

(Text in force on: 16/5/2014)

Decree of 4 September 1969 implementing sections 16, 17, 19 (1) and 21 of the Nuclear Energy Act

We JULIANA, by the grace of God Queen of the Netherlands, Princess of Orange-Nassau, etc., etc., etc.

On the recommendation of Our Minister of Economic Affairs and Our Minister of Social Affairs and Health of 8 May 1968, no. 668/372 W.J.A., made in agreement with Our Minister of Transport, Public Works and Water Management, having heard the Central Council for Nuclear Energy; Having regard to sections 16, 17, 19 (1), 21, 26, 73 and 76 (1) of the Nuclear Energy Act (*Stb.* 1963, 82); Having heard the Council of State (advisory opinion no. 42 of 10 July 1968); Having seen the further report of our Minister of Economic Affairs and the State Secretary for Social Affairs and Health of 3 September 1969, no. 669/609 W.J.A., published in agreement with Our Minister of Transport, Public Works and Water Management;

Have approved and decreed:

Chapter I. Introductory provisions

Article 1

In this Decree and the provisions based upon it the following terms are defined as follows:

spent fuel management: all activities that relate to the handling, pretreatment, treatment, conditioning, storage or disposal of spent fuel, excluding off-site transportation;

source: fissile material or ore;

beyond-design-basis accident: an accident whose probability of occurrence is smaller than each of the postulated initiating events, where the possibility cannot be excluded that the release of fissile materials or radioactive materials as a result of such an occurrence may cause the limit values for postulated initiating events specified in article 18 to be exceeded;

content: mass percentage of the elements uranium, thorium and plutonium in nuclear fuel;

postulated initiating events: incidents which may reasonably be expected to occur and which, if the specially designed safety systems function properly, will result in foreseeable operating consequences or accident conditions that can cause contamination or environmental exposure;

dangerous substances: dangerous substances as referred to in article 1 (b) of the Major Accidents (Risks) Decree 1999;

practice: a practice as referred to in section 15 of the Act, other than transporting, holding in storage for the purpose of transport, or importing into or exporting from the territory of the Netherlands of fissile materials or ores, other than in the case of an intervention, accident or radiological emergency;

high-activity source: sealed source containing a radionuclide whose activity exceeds a value that is equal to or higher than the activity level applicable to that source pursuant to article 3 (1) of the Radiation Protection Decree;

sealed source: fissile materials or ores that are either embedded in or bonded to a bonding material in solid form or sheathed, provided always that either the bonding material or the sheath, as the case may be, is sufficiently strong in normal conditions to prevent any dispersal of fissile materials or ores;

member of the public: any individual from the population inside or outside a given site, other than an employee during his working hours or a person undergoing a radiological procedure;

location: a facility or apparatus as referred to in section 15 (b) or (c) of the Act or as designated pursuant to section 1.1 (3) of the Environmental Management Act, or a site where a practice is carried out;

natural uranium: chemically separated uranium containing the naturally occurring distribution of uranium isotopes;

nuclear pressure equipment: pressure equipment which is specially designed for nuclear use in facilities as referred to in section 15 (b) of the Act and which can, if defective, cause the dispersal of radioactivity, with the exception of fuel rods and storage and transport packaging;

undertaking: the natural or legal person under whose responsibility a practice or activity is carried out;

decommissioning plan: plan describing how a facility as referred to in section 15 (b) of the Act is to be decommissioned and dismantled;

Our Minister: Our Minister of Economic Affairs, Agriculture and Innovation;

waste containing fissile material or ore: fissile material or ore which is designated as such pursuant to article 19 of this Decree in conjunction with article 38 (1) and (2) of the Radiation Protection Decree, and which is not discharged;

spent fuel: nuclear fuel that has been irradiated in and permanently removed from a reactor core;

degree of enrichment: mass percentage of uranium-235 and uranium-233 together in enriched uranium;

enriched uranium: uranium with a greater mass percentage of uranium-235 than occurs in natural uranium;

Act: Nuclear Energy Act.

2. In this Decree and the provisions based on it, the terms 'activity', 'exposure', 'expert', 'effective dose', 'final disposal', 'equivalent dose', 'health detriment', 'ambient dose equivalent', 'radiotoxicity equivalent', '2011/77 Euratom Directive', 'damage', 'work' and 'Act' have the same meaning as in article 1 (1) of the Radiation Protection Decree.
3. In this Decree and the provisions based on it, the terms 'contamination', 'discharge into the air', 'discharge into the public sewer' and 'discharge into surface waters' have the same meaning as in article 1 (1) of the Radiation Protection Decree, provided always that the term 'radioactive materials' will in each case be read as 'fissile materials or ores'.
4. In this Decree and the provisions based on it, the term 'member of the public' has the same meaning as in article 1 (1) of the Radiation Protection Decree, provided always that the term 'location' has the meaning given to it in article 1 (1) of this Decree.
5. In this Decree and the provisions based on it, the term 'holding' includes producing, processing, handling and storage.
6. In this Decree and the provisions based on it, the terms 'pressure vessels', 'piping', 'safety accessories' and 'pressure accessories' have the meanings given to them in the Pressure Equipment (Commodities Act) Decree.

Article 1a

The percentages of uranium, plutonium or thorium present in fissile materials as referred to in section 1 (1) (b) of the Act are one tenth, one tenth and three respectively, calculated by weight.

Article 2

This Decree does not apply to the transport, holding in storage for the purpose of transport, or importing into or exporting from the territory of the Netherlands of fissile materials or ores.

Chapter II. Applications for licences

§ 1. General provisions

Article 3

1. An application for a licence for practices within a facility as referred to in section 15 (b) of the Act or as designated pursuant to section 1.1 (3) of the Environmental Management Act (*Wet milieubeheer*) must be lodged by the person operating the facility.
2. An application as referred to in paragraph 1 does not relate to the practices carried out by a person in possession of a licence to engage in such practices at ever changing places.
3. The application must contain:
 - a) the name and address of the applicant;
 - b) a factual description of what the applicant wishes to do with relevant fissile materials or ores or, as the case may be, a description of the facility or apparatus concerned, indicating the use which the applicant wishes to make of said facility or apparatus;
 - c) in so far as one or more of the provisions of articles 4 to 11 are applicable to the relevant application, the data which the application should contain specifically for that purpose or, if such data are contained in an appendix to the application, a brief indication of the nature and content of such data, together with a reference to the relevant appendix;
 - d) a statement of the length of time for which the licence is desired;
 - e) if a licence is requested for a practice that has been announced as justified in the regulation applicable pursuant to article 19 in conjunction with article 4 (2) of the Radiation Protection Decree, a reference to that announcement;
 - f) if a licence is requested for a practice that has not been announced or has been announced as not justified in the regulation applicable pursuant to article 19 in conjunction with article 4 (2) of the Radiation Protection Decree, a request for justification of that practice and also the data on the economic, social and other benefits of the practice concerned and on the health detriment that may be caused by the practice, which are necessary in order to assess the justification of the practice.
4. Applications for a licence which are covered by different provisions of parts 2 and 3 may be lodged in the form of a single, combined application in so far as they relate to the same facility or to facilities which together form a whole and are located in each other's close proximity. All provisions that relate to the individual applications of which such an application is composed will apply to it, provided always that in cases where unrestricted application of these provisions would result in multiple statements of the same data, the data need be stated only once.
5. If an application for a licence relates to a facility or apparatus in respect of which an application was previously submitted, reference may be made to the previous application in so far as it contained data that have not changed in the meantime.
6. Our Minister may request the submission of further copies of the application and of related appendices.

Article 3a

1. If fissile materials, ores or radioactive materials are already present or apparatus is used within a facility as referred to in section 15 (b) of the Act or as designated pursuant to section 1.1 (3) of the Environmental Management Act, the risk analysis referred to in articles 4 (1) (e) and (3) (e), 5 (1) (d) and 2 (d), 6 (1) (h) and 9 (1) (f) relates to the total effective dose received as a consequence of that facility. The calculation of the effective dose referred to in the first sentence does not relate to

the effective dose as a consequence of practices of a person as referred to in article 3 (2).

2. Rules may be laid down by regulation of Our Minister and Our Minister of Social Affairs and Employment with regard to the risk analyses referred to in articles 4 (1) (e) and (3) (e), 5 (1) (d) and (2) (d), 6 (1) (h) and (i), 9 (1) (f) and 10 (2) (b), at 6°.

§ 2. Applications for a licence to hold or discard fissile materials or ores

Article 4

1. An application for a licence to hold fissile materials must in any event include:
 - a) a statement of the quantities, the chemical and physical state, the form, the content and the degree of enrichment and, in the case of spent fuel, a description of the activity of the fissile materials that is as accurate as possible;
 - b) a statement of the purpose for which the applicant wishes to hold the fissile materials;
 - c) a statement and description of the place where the fissile materials are held or, if a licence as referred to in section 15 (b) or (c) of the Act is required for an facility or apparatus in which the materials are held, a statement of that facility or apparatus, with reference to the licence granted for it or to the application for such a licence;
 - d) a description of the measures that will be taken by or on behalf of the applicant to prevent damage;
 - e) a risk analysis of the damage that would be caused by holding the fissile materials referred to at (a) other than at the place or in the facility or apparatus referred to at (c);
 - f) a statement of all practices and activities involving fissile materials, ores, radioactive materials and apparatus within the location which are subject to a notification or licensing requirement pursuant to this Decree, the Radiation Protection Decree or the Fissionable Materials, Ores and Radioactive Materials (Transport) Decree.
2. If an application relates to a sealed source, it must also contain a statement of the chemical and physical state and form of the fissile materials as a result of which they constitute a sealed source as well as an indication of the structure and quality of the source.
3. An application for a licence to hold ores must in any event include:
 - a) a statement of the nature, quantity and average uranium or thorium content of the ores;
 - b) a statement of the purpose for which the applicant wishes to hold the fissile materials;
 - c) a statement and description of the place where the ores will be held;
 - d) a description of the measures that will be taken by or on behalf of the applicant to prevent damage;
 - e) a risk analysis of the damage that would be caused by holding the ores somewhere else than at the place referred to at (c);
 - f) a statement of all practices and activities involving fissile materials, ores, radioactive materials and apparatus within the location which are subject to a notification or licensing requirement pursuant to this Decree, the Radiation Protection Decree or the Fissionable Materials, Ores and Radioactive Materials (Transport) Decree.
4. If an application concerns a high-activity source, it must also include:
 - a) information about the volume of the source, the source container and the solid shielding of that source;
 - b) written proof that the financial security required pursuant to article 19 in conjunction with article 20 (d) (1) of the Radiation Protection Decree has been provided.

Article 5

1. An application for a licence to discard fissile materials must in any event include:
 - a) a statement of the quantities, the chemical and physical state, the form, the content and the degree of enrichment as well as a description of the activity of the fissile materials that is as

- accurate as possible;
- b) a statement and description of the place where and manner in which the applicant wishes to discard the fissile materials;
- c) a description of the measures that will be taken by or on behalf of the applicant to prevent damage;
- d) a risk analysis of the damage other than at the place referred to at (b) as a consequence of a practice for which a licence is sought;
- e) a statement of all practices and activities involving fissile materials, ores, radioactive materials and apparatus within the location which are subject to a notification or licensing requirement pursuant to this Decree, the Radiation Protection Decree or the Fissionable Materials, Ores and Radioactive Materials (Transport) Decree.

2. An application for a licence to discard ores must in any event include:

- a) a statement of the nature, quantity and average uranium or thorium content of the ores;
- b) a statement and description of the place where and manner in which the applicant wishes to dispose of the ores;
- c) a description of the measures that will be taken by or on behalf of the applicant to prevent damage;
- d) a risk analysis of the damage other than at the place referred to at (b) as a consequence of a practice for which a licence is sought;
- e) a statement of all practices and activities involving fissile materials, ores, radioactive materials and apparatus within the location which are subject to a notification or licensing requirement pursuant to this Decree, the Radiation Protection Decree or the Fissionable Materials, Ores and Radioactive Materials (Transport) Decree.

§ 3. Applications for a licence in respect of a facility as referred to in section 15 (b) of the Act

Article 6

1. An application for a licence to establish a facility in which nuclear energy may be released must in any event include:

- a) a statement and description of the place where the facility is to be established, including all relevant circumstances of a geographical, geological, climatic and other nature;
- b) a description of the facility, including the systems to be used in it, and of the functional performance of the facility and systems relevant to a safety assessment, together with a list of the suppliers of those parts and a statement of the maximum reactor power level at which the facility will operate;
- c) a statement of the chemical and physical state, the form, the content and the degree of enrichment of the fissile materials which will be used in the facility, together with a statement of the maximum quantity of the various fissile materials which will be present in the facility at any given time;
- d) a description of how the fissile materials referred to at (c) will be used in the facility, and how they will be kept before and after use;
- e) a broad indication of the total number of people who will be employed in the facility during normal operations, as well as a statement of the number of experts and of other members of staff who will be directly involved in the release of nuclear energy, and a description of the division of responsibilities among them and, in the case of supervisory staff, the grounds on which they are deemed to possess sufficient expertise to perform their duties;
- f) a description of how the applicant intends to dispose of the fissile materials referred to at (c) after use;
- g) a description of how the applicant intends to dispose of the radioactive materials generated during the use of the fissile materials referred to at (c);
- h) a safety report containing a description of the measures that will be taken by or on behalf of the applicant to prevent damage or mitigate the risk of damage, including the measures to prevent damage outside the facility during normal operations, and to prevent damage resulting from the postulated initiating events mentioned in that description, as well as a risk analysis of the damage outside the facility as a consequence of those events;
- i) a risk analysis of the damage outside the facility as a consequence of beyond-design-basis

- accidents;
 - j) a statement of the insurance or other financial security which the applicant will have and maintain in order to comply with the Nuclear Accidents (Liability) Act, including a mention of all relevant matters.
2. Paragraph 1 applies *mutatis mutandis* to an application for a licence to put into operation or maintain in operation a facility as referred to in that paragraph.

Article 7

1. An application for a licence to establish a facility in which fissile materials which contain plutonium or enriched uranium or spent fuels can be produced, treated or processed, must in any event include the data referred to in article 6 (1), provided always that:
- a) under (b), the words 'the maximum reactor power level at which the facility will operate' are replaced by 'the greatest quantity of the various fissile materials which can be produced, treated or processed in the facility in a given period of time';
 - b) the words 'used', 'the use' or 'the release of nuclear energy' are in each case replaced by 'produced, treated or processed' or, as the case may be, 'the production, treatment or processing'.
2. Paragraph 1 applies *mutatis mutandis* to an application for a licence to put into operation or maintain in operation a facility as referred to in that paragraph.

Article 8

1. An application for a licence for the establishment of a facility in which fissile materials as referred to in article 7 (1) will be stored must in any event include:
- a) a statement and description of the place where the facility is to be established, including all relevant circumstances of a geographical, geological, climatic and other nature;
 - b) a statement of the chemical and physical state, the form, the content and the degree of enrichment, and in the case of spent fuels a statement of the activity of the fissile materials that is as accurate as possible, together with a statement of the maximum quantity of the various fissile materials which will be present in the facility at any given time;
 - c) a broad indication of the total number of people who will be employed in the facility during normal operation, as well as a statement of the number of members of staff who will be directly involved in the storage of fissile materials, and a description of the division of responsibilities among them and, in the case of supervisory staff, the grounds on which they are deemed to possess sufficient expertise to perform their duties;
 - d) a safety report as referred to in article 6 (1) (h);
 - e) a risk analysis as referred to in article 6 (1) (i);
 - f) a statement of the insurance or other financial security as referred to in article 6 (1) (j).
2. Paragraph 1 applies *mutatis mutandis* to an application for a licence to put into operation or maintain in operation a facility as referred to in that paragraph.

Article 9

1. An application for a licence to establish a facility in which fresh fuel that contains no plutonium or enriched uranium can be produced, treated or processed, must in any event include:
- a) a statement and description of the place where the facility will be established;
 - b) a description of the facility;
 - c) a statement of the chemical and physical state, the form and content of the fissile materials, together with a statement of the maximum quantity of the various fissile materials which will be present in the facility at any given time;
 - d) a statement of the number of staff who will be responsible for the expert production, treatment or processing of fissile materials, together with the grounds on which they are deemed to possess sufficient expertise;

- e) a description of the measures that will be taken by or on behalf of the applicant to prevent damage, including measures to prevent damage outside the facility;
 - f) a risk analysis of the damage outside the facility which is connected with the production, treatment or processing in the facility of the fissile materials referred to at (c).
2. Paragraph 1 applies *mutatis mutandis* to an application for a licence to put into operation or maintain in operation a facility as referred to in that paragraph.

Article 10

1. If an application for a licence to change a facility as referred to in articles 6, 7, 8 or 9 also involves decommissioning or dismantling the facility or part thereof, the application must in any event include:
- a) a statement of the licence under which the facility concerned has been established, put into operation or maintained in operation.
 - b) a decommissioning plan.
2. If an application for a licence as referred to in paragraph 1 relates to a facility of the following categories, it must also include:
- a) in the case of a facility as referred to in articles 6, 7 or 8: a safety report as referred to in article 6 (1) (h) and a risk analysis as referred to in article 6 (1) (i);
 - b) in the case of a facility as referred to in article 9: a description of the measures referred to in article 9 (1) (e) and a risk analysis as referred to in article 9 (1) (f), provided always that the safety report, the description of measures and the risk analyses relate to the decommissioning or dismantling.
3. The application to change a licence as referred to in paragraph 1 must in any event include:
- a) a statement of the licence under which the facility concerned has been decommissioned or is to be dismantled;
 - b) a description of the intended change;
 - c) if the proposed change influences one or more data as referred to in the decommissioning plan referred to in paragraph 1 (b), a relevant addition to that plan.
4. If an application is made for a licence to decommission a facility as referred to in paragraph 1, an application must be lodged at the same time for a licence to dismantle the facility.

Article 11

1. The application for a licence to change a facility as referred to in article 6, 7, 8 or 9 must in any event include:
- a) a statement of the licence under which the facility concerned has been established, put into operation or maintained in operation;
 - b) a description of the intended change;
 - c) if the application relates to a facility as referred to in article 6, 7 or 8 and the proposed change concerns one or more data as mentioned in the safety report or risk analysis referred to in article 6 (h) submitted with a view to obtaining the licence referred to at (a): a relevant addition to said data;
 - d) if the application relates to a facility as referred to in article 6, 7 or 8 and the proposed change concerns one or more data as mentioned in the risk analysis referred to in article 6 (1) (i) and submitted with a view to obtaining the licence referred to at (a): a relevant addition to said risk analysis;
 - e) if the application relates to a facility as referred to in article 9 and the proposed change concerns one or more data as mentioned in the risk analysis referred to in article 9 (1) (f) submitted with a view to obtaining the licence referred to at (a): a relevant addition to said risk analysis;

2. If the licence in relation to a facility as referred to article 6, 7 or 8 has been obtained at a time when no risk analysis as referred to in article 6 (1) (i) needed to be submitted, the application referred to in paragraph 1 should be accompanied, if the proposed change affects one or more of the data which are typically listed in such a risk analysis, by a risk analysis as referred to in article 6 (1) (i) relating not only to the change but also to the operation of the facility.
3. This article does not apply to an application for a licence as referred to in article 10.

Article 11a

In cases where the licence concerns the establishment or alteration of a facility as referred to in section 15 (b) of the Act, which also constitutes a building activity as referred to in section 2.1 (1) (a) of the Environmental Permitting (General Provisions) Act, the applicant must provide:

- a) if the application for a licence for that building activity has been lodged at the same time as the application for the licence under this Act, a copy of the application for a licence for that building activity with its application;
- b) if the application for a licence for that building activity is not lodged simultaneously with the application for the licence under this Act, a copy of the application to the competent authority for a licence for that building activity simultaneously with the lodging of that application.

§ 4 [Repealed with effect from 1/10/2002]

Article 12 [Repealed with effect from 01/10/2002]

Article 13 [Repealed with effect from 01/10/2002]

Article 14 [Repealed with effect from 01/10/2002]

Chapter III. Provisions on decisions in respect of licences as referred to in chapter II

§ 1. Decisions to whose preparation Part 3.4 of the General Administrative Law Act applies

Article 15

In the preparation of decisions to which Part 3.4 of the General Administrative Law Act applies pursuant to section 17 or 20 (1) of the Act, the following will be involved (other than as advisers):

- a) in cases in which the decision relates to a facility as referred to in article 6, 7 or 8: the administrations of the province and municipality in which the facility is or will be wholly or mainly located, the administrations of the provinces and municipalities whose territories are located less than ten kilometres from the place where the facility is or will be located, and the authorities responsible for the qualitative management of surface waters situated less than ten kilometres from the place where the facility is or will be located;
- b) in cases in which the decision relates to a facility as referred to in article 9: the administration of the municipality or municipalities in which the facility is or will be located.

§ 2. Decisions to whose preparation Part 3.4 of the General Administrative Law Act and Part 13.2 of the Environmental Management Act do not apply

Article 16

Part 3.4 of the General Administrative Law Act and Part 13.2 of the Environmental Management Act do not apply to the preparation of decisions in respect of licences to hold or discard fissile materials:

- a) if it concerns plutonium with a maximum activity of 37 gigabecquerels, provided that this plutonium is clad in a sheath in such a way as to provide what may reasonably be considered to be sufficient resistance to prevent any dispersal of or contamination by this plutonium;
- b) if it concerns depleted uranium, natural uranium or natural thorium.

Article 17

Notice of the making of a decision to whose preparation Part 3.4 of the General Administrative Law Act and Part 13.2 of the Environmental Management Act do not apply will be given in the Government Gazette.

§ 3. Refusal of licences

Article 18

1. No licence as referred to in section 15 of the Act will be granted if:

- a) the conditions concerning justification, optimisation, expertise and dose limits in force pursuant to article 19, in conjunction with articles 4, 5, 6, 9, 10, 11, 12, 48, 76, 77 and 78 of the Radiation Protection Decree have not been complied with;
- b) as a result of the practice for which the licence has been applied for and as a result of other practices inside and outside this location, one of the following doses is exceeded in the case of a member of the public present outside the location:
 1. an effective dose of 1 mSv in a calendar year, and taking this into account:
 2. an equivalent dose of 50 mSv in a calendar year for the skin, averaged over any skin area of 1 cm²;
- c) the practice for which the licence has been applied for is in a category declared to be justified under the regulation applicable pursuant to article 19 in conjunction with article 4 (2) of the Radiation Protection Decree, but the specific nature of this practice is not justified under article 4 (1) of that Decree;

2. A licence as referred to in section 15 (b) of the Act will be refused if:

- a) the values of the data in the risk analysis referred to in article 6 (1) (h) do not comply with the limit values listed in the table below;

Event frequency F per year	Maximum effective dose allowed	
	persons aged 16 years and over	persons under the age of 16 years
$F \geq 10^{-1}$	0.1 mSv	0.04 mSv
$10^{-1} > F \geq 10^{-2}$	1 mSv	0.4 mSv
$10^{-2} > F \geq 10^{-4}$ ◆	10 mSv	4 mSv
$F < 10^{-4}$	100 mSv	40 mSv

- b) or it is apparent from the risk analysis that the effective thyroid dose will not be limited to 500 mSv.

3. A licence to establish, put into operation, maintain in operation or change a facility in which nuclear energy can be released may be refused if the values in the risk analysis performed pursuant to article 6 (1) (i) exceed one of the following values:

- a) a probability of 10^{-6} per year that an unprotected person permanently present outside the relevant facility will die as a result of a beyond-design-basis accident;
- b) a probability of 10^{-5} times per year that a group of at least ten persons present outside the relevant facility will be direct fatalities of a beyond-design-basis accident, or a probability of n^2 times smaller for n times more direct fatalities.

Chapter IIIa. General rules

Article 19

The provisions laid down by or pursuant to articles 1 (3), 3, 4 (1), (2), (3), (6) and (7), 5, 6-17, 19-20f, 36, 38, 48-64, 66, 71-74, 76-100, 112-122 (1), 123 and 124 of the Radiation Protection Decree, with

the exception of its provisions on apparatus and notifications, will apply *mutatis mutandis*, provided always that where article 124 applies *mutatis mutandis* the words 'which differ from this Decree' will be read as 'which differ from articles declared applicable *mutatis mutandis*'.

Article 20

Our Minister and Our Minister of Social Affairs and Employment may adopt rules governing the design and operation of facilities as referred to in section 15 (b) of the Act with a view to the prevention of damage.

Article 21

1. It is prohibited to use nuclear pressure equipment in a facility as referred to in section 15 (b) of the Act if it has not been approved in accordance with requirements adopted for this purpose by Our Minister in the interests of the safe operation of such equipment.
2. Our Minister may stipulate by ministerial regulation that the prohibition referred to in paragraph 1 also applies to use in a facility as referred to in section 15 (b) of the Act of other pressure equipment designated by or pursuant to that regulation if such equipment could, if defective, cause the spread of radioactivity.
3. Approval of nuclear pressure equipment which has been granted before the entry into force of this article on the basis of an inspection carried out in accordance with the Steam Equipment Decree (*Stoombesluit*) is equated with approval granted after an inspection on the basis of the regulations adopted pursuant to paragraph 1.
4. The authorities designated by Our Minister are responsible for carrying out the inspection. Our Minister will, by ministerial regulation, adopt rules regarding the designation of the authorities referred to in the first sentence. He may adopt rules governing the way in which the inspections are carried out.

Article 22

Our Minister may adopt rules governing the safety of the holding and discarding of the fissionable materials and ores listed in the Appendix to this Decree and governing the safety of facilities as referred to in section 15 (b) of the Act.

Article 23

1. The Major Accidents (Risks) Decree 1999, with the exception of articles 26, 27 and 28, applies *mutatis mutandis* to facilities as referred to in section 15 (b) of the Act in which dangerous substances may be present pursuant to a licence or may be formed as the result of an industrial chemical process getting out of control.
2. Paragraph 1 does not apply to dangerous substances which are also radioactive.

Article 24

The safety report referred to in article 6 (1) (h) and the document referred to in article 5 (2) of the Major Accidents (Risks) Decree 1999 or the safety report referred to in article 9 of that Decree may be combined to form a single safety report.

Article 25

The holder of a licence to establish, put into operation or maintain in operation a facility as referred to in section 15 (b) of the Act must have a decommissioning plan.

Article 26

1. A decommissioning plan must in any event include a description of:

- a) the period in which the permanent shutdown and decommissioning will take place;
 - b) the time schedule for the permanent shutdown and decommissioning, indicating the different phases in which the permanent shutdown and decommissioning will take place;
 - c) the amount and activity of the fissionable materials or radioactive substances that will be present in the facility during the various stages of permanent shutdown and decommissioning;
 - d) the staff involved in the permanent shutdown and decommissioning, their expertise and the division of responsibilities among them;
 - e) the techniques to be applied in the course of the permanent shutdown and decommissioning;
 - f) the relevant environmental aspects, in particular the management of radioactive waste released in the course of the permanent shutdown and decommissioning.
2. The decommissioning plan must be based on a method of permanent shutdown and decommissioning that complies with articles 30 and 30a and the rules laid down pursuant to article 30b.
 3. Further rules on the content of the decommissioning plan may be laid down by regulation of Our Minister and Our Minister of Social Affairs and Employment. It may be laid down in this connection that the adopted rules apply only in the specified categories of cases.

Article 27

1. The decommissioning plan of the holder of a licence to establish, put into operation or maintain in operation a facility as referred to in section 15 (b) of the Act and changes to that plan require the approval of Our Minister.
2. Approval will be refused if the decommissioning plan does not meet the requirements that have been laid down by or pursuant to this Decree.
3. Our Minister will decide on the application for approval of the decommissioning plan within six months of receipt of the application.
4. Our Minister may attach conditions to the approval.
5. Approval may be revoked by Our Minister if the decommissioning plan no longer meets the requirements that have been laid down by or pursuant to this Decree.

Article 28

The holder of a licence to establish, put into operation or maintain in operation a facility as referred to in section 15 (b) of the Act shall act in accordance with the most recently approved decommissioning plan.

Article 29

1. From the date on which a licence for putting into operation a facility as referred to in section 15 (b) of the Act is granted until that on which a licence to decommission the facility has been granted, the holder of the licence to put into operation or maintain in operation that facility must update the decommissioning plan at least once every five years, or whenever Our Minister deems this necessary.
2. The matters to be updated as referred to in paragraph 1 include in any event:
 - a) the timeframe for the permanent shutdown and decommissioning;
 - b) the techniques to be applied in the course of the permanent shutdown and decommissioning;
 - c) changes to the facility in so far as they may affect the permanent shutdown or decommissioning.

Article 30

1. The holder of a licence for a facility as referred to in section 15 (b) of the Act must start the

permanent shutdown and decommissioning of that facility immediately after normal operations have ended.

2. Our Minister may, in special circumstances, permit the permanent shutdown and decommissioning of the facility to start at a later date.
3. The holder of a licence for the permanent shutdown and decommissioning of a facility as referred to in section 15 (b) of the Act must complete the permanent shutdown and decommissioning of that facility as soon as reasonably practicable.

Article 30a

1. If a facility as referred to in section 15 (b) of the Act is decommissioned, the factual limitations precluding the subsequent use of the site of the facility for other purposes are removed in so far as such limitations are the result of that facility.
2. When granting a licence to permanent shutdown and decommission a facility as referred to in section 15 (b) of the Act, Our Minister may, in special circumstances, permit a derogation from paragraph 1.

Article 30b

Our Minister and Our Minister of Social Affairs and Employment may lay down rules on how the permanent shutdown and decommissioning of a facility as referred to in section 15 (b) of the Act are to be carried out.

Article 30c

Our Minister will decide on an application for the cancellation of a licence for the decommissioning of a facility as referred to in section 15 (b) of the Act within six months of receipt of the application.

Article 30d

1. When applying for the cancellation of a licence to decommission a facility as referred to in section 15 (b) of the Act, the holder of that licence must show to the satisfaction of Our Minister that the decommission is complete. To this end he must in any event show that article 30a has been complied with.
2. Our Minister may adopt further rules on how it must be shown that the decommission is complete.

Article 30e

The rules referred to in articles 26 (3), 30b and 30d (2) may also relate to radioactive waste.

Article 30f

1. In the case of a facility designated pursuant to article 37 (8) of the Radiation Protection Decree or article 42 (3) (e) of the present Decree, the holder of a licence for a facility as referred to in section 15 (b) of the Act must make timely provision for the storage of:
 - a) waste containing fissionable material or ore generated as a result of the use of that facility,
 - b) waste containing fissionable material or ore and radioactive waste which return after the reprocessing of the fissionable materials used in that facility, and
 - c) the radioactive waste that is released when the facility is shut down and decommissioned.
2. Our Minister may lay down rules on the provision to be made.

Article 30g

The licensee must determine the charges it will make for maintaining in operation a facility in which

fissionable materials are stored as referred to in section 15 (b) of the Act, as designated by Our Minister under Article 42 (3) (e), in a transparent, objective and non-discriminatory manner. The charges will include the costs incurred by the licensee for research and development in connection with the management of spent fuels as included in the national programme referred to in article 40a.

Chapter IV. Rules relating to requirements to be attached to a licence as referred to in section 15 of the Act

§ 1. Prevention of damage.

Article 31

1. A licence as referred to in section 15 of the Act must be subject to such requirements that:
 - a) damage can be prevented as far as reasonably possible;
 - b) in cases in which exposure or contamination is unavoidable, damage can be mitigated as far as is reasonably possible;
 - c) in cases in which exposure or contamination is unavoidable, the number of persons exposed to ionizing radiation is limited as far as is reasonably possible, while avoiding what is deemed to be unacceptable exposure or contamination of individuals.
2. The requirements referred to in paragraph 1 include requirements to ensure that the facility and everything belonging to it are in good condition. Article 31a [Repealed with effect from 1/3/2002]

Article 32 [Repealed with effect from 01/03/2002]

Article 33

To prevent damage or to mitigate the risk of damage outside the facility, requirements other than those referred to in article 31 (1), may be attached to a licence as referred to in section 15 (b) of the Act. Article 34 [Repealed with effect from 1/10/2002]

§ 2. State security

Article 35

1. A licence as referred to in section 15 of the Act will be subject to requirements designed to ensure State security if it relates wholly or partly to the carrying out of activities:
 - a) involving the use of data, tools or materials or a facility or apparatus with regard to which, in the opinion of Our Minister, the imposition of an obligation of secrecy or a limitation on use is warranted in the interests of State security, or
 - b) involving the conduct of investigations or the application of working methods with regard to which, in the opinion of Our Minister, the imposition of an obligation of secrecy is warranted in the interests of State security, or
 - c) stated by Our Minister to be of vital importance to military or civil defence.
2. Requirements as referred to in paragraph 1 may include the obligation:
 - a) to ensure secrecy with regard to data, tools or materials, a facility or apparatus or research or working methods as referred to paragraph 1;
 - b) to use data, tools or materials or a facility or apparatus as referred to in paragraph 1 in accordance with the limitations specified in the requirement;
 - c) to keep secure, in a manner specified in the regulation, sites, buildings and spaces where activities as referred to in paragraph 1 take place or data, tools or materials used to perform such activities are kept;
 - d) to arrange in a manner specified in the requirement the use of data, tools or materials or of a facility or apparatus as referred to in paragraph 1, as well as the application of the knowledge obtained from such use;

- e) to give timely notice to Our Minister or Dutch control authorities designated in the requirement of any proposal to replace the person or persons charged with the management of the undertaking or facility for which the licence has been granted;
- f) to arrange for all or certain activities to be carried out only by persons in respect of whom Our Minister has stated that, in his opinion, adequate safeguards can be deemed to be in place to ensure that they will satisfactorily discharge the secrecy obligation;
- g) to supply bodies designated in the requirement, which are assigned a task regarding the implementation of the Act, with information specified in the requirement concerning data, tools or materials or a facility or apparatus as referred to in paragraph 1, and to keep records designed to ensure that such information can be provided and by reference to which the correctness of the supplied information can easily be demonstrated;
- h) to inform Our Minister or Dutch control authorities designated in the requirement without delay if espionage or serious breaches of State security requirements are suspected or discovered;
- i) to designate an officer attached to the undertaking or facility as having special responsibility for taking measures to implement the State security requirements attached to the licence and for monitoring compliance with those measures.

§ 3. Storage of fissionable materials and ores

Article 36

1. A licence as referred to in section 15 of the Act will be subject to requirements concerning the storage of fissionable materials and ores, if and in so far as this is necessary for the protection of the interests referred to in section 15b (1) of the Act at (a), (b), (d) or (f).
2. Regulations as referred to in paragraph 1 may include the obligation:
 - a) to store fissionable materials or ores at such a place and in such a manner specified in the requirement as to ensure that no damage can occur;
 - b) to store fissionable materials or ores in such a way that they are protected as much as possible from fire or being lost in some other way;
 - c) to designate one or more officials attached to the undertaking or facility as having special responsibility for taking measures to implement the State security requirements attached to the licence and for monitoring compliance with those measures.

§ 4. Power supply

Article 37

1. A licence as referred to in section 15 (a) of the Act will be subject to requirements concerning the power supply if a regular supply of fissionable materials or ores is not sufficiently guaranteed.
2. Requirements as referred to in paragraph 1 may include the obligation to obtain fissionable materials or ores only from suppliers designated in the requirement or to make delivery only to clients designated therein.

Article 38

1. A licence as referred to in section 15 (b) of the Act relating to a facility intended for the generation of thermal or electrical energy intended for the public power supply will be subject to requirements concerning the power supply if:
 - a) a regular supply of the fissionable materials required for that facility is not sufficiently guaranteed, or
 - b) the uninterrupted operation of the facility is not sufficiently guaranteed.
2. Regulations as referred to in paragraph 1 (a) may involve the obligation to keep a stock of fissionable materials of such nature and composition as determined in the requirement and of such size and for such periods as specified therein.

3. Requirements as referred to in paragraph 1 (b) may involve the obligation to arrange for the facility to be connected to a national grid or to ensure sufficient reserve capacity in some other way as to guarantee the power supply during a period specified in the requirement.

§ 5. Securing the payment of the compensation to which third parties are entitled for damage caused to them

Article 39

A licence as referred to in section 15 (b) or (c) of the Act relating exclusively or partly to a facility or apparatus to which the Nuclear Accidents (Liability) Act (*Wet aansprakelijkheid kernongevallen*) or the Act of 24 October 1973 containing rules regulating the third party liability of the operators of nuclear vessels (Bulletin of Acts and Decrees 536) applies will be subject to a requirement to take out and maintain such insurance or arrange for such other financial security as the licensee is required to do by law in order to ensure payment to third parties of the compensation to which they are entitled for damage caused to them.

§ 6. Compliance with international obligations

Article 40

1. A licence as referred to in section 15 of the Act will be subject to requirements to ensure compliance with international obligations if the licence relates wholly or partly to the performance of activities involving the use of data, tools or materials or a facility or apparatus in respect of which international agreements or decisions of international-law organisations which are binding on the Netherlands and relate wholly or partly to the area of nuclear energy or of ionizing radiation impose obligations on the State.
2. Requirements as referred to in paragraph 1 may include the obligation:
 - a) to ensure secrecy concerning data, tools or materials or a facility or apparatus as referred to in paragraph 1 or to use them in keeping with the limitations specified in the requirement;
 - b) to supply bodies designated in the requirement, which are assigned a task regarding the implementation of the agreements or decisions referred to in paragraph 1, with the information specified in the requirement concerning data, tools or materials or a facility or apparatus as referred to in paragraph 1, and to keep records designed to ensure that such information can be provided and by reference to which the correctness of the supplied information can easily be demonstrated.

Chapter IVa. National programme

Article 40a

1. Our Minister will establish a programme as referred to in article 5 (1) (a) of Directive 2011/70/Euratom for the management of spent fuel.
2. The programme will be based on the following principles:
 - a) limitation of the generation of spent fuel to the minimum which is practically feasible in terms of both activity and volume;
 - b) the interdependencies between all the steps in the generation and management of spent fuel;
 - c) the safe management of spent fuel;
 - d) the adoption of passive safety measures in the long term;
 - e) a graded approach to the implementation of the measures;
 - f) the costs of managing spent fuel are borne by those who generate these waste materials;
 - g) an evidence-based and documented decision-making process at all stages of the management of spent fuel.
3. The programme will also include:

- a) the policy objective regarding the management of all types of spent fuel;
- b) the milestones required for the implementation of the programme and the timeframe for achieving these milestones;
- c) an inventory of all spent fuel and estimates of future quantities;
- d) concepts, plans and technical solutions for the management of spent fuel from generation to geological disposal;
- e) concepts or plans for the period following the closure of a geological disposal facility;
- f) research, development and demonstration activities needed to implement solutions for the management of spent fuel;
- g) the responsibility for implementation of the programme and the key performance indicators for monitoring progress towards implementation;
- h) an assessment of the costs of the national programme and the basis and hypotheses underlying this assessment, including a profile over time;
- i) the financing schemes for implementation of the programme;
- j) the policy on the furnishing of information on the management of spent fuel to workers and the general public;
- k) an overview of agreements concluded with other member states and third countries on the management of spent fuel.

Chapter V. Exemptions from the prohibition contained in section 15 of the Act

§ 1. Fissionable materials and ores

Article 41

1. The prohibition in section 15 (a) of the Act does not apply to the holding of fissionable materials or ores if within a location:
 - a) the activity of the radionuclides in the relevant fissionable materials or ores is lower than the value laid down pursuant to article 3 (1), opening words and (c), of the Radiation Protection Decree; or
 - b) the activity concentration of that material or ore is lower than the value laid down pursuant to article 3 (1), opening words and (c), of the Radiation Protection Decree.
2. Paragraph 1 does not apply if:
 - a) fissionable materials or ores are administered to persons and, in so far as protection of humans against ionizing radiation is concerned, to animals for:
 - 1°. making medical or veterinary diagnoses;
 - 2°. therapy or medical/biomedical research;
 - a) fissionable materials or ores are added to products designed for use on or in the close proximity of people.
3. The provisions laid down by or pursuant to article 25 (3), (4) and (7) of the Radiation Protection Decree apply *mutatis mutandis*.
4. Provision may be made by regulation of Our Minister for paragraph 1 not to be applicable in certain designated categories of cases where there is an unduly high risk of exposure of workers or members of the public.
5. The prohibition contained in section 15 (a) of the Act does not apply to the holding of fissionable materials or ores in the case of practices designated by Our Minister by regulation which entail only a limited risk of human exposure.

Article 41a

1. The prohibition contained in section 15 (a) of the Act does not apply to practices involving a sealed source where the values laid down pursuant to article 3 (1), opening words and (c) of the Radiation Protection Decree for the activity and the activity concentration are exceeded if:

- a) it is of a type approved by Our Minister, and
 - b) under normal operating conditions it cannot cause an environmental dose equivalent higher than 1 μ Sv per hour at 0.1 metres from any accessible external surface thereof.
2. Rules may be laid down by regulation of Our Minister concerning type approval as referred to in paragraph 1 (a) and for the storage and removal of sealed sources as referred to in paragraph 1.

Article 42

1. The prohibition contained in section 15 (a) of the Act does not apply to the discarding of fissionable materials or ores for product or material re-use or of waste containing fissionable materials or ores if:
- a) the activity per calendar year of the radionuclides in the fissionable materials or ores concerned is lower than the value laid down pursuant to article 3 (1), opening words and (c), of the Radiation Protection Decree; or
 - b) the activity concentration of that material or ore is lower than the value laid down pursuant to article 3 (1), opening words and (c), of the Radiation Protection Decree.
2. The provisions laid down by or pursuant to article 25 (3), (4) and (7) of the Radiation Protection Decree and article 41 (4) of the present Decree apply *mutatis mutandis*.
3. The prohibition contained in section 15 (a) of the Act does not apply to the discarding of fissionable materials or ores for product or material re-use or of waste containing fissionable materials or ores if it concerns:
- a) sealed sources that are repatriated by the person who has produced or delivered the source;
 - b) an actual delivery of fissionable materials or ores by simple transfer to a third party with a view to:
 - 1°. the use or product or material re-use of fissionable materials or ores,
 - 2°. collection of wastes containing fissionable materials or ores;
 - c) shipment to a facility designated pursuant to section 22 (4) of the Act for the receipt of fissionable materials or ores taken into possession;
 - d) the discarding of waste containing fissionable materials or ores by shipment to a service recognised by Our Minister for the collection of waste containing fissionable materials or ores;
 - e) shipment to a facility designated by Our Minister for the receipt of waste containing fissionable materials or ores.
4. Paragraph 3 applies only if the undertaking has ascertained that the recipient holds a licence for the practice concerned or is otherwise authorized to receive these materials.
5. Pursuant to section 28 (1), last sentence, of the Services Act (*Dienstenwet*), Division 4.1.3.3 of the General Administrative Law Act does not apply to an application for recognition of a collection service or a designation of a facility for the receipt of waste containing fissionable materials or ores as referred to in paragraph 3.

Article 43

1. The prohibition contained in section 15 (a) of the Act does not apply to the discarding of fissionable materials or ores by discharge into the air, a public sewer or surface waters, if:
- a) in the case of discharge into the air, the activity of the total quantity of fissionable materials or ores discharged in a calendar year is lower at the point of discharge than 1 radiotoxicity equivalent for inhalation, as referred to in the Appendix to the Radiation Protection Decree;
 - b) in the case of discharge into a public sewer, the activity of the total quantity of fissionable materials or ores discharged in a calendar year is lower at the point of discharge than 10 radiotoxicity equivalents for ingestion, as referred to in the Appendix to the Radiation Protection Decree;
 - c) in the case of discharge into surface waters, the activity of the total quantity of fissionable materials or ores discharged in a calendar year is lower at the point of discharge than 0.1

radiotoxicity equivalent for ingestion, as referred to in the Appendix to the Radiation Protection Decree;

2. The amounts discharged, expressed in radiotoxicity equivalents, are corrected for physical decay using the correction factors set out in the Appendix to the Radiation Protection Decree.

§ 2. Facilities

Article 44

The prohibition contained in section 15 (b) of the Act does not apply to the establishment, putting into operation, maintaining in operation or modification of a facility in which fissionable materials can be produced, treated or processed, or in which fissionable materials are stored, in cases where the facility is neither intended nor used for a production process connected with the the recycling of fissionable materials or for holding other materials than fresh fissionable materials, and:

- a) the fissionable materials held do not contain plutonium or enriched uranium, or
- b) the largest quantity of fissionable materials which are held at any time in the facility does not contain more than 375 grams of plutonium-239, plutonium-241 or uranium-233, or not more than 600 grams of uranium-235, provided always that in the presence of more than one of these nuclides the sum of the fractions obtained by dividing the number of grams of each of such nuclides by the maximum quantity fixed above for that nuclide may not exceed 1.

Chapter Va. Applications for approval of financial security as referred to in section 15f of the Act

Article 44a

1. An application for approval of the manner in which financial security is provided as referred to in section 15f (1) of the Act must be submitted to Our Minister and a copy sent simultaneously to Our Minister of Finance.
2. An application for approval as referred to in paragraph 1 must in any event contain the following information:
 - a) an overview of the various cost items for the permanent shutdown and decommissioning of the facility concerned, referred to in section 15 (b) of the Act, based on the most recent decommissioning plan approved by Our Minister and the requirements attached to the approval of the plan under article 27 (4);
 - b) a calculation of the costs associated with the cost items referred to at (a), determined by means of a generally accepted method and on the basis of the price level at the time of the submission of the application;
 - c) a conversion of the costs determined in accordance with part (b) to the costs at the moment of permanent shutdown and decommissioning, determined on the basis of a generally accepted indexing method;
 - d) an overview showing that the calculated amount of the costs at the time of the permanent shutdown and decommissioning is covered by financial security.
3. Our Minister may make detailed rules relating to the application for approval.

Article 44b

1. The holder of a licence for putting into operation or maintaining in operation a facility as referred to in section 15 (b) of the Act, in which nuclear energy can be released, shall update the manner in which financial security has been provided after the decommissioning plan or an amendment to it has been approved by Our Minister or whenever Our Minister or Our Minister of Finance deems this necessary.
2. The licensee referred to in paragraph 1, must lodge an application for approval of the updated financial security within six months of approval of the decommissioning plan or, as the case may

be, within six months of the date on which Our Minister or Our Minister of Finance has announced the updating of the manner in which financial security is provided.

Article 44c

1. When application is made for a licence to shut down and decommission a facility as referred to in section 15 (b) of the Act, in which nuclear energy can be released, an application must be lodged at the same time for approval of the way in which financial security is provided.
2. If paragraph 1 applies, the overview of the different cost items for the permanent shutdown and decommissioning must be based, notwithstanding article 44a (2) (a), on the decommissioning plan as lodged with the application for a licence to shut down and decommission the facility.

Article 44d

1. The holder of a licence to permanent shut down and decommission a facility as referred to in section 15 (b) of the Act, in which nuclear energy can or could be released, shall update the manner in which financial security has been provided after the licence is changed, in so far as this change relates to the decommissioning plan.
2. The licence holder referred to in paragraph 1 should lodge an application for approval of the updated financial security within six months of the change of the licence.

Chapter VI. Final provisions

Article 45

1. This Decree may be cited as the Nuclear Facilities, Fissionable Materials and Ores Decree.
2. It will enter into force on a date to be determined by Us.

Our Minister of Economic Affairs and Our Minister of Social Affairs and Health are responsible for the implementation of this Decree, which will be published, together with its Explanatory Memorandum, in the Bulletin of Acts and Decrees and a copy of which will be sent to the Council of State.

Soestdijk, 4 September 1969

JULIANA.

The Minister of Economic Affairs,
L. DE BLOCK.
The State Secretary for Social Affairs and Health,
R.J.H. KRUISINGA.

Published on the ninth of October 1969.

The Minister of Justice,
C. H. F. POLAK.

Appendix accompanying article 22 of the Nuclear Facilities, Fissionable Materials and Ores Decree

The following are fissile materials and ores as referred to in article 22:

1. Unirradiated plutonium in quantities of more than 15 grams, unless the isotope content of plutonium-238 exceeds 80%
2. Unirradiated uranium enriched to 20% uranium-235 or more, in quantities of more than 15 grams
3. Unirradiated uranium enriched to 10% or more but less than 20% uranium-235, in quantities of more than 1 kilogram

4. Unirradiated uranium enriched to more than the natural content but less than 10% uranium-235, in quantities of 10 kilograms or more
5. Unirradiated uranium-233 in quantities of more than 15 grams
6. Spent fuel