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## THE USE OF ROBOTS BY PATROL POLICE AROUND THE WORLD

Many of us understand that the day-to-day job of a police officer is full of potential dangers. Nearly every day, we see news stories of another police officer somewhere in the Ukraine who is hurt or killed. The duties of police carry a great deal of risk. The police profession ranks fifteenth among 25 hardest jobs in the world. Law enforcement officers are commissioned to keep citizens safe 24 hours a day and seven days a week. Police officer usually works 12 hours a day or more and 5-6 days a week. Such a schedule is bad for health. With a lot of psychological pressures and physical efforts work becomes very hard.

Police officers have many duties and responsibilities. But this whole spectrum of obligations can be reduced.

Over the last few years, humanity has made a huge step in the field of technology, which touched all spheres of human activity in fact. The most developed countries in the world are increasingly beginning to use automated systems in various fields (in banks, transports, manufacture), including law enforcement. It is difficult to determine which country started the first use of robotics in the police patrol units, but currently robots are used in the USA, United Arab Emirates, China, Russian Federation, the Republic of Kazakhstan, Singapore, and some regions of India.

For example, in California, you can already find robots that are moving and analyzing all the data (noise occurring around, changing temperature), assessing the situation as calm or dangerous and, in the event of a situation, sending an urgent notification to the security service. They work in several shopping centers and offices of major technology companies as assistant security officers or policemen. Creators do not promise that these robots will soon replace all usual patrol officers, but intend to teach them to predict possible crimes. The advantage of these robots is that their rent costs only 6.25 dollars per hour that is less than the minimum salary of a police officer in the United States.

One more device called robot REEM, which was launched in the United Arab Emirates can protect people from crime because it can broadcast what is happening right away to command and control center. People will be able to use it to report crimes, pay fines and get information by tapping a touch screen on its chest.

In Dubai police began to use small autonomous cars that patrol streets. The self-driving police car offer 360-degree surveillance technology and

will be able to use biometric scanners to look for suspects, identify suspicious objects, launch a mini drone and even give chase to suspects.

This is not a complete list of robots and their functions that they already perform.

The use of foreign experience, namely the use of police robots, will help make the work of police officers safer and more effective. It would also be very appropriate to introduce them to the Ukraine patrol police.

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## ROBOTS IN THE WORK OF THE POLICE

The challenges of dealing with criminal behaviours are increasing globally. In many countries government program aimed at replacing some human crime-fighters with machines.

Tokyo's Metropolitan Police Department has been training up a special drone unit to watch over the prime minister's office, as well as the country's parliament building, the Imperial Palace, and other high-profile locations scattered throughout the capital. If the specially trained unit spots a rogue copter flying in a restricted zone, the operator will attempt to catch it. Professionals describe a hexacopter as "highly portable, lightweight, strong, and stable."

In Cleveland, USA, the Police Department's bomb squad has a new tool available for them to use. That tool is a robot. The robot is called 'The Griffin'. It is described as a 'spybot' or a "scout bot" because it can go into tight places and remotely sends back pictures from a rotating video camera. It can survey a potential threat faster and easier than the police department's larger bomb squad robot and can be deployed much faster. 'The Griffin' is able to climb over and around obstacles, maneuver underneath a small pickup truck, and go into a dark closet, sending pictures to a screen.

A prison in Pohang, South Korea began using the world's first robotic prison guards. Equipped with 3D depth cameras, a two-way wireless communication system, and software capable of recognizing certain human behavior patterns, the 5-foot-tall bots keep a cycloptic eye out for trouble while patrolling the corridors of the prison block. The "guard" is designed to conduct self-directed patrols, guided by navigation tags located along corridor ceilings, but is supervised by a human guard and may be controlled