

# TATNEFTEKHIMINVEST- HOLDING

—▶ June 2021

Coordination of the Gas and Petrochemical Complex  
of the Republic of Tatarstan  
since 1994

Oil production

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Oil refining

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Gas processing

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Chemical industry



Rubber and plastic products

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Pharmacy

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Biotechnology

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Ecology

# Tatneftekhiminvest- holding

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## Coordinates the development of the Gas and Petrochemical Complex of the Republic of Tatarstan



### Attraction of projects

search, assessment and attraction of technologies and companies for the implementation of projects in Tatarstan



### Company support

assistance in the implementation of investment and innovation projects



### Raw materials supply

assistance in resolving issues of raw materials supply



### Cooperation

development of cluster relations



### Planning

development of strategic documents and strategic decisions



### Communications

organization of conferences and round tables

# Our team



**Rafinat Yarullin**  
General Director



**Haris Mustafin**  
Deputy Director



**Ilfat Salikhov**  
Deputy Director, Academic Secretary  
of the Scientific and Technical Council



**Ilgizar Yakushev**  
Deputy Director for the Development  
of Bio -, Nano-and Medical Technologies



**Abzalilova Leysan**  
Deputy Director  
of Economics



**Mingazi Gibadukov**  
Chief Technologist,  
Head of the Hydrocarbons Department

# 10 projects received support in 2020

10

## Commercial projects

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received support through finding business partners, establishing direct contacts, solving problematic issues, creating working groups

19

## Business plans

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were developed by Tatneftekhiminvest-holding in 2020

19

## Marketing studies

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were carried out to assess the directions of development of the Gas and Petrochemical Complex

# Companies supported in 2020

## Nizhnekamskneftekhim

### Vat residues

Launch of the unit for the separation of commodity fractions from vat and gas fractions in cooperation with GTC Technology (USA)

### Additive for polyester resin plant

Development and implementation of a new technology for the production of an additive based on ethylene oxide and propylene oxide at the plant for the production of styrene and polyester resins with Kazan Federal University, Himtechno SPC (Kazan)

## Oil sludge decantation complex

### Oil sludge

Involvement of VNIPIneft (Moscow) in the preparation of a feasibility study of the project

## Kazanorgsintez

### Ethane production

Continuation of work with the Candidate of Technical Sciences A.V. Kurochkin (Republic of Bashkortostan) on the production of ethane from natural gas at a thermal power plant

## TANEKO

### Hydroconversion

Participation in the optimization of the hydroconversion process of heavy oil residues with a capacity of 50 thousand tons

## Corib Metal

### Battery recycling

Assistance in the implementation of the project for the recycling of used lead-acid batteries

## Bureau of Innovative Chemical Technologies

### Serobitum

Optimization of a pilot plant for the production of serobitum

Monitoring the testing of a 200-meter stretch of roadbed laid with the use of serobitum

## Himtechno

### Disinfectants

Creation of all-purpose antimicrobial disinfectants from chemical industry waste

### Veterinary products

Expansion of production volumes and markets for veterinary products at the Urussinsky Chemical Plant

### Demulsifiers

Promotion of demulsifiers and corrosion inhibitors developed by Himtechno and Kazan Federal University

# Participation in R&D and innovation projects

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## Expertise

Technological and economic assessment of projects  
External expertise by the Scientific and Technical Council of Tatneftekhiminvest-Holding

## Consulting

Market research  
Search for potential partners  
Assistance in conclusion of contracts

## Financing

Financing of costs at the stage of the laboratory or the creation of a prototype

## Piloting

Assistance in pilot implementation in Tatarstan

## Scholarships

Personal scholarships based on the results of the republican contest "Fifty best Innovative ideas for the Republic of Tatarstan"

# TOP R&D projects in 2020

## Technology development

### Polyphenylene sulfide

With the participation of Tatneftekhiminvest-Holding, the Department of Organic Chemistry of Kazan Federal University, together with Ingehim, at the request of the Russian Ministry of Defense, developed a technology for producing polyphenylene sulfide and 1,4-butanediol

In February 2021, the first batch of polyphenylene sulfide was received, which was transferred to the customer

### Oil sludge processing

Participation together with the Soyuzhimpromproekt Design Institute and Tatoi-gaz in the development of a program to select the optimal scheme for processing oil sludge and heavy residues

The experience of Bashkortostan and the operating oil sludge processing plant in Salavat were studied

## Testing

### Wastewater treatment

Tests of wastewater treatment technology using bacteria at treatment facilities in Vysokaya Gora, Laishevo and Innopolis were funded

Positive results were obtained

### Serobitum

Monitoring of the roadbed using serobitum which was laid in Almeteyevsk

### Polymer sulfur

Tests of polymer sulfur were organized at the Kama Research and Development Center with the prospect of implementation at tire factories

### Electron beam technologies

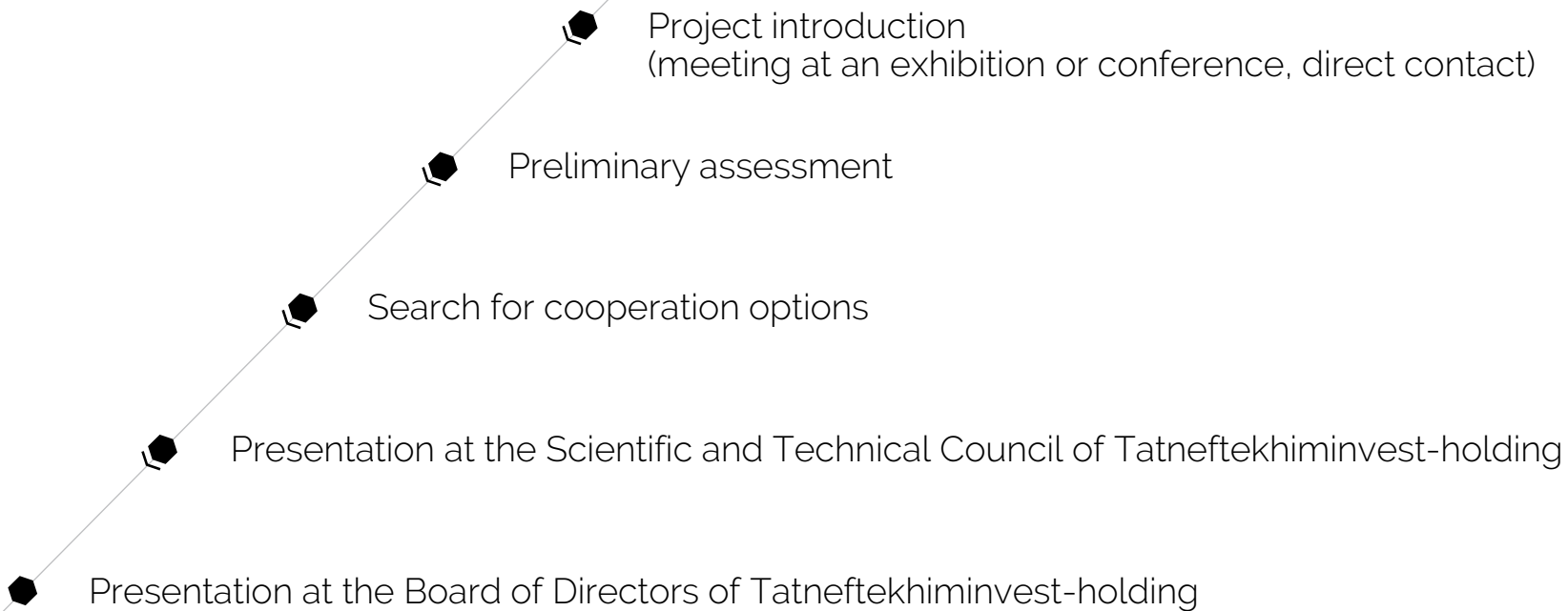
Initiation of the project

Support was provided until the conclusion of a contract for joint work between Kazan National Research Technological University, the Frumkin Institute of Physical Chemistry and Electrochemistry of the Russian Academy of Sciences and the Kama Scientific and Technical Center



# Algorithm for working with offers and projects

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# Projects can be presented to government officials and major companies at the Board of Directors

The chairman of the Board of Directors is the president of the Republic of Tatarstan  
**R. N. Minnikhanov**

Ministry of Economy

Ministry of Industry and Trade

Investment Development Agency

Ministry of Construction, Architecture, Housing and Communal Services



# 12

board meetings  
are held annually



# 58

companies and  
projects were  
presented in 2020

# Participation in the formation of raw material flows

## Conclusion of contracts

Assistance in concluding direct contracts for the supply of hydrocarbon raw materials and chemical products between companies of Tatarstan



## Discussion of problems

Organization of meetings among producers of hydrocarbon raw materials and consumers to resolve problematic issues

## Demand forecast

Formation of the current and strategic balance of raw materials for the Gas and Petrochemical Complex of Tatarstan

# Participation in cluster policy through INNOKAM

**300**

participating  
organizations

**110 thou**  
total number  
of participants

**\$ 10+ bln**  
of shipped products  
in 2020

**\$ 2 bln**  
investment  
in 2020

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The INNOKAM cluster was founded by the Ministry of Economy of the Republic of Tatarstan and Tatneftekhinvest-holding in 2011 on the initiative of leading petrochemical and automotive enterprises

In 2020, cluster members took part in 40 communication and exhibition events

# Creation of INNOSCOPE — an open innovation center

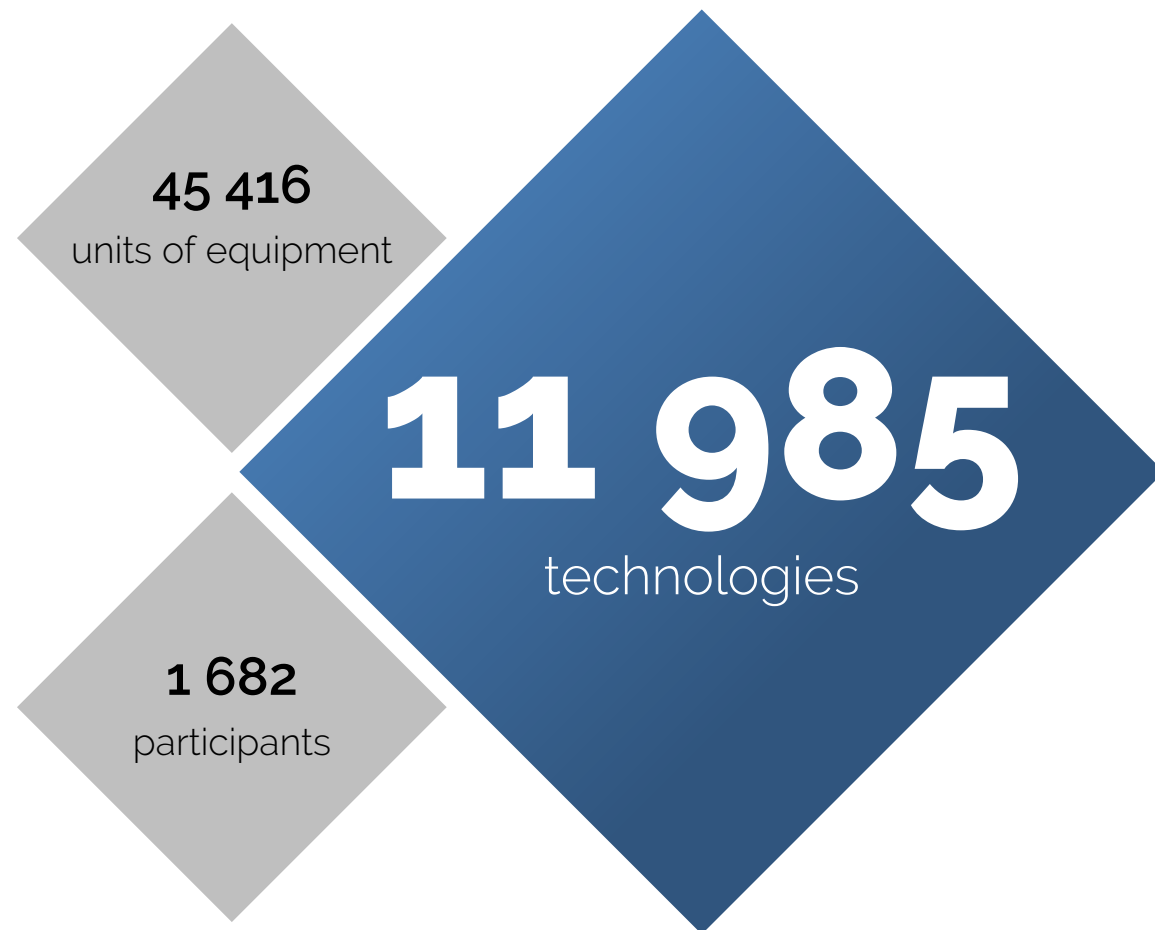
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The web portal "Russian Center for Open Innovations Innoskop" was created by the INNOKAM Association in September 2018.

The goal is the development of interaction between science and business for implementation of innovative technologies, additional loading of equipment for universities and engineering centers.

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[www.innoscope.ru](http://www.innoscope.ru)



registered on the portal at the end of 2020

# Tatneftekhiminvest-holding participated in the creation of two centers in 2020

## Partnership agreements

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The "New Technologies" Consortium, created by Kazan National Research Technological University

## Participation in the creation

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The World-class Scientific and Educational Center "Circular Economy"

Tatarstan-Finnish Center for Circular Economy on the basis of Kazan State Power Engineering University

## Assistance in the organization

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Cooperation Agreement between the Government of the Republic of Tatarstan and the Foundation for Advanced Research

Agreement on Scientific and Educational Consortium in the field of industrial and environmental safety, energy and construction supervision between Kazan State University of Architecture and Engineering, Kazan National Research Technological University, and Kazan State Power Engineering University



# Strategic decision-makers

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the **5<sup>th</sup>**

program for the development of the Gas and Petrochemical Complex is implemented in Tatarstan

## Industry programs

The programs for the development of the Gas and Petrochemical Complex of the Republic of Tatarstan have been developed

- ▷ for 1999-2003
- ▷ for 2004-2008
- ▷ for 2010-2014
- ▷ for 2015-2019

▶ **for 2020-2024**

Biotechnology Development Program for 2010-2020

Pharmaceutical Industry Development Program of the Republic of Tatarstan for 2011-2020

## Regional documents

Participation in the development of regional strategic documents

## Corporate plans

Assistance in the development of strategic documents for manufacturing companies, educational organizations

## Current analysis

Quarterly outcome analysis of the development of the Gas and Petrochemical Complex of the Republic of Tatarstan



# Organization of events

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## Annual Conference

Annual international scientific-practical conference on advanced technologies of petrochemistry and oil refining within the framework of the Tatarstan Gas and Petrochemical Forum (held in early September)



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Thematic round tables at republican events



**TATARSTAN GAS AND  
PETROCHEMICAL FORUM**

**September 7-9, 2021**

# Informational materials release



## Catalogues

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Catalogue of manufacturers of materials for construction and road use, produced on the basis of chemical products

Product catalogue of the enterprises of the Gas and Petrochemical Complex of Tatarstan

Catalogue of chemical laboratory facilities of Tatarstan



## Information for investors

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Presentation materials

Scheme for cluster development of hydrocarbon processing



## Articles

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Releases in newspapers and magazines

Posting industry news on the company's website

Digests for public authorities

# To start cooperation, please contact us



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General Director

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