

BREACHES OF ENERGY CONSUMPTION LAW

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ABSTRACT

Artificial electric lighting in buildings is an important element of any electrical system. The ample use of artificial electric lighting in modern society is indisputable. Apart from its main purpose, if legally designed and installed, electrical lighting promotes the stable work and development of a country's power engineering. Effective use of energy resources and the capacities of power engineering are keys for the sustainability of economic growth. An increased demand in energy resources has provoked uncontrolled energy consumption and violations in fuel extraction as well as in fuel or electricity use. In the article, the authors try to give an analysis of such violations, which in its turn allows disclosing a few legal loopholes in this economic sector. The owner of energy resources suffers great damages from unauthorized connections to electrical and gas networks. Perpetrators of electrical and thermal energy consumption regulations are subject to civil, criminal, and administrative law. Nevertheless, the authors' analysis of cases in the courts shows that a great number of them are seldom inquired into, and most perpetrators are very rarely held liable. The aim of the article is to analyze the national legislation to withstand the illegitimate energy resources consumption, to bring to light the issues in this economic sector and to suggest some ways of their solution.

Keywords: energy resources, lighting; mineral resources used as sources of power, power infrastructure, electrical equipment, consumers of electricity, generation and use of electrical energy, energy conservation, uncontrolled use of electrical and

thermal power, energy consumption supervision, violation of consumption regulations, infringement on energy resources use

1. INTRODUCTION

Effective use of energy resources and the potentialities of the energy sector is the pivot of Russian economic policy. It is aimed to sustain the economic growth in Russia, raise the living standard of the population, and improve external trade status of Russia. A strong focus of its policy is on power engineering security, energy efficiency in economy, effective budgeting, and ecological security of power engineering [1].

The choice of the above-mentioned focus in the Russian energy strategy is determined by a great amount of energy resources, which include electricity as well. This makes it possible to satisfy the country's needs as well as to export them. According to the projections, by 2020 the lighting industry turnover in the world market is expected to catch up with the television industry turnover [2, 3]. The leading economies in today's world strive for an increase of their energy efficiency; one of the means in this great effort is to develop effective lighting technologies. In their simulation of the situation in the world market, the McKinsey analysts show that by 2020 the turnover of lighting industry may reach nearly 110 bn euro with the annual growth by 3 %. The growing population on Earth instigates the growing demand in lighting.

In Russia, owing to energy conservation measures, as well as increase in efficiency of energy projects, there is a possibility to increase current

Table 1. The Increase in Electricity Generation

	2016, bn kWh	2017, bn kWh	%
Electricity Generation, in total	1071.9	1073.7	+0.2
included:			
Thermal electric power stations	628.5	622.4	-1.0
Gas electric power stations	186.7	187.4	+0.4
Nuclear power stations	196.4	202.9	+3.3
Renewable sources of energy	0.61	0.69	+13.1
Electric power stations at industrial works	59.8	60.3	+0.9
Electricity consumption	1054.6	1059.7	+0.5

energy consumption by 30 %. However, Russian power engineering is faced with a number of risks and threats. The complexity of problems places energy security in the foreground of national security. This is predetermined by the depleted available fuel deposits and a continuous increase in electricity or fuel consumption.

This work summarizes the main legislative norms of the national policy in energy consumption. It also investigates the factors, which hinder the further progress in this branch of Russian economy. The article analyzes the main illegal actions by perpetrators, who violate the existing law in energy consumption and highlights the legal regulations, which are designed to eradicate illegal energy consumption.

2. METHODOLOGY

Scientific and technological progress has made contemporary society dependent on the uninterrupted centralised supply of electrical and thermal energies as well as gas and water [4]. Cutting off or limiting their supply not only infringes on customers' civil rights and every day interests, but deprives the customer of their subsistence, which excites very negative reactions on their part. That is why one of the main aims of the Russian national policy is to provide and guarantee energy security measures. This aim is to be achieved by laws and their observance. The methodology is based upon a collection of laws or legal regulations of energy consumption, their analysis, and categorization of unlawful actions in energy use and consumption.

The Strategic Plan of electricity supply network development in the Russian Federation in the period to 2030 is elaborated in accordance with Decree 1567 by President of Russia (22 November, 2012). The document defines the electricity supply network missions, which include electricity transmission, distribution, generation, and selling on the territory of Russia [5].

The power supply system of Russia comprises a federal power supply system and local power supply systems. The expected change in economic development, structural changes of economy, and amount of energy consumption determine domestic demand for energy resources including electricity. According to the information from the Ministry of Energy (Russia), in 2017 the electricity consumption reached 1059.7 bn kWh (1039.9 bn in the federal system), which was higher than in 2016 by 0.5 % (by 1.3 % in the federal system). The highest level of consumption was registered in metallurgy, railway transport, and gas main. The Russian electric power stations together with electric power stations at industrial works generated 1073.7 bn kWh (1053.9 bn kWh in the federal system). The increase in electricity generation was by 0.2 % (Table 1) [6].

In 2017, the electricity consumption in the federal power supply system reached 1 039 879.9 million kWh, which tops the 2016 consumption by 13023.5 million kWh (1.27 %). The growth of the annual consumption of electricity in 2016 (29 February excluded) accounts for 16038.4 million kWh (1.57 %). In comparison to 2015, the growth makes up 31 629.1 million kWh (3.14 %).

Non-payment or overdue payment hinders the development of this branch of industry. According

to the information presented by *NP Sovetrynok Association*, the arrears amounted to 65.2 bn roubles in the whole-sale market and 243 bn roubles in retail on the end of October 2017. While there are a number of legislative measures, which allow punishing defaulters in the whole-sale market of electricity, the retail market does not have such mechanisms of influence. Supplying the population with electricity as a service of paramount social importance, makes cutting off electricity for defaulters in the retail market impermissible [7].

The Federal Law No. 307-FL of 03.11.2015 issued the amendments aimed at tougher responsibility of energy consumers for non-payment or overdue payment. The Federal Law improved the procedure and established a new system of punishment. The amendments concern the consumers of energy resources or services of electricity transmission and buyers of energy resources or services of water supply and sewage. For example, the Law imposes a fine on debtors and grants financial rights and guarantees to certain categories of electricity consumers. Limitations on electricity consumption are another economic tool for improving the responsibility of the consumers, who neglect their commitments [8]. Moreover, the Federal Law altered the basic rules of consumption limitations. The alterations concerned so-called “not liable to limited consumption” consumers of electricity and initiated partially limited consumption as an obligatory step in the procedure.

Thus, the amendments led to the necessity of reviewing the legal documents regulating the procedure of cutting consumption and to the revision of some procedural steps that stirred up controversy, which resulted in the futility of effective work with debtors. For example, the Russian government enacted Decree No. 624 (24.05.2017) “Amendments in the Acts of the Russian Government on Completely and/or Partially Limited Consumption of Electricity and the Use of Economic Unions’ Seals” [9]. In addition, in accordance with the requirements of the Federal Law, the Russian government adopted Decree No. 139 of 04.02.2017 “Amendments in the Decrees of the Russian Government to Ensure the Fulfilment of Obligations to Pay for Energy Resources” [10].

A high degree of generating and networking equipment depreciation is also a deterrent to the development of power engineering. A decreased consumption of electricity was a part of the indus-

trial stagnation in the 1990s. Overdue and insufficient payment for electricity consumption was the reason for the systematic deficit of money allotted to update the capital assets in power industry. It was for a long time that power engineering did not receive a sufficient amount of investment. To date this has resulted in a critical depreciation of the equipment.

According to the overall locating plan of electrical power structures for the period of up to 2035, approximately 46 % of them were put into operation before 1980, i.e. more than 36 years ago. The fleet life of more than 90 GW of steam turbine equipment capacity is finished. Moreover, before 2025 the life of 30 GW of the thermo electric power stations capacity will come to an end [11].

A slow development of power infrastructure and greater demand in all kinds of energy are the reasons for higher unlawful energy consumption [12]. Breaches of energy consumption law is a most widely spread phenomenon of social character. Unauthorised link to electric and other networks causes great damage to the owners of power resources. The amendments introduced into criminal law are aimed to prevent harmful actions and impose amenability on perpetrators. Thus, they are additional legal means of protecting energy resources from theft. However, such harmful actions are still difficult to eradicate because of their latency.

3. RESULTS

Despite many serious challenges, the Russian electric power industry continues growing. The growth of electricity consumption and an increase of the companies’ profitability are obvious. Further development and gradual update of the generating companies’ power capacities are necessary steps in its growth. The current legislation inflicts administrative, civil, and criminal punishments on consumers, thus enhancing their responsibility for violating the legal rules of electricity, water, gas, and other kinds of energy consumption.

4. ADMINISTRATIVE LAW AND UNLAWFUL ACTIONS IN ENERGY CONSUMPTION

The Administrative Punishment Code of the Russian Federation (APC) specifies cases of unlaw-

ful energy use and enforces administrative punishment for illegal energy consumption.

1. *Unauthorised connection to and use of electric, thermal, gas, or oil energy* (article 7.19 APC)

Unauthorised connection to electric network, gas, or oil pipelines is defined as such in cases, when there is no sanction given by an authorized representative of the national energy inspection. Gas or oil pipelines, and energy networks are technically complex structures, which are built for transportation of gas, oil, oil products, and electric power to their consumers. Consumers are required to forward a written request and ask their energy supplying organization for a sanction to link their dwellings or other buildings with new wiring systems to the electric network. Also, gas use and its supply is not permitted without its calculated amount. The relevant regulations determine in detail the required procedure of its amount registration, control of its characteristics, and general technical conditions for metering units. It should be noted that this unlawful action by the consumer is intentional.

2. *Unauthorised commissioning of fuel or energy consuming structures* (article 9.9 APC)

This breach of law consists in activities, which violate the established procedure of authorization when commissioning fuel or energy consuming structures. This unlawful action violates the secure work of energy structures, as well as the prescribed regulations in the fuel and energy complex.

The regulations of energy plants' work and maintenance were determined and issued in the following documents: the Federal law "Energy Conservation, Higher Efficiency of Energy Use and Amendments in the Legislative Acts of the Russian Federation" (23.11.2009, No. 261-FL) and the federal law "Communications Network" (07.07.2003, No. 126-FL), and, additionally, in the decrees by President and Government of the Russian Federation, as well as the Ministry of Energy (Russia).

Unauthorized commissioning is an unlawful action intentionally committed by officials, who should observe the established procedure of receiving commissioning authorization. Other perpetrators are entrepreneurs and legal entities that have ignored or neglected the mandatory operating rules for fuel and energy structures.

3. *Ignorance or negligence of regulations, which are issued by the Russian government, Min-*

istry of Energy, and other federal governmental agencies and related to fuel or energy use, work, and maintenance of fuel/energy consuming equipment or implements, heating systems, structures for containing, warehousing, selling or transporting machines and appliances, fuel, and its derived products (article 9.11 APC)

The terms of relations between energy or gas suppliers and individuals, who consume their products, are determined in the regulations of electric or thermal energy use, which were approved by the Ministry of Energy. The regulations ban unauthorized use of electric or thermal energy and gas. A consumer is required to forward a written request to the supplier to get a sanction thus linking their dwellings or other buildings with new wiring systems to the electric network.

The regulations of energy or gas use contain conditions for maintenance and installation of electric or gas appliances, energy or gas meters, as well as for energy and gas payments.

This unlawful action is committed intentionally or out of insufficient attention to the regulations by officials, legal entities, or Russian nationals.

4. *Unproductive wastage of energy resources* (article 9.12 APC)

The Federal Law "Economy of Energy, Higher Efficiency of Energy Use and Amendments in the Legislative Acts of the Russian Federation" (23.11.2009, № 261-FL) defines "unproductive wastage of energy resources" as violation of regulations stipulated by national standards or other legal documents, by technical documentation, passport information, and maintenance schedules for operating equipment. According to the national standards, norms of precise measurements, or other legal and technical documentation, an amount of energy and natural resources (extracted, produced, manufactured, transported, warehoused, or used) are to be mandatorily registered.

This unlawful action infringes on the interaction between the producer and consumer of energy resources as legal entities. The proof of its unlawfulness is based on an analysis of the standards, norms and regulations aimed at energy conservation. For example, the interdepartmental regulations of thermal energy or coolant control, regulations of electricity control, regulations of limited electric or thermal energy consumption, a sanctioning proce-

ture of using electric boilers and other electric appliances, etc.

This unlawful action is committed both intentionally and out of insufficient attention to the regulations by executives at enterprises irrespective of their ownership, legal entities, and employees in charge of energy conservation or its effective use.

5. CONCLUSION

In our opinion, the above-mentioned challenges in administering energy consumption law in courts result from the loopholes in the current legislation of fuel/energy use; secondly, a lack of cooperation between executive bodies and law-enforcement bodies, whose duty is to supervise, make known and counteract unlawful actions of energy consumption, and thirdly, official corruption in this branch of industry.

To sum up, law formulation and creation of legal countermeasures, which secure energy resources protection, are the main tasks in the activities of executive bodies in the Russian Federation. Any breaches of energy consumption law have a negative effect on the development of the energy sector. That is why harmful economic consequences of illegal energy consumption should not be underestimated.

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