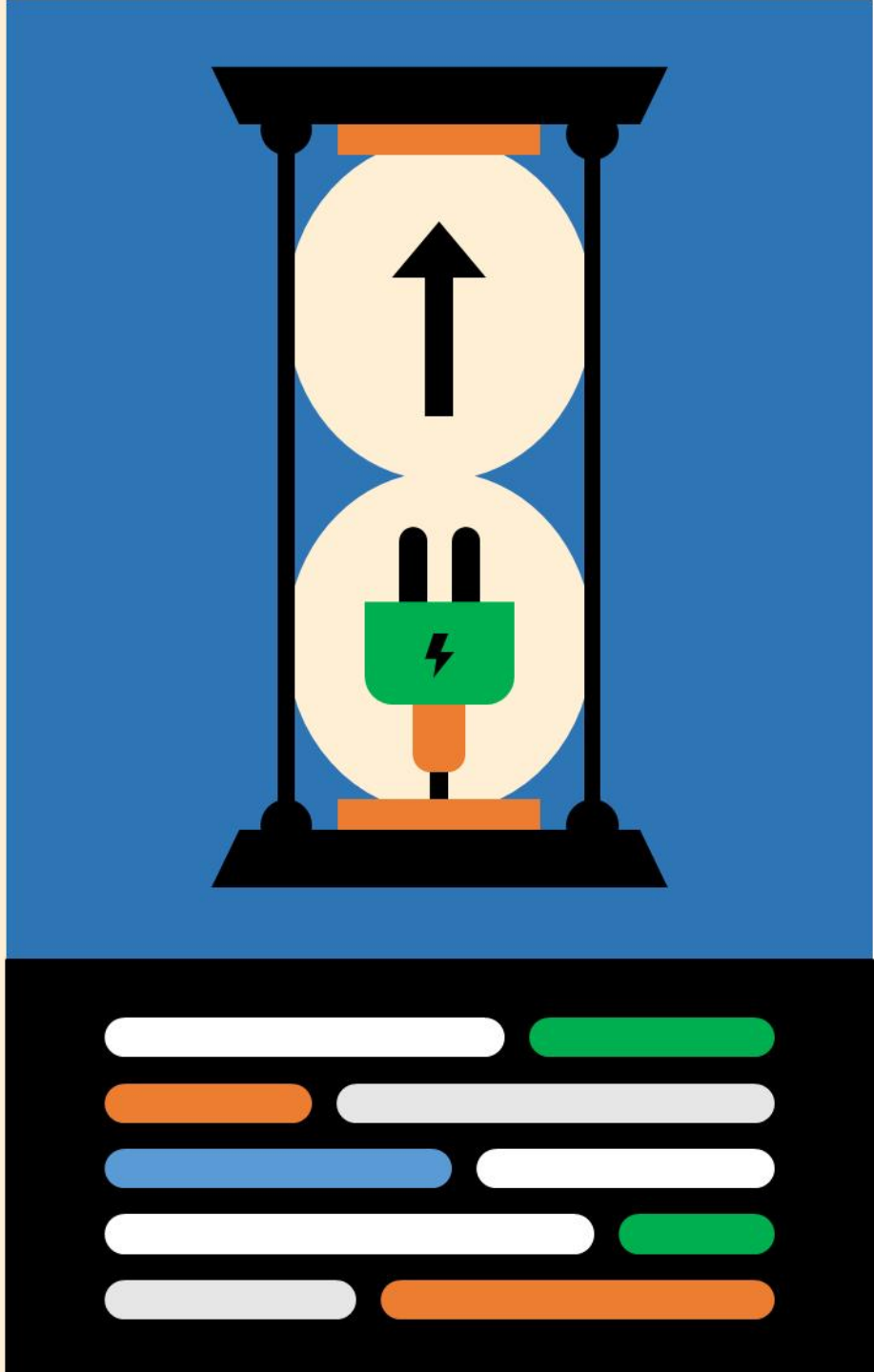
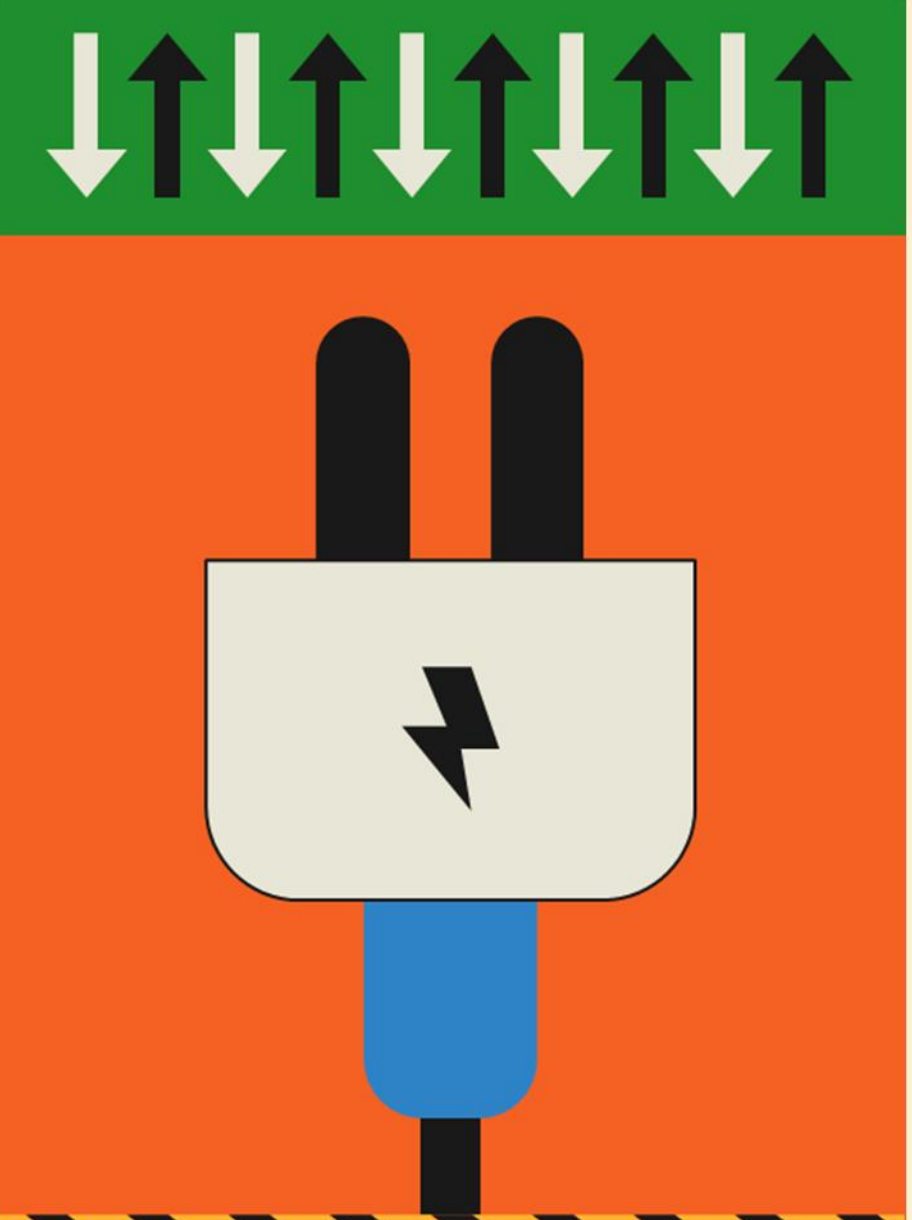
Outstanding electricians of Russia

for all the time





ANNOTATION

This presentation describes the lives and contributions of remarkable electricians and electrical engineers from Russia, and highlights their significant impact on the development of electrical engineering and technology. By studying their stories, we strive to glorify the legacy of these outstanding personalities and inspire future generations in the world of electrical engineering and mechanical engineering.

PAVEL NIKOLAEVICH YABLOCHKOV

Pavel Nikolaevich Yablochkov is known, first of all, for the invention of an electric candle, which went down in history as the "Yablochkov candle". The scientist's activity took place in the second half of the nineteenth century, and was marked by significant inventions in the field of electrical engineering.

It was with electric candles that outdoor lighting began: city squares, shop windows, theaters and streets were illuminated at night. The use of Yablochkov candles began in Paris, London and Berlin. Europe was simply amazed by the new invention, which contemporaries nicknamed "Russian light".

BORIS SEMYONOVICH YAKOBI

While studying the transfer of power from a battery to an electric motor, he deduced the maximum power theorem. Jacobi tested the output of motors by determining the amount of zinc consumed by the battery. With the financial assistance of Tsar Nicholas I, in 1839 Jacobi constructed a 28-foot electric motor boat powered by battery cells, which carried 14 passengers on the Neva river against the current at three miles per hour.

He also worked on the development of the electric telegraph. In 1842-1845 he built a telegraph line between Saint Petersburg and Tsarskoe Selo using an underground cable. In 1867 he was a Russian delegate to the Commission on Measurement Units at the Paris World's Fair. He was a strong proponent of the metric system.

ALEXANDER NIKOLAEVICH LODYGIN

First of all, Lodygin became known as the inventor of the incandescent lamp, he devoted many years of his life to studying and improving this invention. he was the first to use tungsten and twist the threads into a spiral, and also pumped air out of the lamp body, which increased its service life several times. Thus, he became the parent of the modern light bulb, which is widely used today.

In addition, his list of inventions includes such important projects as an autonomous diving suit, an induction furnace, and an electric heater for heating.

POPOV ALEXANDER STEPANOVICH

He made one of the first X-ray machines in Russia, took pictures of various objects, including a picture of a human hand. It is known that after the battle in the Tsushima Strait, 40 wounded sailors were treated on the cruiser Aurora, which had such an installation.

On April 25 (May 7, new style), 1895, Alexander Stepanovich Popov first presented his invention at a meeting of the Russian Physico-Chemical Society, where he made a presentation and demonstration of the world's first radio receiver he created.

VLADIMIR FEODOROVICH MITKEVICH

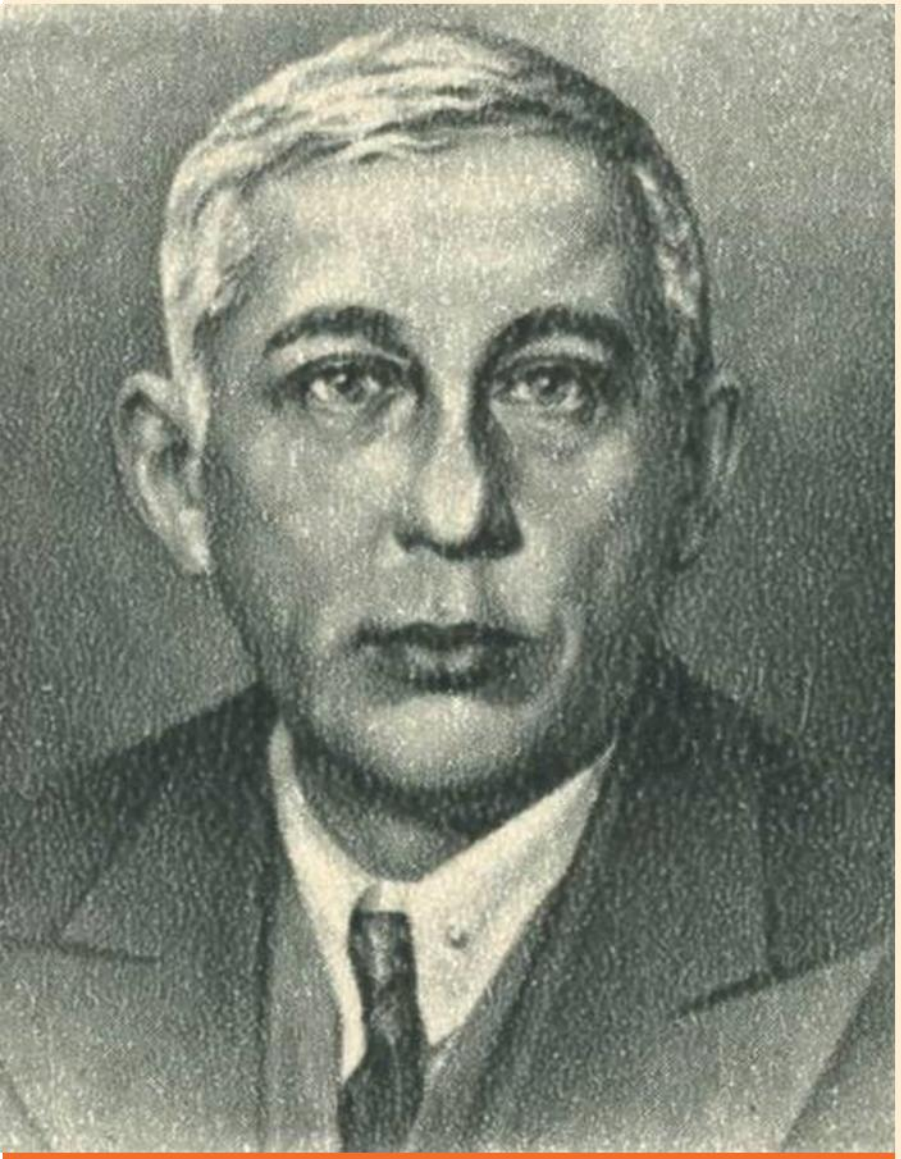
An outstanding scientist and inventor who devoted his life to the development of electrical engineering and science in the Russian Empire and in the USSR. He was known for his research in the field of electrical engineering and electrothermy.

His research on the electric arc and courses in the theory of electrical and magnetic phenomena and the theory of alternating currents were a very valuable contribution to electrical engineering as a scientific discipline. In fact, V. F. Mitkevich is the founder of such a discipline as "Theoretical Foundations of Electrical Engineering" (TOE) in its modern understanding.

BORIS MIKHAILOVICH GOKHBERG

Little is known about the inventor Gokhberg himself: he was a Soviet scientist at the Leningrad Institute of Physics and Technology; devoted a lot of time to studying the electrical properties of gases and discovered the so-called "elegaz", which is actively used in modern energy.

Thanks to close attention to sulfur hexafluoride, the scientist discovered the unique properties of this compound, which later became known as "electric gas". So, elegaz began to be used in the Soviet industry, and it was widely used in the 90s of the last century.



MIKHAIL ALEKSANDROVICH BONCH-BRUEVICH

In the military, Bonch-Bruevich was assigned to the Central Laboratory of the War Department. There he continued research in radio, with an emphasis on vacuum tube (valve) development.

Bonch-Bruevich was the man who built Russia's first military transceiver radio station; wrote the first manual on working on radio equipment; designed and manufactured the first domestic radio tubes; founded the radio engineering industry; played a key role in the construction of the first Soviet radio station Radio Comintern. He is not a native of Tver, but all his main achievements and victories in radio engineering took place in Tver.