РОББО КЛУБ™

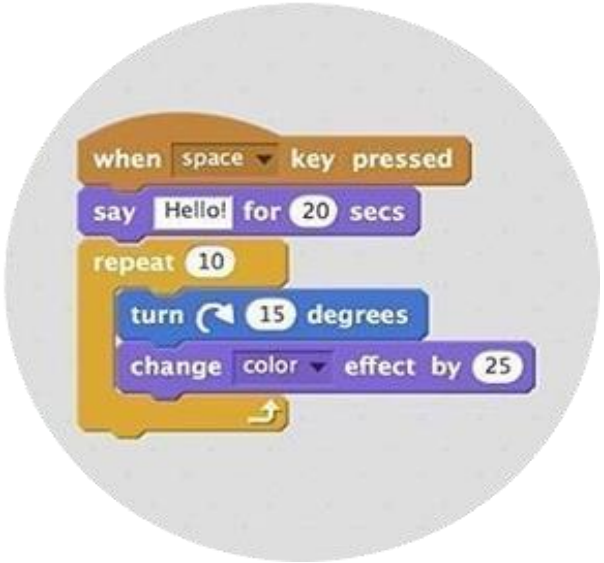
Modernization of education using contemporary methods: how to bring up the engineers and innovators of the future?

http://robboclub.ru

Projetc producer
Pavel Frolov

What is ROBBO Club (РОББО Клуб)?

«ROBBO Club» is a network of robotics, programming and 3D-prototyping clubs, where the children start from robot modelling on the screen and reach up to creating their own robots using 3D-printing



The problem of educational robotics

Despite the rapid growth of educational robotics market, at the moment there are **no proven methods of training** of future architects and innovators of new technologies

The market is dominated by devices made on the basis of a **closed** hardware and software that form the thinking in the spirit of "black box":
Students can create and invent only on the basis of closed devices **without making changes** to the devices themselves.

**The result – low-quality education,
student is a user, not an innovator.**

Solution: open technologies

The idea of ROBBO is that the device should be studied comprehensively. Students should not only understand the principle of operation of the device, but also be able to **create it from scratch**

We create devices based on **free** software and hardware, which allows students to disassemble our robots to the small parts, and software to bytes.

The result - **a full-fledged training of engineers and architects, the development of Russian technology and innovation**

What knowledge we provide?

Teaching programming

We teach children programming language using Scratch, which allows them to easily explore the fundamental basics of programming

A thorough study of the principles of devices' operation

The ROBBO Club children do not just play with the robots - they get to know how they work. With the circuit design of the course, students learn the basics of physics and electronics, and as a result of training can gather any device from scratch virtually.

3D-printing and prototyping

During the ROBBO Classes children can help teachers to create their first 3D-model and then print it out on the 3D-printer.

Immersion in the professional programming languages

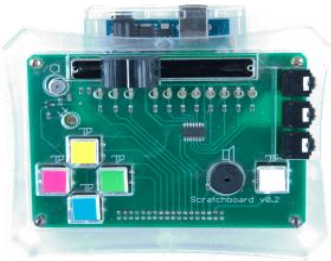
After Scratch language students have much to develop! They learn robot programming already on the "adult" language Arduino devices based on C / C ++.

Our products

Robots for the development of Algorithmic, programming, robotics and electrical engineering skills

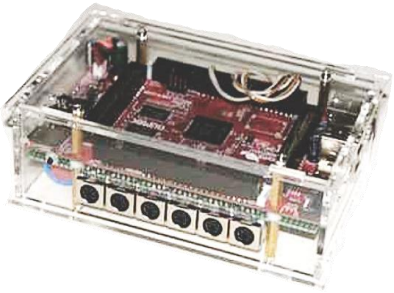
* Simple training start (**minimum** training of teachers, children from 5 years)

* Author's **manuals**, developed in collaboration with teachers and methodologists



* Produced in Russia correspond to federal educational standards.

Designed for mass adoption with minimal training



ROBBO Club benefits

Our feature is a comprehensive approach to the question of training future robotics engineers

Lessons with experienced teachers using the author's methods

The strong theoretical base on programming, and tremendous experience in the application at the school age to assemble microchips, programming and assembling robots of any complexity

Training of qualified teachers

Teaching method is transmitted from the most experienced and competent colleagues, allowing to maintain a high level of teaching and learning to ensure uniform standards in the clubs all over Russia.

The popularization of engineering, robotics, and technical specialties

An understandable and accessible curriculum for each child from 5 years is designed for the development of robotics and programming. Number of children who have an access to new knowledge in these areas is growing. In the future, the number of engineering will increase and the quality of their knowledge become better.

ROBBO Club now

2015

- **2 clubs** in St. Petersburg
- **More than 100** educated learners

2016

- **4** own clubs in St. Petersburg
- **22** partner clubs in Russia and CIS
- **3 800** educated learners

ROBBO Club

Thank you!

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