

## Laboratory of Wireless Networks LLC

**Volume of investments required: \$ 500 thousand**

### Use of funds

R&D - 50%

Acquisition of fixed assets - 20%

Marketing - 20%

Acquisition of current assets - 10%

### Company profile

1. Date of establishment – June, 2005.
2. Size and source of investment to date – \$ 25 000. – The Foundation for Assistance to Small Innovative Enterprises.
3. Production – wireless mobile security systems.
4. Target market – object securing, communication and energy infrastructure creation is available (summer houses, building areas, temporary warehouses, garages, etc.).
5. Sales 2004 – none.
6. Description and value of assets – none.
7. Goodwill and intellectual property rights – claimed patent “Method of detection of trespasser and system for realization”, priority 22.07.05. Patent holder “Laboratory of Wireless Networks” LLC.
8. Signs of public recognition – none.

### Owners

Individuals (3):	33.3% each other
Share of government property	0%

### Products characteristics

Production being developed – “Mobile security system” – robust, long-life, fast and easy to install and scalable security and monitoring system. It does not depend on energy and communication resources of controlling objects, able to operate in “field” conditions. In the basis of the system is the concept of wireless self-organizing sensor network extended with novel energy saving communication and location principles developed by “Laboratory of Wireless Networks”. Passive nonlinear antennas scattering external fields are used as radio wave sources. The system consists of a number of small autonomous devices being placed in the securing territory by user (without specialists). Devices automatically establish communication with each other and organize wireless network including location system and take under control an area where they have been placed. Secured zone can be easily extended by additional devices placed in areas which should be secured. Main advantages of the system are low cost, simple service and extra long life. These characteristics can be achieved by novel radio location technology. Being easy and fast to deploy “Mobile security systems” will be commonly demanded by different groups of users.

### Markets & Competition

	Data	Products of the “Laboratory of Wireless Networks”	Standard wired sensor and security systems	Standard wireless sensors and security systems
	Geographical Region – Moscow region. Market size* \$ 200 million			
2004	Company market share \$ ths / %	0 / 0%	190 000 / 95%	10 000 / 5%
	Geographical Region – Russia. Market size \$ 600 million			
2009	Company market share \$ ths / %	42 000 / 7%	480 000 / 80%	78 000 / 13%

\* The market of technical securing systems and devices for summer houses and cottages.

In addition to technical securing methods for summer houses and cottages in large cities there is (is not shown in the table) a large potential market of securing systems for garages, building areas, temporary warehouses etc. Volume of this market in Russia in 2004 can be estimated as \$ 50 million. Nowadays such systems are rarely used because of their high price, necessity of complex installation works and complex service.

#### **Marketing & Sales**

Marketing researches held by the "Laboratory of Wireless Networks" and analysis of RBC analytical surveys demonstrate that in the case of "Mobile security system" price range \$ 300–400, the system will be widely demanded for cottages and garage securing. "Mobile security system" will be selling by special shops selling goods for summer residents and drivers. Another channel to be used are companies selling and installing security systems. An agreement is signed with the BINAR scientific production association to apply with their help the system at the territories of GASPROM companies and objects of rail road transport system.

#### **Prospects of development**

Promotion of "Mobile security system" to foreign markets based on integration with ZigBee, WiFi, WiMAX networks and cellular networks is planned.