALL AREAS OF ECONOMIC ACTIVITY, 67% OF GRADUATES WORK IN THE REGION

Key Human Capital Indicators

- 67% Employment rate in Udmurtia (65.5% in Russia on average)
- 3 Specialists involved in R&D per 1,000 employees (10 in Russia on average)

Distribution of regional university graduates

- 85% of graduates from Udmurt universities are employed within one year upon graduation
- 67% of regional university graduates stay to work in Udmurtia

Share of innovative goods, work and services among all goods, work and services in Udmurtia (in the mining, manufacturing and energy industries)

- 12% of mining, manufacturing and energy companies in Udmurtia are engaged in innovation (11.5% in Russia on average)
- 18% Share of innovative goods, work and services among all goods, work and services in Udmurtia (8% in Russia on average)

Sources:
- Main Information and Computer Centre (GIVTs), Higher Education Monitoring, 2018, Ministry of Education of the Udmurt Republic, 2018
- National Research University Higher School of Economics, Innovation indicators, 2016
<table>
<thead>
<tr>
<th>No.</th>
<th>Address</th>
<th>Type of Property</th>
<th>Area</th>
<th>Access Ways</th>
<th>Electricity Supply</th>
<th>Gas Supply</th>
<th>Water Supply and Water Disposal</th>
<th>Type of Ownership</th>
<th>Cost</th>
<th>Use Cases</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Izhevsk</td>
<td>Property portfolio (5 items)</td>
<td>1. Land area: 50,000 m²</td>
<td>М-7: 2 km</td>
<td>2 MW</td>
<td>Capability to connect to networks (gas pipeline across the plot)</td>
<td>Private</td>
<td>RUB 120m</td>
<td>Any type of production activity</td>
<td></td>
</tr>
<tr>
<td>2</td>
<td>Izhevsk</td>
<td>Property portfolio (113 items)</td>
<td>2. Land area: 150,000 m²</td>
<td>М-7: 3.5 km</td>
<td>5 MW</td>
<td>Gas pipeline will be extended to the borders of the plot by end 2019</td>
<td>Central water supply and on-site wells</td>
<td>Private</td>
<td>RUB 12,000/m²</td>
<td></td>
</tr>
<tr>
<td>3</td>
<td>Izhevsk</td>
<td>Property portfolio (15 items), 1 overhead crane</td>
<td>3. Land area: 100,000 m²</td>
<td>М-7: 2.5 km</td>
<td>2 MW</td>
<td>Capability to connect to networks (gas pipeline across the plot)</td>
<td>Private</td>
<td>RUB 12,000/m²</td>
<td>Any type of production activity</td>
<td></td>
</tr>
<tr>
<td>4</td>
<td>Izhevsk</td>
<td>Property portfolio (2 items)</td>
<td>4. Land area: 33,231 m²</td>
<td>М-7: 7 km</td>
<td>Capability to connect</td>
<td>300 m</td>
<td>Capability to connect</td>
<td>Private</td>
<td>RUB 23m</td>
<td>Office, production activity</td>
</tr>
<tr>
<td>5</td>
<td>Izhevsk</td>
<td>Building (non-residential, 1 floor)</td>
<td>5. Land area: 20,789 m²</td>
<td>М-7: 18 km</td>
<td>100 kW, capability to increase capacity</td>
<td>Capability to connect to water supply networks</td>
<td>Private</td>
<td>RUB 12,000/m²</td>
<td>Any type of production activity, logistics</td>
<td></td>
</tr>
<tr>
<td>6</td>
<td>Izhevsk</td>
<td>Health centre building</td>
<td>6. Land area: 3,533 m²</td>
<td>М-7: 5 km</td>
<td>101 kW</td>
<td>The facility is connected to city heat supply networks</td>
<td>Municipal</td>
<td>RUB 31 m/day</td>
<td>Office, health centre</td>
<td></td>
</tr>
<tr>
<td>7</td>
<td>Izhevsk</td>
<td>Health centre building</td>
<td>7. Land area: 7,942 m²</td>
<td>М-7: 4 km</td>
<td>101 kW</td>
<td>The facility is connected to city heat supply networks</td>
<td>Municipal</td>
<td>RUB 40 m</td>
<td>Office, health centre</td>
<td></td>
</tr>
<tr>
<td>8</td>
<td>Izhevsk</td>
<td>Group of buildings</td>
<td>8. Land area: 133.3 m²</td>
<td>М-7: 10 km</td>
<td>105 kW</td>
<td></td>
<td>Central water supply</td>
<td>Municipal</td>
<td>RUB 28.6 m</td>
<td>Any type of commercial activity</td>
</tr>
<tr>
<td>9</td>
<td>Izhevsk</td>
<td>2 cafeteria buildings</td>
<td>9. Land area: 119 m² and 120 m²</td>
<td>М-7: 12 km</td>
<td>105 kW per each cafeteria</td>
<td>Capability to connect, the cost of work is RUB 91.6 m</td>
<td>Central water supply</td>
<td>Municipal</td>
<td>Estimated cost is RUB 8.4 m</td>
<td>Food production</td>
</tr>
<tr>
<td>10</td>
<td>Izhevsk</td>
<td>Group of buildings</td>
<td>10. Land area: 3,211 m²</td>
<td>М-7: 6 km</td>
<td>100 kW</td>
<td>Gas boiler house for 300 kW</td>
<td>Central water supply</td>
<td>Private</td>
<td>RUB 25 m</td>
<td>Office, production activity</td>
</tr>
</tbody>
</table>
## INVESTMENT SITES IN UDMURTIA

### PROPERTY (2/3)

<table>
<thead>
<tr>
<th>No.</th>
<th>ADDRESS</th>
<th>TYPE OF PROPERTY</th>
<th>AREA</th>
<th>ACCESS WAYS</th>
<th>ELECTRICITY SUPPLY</th>
<th>GAS SUPPLY</th>
<th>WATER SUPPLY AND WATER DISPOSAL</th>
<th>TYPE OF OWNERSHIP</th>
<th>COST</th>
<th>USE CASES</th>
</tr>
</thead>
<tbody>
<tr>
<td>2</td>
<td>Sarapul</td>
<td>Building (residential, 2 floors)</td>
<td>The building is a cultural heritage site</td>
<td>M-7: 55 km</td>
<td>Capability to connect 100 kW</td>
<td></td>
<td>Capability to connect to water supply networks 11,000 m³/day 15 m Capability to connect to water disposal networks 8,000 m³/day 20 m</td>
<td>Municipal</td>
<td>RUB 5.3m*</td>
<td>After the facility is reclassified as non-residential, it can be used for commercial purposes</td>
</tr>
<tr>
<td>3</td>
<td>No.11 49, ulitsa Truda</td>
<td>Administrative and service building (a five-floor administrative building and a three-floor production facility)</td>
<td></td>
<td>M-7: 55 km</td>
<td>Capability to install a substation and connect it to 6 kV cable 10 m</td>
<td></td>
<td>Capability to connect to water supply networks 5 m</td>
<td>Private</td>
<td>RUB 10.1m*</td>
<td>Any type of production activity, woodworking</td>
</tr>
<tr>
<td>4</td>
<td>No.12 40, ulitsa Gogolya, building 7</td>
<td>Building (non-residential, 3 floors)</td>
<td></td>
<td>M-7: 55 km</td>
<td>The site is connected 300 m</td>
<td></td>
<td>Capability to connect to water supply networks 30 m3/day</td>
<td>Private</td>
<td>RUB 2.6m*</td>
<td>Any type of production activity</td>
</tr>
<tr>
<td>5</td>
<td>No.13 40, ulitsa Gogolya, building 7</td>
<td>Building (non-residential, 3 floors)</td>
<td></td>
<td>M-7: 55 km</td>
<td>up to 1,000 kVA, 50 m TP-2 with a capacity of 2*1,000 kVA</td>
<td></td>
<td>Capability to connect to water supply networks 15 m</td>
<td>Private</td>
<td>RUB 2.2m*</td>
<td>Any type of production activity</td>
</tr>
<tr>
<td>6</td>
<td>No.14 15 ulitsa Elektrozavodskaya</td>
<td>Building (non-residential, 2 floors)</td>
<td></td>
<td>M-7: 54 km</td>
<td>Capability to connect 1.5 MW TP-21: 30 m TP-22: 80 m</td>
<td></td>
<td>Capability to connect to water supply networks 213 m³/day Capability to connect to water disposal networks 109 m³/day</td>
<td>Private</td>
<td>RUB 2.0m*</td>
<td>Any type of production activity</td>
</tr>
<tr>
<td>7</td>
<td>No.15 10 letter BB, ulitsa Industrialnaya</td>
<td>Building (non-residential, 8 floors)</td>
<td></td>
<td>M-7: 55 km</td>
<td>Capability to connect 1.136 kW/h</td>
<td></td>
<td>Capability to connect to water supply networks 213 m³/day</td>
<td>Private</td>
<td>RUB 650*</td>
<td>Any type of production activity</td>
</tr>
</tbody>
</table>

### SUPPORT MEASURES:
- The regional administration will provide assistance in preparing the full package of documents for commissioning (No.1, No.9)
- Reduced-rate lending from the Udmurtia Fund for Entrepreneurship Development (No.1–7)
- PSEDA (No.10–15, 17–20)

* Upon the investor’s request, a valuation can be conducted on the asset.

Source: Development Corporation of the Udmurt Republic.
INVESTMENT SITES IN UDMURTIA

INVESTMENT SITES AND INDUSTRIAL PARKS

No.17   1A, ulitsa Goncharova
Production property portfolio (48 items)
3 (land area): 108,018 m²
3 (GFA): 23,633.6 m²
M-7: 34 km
Sarapul Station: 3 km
1.8 MW
TP-1 — 545 m
TP-2 — 300 m
 Capability to connect 296 m
Water supply 10 m³/day
900 m³/year
Drainage 10 m³/day
(drainage pumping station on the premises)
Federal
RUB 95.4 m*
Any type of production activity, production of reinforced concrete structures

Volzhsk

No.18   1A, ulitsa Dubovaya
Building (non-residential, 1 floor)
3 (land area): 45,576 m²
3 (GFA): 7,000 m²
M-7: 30 km
Volzhsk Station: 4 km
235.05 kW
51,400 m³/year
27 m³/day
Private
RUB 60 m/㎡
Any type of production activity, logistics

Glazov

No.19   AO ChMZ Site
No.1, 7, ulitsa Belova
UAT land plot and property portfolio (32 items)
3 (land area): 54,679 m²
3 (GFA): 11,880.2 m²
M-7: 83 km
Glazov Station: 0.5 km
Substation PS-13 Transformers 6/0.4 kV 2x630 kVA
Substation PS-14 Transformers 6/0.4 kV 2x320 kVA
Current utilisation ≈ 600 kVA
Heat supply and hot water supply 2 Gcal/h
Compressed air 8 m³/h
Service and drinking water supply 25 m³/h
Technical water 15 m³/h
Storm water drain 50m³/h
Servicing and drinking water supply 350 m³/day
Technical water 130,000 m³/day
Private
RUB 19.26 m*
Any type of production activity except food production

No.20   AO ChMZ Site
No.2, 7, ulitsa Belova
Land plot with an unfinished concrete structure
Detached structure
3 (land area): 18,025.9 m²
3 (GFA): 12,000 m²
M-7: 83 km
Glazov Station: 0.05 km
38 MW
Heating supply 80 Gcal/h
Service and drinking water supply 13,000 m³/day
Technical water 130,000 m³/day
Private
RUB 49.32 m
Any type of production activity except food production

No.21   AO ChMZ Site
No.5, 7, ulitsa Belova
Pre-production site (17 items)
3 (land area): 44,618 m²
3 (GFA): 16,768 m²
M-7: 83 km
Glazov Station: 0.1 km
Substation PS-13 Transformers 6/0.4 kV 2x630 kVA
Substation PS-14 Transformers 6/0.4 kV 2x320 kVA
Current utilisation ≈ 600 kVA
Heat supply and hot water supply 1.5 Gcal/h
Service and drinking water supply 25 m³/h
Service drainage 100 m³/h
Private
RUB 19.75 m
Any type of production activity except food production

Kol' ulitsa

No.22   AO Glazov.Elektron production site complex (9 items)
3 (land area): 23,803 m²
3 (GFA): 10,000 m²
M-7: 78 km
Glazov Station: 0.5 km
300 kW within the land plot
Capability to connect 300 m³/h
The site is connected 60 m³/day
Other (Public
Organization)
RUB 100 m
Any type of production activity except food production

No.23   Yakshur-
Bodyinsky district, quarter 49 of Yakshur-
Bodyinsky forestry
Berezova Roschta Recreation Camp
3 (land area): 125,500 m²
3 (GFA): 0.2 km
The camp has sufficient electricity supply
Gas connection is available with gas boiler house
Borehole, pumping station, treatment facilities
Private
RUB 10 Dm
Recreation camp

SUPPORT MEASURES:

- The regional administration will provide assistance in preparing the full package of documents for commissioning (No.1, No.9)
- Reduced-rate lending from the Udmurtia Fund for Entrepreneurship Development (No.1–7)
- PSEDA (No.10–15, 17–20)

- Sale
- Lease
- Cadastral value of the land plot
- Capacity to connect
- Capacity
- Capacity range
- Distance to connection point
- The site is connected

* Upon the investor’s request, a valuation can be conducted on the asset.

Source: Development Corporation of the Udmurt Republic
### INVESTMENT SITES IN UDMURTIA

#### INVESTMENT SITES AND INDUSTRIAL PARKS

<table>
<thead>
<tr>
<th>No.</th>
<th>Address</th>
<th>Area, Ha</th>
<th>Access Ways</th>
<th>Permitted Use Type</th>
<th>Electricity Supply</th>
<th>Gas Supply</th>
<th>Water Supply and Water Disposal</th>
<th>Type of Ownership</th>
<th>Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Izhevsk</td>
<td>10</td>
<td>M-7: 25 km, Izhevsk Station: 27 km</td>
<td>Land for multifunctional public and business facilities, for deployment of an industrial facility or warehouses</td>
<td>2 MW onsite</td>
<td>2000 m³/h on site</td>
<td>Capability to drill a well to facilitate onsite operations, Water-bearing layer depth: 10 m</td>
<td>Private</td>
<td>RUB 5m per hectare</td>
</tr>
<tr>
<td>2</td>
<td>Izhevsk</td>
<td>24</td>
<td>M-7: 6 km, Izhevsk Station: 15 km</td>
<td>For public and business facilities, for deployment of public and business facilities or a shopping centre</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Networks go along the border of the plot</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Private</td>
<td>RUB 262.1m</td>
</tr>
<tr>
<td>3</td>
<td>Izhevsk</td>
<td>25</td>
<td>198, ulitsa Kambarskaya 9</td>
<td>For deployment of public and business facilities or a shopping centre</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Networks go along the border of the plot</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Private</td>
<td>Search for an investor to build an agribusiness park</td>
</tr>
<tr>
<td>4</td>
<td>Izhevsk</td>
<td>26</td>
<td>M-7: 9 km, Izhevsk Station: 18 km</td>
<td>For public and business facilities or a shopping centre</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Networks go along the border of the plot</td>
<td>Technical specifications not received, networks go along the border of the plot</td>
<td>Private</td>
<td>RUB 29m</td>
</tr>
<tr>
<td>5</td>
<td>Izhevsk</td>
<td>27</td>
<td>0.766 m²</td>
<td>DD-1 Zone: Multi-functional public and business development zone in a multi-storied structure</td>
<td>Technical specifications received</td>
<td>Technical specifications received</td>
<td>Technical specifications received</td>
<td>Private</td>
<td>RUB 29m</td>
</tr>
<tr>
<td>6</td>
<td>Sarapul</td>
<td>28</td>
<td>ulitsa Industrialnaya (plot in the process of formation)</td>
<td>For deployment of production and utility facilities and public and business buildings</td>
<td>Capability to connect 150 kW on site, 50 m</td>
<td>Capability to connect 20 m³/h, 50 m</td>
<td>Capability to connect 2,500 m³/day, 55 m</td>
<td>Municipal</td>
<td>RUB 32.0m*</td>
</tr>
<tr>
<td>7</td>
<td>Sarapul</td>
<td>29</td>
<td>1, ulitsa Leningradskaya 5.24</td>
<td>For deployment of industrial facilities</td>
<td>Capability to install a substation and connect it to 0.4 kV cable, 10 m</td>
<td>Capability to connect 500 m³/h, 10 m</td>
<td>Capability to connect 4,200 m³/day, 70 m</td>
<td>Private</td>
<td>RUB 17.8m*</td>
</tr>
</tbody>
</table>

### Land Plots (1/2)

- **Category:** Land for production, energy industry, transport, communications and other special purposes (Nos. 22–31)
- **Settlement lands (No. 21–30)**

**Support Measures:**

- For lease without bidding: PFEIDA (Nos. 25, 27, 30)
- For lease without bidding: P28, 29, 29, 33

**Type of Ownership:**

- **Sales:** Cadastral value of the land plot
- **Lease:** Capacity to connect

**Cost:**

- **RUB 5m per hectare**
- **RUB 262.1m**
- **RUB 29m**
- **RUB 29m**
- **RUB 32.0m**
- **RUB 17.8m**

* Upon the investor’s request, a valuation can be conducted on the asset.

Source: Development Corporation of the Udmurt Republic
### INVESTMENT SITES IN UDMURTIA

#### LAND PLOTS (2/2)

<table>
<thead>
<tr>
<th>No.</th>
<th>ADDRESS</th>
<th>AREA, HA</th>
<th>ACCESS WAYS</th>
<th>PERMITTED USE TYPE</th>
<th>ELECTRICITY SUPPLY</th>
<th>GAS SUPPLY</th>
<th>WATER SUPPLY AND WATER DISPOSAL</th>
<th>TYPE OF OWNERSHIP</th>
<th>COST</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>Votkinsk</td>
<td>160, ulitsa Pugacheva</td>
<td>М- 7: 62 km Voloknok Station: 4 km</td>
<td>For deployment of industrial facilities</td>
<td>6.2 kV-190 kV 120 m</td>
<td>100 kW</td>
<td>Main water supply pipeline</td>
<td>Non-delineated federal properties</td>
<td>RUB 8.1m*</td>
</tr>
<tr>
<td>2</td>
<td>Votkinsk</td>
<td>160, ulitsa Pugacheva</td>
<td>М- 7: 80 km Votkinsk Station: 5 km</td>
<td>For deployment of industrial facilities</td>
<td>6.2 kV-190 kV 400 m</td>
<td>42 kW</td>
<td>Main water supply pipeline</td>
<td>Municipal</td>
<td>RUB 14.1m*</td>
</tr>
<tr>
<td>3</td>
<td>Glasov</td>
<td>No.33 pereulok Gvardeisky/ulitsa Kuibysheva</td>
<td>М- 7: 80 km Glasov Station: 5 km</td>
<td>To build class IV-V hazard industrial facilities</td>
<td>6.2 kV-190 kV 500 m</td>
<td>250 m</td>
<td>Main water supply pipeline</td>
<td>Municipal</td>
<td>RUB 6.7m*</td>
</tr>
<tr>
<td>4</td>
<td>Zavyalovsky Area</td>
<td>No.35 Zavyalovsky Area</td>
<td>М- 7: 27 km Uzheisk Station: 26 km</td>
<td>Current public and business facilities. For deployment of an industrial facility, warehouses or car dealership</td>
<td>6.2 kV-190 kV 1,000 m3/h</td>
<td>4.5 MW</td>
<td>Main water supply pipeline</td>
<td>Private</td>
<td>RUB 5m per hectare</td>
</tr>
<tr>
<td>5</td>
<td>Zavyalovsky Area</td>
<td>No.35 Zavyalovsky Area</td>
<td>М- 7: 27 km Uzheisk Station: 26 km</td>
<td>Current public and business facilities. For deployment of an industrial facility, warehouses or car dealership</td>
<td>6.2 kV-190 kV 1,000 m3/h</td>
<td>4.5 MW</td>
<td>Main water supply pipeline</td>
<td>Private</td>
<td>RUB 5m per hectare</td>
</tr>
<tr>
<td>6</td>
<td>Muzhinsky District</td>
<td>No.36 900 m west of the village of Chumoitlo, MG Gornakskoye</td>
<td>М- 7: 7 km Muzhga Station: 7 km</td>
<td>Food production. Option to change the type of permitted use to business administration, car service, tslib use, consumer goods industry, construction industry, warehouses, agriculture support, production support or communications</td>
<td>6.2 kV-190 kV 4,500 m3/year</td>
<td>1,000 m3/day</td>
<td>Main water supply pipeline</td>
<td>Municipal</td>
<td>RUB 137.1m*</td>
</tr>
</tbody>
</table>

* Upon the investor’s request, a valuation can be conducted on the asset.
<table>
<thead>
<tr>
<th><strong>INDUSTRIAL PARKS IN UDMURTIA</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>IZHEVSK PLANT</strong></td>
</tr>
<tr>
<td><strong>Address</strong></td>
</tr>
<tr>
<td><strong>Management company</strong></td>
</tr>
<tr>
<td><strong>Focus</strong></td>
</tr>
<tr>
<td><strong>1 Basic services of the management company</strong></td>
</tr>
<tr>
<td>Sale of land plots</td>
</tr>
<tr>
<td>Lease of land plots</td>
</tr>
<tr>
<td>Lease of finished production facilities</td>
</tr>
<tr>
<td>Construction of turn-key industrial buildings</td>
</tr>
<tr>
<td>Provision of specialised equipment</td>
</tr>
<tr>
<td><strong>2 Additional services of the management company</strong></td>
</tr>
<tr>
<td>Logistics, recruitment, maintenance and operation of common use facilities, security, legal, consulting, IT, cleaning of grounds and garbage removal</td>
</tr>
<tr>
<td><strong>3 Transport accessibility</strong></td>
</tr>
<tr>
<td>Distance to the nearest federal highway, km</td>
</tr>
<tr>
<td>Nearest road, name</td>
</tr>
<tr>
<td>Nearest motor road, distance, km</td>
</tr>
<tr>
<td>Length of road network in the park, km</td>
</tr>
<tr>
<td>Railway connection</td>
</tr>
<tr>
<td>On-site railway tracks in the park</td>
</tr>
<tr>
<td>Name of the nearest discharge terminal</td>
</tr>
<tr>
<td>Distance to the nearest railway discharge terminal, km</td>
</tr>
<tr>
<td>Distance to the nearest international airport, km</td>
</tr>
<tr>
<td><strong>4 Park infrastructure, land plot</strong></td>
</tr>
<tr>
<td>Total territory in the park, hectares</td>
</tr>
<tr>
<td>Permitted hazardous facility class</td>
</tr>
<tr>
<td><strong>5 Real estate (Industrial, Office)</strong></td>
</tr>
<tr>
<td>Existing production facilities designated for placement of residents, sq m</td>
</tr>
<tr>
<td>Total office floor size for placement of residents, sq m</td>
</tr>
<tr>
<td><strong>6 Resources</strong></td>
</tr>
<tr>
<td>Electricity</td>
</tr>
<tr>
<td>Available capacity, MW</td>
</tr>
<tr>
<td>Tariff for residents, RUB/kWh</td>
</tr>
<tr>
<td>Park gas supply</td>
</tr>
<tr>
<td>Heat supply</td>
</tr>
<tr>
<td>Park water supply</td>
</tr>
<tr>
<td>Water disposal in the park and storm sewage treatment facilities</td>
</tr>
<tr>
<td>Communications (telephone and fibre optic Internet)</td>
</tr>
<tr>
<td><strong>7 Accessibility for employees</strong></td>
</tr>
<tr>
<td>Availability of transport connection from residential areas to the park</td>
</tr>
<tr>
<td>permanent public transport routes</td>
</tr>
<tr>
<td><strong>8 Investments and residents</strong></td>
</tr>
<tr>
<td>Total investments in park infrastructure, RUB million</td>
</tr>
<tr>
<td>Total investments of park residents, RUB million</td>
</tr>
<tr>
<td>Number of jobs created in the park, units</td>
</tr>
<tr>
<td><strong>CONTACT PERSON</strong></td>
</tr>
<tr>
<td>Artem Votyakov</td>
</tr>
<tr>
<td>T +7 (3412) 911-969</td>
</tr>
<tr>
<td>M +7 (912) 451-60-98</td>
</tr>
<tr>
<td>E <a href="mailto:rav@most-dvlp.ru">rav@most-dvlp.ru</a></td>
</tr>
</tbody>
</table>

Source: Development Corporation of the Udmurt Republic
## Information on Available Agricultural Land

### Available agricultural land

<table>
<thead>
<tr>
<th>District</th>
<th>Number of Agricultural Land Plots (with Assigned Cadastral Numbers)</th>
<th>Total Area of Land Plots Available for Sale/Lease, HA</th>
<th>Minimum and Maximum Area of Land Plots Available for Sale/Lease, HA</th>
<th>Average Cost of Annual Land Plot Lease (without Bidding), RUB*</th>
<th>Minimum and Maximum Cost of Annual Leases on Land Plots Available for Sale/Lease, RUB</th>
</tr>
</thead>
<tbody>
<tr>
<td>Kiyasovsky</td>
<td>16</td>
<td>3,632.2</td>
<td>12 - 848</td>
<td>13,561.9</td>
<td>640 - 45,235</td>
</tr>
<tr>
<td>Mozhginsky</td>
<td>2</td>
<td>391.0</td>
<td>72 - 319</td>
<td>12,424.8</td>
<td>4,571 - 20,278</td>
</tr>
<tr>
<td>Sarapulsky</td>
<td>13</td>
<td>1,353.4</td>
<td>6 - 356</td>
<td>13,642.8</td>
<td>935 - 66,372</td>
</tr>
<tr>
<td>Seltinsky</td>
<td>8</td>
<td>169.8</td>
<td>8 - 37</td>
<td>682.1</td>
<td>171 - 1,237</td>
</tr>
<tr>
<td>Uvinsky</td>
<td>7</td>
<td>115.1</td>
<td>6 - 43</td>
<td>637.4</td>
<td>241 - 1,738</td>
</tr>
<tr>
<td>Yukamensky</td>
<td>34</td>
<td>5,375.6</td>
<td>2 - 1,317</td>
<td>10,087.1</td>
<td>152 - 71,798</td>
</tr>
<tr>
<td>Yarsky</td>
<td>19</td>
<td>782.0</td>
<td>0.2 - 512</td>
<td>2,360.2</td>
<td>11 - 29,332</td>
</tr>
</tbody>
</table>

*0.4% of the cadastral value (rate for agricultural land established by Udmurt Republic Government Resolution No. 172 of 6 November 2007)  
Note: Depending on the project and investor’s requirements, the location and size of the plot may be determined individually.

Source: Development Corporation of the Udmurt Republic

### Lease

Land plots are leased out for 49 years without bidding, provided that an investment project will be implemented there.

### Sale

- After three years of lease, a land plot may be purchased without bidding at its cadastral value.
- For farming purposes, land plots are provided without bidding, provided that the lessee has published the project and is participating in a regional state programme.
- In other cases, there is an auction with the starting price determined following an appraisal.
PERMITTED ACTIVITIES IN THE GLAZOV AND SARAPUL PSEDAS

GLAZOV

1. Food production
2. Textiles
3. Clothing
4. Wood and wood products, except furniture, straw and plaited goods
5. Rubber and plastic items
6. Non-metallic mineral products
7. Fabricated metal products, except machinery and equipment
8. Computers, electronic and optical devices
9. Electrical equipment
10. General machinery and equipment
11. Furniture
12. Finished goods
13. IT
14. Health care
15. Libraries, archives, museums and other cultural facilities
16. Sports, recreation and entertainment

SARAPUL

1. Plant growing and cattle breeding, hunting and provision of related services in these areas (except for auxiliary activities in the field of crop production and post-harvest processing of agricultural products, hunting, capture and shooting of wild animals, including provision of services in these areas)
2. Fisheries
3. Stone, sand and clay
4. Food production (except for drinking milk and drinking cream, production of grain crops flour, production of bread and baked goods, cakes and pastries with short shelf-lives)
5. Soft drinks and mineral water
6. Textiles
7. Clothing
8. Leather and related products
9. Wood and wood products, except furniture, straw and plaited goods
10. Paper and paper products
11. Chemicals and chemical products
12. Basic pharmaceutical products and medical devices
13. Rubber and plastic items
14. Non-metallic mineral products (except for cement, lime and plaster)
15. Metallurgy
16. Finished metal products, except for machines and equipment (except for weapons and ammunition)
17. Computers, electronic and optical products (except for elements of electronic equipment and printed circuits, and communication equipment)
18. Electrical equipment (except for the production of electric motors, electric generators and transformers)
19. General machinery and equipment
20. Motor vehicles, trailers and semi-trailers
21. Other vehicles and equipment
22. Furniture
23. Finished goods
24. Waste processing and disposal
25. Sorted materials disposal
26. Warehousing and storage
27. Freight transport processing
28. Provision of temporary accommodation
29. Telecommunications
30. Software development, consulting services in this area and other related services
31. IT
32. Research and development
33. Other professional, scientific and technical activities (except for professional, scientific and other technical activities not included in other groups)
34. General education
35. Additional education
36. Health care
37. Provision of care with accommodation on site
38. Creative sector, art and entertainment
39. Sports, recreation and entertainment

Sources: Russian Government Decree No. 1178 of 29 September 2017 Russian Government Decree No. 125 of 12 February 2019
APPENDIX 1: SUCCESS STORIES IN UDMURTIA
OVER THE PAST FIVE YEARS, WE HAVE MADE A GREAT LEAP FORWARD IN PRODUCING CIVILIAN-USE PRODUCTS. IN 2018, YEAR-ON-YEAR REVENUE FROM CIVILIAN-USE PRODUCTS INCREASED THREEFOLD. We are recognised as a Russian leader in the digitalisation of manufacturing. At Kalashnikov, we have built an IT ecosystem that serves as a model for other Russian manufacturing enterprises. The regional administration provides key assistance in engaging with development institutes.

The Izhevsk Mechanical Plant was founded in 1807 following a decree issued by Alexander I. The Izmash Production Association was set up in 1975. AO NPO Izhmash was renamed as AO Kalashnikov Concern in 2013 based on Rostec Corporation Decision No. 122-ROAO of 23 May 2013

1. Civilian-use small weapons (sports and hunting weapons, tactical weapons, signal guns, air guns, dummy guns, non-lethal weapons and replica weapons)
2. Unmanned aerial vehicles (copters and planes)
3. Shipbuilding (civilian multifunctional and commercial boats, civilian ships, compound civilian boats, patrol crafts, guided missile boats, speedboats and assault boats)
4. Clothing and accessories
5. Electric transport

Strong brand
Continuous implementation of R&D and advanced technologies to enhance the product line
Manufacturing of a wide range of high-demand and competitive products
Extensive experience in the industry and highly qualified engineers
Rostec Corporation, which includes more than 700 entities that work to unleash Russia’s technological and scientific potential, holds a 25% share in AO Kalashnikov Concern.

Kalashnikov Concern produces products and provides services for the civilian sector.
**TODAY, GOODS UNDER OUR SELO ZELENOE, MOLOCHNAYA RECHKA, TOPTYZHKA, TOBE AND OTHER BRANDS ARE SOLD ACROSS A VARIETY OF NATIONAL AND LOCAL CHAINS IN RUSSIA AND NEIGHBOURING COUNTRIES. WE HAVE STARTED TO EXPORT OUR PRODUCTS TO CHINA. Udmurtia has become part of the global world. This is not just a slogan. The regional administration has taken important measures to promote products made in Udmurtia. We highly appreciate the efforts of the regional administration to enhance the investment appeal of our territory and support local producers. All of this helps to promote a positive image of Udmurtia.**

**OOO KOMOS GROUP**

**YEAR OF ESTABLISHMENT**
- 2003

**CORE ACTIVITIES**
- Milk processing (2nd largest Russian producer of UTH milk)
- Poultry farming (5th in egg production)
- Pig-breeding and meat processing (23rd in pork production)
- Meat processing
- Crop and dairy farming
- Animal feed production
- Fish processing

**PRODUCTION MODERNISATION AND DEVELOPMENT**
- The strategic goal of KOMOS GROUP is to become the leading milk processing company in Russia by reaching processing volumes of 1 million tonnes. For this purpose, the agricultural holding is conducting large scale reconstruction projects on a regular basis. In particular, the holding is currently implementing the MILKOM 2020 investment project, which is aimed at modernising production facilities and adopting modern technology for waste water processing at the Kezskiy Cheese Factory.
- In the near future, the Ministry of Agriculture and Food of the Udmurt Republic and OAO MILKOM plan to sign a special investment contract that will facilitate the project, provided that OAO MILKOM receives tax benefits. Total investments to reconstruct the Kezskiy Cheese Factory will exceed RUB 2bn.
- From 2005 to 2018, the holding invested RUB 23.2bn in the agribusiness sector in Udmurtia, Tatarstan and Perm.

**KEY COMPETITIVENESS DRIVERS**
- KOMOS comprises 17 companies in Udmurtia, Tatarstan, Perm and Bashkortostan.
- KOMOS operates branded retail outlets and the KOMOS-Logistika transportation company, which delivers the holding’s products across Russia.
- KOMOS collaborates with the Selo Zelenoe chain (the brand’s projected sales for 2019 will be RUB 10bn).

**STATE SUPPORT EXPERIENCE**
- In 2018, the Foundation for the Development of Single-Industry Cities approved the application of the Udmurt Republic in relation to the investment project “Reconstruction of Sarapul Meat-Processing Plant of OOO Vostochny of KOMOS GROUP agricultural holding”. As part of the investment project, several shops have been repaired, new production equipment has been launched and infrastructure is being developed. Completing the project will enhance production volumes and create 100 new jobs.

**SALES GEOGRAPHY**
- KOMOS delivers products to 72 Russian regions.
- In April 2019, Sarapul-Moloko shipped the first batch of dairy products to China as part of an international contract signed in March between the agricultural holding and Li Hua Economic and Co.Ltd Suifenhe (Suifenhe, People’s Republic of China). The expected trade volume will be at least 500 tonnes of dairy products and 40 tonnes of ice cream per month.

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**SUCCESS STORIES IN UDMURTIA**

**ANDREY SHUTOV**
Managing Shareholder
OOO KOMOS GROUP

“I TODAY, GOODS UNDER OUR SELO ZELENOE, MOLOCHNAYA RECHKA, TOPTYZHKA, TOBE AND OTHER BRANDS ARE SOLD ACROSS A VARIETY OF NATIONAL AND LOCAL CHAINS IN RUSSIA AND NEIGHBOURING COUNTRIES. WE HAVE STARTED TO EXPORT OUR PRODUCTS TO CHINA. Udmurtia has become part of the global world. This is not just a slogan. The regional administration has taken important measures to promote products made in Udmurtia. We highly appreciate the efforts of the regional administration to enhance the investment appeal of our territory and support local producers. All of this helps to promote a positive image of Udmurtia.”

Source: OOO Komos Group

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Source: OOO Komos Group
OOO IZHEVSK HEATING EQUIPMENT FACTORY

YEAR OF ESTABLISHMENT  2007

CORE PRODUCTS
Thermal equipment:
- Heat guns, thermal curtains
- Infrared electric and gas heaters, electric convectors
- Gas lamps with an electronic control unit, water fan heaters

THE FACTORY’S MILESTONES
- In 2008, an assembly site was launched at NPP Kupol.
- In 2011, the factory moved to new production facilities. The factory launched the following: mechanical metal-working, press-forming, powder painting and assembling conveyors.
- The factory introduced the Lean Production Programme.
- In 2014, the factory opened new production facilities in Kirzhach, Vladimir Region. CE certified. A belt conveyor, bending machine, laser machine and profiling line are in place.
- In 2015, the factory obtained a Quality Management System certificate in accordance with ISO 9001 standards.

VASYL PERMYAKOV
Director of OOO Izhevsk Heating Equipment Factory

SUCCESS STORIES IN UDMURTIA

"UDMURTIA IS A LONG ESTABLISHED INDUSTRIAL REGION WITH PRODUCTION EXPERTISE, STRONG COLLABORATIONS AND HIGH LEVELS OF HUMAN CAPITAL. In combination with state support, all of these factors create excellent conditions to develop existing production facilities and attract new investment."

Source: OOO Izhevsk Heating Equipment Factory

KEY COMPETITIVENESS DRIVERS
- Modern automatic equipment from Germany, Italy, Japan, Turkey and Switzerland and sufficient material and technical resources
- Highly trained and skilled personnel
- Wide range of high-quality products
- Internal network of authorised service centres
- High quality standards
- Collaboration with leading Russian and European universities, laboratories and institutes

KEY ACCOUNTS
- Ballu
- Zanussi
- Electrolux
- ZUBR
- Interskol
- Russian Railways (RZD)
- Moscow Metro
- Sberbank

SALES MARKETS
- Russia and CIS
- Norway
- Finland
- Sweden
- Holland
- England
- France
- Poland
STATE SUPPORT RECEIVED AT THE REGIONAL LEVEL FROM THE GUARANTEE FUND GAVE THE COMPANY ADDITIONAL RESOURCES TO DEVELOP NEW LINES OF BUSINESS AND ENTER NEW DISTRIBUTION MARKETS.

OOO ORION

YEAR OF ESTABLISHMENT 2010

COMPANY MILESTONES
- In 2005, the company sold veneer stock and firewood to a forest combine.
- In 2010, the company bought equipment from Uvadrev Holding and started lato-flex production.
- In 2012, the company started producing veneers of various thickness.
- In 2018, an up-to-date high-output sawmilling line was launched.

CORE PRODUCTS
- Birch veneer products, including veneer, caul, panels.

PROMISING AREAS OF DEVELOPMENT
- Wood trim from soft and hard wood including floor and roofing board, rectangular timber, weatherboard, casing molding

KEY COMPETITIVENESS DRIVERS
- Using cutting-edge, energy-efficient wood processing equipment made in Taiwan, Finland and Brazil
- Efficient use of state support

STATE SUPPORT EXPERIENCE
- In 2013-2016, the company received subsidies from the regional and federal budgets.
- The company received a reduced-rate forest resource lease under a forest development priority investment project (“Technical re-equipment of veneer and sawmilling production, forest harvesting operations set-up”) in 2015.
- The company raised funds via the Industry Development Fund for an investment project (“11-section veneer roller dryer with automated independent temperature control for each gas burner, veneer hot presses and compactors”) in 2017.
- The company received a 106.6m loan against a guarantee issued by the SME Corporation under Programme 6.5 to carry out modernisation and purchase raw materials.

SALES GEOGRAPHY
- Russian Federation
- Azerbaijan
- Italy
- Egypt
- Estonia
- Finland
- Czech Republic
- Germany
- Canada

“STATE SUPPORT RECEIVED AT THE REGIONAL LEVEL FROM THE GUARANTEE FUND GAVE THE COMPANY ADDITIONAL RESOURCES TO DEVELOP NEW LINES OF BUSINESS AND ENTER NEW DISTRIBUTION MARKETS.”

ALEKSANDR SHTUMF
Director OOO ORION
WE FEEL SUPPORTED BY THE GOVERNOR AND REGIONAL ADMINISTRATION AND THE ALMAZ-ANTEY CONCERN. We have developed gas-powered radiant heating systems that enable large industrial sites to cut their energy costs in half. And this is a fact.

We provide turn-key purification facilities, including designing the technical and construction blueprint. We also build, commission, train and set up work schedules for purification facilities.

"WE FEEL SUPPORTED BY THE GOVERNOR AND REGIONAL ADMINISTRATION AND THE ALMAZ-ANTEY CONCERN."

Climate control equipment:
- Fan heaters
- Air curtains
- Infra-red heaters
- Heat guns
- Heat exchangers for ventilation and air conditioning systems

Machinery products and fuel and energy complex:
- NPP equipment
- Edge rolling-off
- Oilfield equipment

Energy and resource efficiency:
- Gas infra-red heating elements
- Light gauge steel framing (LGSF)
“WE ARE HEAVILY ENGAGED IN TRANSFORMING TRADITIONAL COMPANIES INTO INNOVATIVE ONES AND IN HELPING OUR CLIENTS START PROCESS-FOCUSED BUSINESS TRANSFORMATIONS.”

“IN OUR REGION, WE CALL IT COMPANIES OUR COLLEAGUES, NOT OUR COMPETITORS. OVERALL, THE ENVIRONMENT IS VERY FRIENDLY. Many important annual events are organized by the regional administration and the Ministry of Informatisation and Communications, as well as by individual companies.”

“ALEKSEI TREFILOV
CEO OOO Elma

“We are heavily engaged in transforming traditional companies into innovative ones and in helping our clients start process-focused business transformations.”

OOO HIGH TECHNOLOGY CENTRE

YEAR OF ESTABLISHMENT
2000

CORE ACTIVITIES
— Developing tailored solutions for e-commerce, media and manufacturing enterprises

TECHNOLOGIES OFFERED BY THE COMPANY
— Augmented reality and virtual reality
— Computer vision
— Monitoring systems for robots and manufacturing equipment

STATE SUPPORT EXPERIENCE
— Federal tax benefit for companies registered in the Register of Certified IT Companies

KEY ACCOUNTS
— Samsung
— IEMZ Kupol
— Rosatom
— STS Media
— ivi.ru
— Alfa Bank
— Tinkoff

AWARDS
— Top 100 production developers and top 50 web developers according to Tagline
— Second place at Tagline Awards 2018 in the Best Smart TV App nomination
— Winner of the Golden App Awards 2018
— Third place at Tagline Awards 2018 in the Best AR/VR App nomination

OOO ELMA

YEAR OF ESTABLISHMENT
2006

CORE PRODUCTS
— Projects+ (project management)
— CRM+ (sales management)
— ECM+ (electronic workflow)
— BPM (business process management)
— KPI (performance indicators management)

PROMISING DEVELOPMENT AREAS
— ELMA.IA (RPA, AI)
— ELMA365 (a cloud-based system for SME automation)

STATE SUPPORT EXPERIENCE
— The company is registered in the Udmurt Republic’s Export-Focused SME Register

KEY COMPETITIVENESS DRIVERS
— High speed of adoption
— Low entry threshold and visual clarity
— Low-code support
— Adaptive outer look, user-friendly interface
— Wide integration capabilities and quick adaptation to company infrastructure
— Affordable implementation cost and low cost of ownership and roll-out
— Smart automation solutions support

SALES GEOGRAPHY
— Russia
— Netherlands
— Poland
— Guatemala
— Kazakhstan
— Azerbaijan
— China
— UK
— Ukraine

Source: OOO High Technology Centre
Source: OOO Elma
IN MANY HIGH-POTENTIAL DEVELOPMENT AREAS, UDMURTIA ALREADY HAS OPERATIONS SUPPORT FACILITIES...

UNMANNED SYSTEMS

Product description
Reconnaissance unmanned systems to ensure state border protection, carry out reconnaissance and rescue missions and monitor high-risk sites.

Launch date
2004

Did you know?
- 2% of the world’s UAVs are manufactured in Udmurtia.
- Udmurtia is a leader in aerial monitoring service provision for the fuel and energy industry in Russia. UAVs annually inspect over 5 million kilometres of fuel and energy infrastructure making over 20,000 flights.
- Zala Aero Group’s unmanned systems are used to monitor forest fires and other emergency situations.
- Key accounts: Roskosmos, Rosatom, Transnett, Gazprom, Rosteletekom and defence and law enforcement agencies.

www.zala.aero

Launch date

Did you know?
- Up to 2004, all first aid and ambulance teams were equipped with DKN-N-04 defibrillators.
- The enhanced DKN-N-11 monitor defibrillator is the only device in its class manufactured in Russia.
- DKN-N-11 defibrillators were used during FIFA World Cup 2018 in Ekaterinburg, Rostov-on-Don, Kaliningrad, Sarana, Saransk, Nizhny Novgorod and Volgograd.
- Key accounts: Roscosmos, Rosatom, Transnett, Gazprom, Rosteletekom and defence and law enforcement agencies.

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LIFT WINCHES

Product description
Lift winches and worm- and-worm wheel (equipment for lift winches).

Launch date
2018

Did you know?
- Russia’s first domestic lift winch manufacturing facility was launched in the region.
- As part of this process, the Industry Development Fund issued a reduced-rate loan in the amount of RUB 249 million.
- Key accounts: major Russian lift manufacturers: OTIS, Shcherbinsky Lift Plant, Karacharovsky Mechanical Engineering Plant.
- Direct-drive winches are under development to extend the product range of localised production facilities.

www.segz.ru

Launch date
1994 (incorporation) 2009 (PAINTTECH nanopaint)

Did you know?
- Silver Nano is Russia’s only paint with silver nanoparticles certified by Independent Russian Product Quality Assurance and Certification Agency.
- Silver Nano is used in healthcare facilities, kindergartens and schools, the Ministry of Defence and the Penal Correction Department facilities and also other congested locations.
- This paint is designed to prevent the spread of disease.

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APPENDIX 2:
ADVANTAGES OF INVESTING
IN THE FIVE INDUSTRIES SELECTED
FOR AN IN-DEPTH AUDIT
DAIRY FARMING: ADVANTAGES OF SS INVESTING IN UDMURTIA (1/2)

ECONOMIC PERFORMANCE

11% Share of private equity in livestock revenues

4% Livestock accounts for a higher share of regional company revenues in comparison with the national average

16 RUB BN Total investments in livestock for 2013–2017

THE AGRICULTURAL SECTOR ACCOUNTS FOR A HIGHER SHARE OF EMPLOYMENT IN UDMURTIA COMPARED WITH THE NATIONAL AVERAGE AND PEER REGIONS (%)

<table>
<thead>
<tr>
<th>Region</th>
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<td>1.9%</td>
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THE AGRICULTURAL SECTOR ACCOUNTS FOR A HIGHER SHARE OF EMPLOYMENT IN UDMURTIA COMPARED WITH THE NATIONAL AVERAGE AND PEER REGIONS (%)

11% Average for Russia

4% Average for Russia

16 RUB BN Average for Russia

HUMAN CAPITAL

28,000 people employed in farming and livestock breeding

4% Share of farming and livestock in regional employment

THE AGRICULTURAL SECTOR ACCOUNTS FOR A HIGHER SHARE OF EMPLOYMENT IN UDMURTIA COMPARED WITH THE NATIONAL AVERAGE AND PEER REGIONS (%)

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11% Average for Russia

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16 RUB BN Average for Russia

IZHEVSK STATE AGRICULTURAL ACADEMY

100% of students majoring in agriculture, forestry and fishery (code 35.00.00) in Udmurtia study in the academy programmes were recognised as the best programmes according to the Best Educational Programmes of Innovative Russia Programme for 2018

130 companies offer internships to the academy’s students

56 average EGE (Uniform State Exam) score among students enrolled in all programmes

RAW MILK PRODUCTION IN 2017 (TONNES)

757 K TONNES

~93% Marketability of milk produced in Udmurtia (2018)

Izhevsk State Agricultural Academy

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130 companies offer internships to the academy’s students

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SHARE OF GRADUATES UNDER CODE 35.00.00 WHO ARE EMPLOYED (%)

66% 84% 97%

Sources: Dairy News (2018), Rosstat (2017)
DAIRY FARMING: ADVANTAGES OF SS INVESTING IN UDMURTIA (2/2)

FINANCIAL PERFORMANCE

SHARE OF PROFIT-MAKING ORGANISATIONS IN 2017 (%)

<table>
<thead>
<tr>
<th>Region</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>84%</td>
</tr>
<tr>
<td>Voronezh</td>
<td>75%</td>
</tr>
<tr>
<td>Tatarstan</td>
<td>86%</td>
</tr>
<tr>
<td>Rostov</td>
<td>100%</td>
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<td>Russia</td>
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EXPECTED BUSINESS COSTS OF CAPITAL CONSTRUCTION

PRICE ADVANTAGE VS THE AVERAGE FOR RUSSIA (P.P.)

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<tr>
<th>Region</th>
<th>Advantage</th>
</tr>
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LAND RUB/SQ M

<table>
<thead>
<tr>
<th>Region</th>
<th>Cost</th>
</tr>
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<tbody>
<tr>
<td>Udmurtia</td>
<td>1.2</td>
</tr>
<tr>
<td>Voronezh</td>
<td>5.8</td>
</tr>
<tr>
<td>Tatarstan</td>
<td>60.0</td>
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Financial Result to Revenue Ratio in 2017 (%)

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UDMURT AGRIBUSINESS SUPPORT FROM THE FEDERAL AND REGIONAL BUDGET

Total funding in the Udmurt agribusiness sector in 2019

<table>
<thead>
<tr>
<th>Region</th>
<th>Funding</th>
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<tbody>
<tr>
<td>Udmurtia</td>
<td>RUB 987,288,000</td>
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<tr>
<td>Voronezh</td>
<td>RUB 1,038,707,000</td>
</tr>
</tbody>
</table>

MAJOR SUPPORT PROGRAMMES IN 2019:

Programme to increase the productivity of dairy cattle. Udmurtia has allocated an additional RUB 300m above the agreed co-financing amount.

Partial compensation of costs to acquire young dairy cattle.

Subsidy for compensation of costs to acquire and modernise plant and equipment for agribusiness enterprises and organisations (fully from the regional budget).

The PSEDA in Sarapul includes livestock breeding in its list of approved economic activity.

SHARE OF PROFIT-MAKING ORGANISATIONS IN 2017 (%)

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FINANCIAL RESULT TO REVENUE RATIO IN 2017 (%)

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Sources: Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PwC analysis.
WOOD: ADVANTAGES OF INVESTING IN UDMURTIA (1/2)

RAW MATERIALS

- **9%** Share of private equity in wood industry revenues
- **15%** Average for Russia

- **1.3%** Share of the wood industry in the total revenue of regional companies
- **4.8 RUB BN** Total investments in the wood industry for 2013–2017

HUMAN CAPITAL

- **3,300** Number of persons employed in the woodworking industry
- **0.5%** Average for Russia

- **2,169,000 RUB/PERS.** Revenue per employee in the woodworking industry (estimate)

Source: Rosstat (2017)

IZHEVSK STATE AGRICULTURAL ACADEMY

IZhGSKha offers higher education programmes in the forest and woodworking industry

Source: IZhGSKha

UDMURTIA’S LIMITED TIMBER RESERVES ARE OFFSET BY HIGHLY EFFICIENT PRODUCTION METHODS

<table>
<thead>
<tr>
<th>TIMBER RESERVE (CUBIC METRES) PER SQUARE METRE OF FOREST FUND LAND, 2017</th>
<th>% OF FOREST FUND LAND</th>
<th>ROUGH TIMBER (THOUSAND CUBIC METRES) PER PERSON EMPLOYED IN THE INDUSTRY</th>
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<tr>
<td>UDMURTIA</td>
<td>57</td>
<td>48%</td>
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<tr>
<td>TVER REGION</td>
<td>62</td>
<td>57%</td>
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<tr>
<td>LENINGRAD REGION</td>
<td>60</td>
<td>57%</td>
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<tr>
<td>IRKUTSK REGION</td>
<td>72</td>
<td>89%</td>
</tr>
<tr>
<td>PERM KRAI</td>
<td>71</td>
<td>63%</td>
</tr>
</tbody>
</table>

Source: Rosstat (2017)

SHARE OF FORESTRY GRADUATES AMONG IZHGSKH GRADUATES

<table>
<thead>
<tr>
<th>2015</th>
<th>2016</th>
<th>2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>4%</td>
<td>7%</td>
<td>8%</td>
</tr>
</tbody>
</table>

Source: IZhGSKha

SHARE OF FORESTRY GRADUATES WHO ARE EMPLOYED IN THEIR AREA OF EDUCATION

<table>
<thead>
<tr>
<th>2015</th>
<th>2016</th>
<th>2017</th>
</tr>
</thead>
<tbody>
<tr>
<td>74%</td>
<td>100%</td>
<td>93%</td>
</tr>
</tbody>
</table>

Source: IZhGSKha
WOOD: ADVANTAGES OF INVESTING IN UDMURTIA (2/2)

FINANCIAL PERFORMANCE

SHARE OF PROFIT-MAKING ORGANISATIONS IN 2017 (%)

<table>
<thead>
<tr>
<th>Region</th>
<th>Percentage</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>100%</td>
</tr>
<tr>
<td>Tver Region</td>
<td>57%</td>
</tr>
<tr>
<td>Leningrad Region</td>
<td>75%</td>
</tr>
<tr>
<td>Irkutsk Region</td>
<td>73%</td>
</tr>
<tr>
<td>Perm Krai</td>
<td>100%</td>
</tr>
<tr>
<td>Average for Russia</td>
<td>65%</td>
</tr>
</tbody>
</table>

FINANCIAL RESULT TO REVENUE RATIO IN 2017 (%)

<table>
<thead>
<tr>
<th>Region</th>
<th>Ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>23%</td>
</tr>
<tr>
<td>Tver Region</td>
<td>6%</td>
</tr>
<tr>
<td>Leningrad Region</td>
<td>15%</td>
</tr>
<tr>
<td>Irkutsk Region</td>
<td>8%</td>
</tr>
<tr>
<td>Perm Krai</td>
<td>19%</td>
</tr>
<tr>
<td>Average for Russia</td>
<td>13%</td>
</tr>
</tbody>
</table>

EXPECTED BUSINESS COSTS OF CAPITAL CONSTRUCTION

RUSSIAN REGION  CONSTRUCTION* price advantage vs the average for Russia (p.p.)  LAND** RUB/sq m

<table>
<thead>
<tr>
<th>Region</th>
<th>Advantage</th>
<th>Land</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>14 p.p.</td>
<td>189.8</td>
</tr>
<tr>
<td>Tver Region</td>
<td>17 p.p.</td>
<td>284.6</td>
</tr>
<tr>
<td>Leningrad Region</td>
<td>5 p.p.</td>
<td>349.8</td>
</tr>
<tr>
<td>Irkutsk Region</td>
<td>5 p.p.</td>
<td>194.5</td>
</tr>
<tr>
<td>Perm Krai</td>
<td>22 p.p.</td>
<td>231.3</td>
</tr>
</tbody>
</table>

Wood processing is on the list of permitted types of economic activity in the Sarapul and Glazov PSEDA.

Source: Rosstat (2017)

RUSSIAN REGION UTILITY CONNECTIONS

Power (%) Water (%) Heat (%) Total (RUB million)

<table>
<thead>
<tr>
<th>Region</th>
<th>Power</th>
<th>Water</th>
<th>Heat</th>
<th>Total</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>68%</td>
<td>19%</td>
<td>13%</td>
<td>31</td>
</tr>
<tr>
<td>Tver Region</td>
<td>69%</td>
<td>9%</td>
<td>22%</td>
<td>64</td>
</tr>
<tr>
<td>Leningrad Region</td>
<td>57%</td>
<td>36%</td>
<td>7%</td>
<td>54</td>
</tr>
<tr>
<td>Irkutsk Region</td>
<td>27%</td>
<td>66%</td>
<td>8%</td>
<td>82</td>
</tr>
<tr>
<td>Perm Krai</td>
<td>78%</td>
<td>25%</td>
<td>2%</td>
<td>115</td>
</tr>
</tbody>
</table>

Sources: Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PeC analysis

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* The cost of construction advantage is calculated as the difference between the Russia’s average construction cost index and the regional construction cost index. For example, a 10 p.p. advantage means the construction cost index in the region is 10 p.p. lower than the average for Russia.

** The cadastral value of industrial land plots is specified for the last year of cadastral evaluation in the region (permitted use type 2 applied — land plots for construction of production and administrative facilities).
MACHINERY: ADVANTAGES OF INVESTING IN UDMURTIA (1/2)

RAW MATERIALS

The Volga Federal District (VFD) produces more than 10% of Russia’s hot-rolled sheet steel and rod (used as raw materials for metal cutters).

| SHARE OF THE VFD IN RUSSIAN PRODUCTION OF CERTAIN TYPES OF ROLLED STEEL IN 2017 (%) |
|--------------------------------------|--------------------------------------|
| Hot rolled sheet steel               | 14%                                  |
| Plated rolled steel                  | 0%                                   |
| Profiled bar and rod                 | 3%                                   |
| Cold rolled sheet steel              | 15%                                  |

Source: Rosstat (2017)

ECONOMIC PERFORMANCE

- **Share of private equity in machinery revenues**: 4% (Average for Russia)
- **Share of the machinery industry in the total revenue of regional companies**: 2.1% (Average for Russia)
- **Total investments in the machinery industry for 2013–2017**: 1.7 RUB BN

Source: Rosstat (2017)

HUMAN CAPITAL

- **Number of persons employed in the machinery industry**: 6,000
- **Machinery industry’s share of regional employment**: 1% (Average for Russia)
- **Revenue per employee in the machinery industry**: 1,949,000 RUB/PERS.

Source: Rosstat (2017)

KALASHNIKOV IZHEVSK STATE TECHNICAL UNIVERSITY

- **Share of students in Udmurtia who major in machine building study at the university**: 65%
- **Companies have signed special education contracts with the university**: 12
- **Companies provide internships for students from the university**: 498
- **Small enterprises created by the university**: 8

Source: Rosstat (2017)
MACHINERY: ADVANTAGES OF INVESTING IN UDMURTIA (2/2)

FINANCIAL PERFORMANCE

SHARE OF PROFIT-MAKING ORGANISATIONS IN 2017 (%)

<table>
<thead>
<tr>
<th>Region</th>
<th>Profit-Making Organisations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>62%</td>
</tr>
<tr>
<td>Voronezh Region</td>
<td>75%</td>
</tr>
<tr>
<td>Bashkortostan</td>
<td>77%</td>
</tr>
<tr>
<td>Orenburg Region</td>
<td>50%</td>
</tr>
<tr>
<td>Lipetsk Region</td>
<td>73%</td>
</tr>
<tr>
<td>Average for Russia</td>
<td>76%</td>
</tr>
</tbody>
</table>

Source: Rosstat (2017)

FINANCIAL RESULT TO REVENUE RATIO IN 2017 (%)

<table>
<thead>
<tr>
<th>Region</th>
<th>Financial Result to Revenue Ratio</th>
</tr>
</thead>
<tbody>
<tr>
<td>Udmurtia</td>
<td>3%</td>
</tr>
<tr>
<td>Voronezh Region</td>
<td>5%</td>
</tr>
<tr>
<td>Bashkortostan</td>
<td>6%</td>
</tr>
<tr>
<td>Orenburg Region</td>
<td>6%</td>
</tr>
<tr>
<td>Lipetsk Region</td>
<td>5%</td>
</tr>
<tr>
<td>Average for Russia</td>
<td>8%</td>
</tr>
</tbody>
</table>

Source: Rosstat (2017)

EXPECTED BUSINESS COSTS OF CAPITAL CONSTRUCTION

RUSSIAN REGION | CONSTRUCTION* | LAND**
<table>
<thead>
<tr>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>price advantage vs the average for Russia (p.p.)</td>
<td>RUB/sq m</td>
<td></td>
</tr>
<tr>
<td>Udmurtia</td>
<td>14 p.p.</td>
<td>189.8</td>
</tr>
<tr>
<td>Voronezh Region</td>
<td>36 p.p.</td>
<td>378.9</td>
</tr>
<tr>
<td>Bashkortostan</td>
<td>25 p.p.</td>
<td>201.3</td>
</tr>
<tr>
<td>Orenburg Region</td>
<td>23 p.p.</td>
<td>412.6</td>
</tr>
<tr>
<td>Lipetsk Region</td>
<td>19 p.p.</td>
<td>219.3</td>
</tr>
</tbody>
</table>

Sources: Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PwC analysis

RUSSIAN REGION | UTILITY CONNECTIONS
<table>
<thead>
<tr>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Power (%)</td>
<td>Water (%)</td>
</tr>
<tr>
<td>Udmurtia</td>
<td>64%</td>
</tr>
<tr>
<td>Voronezh Region</td>
<td>83%</td>
</tr>
<tr>
<td>Bashkortostan</td>
<td>65%</td>
</tr>
<tr>
<td>Orenburg Region</td>
<td>44%</td>
</tr>
<tr>
<td>Lipetsk Region</td>
<td>35%</td>
</tr>
</tbody>
</table>

Sources: Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PwC analysis

* The cost of construction advantage is calculated as the difference between the Russia’s average construction cost index and the regional construction cost index. For example, a 10 p.p. advantage means the construction cost index in the region is 10 p.p. lower than the average for Russia.

** The cadastral value of industrial land plots is specified for the last year of cadastral evaluation in the region (permitted use type 2 applied — land plots for construction of production and administrative facilities).
FOOD PRODUCTION: ADVANTAGES OF INVESTING IN UDMURTIA

**ECONOMIC PERFORMANCE**

- **Share of private equity in food production revenues**: 2% (Average for Russia)
- **Share of the food production industry in the total revenue of regional companies**: 6.3% (Average for Russia)
- **Total investments in the food production industry for 2013–2017**: 4.3 RUB BN

**HUMAN CAPITAL**

- **Number of people employed in the food production industry**: 10,000
- **Food production industry’s share of regional employment**: 1.4% (Average for Russia)
- **Revenue per employee in the food production industry (estimate)**: 3,543,000 RUB/PERS.

**PRODUCTIVITY**

- **Agricultural output per person employed in the industry in 2017 (RUB million/person)**:
  - UDMURTIA: 26
  - Lipetsk Region: 56
  - Voronezh Region: 95
  - Kaliningrad Region: 62
  - Volgograd Region: 36
  - Saratov Region: 38
  - Tver Region: 37
  - Average for Russia: 5

**EXPECTED BUSINESS COSTS OF CAPITAL CONSTRUCTION**

<table>
<thead>
<tr>
<th><strong>Russian Region</strong></th>
<th><em><em>Construction</em> price advantage vs the average for Russia (p.p.)</em>*</th>
<th><strong>Land</strong> <strong>price advantage vs the average for Russia (RUB/kv m)</strong></th>
<th><strong>Utility Connections</strong></th>
<th><strong>Power (%)</strong></th>
<th><strong>Water (%)</strong></th>
<th><strong>Heat (%)</strong></th>
<th><strong>Total (RUB million)</strong></th>
</tr>
</thead>
<tbody>
<tr>
<td>UDMURTIA</td>
<td>14 p.p.</td>
<td>56</td>
<td>68%</td>
<td>17%</td>
<td>13%</td>
<td>31%</td>
<td></td>
</tr>
<tr>
<td>Lipetsk Region</td>
<td>25 p.p.</td>
<td>219.3</td>
<td>35%</td>
<td>29%</td>
<td>19%</td>
<td>63%</td>
<td></td>
</tr>
<tr>
<td>Voronezh Region</td>
<td>16 p.p.</td>
<td>378.9</td>
<td>83%</td>
<td>27%</td>
<td>11%</td>
<td>68%</td>
<td></td>
</tr>
<tr>
<td>Kaliningrad Region</td>
<td>-2 p.p.</td>
<td>844.8</td>
<td>49%</td>
<td>25%</td>
<td>7%</td>
<td>38%</td>
<td></td>
</tr>
<tr>
<td>Volgograd Region</td>
<td>15 p.p.</td>
<td>291.3</td>
<td>69%</td>
<td>16%</td>
<td>3%</td>
<td>22%</td>
<td></td>
</tr>
<tr>
<td>Saratov Region</td>
<td>24 p.p.</td>
<td>No data</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Tver Region</td>
<td>17 p.p.</td>
<td>284.6</td>
<td>29%</td>
<td>2%</td>
<td>22%</td>
<td>64%</td>
<td></td>
</tr>
</tbody>
</table>

**Sources:** Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PwC analysis

**SHARE OF PROFIT-MAKING ORGANISATIONS IN 2017 (%)**

- **UDMURTIA**: 82%
- **Lipetsk Region**: 85%
- **Voronezh Region**: 69%
- **Kaliningrad Region**: 73%
- **Volgograd Region**: 59%
- **Saratov Region**: No data
- **Tver Region**: 72%
- **Average for Russia**: 78%

**FINANCIAL RESULT TO REVENUE RATIO IN 2017 (%)**

- **UDMURTIA**: 5%
- **Lipetsk Region**: 10%
- **Voronezh Region**: 6%
- **Kaliningrad Region**: 3%
- **Volgograd Region**: 7%
- **Saratov Region**: 3%
- **Tver Region**: 1%
- **Average for Russia**: 7%

**Source:** Rosstat (2017)

* The cost of construction advantage is calculated as the difference between the Russian average construction cost index and the regional construction cost index. For example, a 10 p.p. advantage means the construction cost index in the region is 10 p.p. lower than the average for Russia.

** The cadastral value of industrial land plots is specified for the last year of cadastral evaluation in the region (permitted use type 2 applied — land plots for construction of production and administrative facilities).
PETROLEUM REFINING ADVANTAGES OF INVESTING IN UDMURTIA

RAW MATERIALS

11 M TONNES
Approximate annual crude oil production in Udmurtia

79 M M³
Approximate annual associated petroleum gas production in Udmurtia

IN 2021
LUKOIL PERM is going to launch oil production at two new fields in Udmurtia: Polushkinskoye and Bykovskoye

Source: Rosstat (2017)

EXPECTED BUSINESS COSTS OF CAPITAL CONSTRUCTION

RUSSIAN REGION
CONSTRUCTION* price advantage vs the average for Russia (p.p.)

LAND** RUB/sq m

UTILITY CONNECTIONS
Power (%) Water (%) Heat (%) Total (RUB million)

UDMURTIA 5 p.p. 189.9 68% 30% 13% 31
IRKUTSK REGION 7 p.p. 194.5 27% 64% 8% 82
ASTRAKHAN REGION 21 p.p. 137.7 45% 42% 11% 45
TIKRITAN 13 p.p. 279.2 86% 2% 87
ORENBURG REGION 20 p.p. 412.6 40% 47% 8% 101
PERM KRAI 20 p.p. 231.3 74% 25% 67
SAMARA REGION 24 p.p. 393.1 55% 43% 7% 67

* The cost of construction advantage is calculated as the difference between the Russia’s average construction cost index and the regional construction cost index. For example, a 10 p.p. advantage means the construction cost index in the region is 10 p.p. lower than the average for Russia
** The cadastral value of industrial land plots is specified for the last year of cadastral evaluation in the region (permitted use type 2 applied – land plots for construction of production and administrative facilities).

Sources: Co-Invest (2017), regional laws and regulations on tariff setting, Rosstat (2017), PwC analysis

GUTSERIEV OIL AND GAS INSTITUTE (OGI)

Average passing score
69
77%

Cooperation agreements with employers
20
27

of students in Udmurtia who major in applied geology, mining, oil and gas engineering and geodesy study at OGI

training practice contracts for OGI students

OGI ALUMNI

— CEO of Belkamneft
— CEO of Ulyanovsk Neft
— CEO of Orenburg-Gazprom Neft, etc.

EMPLOYES FOR GRADUATES

Source: Main Information and Computer Centre (GIVTs), Higher Education Monitoring, 2018, OGI

M A D E I N U D M U R T I A
APPENDIX 3. INVESTMENT PROJECTS IN THE UDMURT REPUBLIC PROPOSED FOR JOINT IMPLEMENTATION
MODERNISATION OF THE WATER SUPPLY IN THE CITY OF IZHEVSK

KEY PROJECT PARAMETERS

**PROJECT PROPOSAL**

- Project financing (crediting/leasing).

**Project Description**

The project entails the modernisation of the water supply and water disposal systems operated by Izhvodokanal, a municipal company in Izhevsk. Izhvodokanal supplies more than 600,000 residents of Izhevsk with drinking water, collects wastewater from the population and industrial enterprises, and transports and treats wastewater.

**Current Status**

At the moment, depreciation of fixed assets (networks) is 50–55% (in 2016, depreciation was 60%), while equipment depreciation was at 45%.

**Activities Planned Under the Project**

**Water Supply**

- Reconstruction of pumping stations, siphons, water supply.
- Construction of a water supply system, on-site networks.
- Installation of a pressure regulator.
- Water supply loopback.
- Phasing out and dismantling of old water supply facilities.

**Water Disposal**

- Collector reconstruction.
- Modernisation of treatment facilities.
- Construction of additional water disposal facilities.

**Total Investments**

- In the first 6 years: RUB 6–10 BN
- Within 15 years: RUB 15 BN

---

MODERNISATION OF THE IZHEGET ELECTRIC TRANSPORT FLEET IN IZHEVSK

**PROJECT PROPOSAL**

- Participation in the project (direct investment/leasing).

**Project Description**

The project entails updating the fleet of electric vehicles and modernising the tracks in Izhevsk. Total wear of the equipment is 80%. About 10% of tram tracks require major repairs, and 40% current repairs.

Modernising the electric vehicle fleet will increase efficiency and significantly reduce operating costs. The project also aims to preserve the existing route network.

The depot and tracks are managed by IzhGET Municipal Unitary Enterprise, which is considered the project operator. MUE engages in transportation and maintenance of the route network and rolling stock. Repairs of rolling stock are carried out on a regular basis. In recent years, seven new trams that were newly made from modern materials and components in IzhGET workshops as part of an in-depth overhaul were rolled out. Specialists at IzhGET MUE helped to develop a prototype of experimental production of modernized trolleybuses based on existing obsolete designs.

The last purchase of trolleybuses was carried out in 2010. (2 pcs.) Also, articulated tram cars from Germany have appeared on the line in recent years.

**Possible Implementation Models**

- Concession
- Crediting MUE IzhGET or leasing

**Current Status**

Structuring the project and developing the financial model. In addition to modernising the tram tracks, there is an option to extend the trolleybus network along Kalashnikov Avenue.

**Passenger Traffic**

- 86 million passengers per year
- All vehicles in running condition

**Possible Implementation Models**

**Passenger Traffic**

- Concession
- Crediting MUE IzhGET or leasing

**Proposal**

Participation in the project (direct investment/leasing).
SPORTS CLUSTER

The project provides for the development and implementation of a single concept to enhance the sports cluster in Izhevsk. The territory includes high-level sports grounds that can host international competitions. The project contributes to the development of the sports potential of the Republic by creating high-quality sports infrastructure and enhancing the urban environment.

Priority measures include reconstruction of the Izhstal Ice Palace, construction of a 50-metre pool and other enhancements.

Izhstal Ice Palace is one of the main sports facilities in Izhevsk and serves as the home arena of the Izhstal Hockey Club. The arena was opened in 1971, and today the facility requires major repairs. The arena is 11,000 sq m with a capacity of 3,900 seats.

The facilities will meet accessibility requirements for people with limited mobility.

CONSTRUCTION OF AN ONCOLOGICAL CENTRE IN THE CITY OF IZHEVSK

Currently, an oncology centre built in 1983 operates in Izhevsk, with buildings located in different parts of the city. Construction of a modern oncology centre with a hospital and diagnostic departments is planned. The centre will provide high-tech specialised cancer care, including with nuclear medicine.

A decision from the Udmurt Republic leadership on the optimal organisational and legal structure of the project (PPP) is expected. A medical technical specification has been developed.

Participation in the project (crediting/concession agreement)
### Healthcare Facilities Planned for Construction in 2020–2023

**IZHEVSK**
- Construction of a modern medical complex at the Budgetary Healthcare Institution at Udmurt Republic City Clinical Hospital No. 2
- Republican Tuberculosis Hospital of the Ministry of Health of the Udmurt Republic in Izhevsk
- Construction of a general hospital with an inpatient emergency department in Izhevsk
- Construction of a new building for the Republican Clinical Oncology Centre in Izhevsk
- Acquisition of premises for prenatal clinic at the Udmurt Republic City Clinical Hospital No. 7 under the Ministry of Healthcare of the Udmurt Republic in the Stolichny residential area

**VOTKINSK**
- Construction of a clinic in Votkinsk at Mira St 132

**MOZHGA**
- Construction of a children’s polyclinic in Mozhga

**Current Status**
The project is at the initiation stage. A medical technical specification has been developed.

**Proposal**
Participation in the project (crediting/concession agreement/leasing).

### Production of Wear-Resistant Parts for Technological Equipment

**Key Project Parameters**
- **Implementation Term**: 1.5 years (facility construction and launch of production)
- **Total Investments**
  - RUB 1.8 BN (total volume of investments)
  - RUB 0.9 BN (loans from AO TVEL (parent company of AO CMP))

**Current Status**
- Obtaining a resolution from the investment committee at AO TVEL.
- Obtaining residency status at the Glazov PSEDA.
- Search for a co-investor (project financing).
- Or acquiring a share with subsequent redemption of the share by the project initiator.

**Proposal**
- Participation in the project (project financing; or acquiring a share with subsequent redemption of the share by the project initiator).

**Production of Wear-Resistant Parts**
Establishment of the production of parts for equipment used in the extraction and processing of mineral raw materials with a longer life cycle compared with standard products (from 3 to 5 times) by casting.

The project will be implemented in the city of Glazov by a resident of Glazov PSEDA.

Planned production output is 3,060 tonnes a year.

The project was initiated by AO Chepetsk Mechanical Plant.

**Implementation Term**
- 110 new jobs

<table>
<thead>
<tr>
<th>Will Create</th>
<th>Total Volume of Investments</th>
<th>Loans from AO TVEL (Parent Company of AO CMP)</th>
</tr>
</thead>
<tbody>
<tr>
<td>RUB 1.8 BN</td>
<td>RUB 0.9 BN</td>
<td>RUB 0.9 BN</td>
</tr>
</tbody>
</table>
IT PARK/IT QUARTER

As part of the project, a state-of-the-industry multifunctional IT park will be built.

The IT Park is:
— A place for work and business development (business incubator, office premises, data processing centre).
— A place to study and develop (laboratories, and classrooms, conference halls, programmes from leading universities in the Udmurt Republic).
— A place for networking and recreation for IT specialists.

Udmurt Republic Government’s role
— Provision of a land plot, communication infrastructure and organisational and administrative assistance.
— Primary filling of the IT Park with residents and representatives from educational institutions in the Udmurt Republic.
— Organisation of legal support for the IT Park.

Investor’s role
— Financing construction of the IT Park.
— Participation in the Management Company.

Management company’s role
— Administration of the IT Park.
— Conducting specialised IT events.
— Provision of outsourcing services to residents.
— Organisation of educational programmes.

PROPOSAL
— Participation in the project as IT Park operator and investor.
— Project financing.

CURRENT STATUS
The project is at the initiation stage.

FUNDRAISING FOR THE CONSTRUCTION OF APARTMENT BUILDINGS
(12 BUILDINGS IN IZHEVSK AND MOZHGA)

The project entails the development of residential buildings in Izhevsk and Mozhga.

About 12 residential apartment blocks are proposed for construction.

The pilot project for Izhevsk involves construction of a residential building in the A10 residential area.

The development of a new residential area is proposed for Mozhga.

The key drivers in developing the city’s infrastructure include the construction of the Ice Palace (commissioning in November 2019), development of a residential area with landscaping, a new hotel, kindergarten, and new cafes and shops.

The developer is AO Mortgage Corporation of the Udmurt Republic.

The general contractor is TPO ZhkHUR SUE.

DOCUMENTATION AND DEVELOPMENT OF THE DESIGN ESTIMATE FOR THE PILOT PROJECT IS UNDERWAY. A LAND PLOT SUITABLE FOR CONSTRUCTION OF A 17-FLOOR BUILDING WITH THE TOTAL AREA OF 9,500 sq m HAS BEEN ALLOCATED.

The remaining projects are in the concept formation and land plot allocation phases.

A cooperation agreement with DOM.RF is in development.

PROPOSAL
Project financing of construction.

KEY PROJECT PARAMETERS
TOTAL INVESTMENTS
RUB 700 M

KEY PROJECT PARAMETERS
IMPLEMENTATION TERM
2020–2021

LOANS FOR THE PILOT PROJECT
RUB 300 M

Construction in Mozhga will cost about according to the preliminary estimate

RUB 1 BN

CURRENT STATUS
DOCUMENTATION AND DEVELOPMENT OF THE DESIGN ESTIMATE FOR THE PILOT PROJECT IS UNDERWAY. A LAND PLOT SUITABLE FOR CONSTRUCTION OF A 17-FLOOR BUILDING WITH THE TOTAL AREA OF 9,500 sq m HAS BEEN ALLOCATED.

— The remaining projects are in the concept formation and land plot allocation phases.
— A cooperation agreement with DOM.RF is in development.

PROPOSAL
Project financing of construction.
Creation of logistics centres to process cargo container transports by rail towards China and by water towards Central Asia. The logistics centres will contribute to development of export potential of Udmurtia and neighbouring regions.

Currently, two projects are being developed:

- Construction of the Sarapul universal container terminal.
- Construction of a large logistics centre at the Glazov hub railway station.

LOGISTICS CENTRE AT GLAZOV HUB RAILWAY STATION

KEY PROJECT PARAMETERS

CURRENT STATUS

- OAO Russian Railways representatives have visited Glazov to discuss the project and explore prospective sites.
- The prospective sites are currently under consideration.
- A meeting was held with Rostransmodernization to discuss the possibility of including the site.
- In the “General Scheme for Developing Transport Logistics Centres in the Russian Federation”.

PROPOSAL

Participation in the project as a co-investor.

CONSTRUCTION OF LARGE LOGISTICS CENTRES AT HUB RAILWAY STATIONS

KEY PROJECT PARAMETERS

PROJECT INITIATOR

DEVELOPMENT CORPORATION OF THE UDMURT REPUBLIC

PROJECT COST

NOT DETERMINED

CURRENT STATUS

- Creation of logistics centres to process cargo container transports by rail towards China and by water towards Central Asia. The logistics centres will contribute to development of export potential of Udmurtia and neighbouring regions.

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- OAO Russian Railways representatives have visited Glazov to discuss the project and explore prospective sites.
- The prospective sites are currently under consideration.
- A meeting was held with Rostransmodernization to discuss the possibility of including the site.
- In the “General Scheme for Developing Transport Logistics Centres in the Russian Federation”.

PROPOSAL

Participation in the project as a co-investor.
IZHEVSK POND EMBANKMENT

CURRENT STATUS
The project entails the completion of the reconstruction of the northern section of the Izhevsk Pond Embankment and adoption of an unused part of city lands to connect the improved embankment area with the city centre, Kirov Park. Under the project, sites will be arranged to hold various events, descents to the water with terraces will be built, piers will be created, boat rental and sailing and rowing schools will be organised. The construction of children’s playgrounds, bikeways and a skatepark is also planned.

The area will be visited by about 1.5 million people a year. The total area to be improved is 6.3 ha.

PROPOSAL
— Raising a bond-secured loan by a leasing company or a subsidiary of OOO Axion Corporation to provide unsecured loans or factoring
— Trade project financing

Attraction of debt financing

KEY PROJECT PARAMETERS
IMPLEMENTATION TERM
2020–2022

TOTAL INVESTMENTS
RUB 1 BN

Programme of to replace old lifts new ones built under the #MadeinUdmurtia brand

CURRENT STATUS
A financing mechanism for special accounts owners (lift buyers) is being developed. The Housing and Civil Codes prohibit the application of lease financing and common lending schemes for this type of project.

PROPOSAL
— Raising a bond-secured loan by a leasing company or a subsidiary of OOO Axion Corporation to provide unsecured loans or factoring
— Trade project financing

FINANCING REQUIRED TO ACHIEVE PLANT UTILISATION RATE OF 100%
RUB 1 BN A YEAR

The architectural concept was developed by Strelka KB as part of the DOM.RF 40 Cities project. The project is on the list of priority public space projects according to a public voting held by the Formation of a Comfortable Urban Environment project.

Tools:
— revise the project concept developed earlier;
— elaborate the economic component of the project and residents;
— develop working documentation.

The project entails the replacement of 2,380 lifts in Izhevsk apartment blocks by 2020. Lift winches will be produced by AO SEGZ and cabins by AO IMZ Axion.

A lift production plant was built in 2018. A portfolio of contracts was formed with 16 Russian regions as of 2019. After the lifts are replaced, ownership is handed over to the residents.

Under the project, 2,380 lifts will be replaced in Izhevsk apartment blocks by 2020. Lift winches will be produced by AO SEGZ and cabins by AO IMZ Axion.

KEY PROJECT PARAMETERS
IMPLEMENTATION TERM
2019–2020

TOTAL INVESTMENTS
RUB 1 BN
The project provides for the reconstruction and transformation of the Main Building into a cultural and educational complex. It combines the functions of a modern museum, exhibition space and creative cluster. Construction of the main building of the arms plant began in 1808. The building is a recognised cultural heritage site. The main building is one of the few remaining examples of an admiralty-type factory. There are only four: the main building of the Izhevsk factory, the main building of the Votkinsk factory, the Admiralty in St. Petersburg and the Izhora factory on the banks of the Neva.

Audience outreach: The facility is a symbol of the city, a symbolic place for all its residents, as well as a tourist attraction. The forecasted attendance is 0.8–1 million people a year.

The renovation project will enhance the prestige of the city and provide a new centre of attraction for different groups of the population.

**CURRENT STATUS**

An association of citizens concerned with the dilapidated state of the main building of the Izhevsk arms plant addressed the Governor of the Udmurt Republic with a request to takeover and renovate the building. The initiative was supported by the Governor. An agreement was signed to transfer the building for free use to the National Museum of the Udmurt Republic. Agreements were reached with patrons and enterprises to establish a fund of 40 million roubles for comprehensive research and development of the renovation project. The Centre for the Development of Design, Urban Environment and Energy Saving of the Udmurt Republic is the operator of the project. The project is planned to be included in the Federal Targeted Investment Programme.

**PROPOSAL**

Attraction of investments for renovations

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**MAIN BUILDING OF THE ARMS PLANT**

**PROJECT PARAMETERS**

**VOLUME OF INVESTMENTS**

- **RUB 50 M**
  - to hold architectural competition
- **RUB 3–4 BN**
  - to reconstruct the facility

**IMPLEMENTATION PERIOD**

2019–2024

**AREA**

21,044.9 m²

**CURRENT STATUS**

The process of developing the concept was launched. This will help to define the optimal composition of functions and identify potential residents even before the building renovation.

**PROPOSAL**

Participation in the project as an investor or resident in the creative space. Possibility to sign a concession agreement.

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**PRINTING OFFICE SPACE**

**PROJECT PARAMETERS**

**LAND PLOT AREA**

9,000 m²

**PREMISES AREA**

3,000 m²

**CURRENT STATUS**

A former printing office located in the central part of Izhevsk is part of the cultural quarter that is currently under development.

Renovations are planned for parts of the printing office not currently in use to enrich this space with new functions. The printing office may become the first creative cluster in Izhevsk, a multifunctional space that includes modern exhibition spaces that can also be used as conference and event halls. Offices, cafes and shops are also planned to be located in the building with a general focus on art, design and architecture.

The media offices located around the perimeter will create an attraction point for events and residents in the field of modern media, culture and art, and proximity to the busiest streets and traffic intersections will direct the necessary flow of visitors there.

**PROPOSAL**

The process of developing the concept was launched. This will help to define the optimal composition of functions and identify potential residents even before the building renovation.

**PROPOSAL**

Participation in the project as an investor or resident in the creative space. Possibility to sign a concession agreement.
The project provides for construction of a multifunctional agro-industrial park. An agricultural terminal (warehouse logistics, an agricultural products storage, preparation and transportation centre) is planned to be located on the first land plot (20 ha).

The following items will be located on the second land plot (151 ha):
- refrigeration terminal;
- production terminal;
- centre of agricultural equipment;
- hothouse complex.

The project initiator is OOO AgroSetInvest.

### Key Project Parameters

#### Implementation Term

**2020–2027**

<table>
<thead>
<tr>
<th>Total Investments</th>
<th>Creation of</th>
</tr>
</thead>
<tbody>
<tr>
<td>RUB 45 BN</td>
<td>1,920 new jobs</td>
</tr>
</tbody>
</table>

#### Current Status

- The business plan and financial model of the investment project have been prepared.
- The land plots to be formed are under consideration. The administration of Sarapul initiated amendments to town planning regulations, as well as applied to the Ministry of Construction, Housing and Utilities and Energy of the Udmurt Republic to adopt a decision on preparing amendments to the existing Sarapul Land Use and Development Rules.
- Development of a project for preparing the territory and a project for construction organisation is scheduled for September 2019.
- The constructor is expected to begin territory planning operations in December 2019.
- The development of design estimates is scheduled for completion by March 2020.
- Documents are being prepared to include the building in the register of residents of Sarapul PSEDA.

#### Proposal

Participation in the project as an investor.

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The project provides for creation of a modern agro-industrial complex for breeding livestock and milk production in the Sarapul district. The project involves the creation of a large dairy farm for 1,200 dairy cows and 1,200 young animals using robotic technologies for milking and milk quality control, as well as keeping cows.

The project initiator is Niva SPSSPK.

### Key Project Parameters

#### Implementation Term

**2020–2022**

<table>
<thead>
<tr>
<th>Total Investments</th>
<th>Private funds</th>
<th>Loans</th>
</tr>
</thead>
<tbody>
<tr>
<td>RUB 1.13 BN</td>
<td>RUB 0.23 BN</td>
<td>RUB 0.9 BN</td>
</tr>
</tbody>
</table>

#### Current Status

Design and estimate documentation has been developed, state expert reviews and technical audits have been carried out, and a land plot for rent has been registered.

#### Proposal

Participation in the project as a co-investor.
HudWay offers professional solutions for projecting information on car windshields (HUD, Head-Up Display). Investments are required to implement the company’s development plan:

— development of B2B/B2G segments;
— development and conclusion of more than 30 agreements with B2B/B2G companies and structures through 2021;
— software improvement for customers’ needs;
— team strengthening;
— entry into Chinese, CIS and Indian markets.

The project initiator is OOO RIT Innovations.

### Key Project Parameters

**Total Investments**

- RUB 100 M
- RUB 50 M
- RUB 50 M

**Proposal**

Participation in the project as co-investor by acquiring an RUB 50 million share in the company’s charter capital (VEB Ventures is ready to buy out RUB 50 million more).

**Current Status**

— Preinvestment studies: business plan development, market determination.
— Search for a second co-investor for financing. RUB 50 million by acquiring a share in the company’s capital (holding negotiations with venture funds).
— The deal structuring is expected in September 2019.

### Construction of a Cheese Production Plant

**Volume of Investments**

- RUB 1.5 BN

**Revenue**

- EBITDA: RUB 4.9 BN
- Net profit: RUB 3.7 BN
- Project NPV: RUB 1 BN
- Project IRR: 40%
- Project payback period: 4 years

**Current Status**

At the moment, a site for project implementation has been determined, design documentation and a list of necessary equipment have been prepared.

The project’s success will be ensured by the region’s high raw material supply, comfortable prices for dairy raw materials, favourable business conditions and positive consumption trends.

Availability of an off-taker with strong sales channels represented by OOO Neva Milk.

OOO Neva Milk’s experience in the construction and implementation of such projects.

More than 20% of the cheese market is held by imported cheese. The potential for import substitution is more than 100,000 tonnes a year.

**Proposal**

Credit/leasing, expected scope of participation in the project is RUB 0.5 billion.

### Site Location

Resident of Sarapul PSEDA

Planned plant capacity:

— 12,000 tonnes of cheese a year
— 5,800 tonnes of dry cheese whey
— Milk processing capacity:
— 150,000 tonnes of milk a year

OOO Neva Milk:

The company is the project off-taker and buys out the whole volume of manufactured products. The line of food products is represented by such brands as Tysyacha Ozer, Sirtaki, Cholo Mu, Zoloto Evropy, Gned Syra and Dolce Granto.

The company is responsible for finding a contractor to build the plant, adjust technological processes, recruit staff and manage production management.
CREATION AND DEVELOPMENT OF GLAZOV INNOVATIVE COMPLEX (FORESTRY PARK) IN THE SINGLE-INDUSTRY CITY OF GLAZOV.
The anchor project is construction of a plant for thin extra high density fiberboard production.

**Site location:** resident of Glazov PSEDA

**Planned capacity of the anchor project:** 160,000 cubic meters of EHD fibreboard a year (2–18 mm thick, density up to 1,100 kg/m3)

**Infrastructure construction** is planned at the expense of the Foundation for the Development of Single-Industry Cities. It is responsible for finding a contractor to build the plant, adjust technological processes, recruit staff and manage production management.

The project provides for deep and complete processing of raw timber (up to 98% biomass) into products with high added value, including laminated, painted veneered EHD/ MDF boards, floor laminates, fabricated door and furniture parts, fuel pellets, timber and timber products.

**Credit/leasing, expected scope of participation in the project** is RUB 3 billion.

**PROJECT PARAMETERS**

**TOTAL INVESTMENTS**

RUB 7.165 BN

**FORECAST**

2022–2029

RUB 62.6 BN

**REVENUE**

- EBITDA: RUB 14 BN
- EBITDA Profitability: 22%
- EBIT: RUB 7 BN
- EBIT Profitability: 11%
- Net profit: RUB 6.9 BN
- Profitability by net profit: 11%
- Project payback period: 6 years

**CURRENT STATUS**

In the course of work on the investment project, a business idea was formulated, a list of budgeted costs for launching production was determined, technological equipment was selected and suppliers were identified, equipment was associated with the existing industrial buildings and EIA was carried out.

As of today, a business plan for the investment project has been prepared. A specialised site with buildings and engineering infrastructure is available. OOO Elekond-Service is the operator of the investment project.

The company is part of the Elekond Group of Companies. RUB 220 million has been invested in production development on the site.

The company has experience in launching a line for laminating MDF/EHD boards, individual workshops for the production of products from MDF/EHD boards.

**PROPOSAL**

Credit/leasing, expected scope of participation in the project is RUB 3 billion.

**ESTIMATED COST OF PROJECT LAUNCH**

<table>
<thead>
<tr>
<th>Cost Item</th>
<th>RUB Billion</th>
</tr>
</thead>
<tbody>
<tr>
<td>Engineering</td>
<td>0.1</td>
</tr>
<tr>
<td>EHD production plant</td>
<td>3.081</td>
</tr>
<tr>
<td>Tar production workshop for board materials</td>
<td>0.11</td>
</tr>
<tr>
<td>Floor laminate production workshop</td>
<td>1.024</td>
</tr>
<tr>
<td>Fuel pellets production lines</td>
<td>0.885</td>
</tr>
<tr>
<td>Timber cutting line</td>
<td>0.3</td>
</tr>
<tr>
<td>Forestry machines and equipment</td>
<td>1.008</td>
</tr>
<tr>
<td>Intrasite infrastructure facilities</td>
<td>0.657</td>
</tr>
<tr>
<td><strong>TOTAL project costs</strong></td>
<td><strong>7.165</strong></td>
</tr>
</tbody>
</table>
Export-oriented products, equipment and parts for renewable energy sources are planned to be manufactured as part of an industrial cluster. This is a comprehensive project that includes creation of concentrator solar power plants and components, silicon solar panels with an extended temperature range, flowing energy storage devices and wind and solar energy farms.

Site location: resident of Glazov PSEDA, Sarapul PSEDA.

To date, research and development has been completed and experimental (small-scale) production has been launched.

There is a production site with the required infrastructure.

There are agreements on the supply of raw materials and accessories.

The project initiator, OAO Elekond, is a leading Russian manufacturer of capacitors and supercapacitors, as well as energy storage devices.

**PROPOSAL**

Credit/leasing, expected scope of participation in the project is RUB 7 billion.

**CURRENT STATUS**

**PROPOSAL**

Credit/leasing, expected scope of participation in the project is RUB 7 billion.

**CREATION OF SOLAR ENERGY INDUSTRIAL CLUSTER**

**KEY PROJECT PARAMETERS**

**PAYBACK PERIOD**

7 YEARS

IRR 27%, NPV RUB 3.3bn at a rate of 12.9%

**TOTAL INVESTMENTS**

RUB 7.1 BN

- RUB 2.5 BN on concentrator solar power panels
- RUB 0.7 BN on silicon solar panels with an extended temperature range
- RUB 0.9 BN on flowing energy storage devices
- RUB 0.5 BN on wind farms
- RUB 2.0 BN on photovoltaic production to provide 200 MW of concentrator solar power plants
- RUB 0.5 BN on the co-generation unit for the OAO Elekond production site

**TOTAL INVESTMENTS**

RUB 2.5 BN on concentrator solar power panels
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RUB 0.9 BN on flowing energy storage devices
RUB 0.5 BN on wind farms
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The project initiator, OAO Elekond, is a leading Russian manufacturer of capacitors and supercapacitors, as well as energy storage devices.
INVESTORS MAY CONTACT THE RELEVANT REPRESENTATIVES IN THE REGIONAL GOVERNMENT DIRECTLY

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