**EU 06/01/2021**

**PARLIAMENT OF THE REPUBLIC OF MOLDOVA**

**LAW no. \_\_\_\_\_**

**of \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_**

**on fluorinated greenhouse gases**

The Parliament adopts this organic law.

This law transposes the Regulation (EU) no. 517/2014 of the European Parliament and of the Council of 16 April 2014 on fluorinated greenhouse gases, which repeals the Regulation (EC) no. 842/2006 Text of EEA relevance (published in the Official Journal of the European Union no. L 150 of 20 May 2014)

**Chapter I**

**GENERAL PROVISIONS**

1. Purpose of the law

The purpose of this law is to create the legal framework to strengthen institutional capacities to implement measures to mitigate climate change and protect the environment by reducing emissions of fluorinated greenhouse gases (hereinafter - the F-gases).

1. Subject and scope
2. The provisions of the law regulate measures at national level with regard to:
3. isolation, use, recovery and destruction of F-gases and related auxiliary measures;
4. placing on the market of specific products and equipment, containing or operating on F-gases;
5. specific use of F-gases;
6. application of quantitative limits for placing of HFCs on the market;
7. This law establishes standards, conditions and limits applicable to the following F-gases:
8. hydrofluorocarbons (hereinafter-HFCs) used as refrigerants, cleaning solvents and foaming agents (such as those used in fire extinguishers);
9. perfluorocarbons (hereinafter - PFCs) used in the manufacture of semiconductors, as cleaning solvents and as foaming agents;
10. sulphur hexafluorides (hereinafter - SF6) used in high voltage circuit breakers and magnesium production.
11. Main notions

***technical aerosol*** - an aerosol generator used for the maintenance, repair, cleaning, testing, disinsection and manufacture of products and equipment, for the installation of equipment and in other applications;

***mixture*** - a fluid consisting of two or more substances, at least one of which is a substance set out in Annex no. 1 or a substance set out in Annex no. 2;

***refrigeration truck*** - a vehicle with a mass of more than 3.5 tons, which is designed and built mainly for freight transport and which is equipped with a refrigeration unit;

***organic Rankine Cycle*** - a cycle containing condensable fluorinated greenhouse gases that convert heat from a heat source into energy for generating electricity or mechanical energy;

***primary refrigeration circuit for cascade systems*** - the primary circuit in indirect medium heat systems, where a combination of two or more separate refrigeration circuits are connected in series, so that the primary circuit absorbs capacitor heat from a secondary medium heat circuit;

***container*** - product designed for the transport or storage of F-gases;

***disposable container*** - a container which cannot be refilled without thus being adapted or which is placed on the market without providing for its return for refill;

***destruction*** - the process of permanent transformation or decomposition of the largest part or the entire quantity of fluorinated greenhouse gas into one or several stable substances, which are no F-gases;

***equipment/unit***- set of refrigeration and/or air conditioning components, assembled into a single block;

***fire protection equipment*** - equipment and systems used for preventing or protecting against fires, including fire extinguishers;

***military equipment*** - weapons, ammunition and war materials, intended for specific military purposes, which are necessary for protecting essential security interests;

***fluorinated greenhouse gases*** ***(F-gases)*** - hydrofluorocarbons, perfluorocarbons, sulphur hexafluoride and other greenhouse gases containing fluorine, set out in Annex 1 or mixtures containing any of the above substances;

***sulphur hexafluoride (SF6)*** - the substance set out in Annex 1, Section III or mixtures containing this substance;

***hydrofluorocarbons (HFC)*** - substances set out in Annex 1, Section II of or mixtures containing any of these substances;

***enterprise*** - any individual or legal person which:

* 1. produces, uses, recovers, collects, recycles, regenerates or destroys F-gases;
  2. imports or exports F-gases or products and equipment containing such gases;
  3. places on the market F-gases or products and equipment containing such gases or whose operation is based on such gases;
  4. installs, ensures servicing, maintains, repairs, checks for tightness or decommissions equipment containing F-gases or whose operation is based on F-gases;
  5. is an operator in the field of F-gas-containing technology or whose operation is based on F gases;
  6. produces, imports, exports, places on the market or destroys gases listed in Annex 2;
  7. places on the market products or equipment containing gases listed in Annex 2;

***installation -*** the assembly of two or more items of equipment or circuits containing or designed to contain F-gases, in order to assemble a system in the location in which it shall work, which involves the joining of the conductors of the gas system to complete the circuit, irrespective of the need to charge the system after assembly;

***refrigeration system*** - a set of one or more refrigeration machines and all nodes, assemblies, components, pipes and fluids necessary for their operation, as well as for the distribution and use of artificial cold;

***synthetic intermediates*** - any F-gases or substances listed in Annex 2, which undergo chemical transformations in a process by which their original composition is fully transformed and whose emissions are negligible;

***market placement*** - supply or placing on the market at the disposal of economic agents (legal and natural persons), for the first time, for a fee or free of charge, or one's own use by an importer/manufacturer and includes release from customs for free movement within the territory of the country;

***electric switches*** - switching devices, and combinations thereof, and ancillary equipment for control, measurement, protection and adjustment, as well as assemblies consisting of such devices and equipment, and the interconnections, accessories, enclosures and supporting structures thereto, intended for use in connection with the generation, transmission, distribution and conversion of electric power;

***maintenance or service assurance*** - means all activities, except recovery, in line with art. 15, and leak detection, provided for in art.12, involving access to circuits containing or designed to contain F-gases, in particular the activities of supplying the system with F-gases, removing one or more parts of the circuit or equipment, reassembling two or more parts of the circuit or equipment, and removing leaks;

***mobile*** - moved in transit during operation;

***operator*** - the natural or legal person who controls the technical operation of the products and equipment regulated by this law; in certain determined situations, may designate the owner as responsible for the duties of the operator;

***perfluorocarbons (PFC)*** - substances set out in Annex 1, Section II or mixtures containing any of these substances;

***global warming potential (GWP)*** - the climate warming potential of a greenhouse gas versus the carbon dioxide (CO2) potential, calculated as the 100-year heating potential of one kilo of greenhouse gas versus one kilo of CO2, in accordance with the provisions of Annexes 1, 2 and 4, or, in the case of mixtures, calculated in accordance with the provisions of Annex 4;

***recycling*** - reuse of a recovered fluorinated greenhouse gas after an elementary cleaning process;

***recovery*** - collection and storage of F-gases from products, including containers, and equipment during maintenance or service or before disposal of products or equipment;

***regeneration*** - reprocessing of a recovered fluorinated greenhouse gas to perform equivalent to that of a newly produced substance, taking into account the intended use;

***refrigerated trailer*** - a vehicle that is designed and built to be towed by a truck or tractor, mainly to transport cargo, and which is equipped with a refrigeration unit;

***repair*** - putting back into operation of products or equipment containing or whose operation is based on F-gases that are damaged or leaking, involving a part containing or designed to contain such gases;

***de-commissioning*** - final closure and de-commissioning of a product or equipment containing F-gases;

***leak detection system*** - a mechanical, electrical or electronic device calibrated for the detection of F-gases leaks and which alerts the refrigeration system operator when a leak is detected;

***centralized multimodal refrigeration systems*** - with two or more compressors operating in parallel, connected to one or more ordinary condensers and to several cooling devices such as refrigerated display cases, refrigerated cabinets, freezers or refrigerated storage rooms;

***monosplit air conditioning systems*** - indoor air conditioning systems consisting of a single outdoor unit and a single indoor unit connected by refrigerant pipes, requiring installation at the site of use.

***single-component foam*** - foam composition contained in a single aerosol generator in a liquid state, before reaction or after a partial reaction, and which swells and hardens when removed from the generator;

***stationary*** - is not displaced during operation and includes movable indoor air conditioners;

***newly produced substance*** - a substance not previously used;

***tonne (tonnes) of CO2*** equivalent - the amount of greenhouse gases expressed as the product of the weight of greenhouse gases in metric tonnes and their global warming potential;

***use*** - the use of F-gases in the production, maintenance or provision of service, including the refilling of products and equipment, or in other processes according to the provisions of this law;

***commercial use*** - use for the storage, display or distribution of products for the purpose of sale to end users in retail and food distribution services;

1. Basic principles
2. When enforcing the law, the following principles shall be observed:
3. sustainable reduction of F-gases emissions;
4. extended producer/user responsibility for remedying leakages, recovering F-gases and for their recycling, regeneration or destruction;
5. prevention of pollution;
6. caution in decision making;
7. "polluter pays”;
8. transparency and accessibility.

**Chapter II**

**DUTIES AND RESPONSIBILITIES**

1. Duties of the Government

The Government shall:

1. determine the objectives and set out priority directions of the state climate change mitigation and environmental protection policy;
2. coordinate the work of all public authorities which bear duties in the area of climate change mitigation and environmental protection;
3. approve the normative and institutional framework for the enactment of this law;
4. encourage system development through the responsibility of the producer/user for recovering fluorinated greenhouse gases and for their recycling, regeneration or destruction.
5. Duties of the Ministry of Agriculture, Regional Development and Environment

The Ministry of Agriculture, Regional Development and Environment is responsible for implementing the state climate change mitigation and environmental protection policy and shall:

1. develop and promote policies, the normative framework in the field of climate change and environmental protection and shall be the official contact point for international conventions and agreements related to this Law, to which the Republic of Moldova is a party;
2. promote policies for phasing out HFCs under the Montreal Protocol on substances that deplete the ozone layer;
3. ensure the development, update and enactment of rules and regulations on effective monitoring of greenhouse gas emissions under and for the enforcement of the legislation;
4. ensure cooperation with authorities and institutions with regard to effectively implement the legislation in the field of greenhouse gas emissions reduction;
5. develop the HFC phase-down, accompanied by an action plan for its implementation;
6. contribute to ensuring that public authorities and the general public have access to information on the availability of alternatives to fluorinated greenhouse gases, including the environmental, technical, economic and safety aspects of their use;
7. coordinate the preparation of reports on the implementation of national climate change mitigation programmes and action plans;
8. develop and promote policies in order to realize the commitments taken within the international treaties and agreements related to this law, to which the Republic of Moldova is a party.
9. Duties of the Environmental Agency

The Environmental Agency shall undertake measures to enact normative acts on sustainable reduction of F-gases emissions and shall:

1. ensure the implementation of the normative framework in the field of climate change mitigation, monitors and periodically reports to the Ministry of Agriculture, Regional Development and Environment (Ministry) on the level of its achievement, presents proposals for amendments to normative acts in the field;
2. provide support to the Ministry in developing normative acts on effective monitoring and management of greenhouse F-gases emissions;
3. approve the format of the labels in accordance with the provisions of the regulation on classification, labelling and packaging of substances and mixtures, approved by the Government;
4. keep the National Register of emissions and transfer of pollutants, in line with the provisions of Government Decision 373/2018 on the National Register of emissions and transfer of pollutants;
5. ensure monitoring and reporting of fluorinated greenhouse gases in line with the provisions of Government Decision 1277/2018 on the establishment and operation of the national system for monitoring and reporting greenhouse gas emissions and other climate change relevant information.
6. coordinate the modification of vocational training framework programmes for specialists in refrigeration systems containing fluorinated greenhouse gases;
7. keep track of certificates of attestation of professional skills of refrigeration systems specialists in line with the provisions of Government Decision 483/2019 approving the regulation on the training and attestation of specialists in refrigeration systems containing hydrochlorofluorocarbons and fluorinated greenhouse gases;
8. prepare information and reports in the formats established by the European Environment Agency, EUROSTAT, by the secretariats of climate change conventions and protocols, to which the Republic of Moldova is a party, and submit them to the Ministry;
9. request and receive free of charge, in accordance with the law, generalized data and information on specific products and equipment containing or whose operation is based on F-gases;
10. ensure accuracy, correctness and completeness of provided information.
11. Duties of the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities

The National Agency for the Regulation of Nuclear, Radiological and Chemical Activities has the following duties and responsibilities:

1. to provide support to the Ministry in developing normative acts on greenhouse F-gases emissions reduction;
2. to develop requirements for F-gases leak checks for each type of equipment, provided for in art. 13;
3. to issue authorizations for the import, export, re-export, transit, placement on the market, marketing of products and equipment containing or whose operation is based on F-gases, in accordance with the provisions of art. 21;
4. to keep the Register of applications for authorisations and the Register of issued authorisations;
5. to inform, at its earliest convenience, the customs authorities of operators who have been issued authorisations for the import, export, re-export, transit, placement on the market, marketing of products and equipment containing or operating on F-gases;
6. to withdraw the authorization in case of violation by the operators of the provisions of the legislation in force and the conditions of authorization according to the Law no. 235/2006 on the basic principles regulating entrepreneurial activity and Law No. 160/2011 on regulating through authorization of the entrepreneurial activity;
7. to assign to each producer and importer the quotas for the placing on the market of hydrofluorocarbons for each year starting in 2024;
8. to establish and operate an electronic quota register for placing hydrofluorocarbons on the market;
9. to collect and disseminate, on the basis of available data, information on standards for replacement technologies using alternatives to fluorinated greenhouse gases in refrigeration equipment, air conditioning equipment, heat pumps and foams;
10. to approve the format of the records provided for in art. 18;
11. to collect data and information specific to the annual reports received from producers, importers and exporters of F-gases.
12. Duties of the Environmental Protection Inspectorate

The Inspectorate for Environmental Protection has the following duties and responsibilities:

1. to ensure control in order to comply with the provisions of this law;
2. to control the implementation of measures in the field of F-gases emissions prevention and environmental protection;
3. to effect controls on establishing the causes of the release of F-gases into the atmosphere and propose remedial measures;
4. to verify the process of reporting by operators of data on the detection of F-gases leaks in the National Register of emissions and transfer of pollutants, in accordance with the provisions of the Government Decision 373/2018 on the National Register of emissions and transfer of pollutants;
5. to check compliance with the use of equipment, provided for in art.25, by operators for the purpose of self-monitoring of F-gases emissions into the atmosphere;
6. to verify, within the planned or unannounced controls, compliance with the provisions of Government Decision 483/2019 on holding of certificates of attestation of professional skills;
7. to carry out controls in the manner and limit provided for by law in order to detect and counteract activities having a negative impact on the environment;
8. to identify cases of violation of legislation in the field and applies sanctions according to normative acts; to calculate the damage caused to the environment as a result of violation of normative acts;
9. to inform the Ministry of Agriculture, Regional Development and Environment and the Environment Agency in case of non-compliance with major environmental impact or, at their request, to present information on the results of the conducted checks, to propose the termination, withdrawal of issued permissive acts when non-compliances are identified.
10. Customs Service

The Customs Service has the following duties and responsibilities:

1. to exercise control over the legality of the placing on the market of F-gases in accordance with the provisions of art. 19-21 and the equipment referred to in Annex 3 in the customs territory of the state under the authorization issued by the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities;
2. to cooperate with the Environmental Protection Inspectorate in the process of supervision and control of the execution of the provisions of this law and the regulations approved pursuant to it;
3. to notify the Inspectorate for Environmental Protection of cases of violation of the provisions of this law, which are identified within the control carried out in accordance with the powers assigned by the Customs Code of the Republic of Moldova;
4. provide the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities with detailed information on the import, export, re-export and transit of products and equipment containing or operating on F-gases.
5. Operators of products and equipment containing F-gases

Operators have the following responsibilities:

1. hold attestation certificates, obtained in accordance with the provisions of art. 16.
2. apply precautions to prevent leakage and/or unintentional release of F-gases into the atmosphere;
3. take technical and economic measures to minimise the leakage of fluorinated greenhouse gases;
4. obtain permits for the import or export of products and equipment containing or whose operation is based on F-gases in accordance with the provisions of art. 21;
5. place hydrofluorocarbons on the market for each year starting with 2024 in accordance with the quotas allocated under the mechanism provided for in art. 28;
6. keep records in accordance with the provisions of art. 17.

**Chapter III**

**INSULATION**

**Section 1.**

**Prevention of fluorinated greenhouse gas emissions**

1. Precautions
2. It is prohibited to release F-gases into the atmosphere, unless it is technically necessary for intended use.
3. Natural and legal persons which produce, assemble, have installations/equipment containing fluorinated compounds, as well as F-gases as by-products shall take all necessary precautions to limit the emissions of F-gases to the greatest extent possible during:
4. production;
5. transportation;
6. storage;
7. handling operations for installation and maintenance of installations/equipment;
8. failure of equipment; and
9. when using fluorinated gases as a cleaning agent or solvent.
10. Operators of installations/equipment containing F-gases shall take precautions to prevent the unintended release of these gases (hereinafter-leakage).
11. Operators of installations/equipment containing F-gases shall take all technical and economic measures to minimise F-gases leakage.
12. If an F-gases leakage is detected, operators shall ensure that the equipment is properly repaired and without undue delay.
13. With reference to the equipment that must be checked for leaks, pursuant to art. 14, where any leakage from the equipment has been remedied, operators shall ensure that the equipment is monitored within one month of the repair by a duly certified operator to verify the effectiveness of the repair.
14. Individuals are certified in accordance with the provisions of art. 17 para. (1) and take precautions to prevent leakages of F-gases.
15. Companies carrying out the installation, servicing, maintenance, repair or dismantling of equipment provided for in art. 13 (2) letter (a) - (d) are certified in accordance with art. 17 (4) and (7) and shall take precautions to prevent leakages of F-gases.
16. Leak detection
17. Operators of installations/equipment containing F-gases in quantities of 5 tonnes of CO2 equivalent or more and not contained in expandable foams, which are duly attested shall ensure verification for leaks.
18. The provisions of para. (1) applies to operators of the following equipment containing F-gases:
19. stationery refrigeration equipment;
20. stationary air conditioning equipment;
21. stationary heat pumps;
22. stationary fire protection equipment;
23. refrigeration units of refrigerated trucks and trailers;
24. electrical switches;
25. organic Rankine cycles.
26. The leak check for fire protection equipment shall be deemed to have been performed provided that the following two conditions are met:
27. the existing inspection regime complies with ISO 14520 or EN 15004; and
28. fire protection equipment shall be inspected with the frequency prescribed in accordance with para. (5).
29. Verification to detect leaks in equipment referred to in para. (2) letter (a) - (e) is performed by certified technical personnel in accordance with the provisions of art. 17.
30. Leak detection is carried out with the following frequency:
31. for equipment containing F-gases in quantities of 5 tonnes of CO2 equivalent or more but less than 50 tonnes of CO2 equivalent: at least every 12 months or, if a leak detection system has been installed, at least every 24 months;
32. for equipment containing F-gases in quantities of 50 tonnes of CO2 equivalent or more but less than 500 tonnes of CO2 equivalent: at least every six months or, if a leak detection system has been installed, at least every 12 months;
33. for equipment containing F-gases in quantities of 500 tonnes of CO2 equivalent or more: at least every three months or, if a leak detection system has been installed, at least every six months.
34. Waiver of leak detection verification
35. Hermetically sealed equipment containing F-gases in quantities of less than 10 tonnes of CO2 equivalent shall not be subject to leak checks, provided that such equipment is labelled as hermetically sealed.
36. Equipment containing less than 3 kg F-gases or hermetically sealed equipment, that is properly labelled and contains less than 6 kg F-gases shall not be subject to leak checks.
37. Electrical switches shall not be subject to leak checks, provided that one of the following conditions is met:
38. have a tested leakage rate of less than 0,1% per year as specified in the manufacturer's technical specifications and be labelled;
39. be equipped with a pressure or density monitoring device; or
40. contain less than 6 kg of F-gases.
41. Leak detection systems
42. Operators of the installations/equipment, referred to in art. 12 para. (2) letters (a) - (d), containing F-gases in quantities of 500 tonnes of CO2 equivalent or more shall ensure a leak detection system which alerts the operator or a servicing company of any leaks.
43. Operators of the installations/equipment, referred to in art. 13 para. (2) letters (f) and (g), containing F-gases in quantities of 500 tonnes of CO2 equivalent or more and which are installed starting 1 January 2023, shall ensure a leak detection system that alerts the operator or a servicing company of any leaks.
44. Operators shall check leak detection systems at least every 12 months to secure the operation of the equipment listed in art. 12 para. (2) letters (a) - (d) and (g), referred to in para. (1) or (2) of this article.
45. Operators shall check the leak detection systems at least every 6 years to secure the operation of the electrical switches, referred to in para. (2) of this article.
46. Recovery
47. Operators of stationary installations/equipment or refrigeration units on refrigerated trailers containing F-gases, not found in foams, shall ensure that the recovery of those gases is carried out by natural persons certified in accordance with the provisions of art. 17, so that these gases are subsequently recycled, regenerated or destroyed.
48. The obligation referred to in para. (1) applies to operators of the following equipment:
49. cooling circuits for stationary refrigeration equipment, stationary air conditioning equipment and stationary heat pumps;
50. cooling circuits for refrigeration units on refrigerated trailers;
51. fixed equipment containing F-gases-based solvents;
52. stationary fire protection equipment;
53. stationary electrical switches.
54. The company which used an F-gases container immediately before its disposal shall ensure the recovery of any waste gas, so that it is subsequently recycled, regenerated or destroyed.
55. Operators of products and equipment, not referred to in para. (1), including equipment installed on transportation units, containing F-gases, shall ensure the recovery of F-gases in the maintenance operations of the equipment or its failure, by technical personnel certified in accordance with the provisions of art. 17, so that they are subsequently recycled, regenerated or destroyed.
56. The recovery of F-gases from air conditioning equipment in vehicles that are not subject to Government Decision 1242/2016 approving the Regulation on measures to reduce emissions from air conditioning systems of vehicles shall be done by a certified operator in accordance with the provisions of art. 17.
57. To recover F-gases from air-conditioning systems in vehicles which are subject of the Government Decision 1242/2016, only individuals, which hold at least one certificate of professional competences in line with the provisions of the Government Decision 483/2019 approving the Regulation on training and attestation of specialists in refrigeration systems containing hydrofluorocarbons and fluorinated greenhouse gases shall be deemed appropriate.

**Section 2**

**Training, certification and records**

1. Training and certification
2. Training and certification, as well as continuous professional training of individuals, is carried out in accordance with the provisions of the Government Decision 483/2019 approving the Regulation on the training and certification of specialists in refrigeration systems containing hydrochlorofluorocarbons and fluorinated greenhouse gases.
3. The training programmes for individuals developed by the training and evaluation centres shall be adapted to the minimum requirements set out in Annex 1 to the Government Decision 483/2019.
4. The issue and recognition or equivalence of professional competence certificates for individuals shall be carried out in accordance with the model set out in Annex 2 of the Government Decision 483/2019 for a period of validity of 3 years.
5. Companies performing the installation, servicing, maintenance, repair or decommissioning of equipment, referred to in art. 13 para. (2) letters (a) to (d) for other parties shall be certified in accordance with the minimum requirements set out in Annex 1 of the Government Decision 483/2019.
6. The company handing over a task referred to in paragraph (4) to another undertaking shall verify that it holds the certificate necessary for the tasks imposed.
7. The Environment Agency shall provide access to individuals holding certificates of attestation of professional skills obtained under the certification programmes referred to in para. (1) to the following information:
8. relevant technologies for substituting or reducing the use of F-gases and their safe handling; and
9. existing regulatory requirements for working with equipment containing alternative refrigerants to F-gases.
10. The Environment Agency shall recognise certificates of professional competence issued in another state in which the training programme is adopted at the minimum requirements set out in Annex 1 to the Government Decision 483/2019 and does not restrict the freedom to provide services or freedom of establishment, on the grounds that a certificate has been issued in another state.
11. Records
12. Operators of installations/equipment to be checked for leaks referred to in art. 13 para. (1) draw up and keep records for each element of these equipment, specifying the following information:
13. quantity and type of installed F-gas;
14. quantities of F-gases added during installation, maintenance or servicing or due to accidental leakage;
15. whether the installed F-gas volumes have or have not been recycled or regenerated, including the name and address of the owner (end-user), as well as the number and term of validity of the certificate of the qualified operator, attested in accordance with the provisions of art. 17 which carried that operation out;
16. quantity of recovered F-gas;
17. identity of the enterprise that installed, serviced, maintained and, where applicable, repaired or decommissioned the equipment, including the number and validity of the certificate of the qualified operator, attested in accordance with the provisions of art. 17, who carried that operation out;
18. data and results of checks, carried out pursuant to art. 13;
19. if the equipment has been decommissioned, the measures taken to recover and prevent the removal of F-gases.
20. Unless the records referred to in para. (1) are registered in the National Register of emissions and transfer of pollutants according to the Government Decision 373/2018, the following rules shall apply:
21. the operators referred to in para. (1) shall keep the required records for at least five years;
22. companies, carrying out activities referred to in para. (1) letter (e) for the benefit of operators, shall keep copies of the required records for at least five years.
23. F-gases suppliers shall draw up records and keep them for a minimum of five years, containing relevant information on purchasers of such F-gases, including the following:
24. buyers' certificate numbers, obtained in line with the provisions of the Government Decision 483/2019; and
25. respective quantities of purchased F-gases.
26. Upon request, the records shall be made available to the public authorities in charge for environment protection.
27. Public authorities for environment protection shall ensure the right of access to information in accordance with the provisions of the Government Decision 1467/2016 approving the regulation on public access to environmental information, insofar as the records contain information about the environment.

**Chapter IV**

**PLACING ON THE MARKET AND CONTROL OF USE**

**Section 1.**

**Placing on the market**

1. Restrictions regarding placing on the market
2. Placing on the market of products and equipment referred to in Annex no.3 shall be prohibited, with the exception of military equipment, from the date referred to in this annex, differentiating, as appropriate, subject to the type or global warming potential of the F gases contained.
3. By way of derogation from para. (2) manufacturers or importers may import F gases and gases referred to in Annex no.2, if, while placing on the market they submit, the safety data sheet, according to which the trifluoro methane obtained as by-product during the manufacturing process, including during the production of feedstock for the production thereof, has been destroyed or recovered for subsequent use, in accordance with best available techniques.
4. The Prohibition provided for in Paragraph 1. (1) does not apply to equipment for which it has been provided in the requirements in the area of environmental design measures adopted pursuant to the Government Decision nr. 750/2016 for the approval of regulations regarding the requirements in the area of environmental design applicable to products with an energy impact due to higher energy efficiency during its operation, the emission of CO2-equivalent during the life cycle would be lower than those of equivalent equipment which meets the requirements in the area of relevant environmental design, and does not contain hydrofluorocarbons.
5. Following a justified request from a competent authority, and having regard to the objectives of the present law, the National Agency for the Regulation of Nuclear, Radiological, Chemical Activities in exceptional cases, may allow the importation, marketing and use of F gases, if they are samples for research, activities, development or use for analytical purposes in quality control laboratories of the product, or, in case of specific products and equipment listed in the Annex 3, containing or operating based on F - fluorinated greenhouse gases, where it has been shown that:
6. for a specific product, for a specific equipment or for a specific category of products or equipment, there are no alternatives available or those alternatives cannot be used for technical or safety reasons; or
7. the use of technically feasible and safe alternatives would entail disproportionate costs.
8. Restrictions for companies
9. For the purpose of installing, servicing, maintaining or repairing equipment containing F-gas or operating on the basis of such gas, for which certification is required pursuant to art. 17, F -gas:
10. shall be marketed only to companies holding appropriate certificates;
11. are procured only by these companies or companies that have as employees persons with a certificate of professional competence.
12. Companies which do not carry out activities referred to in paragraph (1), collect, transport or deliver F -gas without certification in accordance with paragraph 1 (1).
13. Non-hermetic equipment loaded with F-gas shall only be sold to the end-user in cases where proof is provided that the installation is carried out by a certified company.

**Section 2**

**Authorization for the import, export, re-export, transit, placing on the market, trading products and equipment containing or operating based on F gas**

1. Issuing Authorizations
2. Import, export, re-export and transit of each consignment of F-gases, as provided in Annex 1, Section 1, as well as products and equipment containing or whose operation is based on such substances, as specified in Annex nr. 3 shall be carried out on the basis of the Authorization for import, export, re-export and transit of F gas provided in Annex no. 1, Section 1, as well as products and equipment containing or whose operation is based on such substances (hereinafter – authorization).
3. The Authorizations hall be issued by the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities.
4. The National Agency for the Regulation of Nuclear, Radiological and Chemical Activities shall issue Authorization for the import, export, re-export and transit of each consignment of F gas specified in Annex no. 1, Section 1, as well as products and equipment containing or whose operation is based on such substances, as specified in Annex no. 3 with a reference value, as specified in Art. 28, and from 2024 for each year according to quotas allocated in accordance with provisions of art.27.
5. In order to obtain the authorization, the company submits the following documents, either on paper, at the issuing authority's premises, or in electronic form, through the Electronic Authorizations One Stop Shop:
6. an application that contains the following information: name, legal organizational form, legal address, TIN of the applicant of the Authorization or, in case of a natural person, its name and surname, address, serial and ID number, TIN, product or equipment which is imported/exported/re-exported (with an indication of the tariff position from the combined Nomenclature of goods), quantity to be imported/exported/re-exported, the country of origin, importer/exporter, the registered office of the beneficiary, the purpose of import/export/re-export;
7. copy of contract between importer and exporter, to which the list and quantity of imported/exported products or equipment are annexed;
8. Safety Data Sheet;
9. copies of invoices for the purchase of goods (invoice) for export/import.
10. Where the operator has submitted the application and the set of documents in electronic format, the issuing authority may request the presentation, at the time of issuance of the Authorization of originals of documents, copies which have been attached to the application submitted remotely, in order to verify the authenticity of those copies.
11. The National Agency for Regulation of Nuclear, Radiological, Chemical Activities, maintains the Register of applications requesting authorizations, as well as the Register of authorizations issued, providing access of the public, including via the internet to the data in the registers referred above in compliance with the requirements laid down by the law on the protection of private data.
12. The Authorizations hall be issued within 10 working days of application submission.
13. The Authorizations hall be issued within 10 working days from the date of application submission.
14. The authorization is issued free of charge and is valid for 90 days.
15. Withdrawal or suspension of authorization
16. The Authorization shall be suspended pursuant to let. (a), para. (2), art. 10 of Law No. 160/2011 on the regulation by authorization of entrepreneurial activity.
17. The Authorization shall be withdrawn pursuant to art. 11 of Law No. 160/2011 on the regulation by authorization of entrepreneurial activity

**Section 3**

**Labelling requirements**

1. Product and equipment labelling and information
2. The placing on the market of the following products and equipment containing or whose operation is based on F gas shall be prohibited, unless the following is labelled:
3. refrigeration equipment;
4. air conditioning equipment;
5. heat pumps;
6. fire protection equipment;
7. electrical switches;
8. aerosol generators containing F-gas, except exact dose inhalers for dispensing pharmaceutical ingredients;
9. all containers with F-gases;
10. solvents based on F -gas;
11. organic Rankine cycles.
12. The label contains the following:
13. the statement that the product or equipment contains F- gas or that its operation is based on such gas;
14. the name accepted by the industry for the F -gas concerned or, where no such name exists, the chemical name;
15. from 1 January 2024, the quantity of F -gas, expressed in weight and in CO2 equivalent, contained in the product or equipment or the quantity of F- gas for which the equipment is intended, and the global warming potential of this gas.
16. The label may be supplemented with the following information, as appropriate:
17. note that F -gas is contained in hermetic equipment;
18. a statement that the electrical switch has a tested leakage rate of less than 0,1% per annum as specified in the manufacturer's technical specifications.
19. The label is clearly visible and indelible in the state language of the Republic of Moldova and is placed:
20. next to the service points for loading or recovering F -gas; or
21. on the part of the product or equipment containing F-gases.
22. Premixed foams and polyols containing F- gas shall not be placed on the market unless F -gas is identified by means of a label containing the following:
23. clearly indicates that the foam or pre-mixed polyol contains F gas;
24. uses the name accepted by the industry or, where such a name is not available, the chemical name;
25. Information on the foam boards is indicated clearly and indelibly.
26. The information referred to in Paragraph 1. (2) and (5) shall be included in the user manuals for such products and equipment.
27. Information on products and equipment containing F-gas with a global warming potential of 150 or more shall also be included in descriptions used for advertising purposes.
28. **F -gas labelling requirements**
29. Regenerated or recycled F -gas shall be labelled with an indication that the substance has been regenerated or recycled and with the information on the batch number and the name and address of the regeneration or recycling facility.
30. F -gas placed on the market for destruction shall be labelled with an indication that the contents of the container can only be destroyed.
31. F -gas placed on the market for direct export shall be labelled with an indication that the contents of the container can only be exported directly.
32. F -gas placed on the market for use in military equipment shall be labelled with an indication that the contents of the container may not be used for any other purpose.
33. F -gas placed on the market for use in the corrosion of semiconductor materials or in the cleaning of chemical vapour deposition chambers in the semiconductor manufacturing sector shall be labelled with an indication that the contents of the container may not be used for any other purpose.
34. F -gas placed on the market for use as feedstock shall be labelled with an indication that the contents of the container may only be used as feedstock.
35. F-gas placed on the market for the production of exact dose inhalers for the distribution of pharmaceutical ingredients shall be labelled with an indication that the contents of the container cannot be used for any other purpose.

**Section 3**

**Control of use**

1. Obligations on control of use
2. The use of sulphur hexafluoride for filling vehicle tires is prohibited.
3. From 1 January 2025 it shall be prohibited to use F -gas with a global warming potential of 2 500 or more to service or maintain refrigeration equipment with a load capacity equal to or greater than 40 tones of CO2 equivalent. The provisions shall not apply to military equipment or equipment intended for applications designed to cool products to temperatures below -50°C.
4. Until 1 January 2030, the prohibition provided for in Paragraph (2) does not apply to the following categories of F -gas:
5. F -gas that have been recycled, have a global warming potential of 2 500 or more and are used to service or maintain existing refrigeration equipment, provided that they are properly labelled in accordance with art. 21 para. (1);
6. F- gas that has been recycled, has a global warming potential of 2 500 or more and is used to service or maintain existing refrigeration equipment, provided the recovery from such equipment. These recycled gases may only be used by the company which has conducted the recovery in the course of maintenance or service activities or by the company for which the recovery was conducted in the course of maintenance or service activities.
7. Preloading of equipment with hydrofluorocarbons
8. From 1 January 2024, refrigeration, air conditioning and heat pumps loaded with hydrofluorocarbons shall be placed on the market provided that the hydrofluorocarbons loaded in those equipment are accounted for in the quota system referred to in Chapter V.
9. When placing on the market the preloaded equipment referred to in Paragraph 1), manufacturers and importers of equipment are insured with the authorization obtained in accordance with the provisions of art.21.
10. When placing on the market the preloaded equipment referred to in Paragraph 1), manufacturers and importers of equipment fill in in accordance with the customs declaration.
11. From 1 January, 2024, where the hydrofluorocarbons contained in the equipment have not been placed on the market before loading the equipment by 31 March each year, importers of such equipment shall submit a report on the accuracy of the documentation to the Environmental Protection Inspectorate.
12. Manufacturers and importers of equipment referred to in Paragraph 1) keep the report and the copy of the customs declaration for a period of at least five years after placing the equipment on the market.
13. Importers of equipment placing preloaded equipment on the market where the hydrofluorocarbons contained in such equipment were not placed on the market prior to loading of the equipment shall be registered in accordance with art. 28 para. (1) letter (e).

**Chapter V**

RESTRICTION OF THE QUANTITY OF HYDROFLUOROCARBONS PLACED ON THE MARKET

**Section 1.**

1. **Restriction of the quantity of hydrofluorocarbons placed on the market**
2. The National Agency for Regulation of Nuclear, Radiological, Chemical Activities, starting in the year 2024, assigns a quantity of hydrofluorocarbons that producers and importers are entitled to place on the market of the Republic of Moldova each year, which shall not exceed the maximum amount for the year in question, calculated in accordance with Schedule 5.
3. Manufacturers and importers shall ensure that the quantity of hydrofluorocarbons calculated in accordance with Annex no.5 which each of them places on the market does not exceed the quota allocated to them pursuant to Article 28 (9) or transferred to them pursuant to art. 30.
4. This article shall not apply to producers or importers of less than 100 tonnes of CO2 equivalent of hydrocarbons per year.
5. This article shall also not apply to the following categories of hydrofluorocarbons:
6. imported hydro-fluorocarbons to be destroyed;
7. hydro-fluorocarbons used by a manufacturer in applications with feedstock or supplied directly to companies by a manufacturer or by an importer for use in applications with feedstock;
8. hydrofluorocarbons supplied directly to companies by a producer or importer for export outside the country;
9. hydrofluorocarbons supplied directly by a manufacturer or importer for use in military equipment;
10. hydrofluorocarbons supplied directly by a manufacturer or importer to a company using them for the corrosion of semiconductor materials or for the cleaning of chemical vapour deposition chambers in the semiconductor manufacturing sector;
11. from 1 January 2024, hydrofluorocarbons supplied directly by a manufacturer or an importer to an undertaking producing exact-dose inhalers for the distribution of pharmaceutical ingredients.
12. The provisions on the restriction of the quantity of hydrofluorocarbons shall also apply to hydrofluorocarbons contained in premixed polyols.
13. **Allocation of quotas for the placing of hydrofluorocarbons on the market**
14. By 31 October 2023, the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities shall establish a reference value on the basis of the average annual quantities of hydrofluorocarbons that the manufacturer or importer has reported placing on the market for the period 2020 to 2022.
15. The reference values shall be calculated in accordance with Annex no.5.
16. Allocation of quotas for the import, export, re-export and transit of each consignment of F -gas specified in Annex no. 1, Section 1, as well as products and equipment containing or whose operation is based on such substances, as specified in Annex no. 3 the placing on the market of hydrofluorocarbons is carried out on the basis of the procedure established by Government Decision 589/2018 for the approval of the regulation on the establishment of the mechanism for the allocation of annual quotas for the import of halogenated hydrochlorofluorocarbons.
17. Producers and importers who have not reported the introduction of hydrofluorocarbons on the market for the reference period referred to in Paragraph. (1) may declare their intention to place hydrofluorocarbons on the market in the following year.
18. The declaration is addressed to the Commission in accordance with the provisions of Government Decision 589/2018, specifying the types of hydrofluorocarbons and the quantities expected to be placed on the market. The commission shall publish a notice on the deadline for the submission of such declarations.
19. Before submitting a declaration in accordance with paragraphs 4 and 5 of this article, companies shall be registered in the Register referred to in Article 13 (1). 29.
20. By 31 October 2023 and every four years thereafter, the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities shall recalculate the reference values for the producers and importers referred to in Paragraph 1. (1) and (4) of this article, on the basis of the annual quantities of hydrofluorocarbons legally placed on the market during the period 2020 to 2022, reported in accordance with art.33, for available years.
21. Producers and importers for whom reference values have been determined may declare additional quantities they anticipate in accordance with the procedure laid down in paragraph 4.
22. The National Agency for the Regulation of Nuclear, Radiological and Chemical activities shall assign to each producer and importer the quotas for the placement on the market of hydrofluorocarbons for each year stating from 2024, applying the allocation mechanism set out in Annex no. 6.

**Section 2**

**Keeping track and transfer of quotas**

1. **Register**
2. By 1 January 2024, an electronic register of quotas for placing hydrofluorocarbons on the market (hereinafter –the Register) shall be established and maintained.
3. Registration in the register is mandatory for the following categories:
4. producers and importers who were allocated a marketing share for hydrofluorocarbons in accordance with art. 28 para. (9);
5. companies to which a share has been transferred in accordance with art. 30;
6. producers and importers declaring their intention to file a declaration in accordance with art. 28 para. (4);
7. producers and importers supplying hydrofluorocarbons or companies receiving hydrofluorocarbons for the purposes listed in art. 27 para. (4) lit. (a) - (f);
8. importers of equipment placing preloaded equipment on the market where the hydrofluorocarbons contained in the equipment were not placed on the market prior to loading of such equipment in accordance with art. 26.
9. Registration is made by means of an application addressed to the Commission in accordance with the provisions of Government Decision 589/2018 for the approval of the regulation on the establishment of the mechanism for the allocation of annual quotas for the import of halogenated hydrochlorofluorocarbons.
10. The National Agency for the Regulation of Nuclear, Radiological and Chemical Activities shall ensure that registered producers and importers are informed through the Register regarding allocated quotas and of any changes to them during the allocation period.
11. **Transfer of quotas and Authorization for the use of quotas for the placement on the market of hydrofluorocarbons in imported equipment**
12. Any producer or importer for which a reference value has been determined in accordance with art. 28 para. (1) or (7) and to whom a quota has been allocated in accordance with art. 28 para. (9) may transfer in the Register referred to in art. 29 para. (1) that quota for all or any of the quantities to another producer or importer in the Republic of Moldova.
13. Any producer or importer that has received a quota pursuant to art. 28 (1) and (7), or to whom a quota has been transferred pursuant to Paragraph 1 of this article, may authorize another company to use its quota within the meaning of art. 26.
14. Any producer or importer which received its quota solely on the basis of a declaration pursuant to art.28 para. 4. may authorize another company to use its quota within the meaning of art. 26 only provided that the authorizing producer or importer actually supplies the appropriate quantities of hydrofluorocarbons.

**Chapter VI**

**INFORMATION AND REPORTING**

1. **Public information**
2. Public environment protection authorities provide information to the public and interested institutions on:
3. technologies that serve to replace and reduce the use of F- gas;
4. information received from gas producers, importers and exporters of F -gas;
5. certificates of professional competence of natural or legal entities who effectively control the technical operation of products and equipment containing or whose operation is based on F -gas;
6. information on the placement on the market of products and equipment containing or operating on the basis of F -gas;
7. the quotas allocated to each producer and importer for the placement on the market of hydrofluorocarbons for each year from 2024.
8. The information shall be made available to the public free of charge through any easily accessible media and shall be placed on the official website of the public authority for Environmental Protection.
9. **International cooperation**

The Republic of Moldova cooperates with neighboring states through the exchange of information on scientific and technical research and development in order to improve the means that facilitate the reduction of F -gas emissions.

1. **Reporting**
2. By 31 March 2024 and each year after that date, each company which has destroyed one metric ton or 1000 tones of CO2 equivalent or more of F-gases and gases listed in Annex 2 during the previous calendar year, shall report to the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities the data specified in Annex 7 for each of these substances for that calendar year.
3. By March 31, 2024 and each year thereafter, each company that used 1 000 tones of CO2 equivalent or more of F-gases as feedstock during the preceding calendar year shall report to the National Agency for the Regulation of the Nuclear, Radiological, Chemical Activities the data provided in the Annex 7 for each of these substances for that calendar year.
4. By 31 March 2024 and each year after that date, each company which has destroyed one metric ton or 1000 tones of CO2 equivalent or more of F-gases and gases listed in Annex 2 during the previous calendar year shall report to the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities the data specified in Annex 7 for each of these substances for that calendar year.
5. The National Agency for the Regulation of Nuclear, Radiological and Chemical Activities issues authorization for the placing on the market of hydrofluorocarbons for each year starting from 2024, according to the quotas allocated by the Ministry of Agriculture, Regional Development and Environment provided for by art. 27.
6. Each producer and importer of the quotas allocated for the placing on the market of hydrofluorocarbons shall submit annually, by 15 February, to the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities the report (Form "1-ozone").
7. Each importer of equipment placing preloaded equipment on the market for which the hydrofluorocarbons contained in such equipment have not been placed on the market prior to loading of the equipment shall submit annually, by 15 February, to the National Agency for the Regulation of Nuclear, Radiological and Chemical Activities the report (Form '1-ozone').

**Chapter VII**

**COMPETENCE FOR CARRYING OUT CONTROL.**

**LIABILITY FOR VIOLATION OF THE LEGISLATION ON FLUORINATED GREENHOUSE GASES**

1. Control measures
2. State control in the area of F-gases emission reduction is exercised by the Customs Service and the Environmental Protection Inspectorate and is carried out to ensure compliance with the relevant legislation, inspection of the placement on the market of F-gases and compliance with environmental protection measures.
3. In case of non-compliance with obligations in the field of F-gases emission reduction, Inspectorate for Environmental Protection is entitled to apply sanctions within the limits established by the Contravention Code of the Republic of Moldova and to calculate the damage caused to the environment.
4. Liability for violation of legislation in the field of F -gas emission reduction

Failure to comply with the provisions of this law and the normative acts approved under this law shall entail, as the case may be, contravention civil or criminal liability, according to the law.

**Chapter VIII**

**FINAL AND TRANSITIONAL PROVISIONS**

1. Final provisions
2. This law enters into force from the date of publication in the Official Gazette of the Republic of Moldova.
3. Government:

a) within 12 months of the publication of this law, shall develop the normative framework related to this law;

b) within 6 months of the entry into force of this law:

- shall develop and present to Parliament proposals for bringing the normative acts in accordance with this law;

- shall bring its normative acts in accordance with this law;

- shall adopt the normative acts necessary for the execution of this law.

1. Transitional provisions

On the date of entry into force of the Kigali Amendment of the Montreal Protocol for the progressive reduction of the use of hydrofluorocarbons worldwide from 15.10.2016, the provisions of art.21 para. (3) and Chapter V of this law shall enter into force.

Annex 1

to the law on fluorinated greenhouse gases

**FLUORINATED GREENHOUSE GASES**

|  |  |  |  |
| --- | --- | --- | --- |
| **Substance** | | | **GWP (1)** |
| **Industrial name** | **Chemical name**  **(Common name)** | **Chemical formula** |
| **Section 1: Hydrofluorocarbons (HFCS)** | | | |
| HFC-23 | trifluoro methane  (fluoroform) | CHF3 | 12 400 |
| HFC-32 | difluoromethane | CH2F2 | 677 |
| HFC-41 | fluoromethane  (methyl fluoride) | CH3F | 116 |
| HFC-125 | pentafluoroethane | CHF2CF3 | 3170 |
| HFC-134 | 1,1,2,2-tetrafluoroethane | CHF2CHF2 | 1 120 |
| HFC-134a | 1,1,2,2-tetrafluoroethane | CH2FCF3 | 1 300 |
| HFC-143 | 1,1,2-trifluorethane | CH2FCHF2 | 328 |
| HFC-143a | 1,1,1-trifluorethane | CH3CF3 | 4 800 |
| HFC-152 | 1,2-difluoroethane | CH2FCH2F | 16 |
| HFC-152a | 1,1-difluoroethane | CH3CHF2 | 138 |
| HFC-161 | fluoroethane  (ethyl fluoride) | CH3CH2F | 4 |
| HFC-227ea | 1,1,1,2,3,3,3-heptafluoropropane | CF3CHFCF3 | 3 350 |
| HFC-236cb | 1,1,1,2,2,3-hexafluoropropane | CH2FCF2CF3 | 1 210 |
| HFC-236ea | 1,1,1,2,3,3-hexafluoropropane | CHF2CHFCF3 | 1 330 |
| HFC-236fa | 1,1,1,3,3,3-hexafluoropropane | CF3CH2CF3 | 8 060 |
| HFC-245ca | 1,1,2,2,3-pentafluoropropane | CH2FCF2CHF2 | 716 |
| HFC-245fa | 1,1,1,3,3-pentafluoropropane | CHF2CH2CF3 | 858 |
| HFC-365 mfc | 1,1,1,3,3-pentafluorobutane | CF3CH2CF2CH3 | 804 |
| HFC-43-10 mee | 1,1,1,2,2,3,4,5,5,5-decafluoropentane | CF3CHFCHFCF2CF3 | 1 650 |
| **Section 2: Perfluorocarbons (PFCs)** | | | |
| PFC-14 | tetrafluoromethane  (carbon perfluorometantetrafluoride) | CF4 | 6630 |
| PFC-116 | hexafluoroethane  (perfluoroethane) | C2F6 | 11100 |
| PFC-218 | octafluoropropane  (perfluoropropane) | C3F8 | 8 900 |
| PFC-31-10  (R-31-10) | decafluorobutane  (perfluorobutane) | C4F10 | 9 200 |
| PFC-41-12  (R-41-12) | dodecafluoropentane  (perfluoropentane) | C5F12 | 8 550 |
| PFC-51-14  (R-51-14) | tetradecafluorohexane  (perfluorohexane) | C6F14 | 7 910 |
| PFC-c-318 | octafluorocyclobutane  (perfluorcyclobutane) | c-C4F8 | 9 540 |
| **Section 3: other perfluorinated compounds** | | | |
|  | sulphur hexafluoride | SF6 | 22 800 |

***Note:***

(1) On the basis of the fourth assessment report approved by the Intergovernmental climate change group, unless otherwise provided for.

Annex 2

to the law on fluorinated greenhouse gases

**OTHER FLUORINATED GREENHOUSE GASES SUBJECT TO THE REPORTING OBLIGATION IN ACCORDANCE WITH ART. 33**

|  |  |  |
| --- | --- | --- |
| **Substance** | | **GWP (1)** |
| **Common name/industrial name** | **Chemical formula** |
| **Section 1: Hydro(chlorine)fluorocarbons unsaturated** | | |
| HFC-1234yf | CF3CF = CH2 | 4 Fn (2) |
| HFC-1234ze | trans – CHF = CHCF3 | 7 Fn 2 |
| HFC-1336mzz | CF3CH = CHCF3 | 9 |
| HCFC-1233zd | C3H2ClF3 | 4.5 |
| HCFC-1233xf | C3H2ClF3 | 1Fn (3) |
| **Section 2: Fluorinated ethers and alcohols** | | |
| HFE-125 | CHF2OCF3 | 14 900 |
| HFE-134 (HG-00) | CHF2OCHF2 | 6 320 |
| HFE-143a | CH3OCF3 | 756 |
| HCFE-235da2 | CHF2OCHClCF3 | 350 |
| HFE-245cb2 (isofluorane) | CH3OCF2CF3 | 708 |
| HFE-245fa2 | CHF2OCH2CF3 | 659 |
| HFE-254cb2 | CH3OCF2CHF2 | 359 |
| HFE-347 mcc3 (HFE-7000) | CH3OCF2CF2CF3 | 575 |
| HFE-347pcf2 | CHF2CF2OCH2CF3 | 580 |
| HFE-356pcc3 | CH3OCF2CF2CHF2 | 110 |
| HFE-449sl (HFE-7100) | C4F9OCH3 | 297 |
| HFE-569sf2 (HFE-7200) | C4F9OC2H5 | 59 |
| HFE-43-10pccc124 (H-Galden 1040x) HG-11 | CHF2OCF2OC2F4OCHF2 | 1 870 |
| HFE-236ca12 (HG-10) | CHF2OCF2OCHF2 | 2 800 |
| HFE-338pcc13 (HG-01) | CHF2OCF2CF2OCHF2 | 1 500 |
| HFE-347mmy1 | (CF3)2CFOCH3 | 343 |
| 2, 2, 3, 3, 3 - pentafluoropropanol | CF3CF2CH2OH | 42 |
| bis (trifluoromethyl) - methanol | (CF3)2CHOH | 195 |
| HFE-227ea | CF3CHFOCF3 | 1 540 |
| HFE-236ea2 (desfluorane) | CHF2OCHFCF3 | 989 |
| HFE-236fa | CF3CH2OCF3 | 487 |
| HFE-245fa1 | CHF2CH2OCF3 | 286 |
| HFE 263fb2 | CF3CH2OCH3 | 11 |
| HFE-329 mcc2 | CHF2CF2OCF2CF3 | 919 |
| HFE-338 mcf2 | CF3CH2OCF2CF3 | 552 |
| HFE-338mmz1 | (CF3)2CHOCHF2 | 380 |
| HFE-347 mcf2 | CHF2CH2OCF2CF3 | 374 |
| HFE-356 mec3 | CH3OCF2CHFCF3 | 101 |
| HFE-356mm1 | (CF3)2CHOCH3 | 27 |
| HFE-356pcf2 | CHF2CH2OCF2CHF2 | 265 |
| HFE-356pcf3 | CHF2OCH2CF2CHF2 | 502 |
| HFE 365 mcf3 | CF3CF2CH2OCH3 | 11 |
| HFE-374pc2 | CHF2CF2OCH2CH3 | 557 |
|  | - (CF2)4CH (OH) - | 73 |
| **Section 3: other perfluorinated compounds** | | |
| perfluoropolymethylpropylether (PFPMIE) | CF3OCF(CF3)CF2OCF2OCF3 | 10 300 |
| nitrogen trifluoride | NF3 | 17 200 |
| sulphur-trifluoromethyl pentafluoride | SF5CF3 | 17 700 |
| perfluorcyclopropane | c-C3F6 | 17 340Fn(4) |

***Note:***

(1) On the basis of the fourth assessment report approved by the Intergovernmental climate change group, unless otherwise provided for.

(2) GWP in accordance with the 2010 Evaluation report of the Montreal Protocol scientific evaluation group, Tables 1 to 11, citing two *peer-review* scientific references. <http://ozone.unep.org/Assessment_Panels/SAP/Scientific_Assessment_2010/index.shtml>

(3) Standard value, the global warming potential is not yet available.

(4) Minimum value according to the fourth assessment report approved by the Intergovernmental climate change group.

Annex 3

to the law on fluorinated greenhouse gases

**PROHIBITIONS RELATED TO THE PLACING ON THE MARKET**

|  |  |  |
| --- | --- | --- |
| **Products and equipment**  **If necessary, the GWP of mixtures containing fluorinated greenhouse gases shall be calculated in accordance with annex no. 4, according to the provisions of art. 3 p. *Global Warming Potential (GWP)*** | | **Date of prohibition** |
| |  |  | | --- | --- | | 1. | Disposable containers for fluorinated greenhouse gases used to service, maintain or fill refrigeration, air conditioning equipment or heat pumps, fire protection systems or switches or systems for use as solvents | | | 1 January 2024 |
| |  |  | | --- | --- | | 2. | Open direct evaporation systems containing HFCS and PFCs as refrigerants | | | 1 January 2024 |
| |  |  | | --- | --- | | 3. | Fire protection equipment | | containing PFCs | 1 January 2024 |
| containing HFC-23 | 1 January 2024 |
| |  |  | | --- | --- | | 4. | Household windows containing fluorinated greenhouse gases | | | 1 January 2024 |
| |  |  | | --- | --- | | 5. | Other windows containing fluorinated greenhouse gases | | | 1 January 2024 |
| |  |  | | --- | --- | | 6. | Footwear containing fluorinated greenhouse gases | | | 1 January 2024 |
| |  |  | | --- | --- | | 7. | Tires containing fluorinated greenhouse gases | | | 1 January 2024 |
| |  |  | | --- | --- | | 8. | Single-component foams, unless required to comply with national safety standards, containing fluorinated greenhouse gases with a global warming potential of 150 or more | | | 1 January 2024 |
| |  |  | | --- | --- | | 9. | Aerosol dispensers marketed and intended for sale to the general public for entertainment and decoration purposes, as listed in point 40 of Annex XVII to the Regulation (EC) no. 1000/2003, 1907/2006 and signal horns containing HFCs with a global warming potential of 150 or more | | | 1 January 2024 |
| |  |  | | --- | --- | | 10. | Household refrigerators and freezers containing HFCs with a global warming potential of 150 or more | | | 1 January 2024 |
| |  |  | | --- | --- | | 11. | Commercial refrigerators and freezers (hermetically sealed equipment) | | containing HFCs with global warming potential of 2 500 or more | 1 January 2024 |
| containing HFCs with global warming potential of 150 or more | 1 January 2024 |
| |  |  | | --- | --- | | 12. | Stationary refrigeration equipment containing or whose operation relies on HFCs with a global warming potential of 2 500 or more, except for equipment intended for product cooling applications below -50 C | | | 1 January 2024 |
| |  |  | | --- | --- | | 13. | Multi-module centralized refrigeration systems for commercial use with a rated capacity of 40 kW or more that contain, or whose operation relies upon fluorinated greenhouse gases with a global warming potential of 150 or more except for the primary circuit of cascade refrigeration systems in which fluorinated greenhouse gases with a global warming potential of less than 1 500 can be used | | | 1 January 2025 |
| |  |  | | --- | --- | | 14. | Mobile indoor air conditioning equipment (hermetically sealed equipment which can be moved from one room to another by the final user), containing HFCs, having global warming potential of 150 or more. | | | 1 January 2024 |
| |  |  | | --- | --- | | 15. | Mono split air conditioning systems containing less than 3 kg of fluorinated greenhouse gases containing or relying in their operation on fluorinated greenhouse gases with a global warming potential of 750 or more | | | 1 January 2025 |
| |  |  | | --- | --- | | 16. | Foams containing HFCs having a global warming potential of 150 or more, unless required to meet national safety standards | | Extruded polystyrene (XPS) | 1 January 2024 |
| Other foams | 1 January 2024 |
| |  |  | | --- | --- | | 17. | Technical aerosols containing HFCs having a global warming potential of 150 or more, unless required to meet national safety standards or for medical applications | | | 1 January 2024 |

Annex 4

to the law on fluorinated greenhouse gases

**METHOD FOR CALCULATING GWP POTENTIAL**

The GWP of a mixture shall be calculated as a weighted average derived from the sum of the mass fractions of each substance multiplied by their global warming potential, unless otherwise specified, including substances that are not fluorinated greenhouse gases.

**∑** (Substance X % × GWP)+(substance Y % × GWP)+(substance N % × GWP

Where % is weighting factor with a weight tolerance of + / -1%.

For example: applying the formula to a gas mixture consisting of 60% dimethyl ether, 10% HFC-152A and 30 % isobutane:

→ Total GWP = 13.9

The global warming potential of the following non-fluorinated substances is used to calculate the global warming potential of the mixtures. For other substances not listed in this annex, a standard 0 value shall apply.

|  |  |  |  |
| --- | --- | --- | --- |
| **Substance** | | | **GWP (1)** |
| **Common name** | **Industrial name** | **Chemical formula** |
| methane |  | CH4 | 25 |
| nitrous oxide |  | N2O | 298 |
| dimethyl ether |  | CH3OCH3 | 1 |
| methylene chloride |  | CH2Cl2 | 9 |
| methylene chloride |  | CH3Cl | 13 |
| chloroform |  | CHCl3 | 31 |
| ethane | R-170 | CH3CH3 | 6 |
| propane | R-290 | CH3CH2CH3 | 3 |
| butane | R-600 | CH3CH2CH2CH3 | 4 |
| isobutane | R-600a | CH(CH3)2CH3 | 3 |
| pentane | R-601 | CH3CH2CH2CH2CH3 | 5(2) |
| isopentane | R-601a | (CH3)2CHCH2CH3 | 5 (2) |
| ethoxyethane (diethyl ether) | R-610 | CH3CH2OCH2CH3 | 4 |
| methyl formate | R-611 | HCOOCH3 | 25 |
| hydrogen | R-702 | H2 | 6 |
| ammonia | R-717 | NH3 | 0 |
| ethylene | R-1150 | C2H4 | 4 |
| propylene | R-1270 | C3H6 | 2 |
| cyclopentane |  | C5H10 | 5 (2) |

***Note:***

(1) On the basis of the fourth assessment report approved by the Intergovernmental climate change group, unless otherwise provided for.

(2) Substance not listed in the fourth assessment report adopted by the Intergovernmental climate change group, standard value based on GWP of other hydrocarbons.

Annex 5

to the law on fluorinated greenhouse gases

**CALCULATION OF THE MAXIMUM QUANTITY, REFERENCE VALUES AND QUOTAS FOR THE PLACING ON THE MARKET OF HYDROFLUOROCARBONS**

The maximum quantity provided for in art. 27 para. (1) shall be calculated by applying the following percentages to the annual average of the total quantity placed on the market of the Republic of Moldova in the period 2024-2028. With effect from 31 October 2023, the maximum quantity provided for in Article 27 para. (1) shall be calculated by applying the following percentages to the annual average of the total quantity placed on the market to the Republic of Moldova during 2020-2022 and then decreasing the quantities for exempted uses in accordance with Article 27 para. (2), based on the available data.

|  |  |
| --- | --- |
| **Years** | **Percentage for calculating the maximum quantity of hydrofluorocarbons to be placed on the market and the corresponding quotas** |
| 2024-2028 | freezing consumption at 100% of baseline consumption (1) |
| 2029-2034 (stage I) | 90% of basic level consumption |
| 2035-2039 (stage II) | 70% of basic level consumption |
| 2040-2044 (stage III) | 50% of basic level consumption |
| 2045 and beyond (stage IV) | 20% of basic level consumption |

**Note:** (1)  - estimation of the base level (production/use of HFCs) as average of years 2020, 2021, 2022 + 65% of base level (production/use) of HCFCs;

The maximum quantity, reference values and quotas for the placing on the market of hydrofluorocarbons referred to in articles 27 and 28 shall be calculated as cumulative quantities of all types of hydrofluorocarbons, expressed in tonnes of CO2 equivalent.

Calculation of the reference values and quotas for the placing on the market of hydrofluorocarbons provided for in art. 27 and 28 shall be based on the quantities of hydrofluorocarbons which producers and importers have placed on the market of the Republic of Moldova during the reference period or allocation period, but shall exclude the quantities of hydrofluorocarbons intended for the use as provided for in art. 27 para. (3) and (4) during the same period, on the basis of available data.

Annex 6

to the law on fluorinated greenhouse gases

**ALLOCATION MECHANISM PROVIDED FOR IN ARTICLE 28**

1. Determination of the amount to be allocated to undertakings for which a reference value has been established in accordance with art. 28.

Each undertaking for which a reference value has been established shall receive a share corresponding to a proportion of 89% of the reference value multiplied by the percentage indicated in Annex 5 for that year.

2. Determination of the amount to be allocated to undertakings that have filed a declaration in accordance with art. 28 para. (5)

The amount of quotas allocated in accordance with point 1 shall be subtracted from the maximum quantity for a given year set out in Annex 5 to determine the quantity to be allocated to undertakings for which a reference value has not been established and which have filed a declaration in accordance with art. 28 para. (5) (the quantity to be allocated in step 1 of the calculation).

**2.1. Step 1 of the calculation**

Each undertaking shall receive an allocation corresponding to the quantity requested in its declaration, but not greater than a proportional share of the quantity allocated in Step 1.

The proportional share shall be calculated by dividing 100 by the number of undertakings that have filed a declaration. The amount of quotas allocated in step 1 shall be subtracted from the quantity to be allocated in step 1 in order to determine the quantity to be allocated in step 2.

**2.2. Step 2 of the calculation**

Each undertaking which has not obtained 100% of the quantity requested in its declaration at step 1 shall receive an additional allocation corresponding to the difference between the quantity requested and the quantity obtained at step 1. However, this shall not exceed the proportional share of the quantity to be allocated in step 2.

The proportional share shall be calculated by dividing 100 by the number of undertakings eligible for an allocation in step 2. The amount of quotas allocated in step 2 shall be subtracted from the quantity to be allocated in step 2 in order to determine the quantity to be allocated in step 3.

**2.3. Step 3 of the calculation**

Step 2 shall be repeated until all requests are met or until the remaining amount to be allocated in the next step is less than 500 tonnes of CO2 equivalent.

Determination of the amount to be allocated to undertakings that have filed a declaration in accordance with art. 28 para. (9)

For the allocation of the quotas for 2024-2028, the amount of quotas allocated in accordance with points 1 and 2 shall be subtracted from the maximum quantity for a given year set out in Annex 5 to determine the quantity to be allocated to undertakings to which a reference value has been set and which have submitted a declaration pursuant to art. 28 para. (9).

The allocation mechanism set out in points 2.1 and 2.2 shall apply.

For the allocation of quotas for 2024 and every year thereafter, enterprises that have filed a declaration under art. 28 para. (8) shall be treated in the same way as undertakings which have submitted a declaration pursuant to art. 28 para. (4).

Annex 7

to the law on fluorinated greenhouse gases

**DATA TO BE REPORTED IN ACCORDANCE WITH ARTICLE 33**

1. Each manufacturer, as provided for in art. 33 para. (1), shall report data on:
2. the quantities of each destroyed substance set out in Annexes 1 and 2, including the quantities of those substances contained in products or equipment;
3. stocks of each substance set out in Annexes 1 and 2, waiting to be destroyed, including the quantities of those substances contained in products or equipment;
4. the technology used for the destruction of the substances referred to in Annexes 1 and 2.
5. Each undertaking provided for in art. 33 para. (2) shall report data on the quantities of each substance listed in Annex 1 used as a synthesis intermediate.
6. Each undertaking, as provided for in art. 33 para. (1), shall report data on:
7. the categories of products or equipment containing substances set out in Annexes 1 and 2;
8. the number of units;
9. the quantities of each substance set out in Annex 1 contained in products or equipment.