

#### On Radiation Security of Population

#### Unofficial translation

The Law of the Republic of Kazakhstan dated 23 April, 1998 No. 219.

Unofficial translation

Footnote. Throughout the text the words "competent", of competent", "Competent", "by the competent" are respectively substituted by the words "authorized", of authorized", "Authorized", "by the authorized", "by the authorized" by the Law of the Republic of Kazakhstan dated 10.01.2011 No.383-IV (shall be enforced upon expiry of ten calendar days after its first official publication).

This Law regulates public relations in the field of ensuring of radiation security of population, for the purposes of health protection from damage effect of ionizing radiation.

#### Chapter 1. General provisions

#### Article 1. Basic definitions used in this Law

The following basic definitions shall be used in this Law:

intervention level - avertable dose quantity, upon achievement of which in the cases of occurrence of situation of chronic or emergency exposure shall be accepted protective or post-accident measures;

effective dose – the amount of absorbed energy of ionizing radiation, used as a risk level of occurrence of delayed radiation effect of human body and its organs considering their radiosensibility;

control zone – the territory, on which the special rules on radiation control, admission and residence of people are effected;

ionizing radiation – radiation, consisting of charged, uncharged particles and photons, which upon interaction with environment forms the ions of different signs;

an operator - a legal person conducting an activity related to the handling of nuclear facilities

personnel - individuals permanently or temporarily working with sources of ionizing radiation or exposed to its effects because of working conditions;

radiation accident – violation of normal operation limits of the object of atomic energy uses, upon that was the release of radioactive products and (or) ionizing radiation for the boundaries, provided by the project of normal operation, which may lead or led to exposure of people or radioactive pollution of environment above the established norms;

radiation safety is the state of the properties and characteristics of a nuclear facility, provided by a set of measures that limit the radiation impact on personnel, the public and the environment, in accordance with the standards established by the legislation of the Republic of Kazakhstan;

radiation protection – a set of radiation-hygienic, project designing, technical and organizational measures, directed to ensure of radiation security;

radiation monitoring - systematic observation for the state of radiation situation both on the objects of the use of sources of ionizing radiation, and in the environment;

natural radiation background - radiation dose, created by cosmic radiation and radiation of radionuclides of natural origin, naturally distributed in the earth, water, air and other elements of the biosphere, food products and the human body;

technologically modified radiation background - natural radiation background, modified in the result of human activity;

technologically radiation background – the levels of indices, characterizing the radiation situation after deduction of levels of these same indices characterizing the natural radiation background of this area.

Footnote. Article 1 is in the wording of the Law of the Republic of Kazakhstan dated 29.12.2006 No. 209 (the order of enforcement see Article); as amended by the Law of the Republic of Kazakhstan dated 10.01.2011 No. 383-IV (shall be enforced upon expiry of ten calendar days after its first official publication); dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication); dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

# Article 2. The legislation of the Republic of Kazakhstan in the field of ensuring of radiation security

The legislation of the Republic of Kazakhstan in the field of ensuring of radiation security shall be based on the Constitution of the Republic of Kazakhstan, consists of the Law of the Republic of Kazakhstan "On atomic energy use", this Law, as well as other regulatory legal acts of the Republic of Kazakhstan.

### Article 3. Basic principles of ensuring of radiation security

Basic principles of ensuring of radiation security are:

normalization principle - non-exceedance of allowable limits of individual doses of radiation of citizens from all sources of ionizing radiation;

principle of substantiation - prohibition of all activities on the use of ionizing radiation sources, in which the benefit, obtained for the individual and society does not exceed the risk of possible damage, caused by the additional exposure to the natural radiation background;

optimization principle - maintain the individual doses and the number of exposed individuals using any source of ionizing radiation on the level as low as possible and achievable, considering account economic and social factors;

the principle of emergency optimization - the form, scale and duration of taking measures in emergency (emergency) situations should be optimized so that the measures to eliminate the consequences of a radiation accident bring more benefit than harm.

Footnote. Article 3 as amended by the Law of the Republic of Kazakhstan dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

### Article 4. Ensuring of radiation security

Radiation security shall be ensured by:

carrying out a complex of legal, organizational, engineering and technical, sanitary and hygienic, preventive, educational, general educational and informational nature;

implementation of measures on observance of rules and regulations in the field of radiation security by the state bodies of the Republic of Kazakhstan, public associations, individuals and legal entities;

implementation of radiation monitoring over the whole territory of the republic;

implementation of programs of quality ensuring of radiation security at all levels of carrying out of practical activity with sources of ionizing radiation.

Footnote. Article 4 as amended by the Law of the Republic of Kazakhstan dated 03.07.2013 No. 124-V (shall be enforced upon expiry of ten calendar days after its first official publication).

# Chapter 2. The state management, supervision and control in the field of ensuring of radiation security

### Article 5. Competence of the Government of the Republic of Kazakhstan

Government of the Republic of Kazakhstan:

- 1) develops the main directions of the state policy in the field of ensuring the radiation safety of the population;
- 2) performs other functions assigned to it by the Constitution, this Law, other laws of the Republic of Kazakhstan and acts of the President of the Republic of Kazakhstan.

Footnote. Article 5 as amended by the Law of the Republic of Kazakhstan dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

## Article 6. Competence of state bodies to ensure radiation safety

- 1. The competence of the authorized state body in the field of the use of atomic energy includes:
- 1) implementation of the state policy in the field of ensuring the radiation safety of the population, provided for by the legislation of the Republic of Kazakhstan in the field of the use of atomic energy;
  - 2) development and approval of technical regulations in the field of radiation safety;
- 3) development and approval of qualification requirements for personnel employed at nuclear facilities;
- 4) exercise of other powers provided for by this Law, other laws of the Republic of Kazakhstan, acts of the President of the Republic of Kazakhstan and the Government of the Republic of Kazakhstan.
- 2. The competence of the state body in the field of sanitary and epidemiological welfare of the population includes:
- 1) organization and implementation of state sanitary and epidemiological control and supervision over compliance with the requirements of sanitary rules, hygienic standards and technical regulations in the field of ensuring radiation safety of the population;
- 2) exercise of other powers provided for by this Law, other laws of the Republic of Kazakhstan, acts of the President of the Republic of Kazakhstan and the Government of the Republic of Kazakhstan.
- 3. The authorized body in the field of environmental protection, the customs authorities of the Republic of Kazakhstan and the Border Service of the National Security Committee of the Republic of Kazakhstan, within their competence, ensure the radiation safety of the population in accordance with the legislation of the Republic of Kazakhstan.

Footnote. Article 6 as amended by the Law of the Republic of Kazakhstan dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

### Article 7. State norming on ensuring of radiation security

- 1. State norming on ensuring of radiation security shall be carried out by establishement of standards of radiation security, sanitary rules, hygienic regulations, construction rules and regulations, labour protection rights, methodical, guidance and other documents on radiation security. These acts shall consider international standards on radiation security and shall not contradict to the provisions of this Law.
- 2. Sanitary and epidemiological rules and regulations, technical regulations in the scope of radiation security shall be approved in the manner established by the legislation of the Republic of Kazakhstan.
- 3. Administrative, instructional, methodological and other documents on issues of radiation security shall be approved and accepted by the authorized state body and operating

organization within their competence on the basis of technical regulations in the scope of radiation security.

Footnote. Article 7 as amended by the Law of the Republic of Kazakhstan dated 29 December, 2006 No. 209 (the order of enforcement see Article 2).

#### Article 8. Production control of radiation safety

- 1. The operators conduct production control over the quality of radiation protection.
- 2. The procedure for performing production control in the field of ensuring radiation safety for each operating organization is determined taking into account the characteristics and conditions of the work performed by it.
- 3. If the operator's officials, carrying out production control of radiation protection, reveal violations of radiation safety requirements, sanitary rules and hygienic standards, radiation safety rules, construction norms and rules, labor safety rules, administrative, instructive, methodological and other documents in the field of radiation safety, they shall take enforcement actions provided for by the laws of the Republic of Kazakhstan.

Footnote. Article 8 in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication); as amended by the Law of the Republic of Kazakhstan dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

# Chapter 3. General requirements to the ensuring of radiation security

### Article 9. Requirements to assessment of the state of radiation security

- 1. When planning and making decisions in the field of radiation safety, analyzing their effectiveness by state bodies, local executive bodies of regions, cities of republican significance, the capital, operators, it is required to assess the radiation safety situation to ensure the compliance with radiation safety requirements, sanitary rules and hygienic standards in the field of radiation safety.
- 2. The assessment of radiation safety is carried out by the state body in the field of sanitary and epidemiological wellbeing of the population, the authorized body in the field of environmental protection and the authorized state body in the field of the use of nuclear energy on the basis of:
  - 1) characteristics of radioactive contamination of environment;
- 2) analysis of provision of measures on radioactive security and performance of standards, rules and hygienic regulations in the field of radiation security;
  - 3) probability of radiation accidents and their scale;

- 4) degree of readiness to the effective operation of radiation accidents and their consequences;
- 5) analysis of radiation dose, received by the separate group of population from all sources of ionizing radiation;
  - 6) number of persons, exposed to radiation above the established limits of radiation doses.
- 3. Results of assessment of radiation security shall be analyzed and approved by the authorized state body in the field of atomic energy use.

Footnote. Article 9 – is in the wording of the Law of the Republic of Kazakhstan dated 20 December, 2004 No. 13 (shall be enforced from 1 January, 2005). As amended from 29 December, 2006 No. 209 (the order of enforcement see Article 2); dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

# Article 10. Requirements for ensuring of radiation security upon handling with sources of ionizing radiation

The operators are obliged to:

observe requirements of this Law and other regulatory legal acts in the field of ensuring of radiation security;

plan and carry out measures on ensuring of radiation security and preservation of sources of ionizing radiation;

carry out works on substantiation of radiation security of new (revised) product, materials and substances, technological process and productions, being the sources of ionizing radiation;

carry out systematic production control of radiation situation in the workplace, in the premises, in the territories of organizations, and controlled zones, as well as emissions and discharges of radioactive substances;

conduct regular control and record of individual radiation doses of staff;

make preparation and certification of civil servants and staff, specialists of services of production radiation control, other persons, permanently or temporarily carrying out work with sources of ionizing radiation;

organize conducting of preliminary (at the commencement of employment t) and periodic medical examinations of staff;

regularly inform the staff on levels of ionizing radiation in their workplaces and on the size of individual radiation doses, received by them;

timely inform the state bodies, authorized to carry out the state management, supervision and control in the field of ensuring of radiation security, on emergency situations, on violations of process regulation, created a threat of radiation security;

execute conclusions, regulation, orders of civil servants, state bodies, authorized for that, carrying out the state management, supervision and control in the field of ensuring of radiation security;

ensure enforcement of the rights of citizens in the field of ensuring of radiation security.

Footnote. Article 10 as amended by the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

#### Article 11. Ensuring of radiation security under the influence of radionuclides of natural origin

- 1. Radiation of population and staff conditioned by radon and other radionuclides of natural origin, in the residential and industrial premises shall not exceed the established standards.
- 2. In order to protect population and staff from influence of radionuclides of natural origin shall be carried out:

choice of land plots for construction of buildings and structures considering the level of release of radon from the soil and radiation background;

planning and construction of buildings and structures considering prevention of entry of radon in the air of these premises;

conducting of production control of construction materials, acceptance of buildings and structures into operation considering the level of radon in the air of premises and radiation background;

operation of buildings and structures considering the level of radon and radiation background.

- 3. Upon impossibility of performance of standards by recession of level of radon and radiation background in the buildings and structures shall be changed the nature of their use.
- 4. Construction materials and products, not complying with the requirements on ensuring of radiation security shall be prohibited to use.
- 5. Radiation doses of population from natural sources of radiation shall not exceed the standards, established for them by the authorized body in the field of health care service.

Footnote. Article 11 as amended by the Law of the Republic of Kazakhstan dated 29 December, 2006 No. 209 (the order of enforcement see Article 2).

# Article 12. Ensuring of radiation security upon production of food products and upon consumption of drinking water

Operating supplies, food products, drinking water, materials and products, contacting with them in the process of production, storage, transportation and sale shall comply with the requirements of standards of radiation security.

### Article 13. Ensuring of radiation security of citizens upon carrying out of medical procedures

1. Upon carrying out of medical procedures with the use of radioactive isotopes or other sources of ionizing radiation shall be used the relevant means of protection of citizens (

patients). Radiation dose of patients shall not exceed the level, established by the regulatory legal acts in the field of radiation security.

- 2. Upon carrying out of medical procedures, complete information on the expected and ( or) received radiation doses and the possible consequences of its impact shall be provided to the patient. The citizen (patient) shall have a right to refuse from such medical procedures, except for the prevention researchers, conducted for the purposes of identify diseases, dangerous in epidemiological terms.
- 3. Medical organization, carrying out procedures with the use of sources of ionizing radiation shall bear responsibility, provided by the Laws of the Republic of Kazakhstan, for the possible negative impact on the health or life of the patient, if such casual relation is proved in a judicial procedure.
- 4. Medical organization shall develop and approve the program of ensuring the quality of medical services in the authorized body on the atomic energy use for the purposes of radiation security upon carrying out of procedures for all medical procedures with the use of radioactive isotopes or other sources of ionizing radiation.
- 5. Requirements to qualification of specialists, permitted to the works, procedure of their certification and recertification, training and retraining program shall be established in the qualifying requirements to the medical activity with the use of sources of ionizing radiation.
- 6. Use of radioactive substances and other sources of ionizing radiation for diagnosis, prevention and treatment of diseases shall be permitted only in accordance with the methods (methods), approved by the authorized body in the field of health care service, containing requirements on ensuring of radiation security of patients.

Footnote. Article 13 is in the wording of the Law of the Republic of Kazakhstan dated 29 December, 2006 No. 209 (the order of enforcement see Article 2).

#### Article 14. Record and control of individual radiation doses

Control and accounting of individual exposure doses received by citizens when working with sources of ionizing radiation, performing medical X-ray radiological procedures, as well as due to natural and man-made radiation background, are carried out within the framework of a unified state system for monitoring and accounting for individual exposure doses in the manner determined by the state body in the field sanitary and epidemiological welfare of the population.

Footnote. Article 14 is in the wording of the Law of the Republic of Kazakhstan dated 29.09.2014 No. 239-V(shall be enforced upon expiry of ten calendar days after its first official publication); as amended by the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication); dated February 25, 2021 No. 12-VII (shall be enforced ten calendar days after the day of its first official publication).

# Chapter 4. Ensuring of radiation security upon radiation accident

#### Article 15. Activity of authorized state bodies upon radiation accident

Authorized state bodies in case of a radiation accident are guided by this Law and carry out their activities in accordance with the legislation of the Republic of Kazakhstan on civil protection and the legislation of the Republic of Kazakhstan in the field of the use of atomic energy.

Footnote. Article 15 as amended by the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication); dated May 14, 2020 No. 329-VI (shall be enforced ten calendar days after the day of its first official publication).

#### Article 16. Emergency preparedness

The operators are obliged to have:

a list of potential radiation accidents and the forecast of their consequences and radiation situation agreed with the authorized state body;

criteria for making prompt decisions in the event of a radiation accident and the levels of intervention agreed with the authorized state body;

an action plan to protect the personnel and population from a radiation accident and its consequences agreed with the local executive body of a region (a city of republican significance, the capital), authorized state bodies for state management, supervision and control in the field of radiation safety;

means for warning and ensuring the elimination of the consequences of a radiation accident;

medical means for prevention of radiation damage and means for medical aid to the victims of a radiation accident;

rescue units formed from among the personnel

Footnote. Article 16 as amended by the Laws of the Republic of Kazakhstan dated 20 December, 2004. № 13 (shall be enforced from January 1, 2005); dated 29 December, 2006. № 209 (the order of enforcement see Art. 2); dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

## Article 17. Operators' obligations to ensure radiation safety in case of a radiation accident

Footnote. The title in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

In the case of a radiation accident, the operator shall:

Immediately inform the authorized state bodies responsible for state administration, supervision and control in the field of radiation safety, as well as local executive bodies of oblasts (cities of national importance, the capital) and the population of areas where increased exposure is possible, about the radiation accident;

together with authorized state bodies, ensure the implementation of measures to protect the personnel and population from a radiation accident and its consequences;

take measures on rendering of medical assistance to suffered upon radiation accident;

take measures on localization of focus of radioactive contamination and prevent distribution of radioactive substances in the environment;

carry out an analysis and prepare prediction of development of radiation accident and change of radiation situation upon radiation accident;

take measures to normalize the radiation situation in the operator's premises after elimination of the radiation accident;

take measures on assessment of individual radiation doses of staff and population and transfer these data to the health authorities and other authorized state bodies.

Footnote. Article 17 as amended by the Law of the Republic of Kazakhstan dated 20 December, 2004 No. 13 (shall be enforced from 1 January, 2005); dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication); No. 210-VI of 28 December 2018 (shall be enforced upon the expiration of ten calendar days after the date of its first official publication).

# Article 18. Planned special exposure of citizens, engaged for liquidation of consequences of radiation accident

- 1. Planned special exposure of citizens, engaged for liquidation of consequences of radiation accident, rescue and urgent works, deactivation may be conditioned only by the need to rescue people and prevent their further exposure.
- 2. Planned special exposure of citizens, engaged for liquidation of consequences of radiation accident shall be accepted once during the lifetime upon voluntary consent and preliminary informing on possible radiation doses and health risk.
- 3. Types, amount of compensation and compensation of damage, caused by radiation effect to health of persons, engaged for execution of specified works shall be established by the legislation of the Republic of Kazakhstan.

Chapter 5. Rights and obligations of citizens, public associations and organizations in the field of ensuring of radiation security

Article 19. Right to radiation safety

Citizens of the Republic of Kazakhstan, foreigners and stateless persons residing in the Republic of Kazakhstan have the right to radiation safety. This right is ensured by the implementation of a set of measures to prevent the radiation effect of ionizing radiation on the human body above the established norms, as well as by individuals' and operators'

fulfillment of the requirements to ensure radiation safety.

Footnote. Article 19 in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

### Article 20. Right to receive information

Natural and legal persons have the right to receive information in the field of radiation safety from authorized state bodies and mass media in accordance with the legislation of the Republic of Kazakhstan.

Footnote. Article 20 in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

# Article 21. Right of citizens to compensation of damage, caused to their life and health, material damages upon exposure to ionizing radiation or in the result of radiation accident

- 1. Citizens shall have a right to compensation of damage, caused to their life and health, and compensation of material damages, conditioned by exposure of ionizing radiation above established limits or in the result of radiation accident, in accordance with the legislation of the Republic of Kazakhstan.
  - 2. (Is excluded)
  - 3. Suffered from radiation effect are:

persons, received radiation dose higher than permitted, upon liquidation of radiation accident;

persons, received effective radiation dose from sources of ionizing radiation, exceeding dose limit, established by the standards of radiation security for the staff and having the diseases, causally related with this exposure;

children, suffering by separate types of diseases, determined by the list of diseases, related with influence of ionizing radiation, born from parents, if at least one of them come within the status of suffered from radiation effect.

Footnote. Article 21 as amended by the Law of the Republic of Kazakhstan dated 29 December, 2006 No. 209 (the order of enforcement see Article 2).

# Article 22. Obligations of citizens of the Republic of Kazakhstan, foreigners and stateless persons in the field of radiation safety

Citizens of the Republic of Kazakhstan, foreigners and stateless persons residing in the Republic of Kazakhstan are obliged to observe the legislation of the Republic of Kazakhstan in the field of radiation safety.

In the premises of an operator, the said persons are obliged to comply with the requirements of this operator's officials.

Footnote. Article 22 in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

# Chapter 6. Responsibility for violation of requirements of radiation security

# Article 23. Liability for violation of the legislation of the Republic of Kazakhstan in the field of radiation safety

Violation of the legislation of the Republic of Kazakhstan in the field of radiation safety entails responsibility established by the laws of the Republic of Kazakhstan.

Footnote. Article 23 in the new wording of the Law of the Republic of Kazakhstan dated 12.01.2016 № 443-V (shall be enforced upon expiry of ten calendar days after the day its first official publication).

#### Chapter 7. International treaties

## Article 24. International treaties in the field of ensuring of radiation security

If by the international treaty, ratified by the Republic of Kazakhstan, made other rules than those that contained in the legislation of the Republic of Kazakhstan in the field of ensuring of radiation security, the rules of the international treaty shall be applied.

The President of the Republic of Kazakhstan

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