



# The Swedish Environmental Code

A résumé of the text of the Code and related Ordinances



REGERINGSKANSLIET

Ministry of the Environment



Clean air

# Contents

The Environmental Code – a framework law	4
Objectives of the Environmental Code	6
The Swedish environmental quality objectives	7
The general rules of consideration	9
Provisions concerning land management	16
Environmental quality standards	18
Environmental impact statements	19
The right of access to private land and special protection areas	20
Shore protection	22
Protection of animal and plant species	23
Environmentally hazardous activities and health protection	24
Polluted areas	27
Water operations	28
Quarrying, notice of consultation and environmental concerns in agriculture	29
Genetic engineering	30
Chemical products	31
Waste and producer responsibility	32
Common rules concerning the consideration of cases and matters	35
The Government's consideration of permissibility	35
Common rules on supervision	36
Compensation and environmental damage	38

This presentation of the Environmental Code and the Ordinances issued pursuant to the Code is a résumé of a compendium prepared by the Environmental Code Education Commission. The Commission was set up by the Government for the purpose of arranging education concerning the Environmental Code in connection with its entry into force on January 1 1999.

## The Environmental Code – a framework law

The Environmental Code is the first integrated body of environmental legislation enacted in Sweden. Its rules relate to the management of land and water, nature conservation, the protection of plant and animal species, environmentally hazardous activities and health protection, water operations, genetic engineering, chemical products and waste. The Code replaces 15 previous Acts that were repealed on its entry into force on January 1 1999.

With its related Ordinances and rules, the Environmental Code covers a very wide area. Altogether, the Code's system of rules comprises thousands of provisions. The Environmental Code is a framework law, which means that its rules do not generally specify limit values for various operations and that it does not go into detail when it comes to striking a balance between various interests.

The rules are often made more specific by regulations issued by central government agencies in the environmental sector such as the Swedish Environmental Protection Agency and the National Chemicals Inspectorate. For many environmentally harmful operations, permits must be obtained from environmental courts or county administrative boards, and certain large structures and facilities must be approved by the Government before they are established. The supervisory authority in each municipality also has an important role in protecting human health and the environment from damage and detriment.

### To whom does the Environmental Code apply?

The Environmental Code is applicable to all citizens and economic operators who undertake operations or measures that conflict with the objectives of the Code.

The rules of the Code apply to all those whose activities are potentially detrimental to human health or the environment, damage the natural or cultural environment or deplete biological diversity. The rules apply to all kinds of impacts affecting the natural environment, whether large or small. They also apply to the housing environment and the built environment and to all other places to which the public has access. The Code contains provisions relating to such diverse activities as individual sewage treatment systems, compost heaps, "sick buildings" and heat pumps, airports, thermal power stations and pulp industries.

All operations that give rise to emissions to land, water or air are deemed environmentally hazardous activities and must therefore comply with the rules. As soon as there is any risk of environmental impacts in the form of noise, smell, vibrations, light or other nuisances, operators must take the necessary protective measures without being called upon to do so by a public authority.

The Code's rules do not apply to the work environment. To ensure that the rules do not involve unreasonable consequences for individuals, they are not applicable to measures of minor importance, such as the choice of residence and leisure occupations.

High-quality  
groundwater



### **The Environmental Code is applicable in parallel with other legislation**

The provisions of the Environmental Code apply to operations and measures that affect the environment and human health even where these are covered by other legislation. Its rules and the provisions of other legislation are thus applicable in parallel. This means, for example, that it is not always sufficient to obtain building permission under the Planning and Building Act. In addition to building permission, it may be necessary under the Environmental Code to apply for a permit or exemption, or to notify the authorities of an operation before it starts.

### **Structure of the Code**

All operations and measures covered by the Code must pursue the objectives and comply with the common rules of consideration established by its provisions. The basic rules concerning permit application procedures and supervision apply to all such operations and measures.

Title I: OBJECTIVES AND GUIDELINES (Chapters 1–6)

- \* Objectives of the Environmental Code
- \* General rules of consideration
- \* Provisions concerning land management
- \* Rules on environmental quality standards
- \* Rules on environmental impact statements

Title II: PROTECTION OF NATURE (Chapters 7–8)

- \* Protection of areas
- \* Protection of animal and plant species

Title III: OPERATIONS (Chapters 9–15)

This title contains provisions relating to each of the operations covered by the Code

- \* Environmentally hazardous activities and health protection
- \* Polluted areas
- \* Water operations
- \* Quarrying and environmental concerns in agriculture
- \* Genetic engineering
- \* Chemicals and biotechnical organisms
- \* Waste and producer responsibility

Titles IV–VII: COMMON PROVISIONS (Chapters 16–33)

These titles contain common provisions relating to all operations that are governed by the Environmental Code

- \* Consideration of cases and matters
- \* Supervision
- \* Charges and fees
- \* Penalties
- \* Compensation
- \* Liability
- \* Insurance

# Objectives of the Environmental Code

Chapter 1

## **The purpose of the Environmental Code is to promote sustainable development**

The purpose of the Code is to promote sustainable development that will assure a healthy and sound environment for present and future generations.

The present generation's lifestyles must not be such as to damage the environment and deplete natural resources. We ourselves and future generations must have a healthy and sound environment to live in. (The basic principle expressed in *Our Common Future*, the report of the World Commission on Environment and Development).

The first section of the Code contains five points specifying how the Code is to be applied.

### 1. Protection of human health and the environment from damage

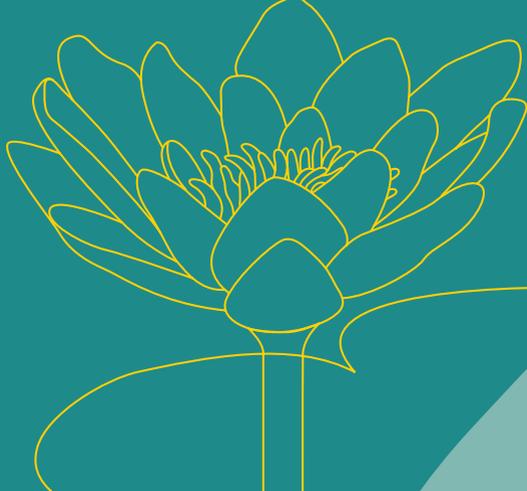
The protection provided by the Code relates to both direct and indirect damage. Damage to human health includes both physical and mental impacts.

### 2. Protection and preservation of natural and cultural environments

Sustainable development calls for the protection and preservation of areas with valuable natural and cultural assets so as to ensure that these assets are maintained.

### 3. Preservation of biological diversity

Biological diversity must be protected since the natural environment is worth protecting for its own sake. This means that the long-term productive



capacity of ecosystems must be preserved. Biological diversity relates both to the diversity of ecosystems and the diversity of animal and plant species.

#### 4. Ensuring a sound land and water management

The use of land and water and community development in general must be such as to promote appropriate and a long-term good management in ecological, social, cultural and economic terms.

#### 5. Encouragement of reuse and recycling of resources

The rules relating to management apply also to the conservation of raw materials, energy and other natural resources. The utilization of new resources must be reduced and full use must be made of the potential for recycling and reusing resources.

### The Code's objectives are the determining factor

The objectives described above determine the application of all the Code's provisions. In connection with permit application procedures and supervision under the Code, the Code's rules are to be implemented in the way that is *best* calculated to achieve its objectives. The same applies to operations or measures that affect the environment or human health.

## The Swedish environmental quality objectives

### Towards sustainable development

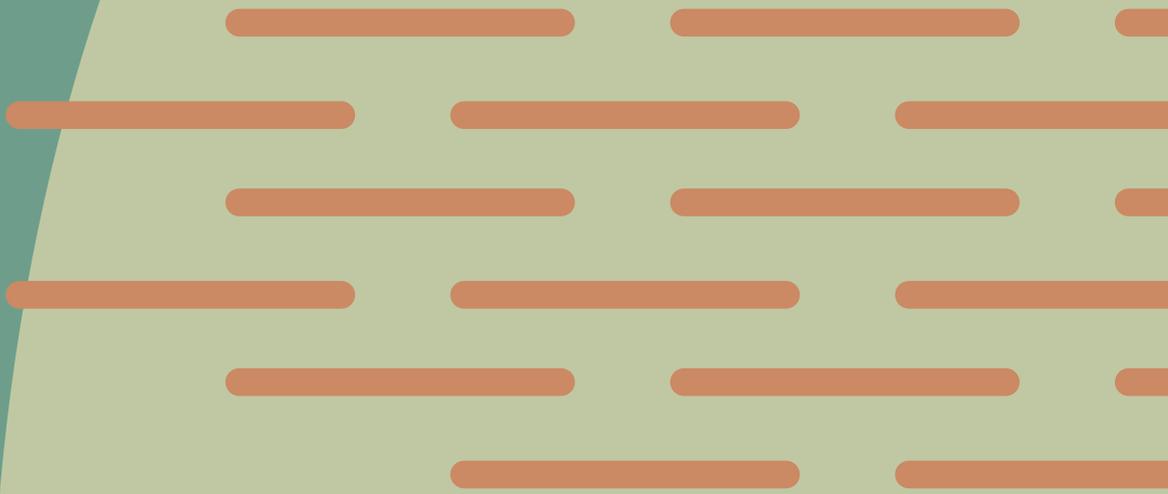
Independently of the Environmental Code, Parliament has adopted 15 national environmental quality objectives which describe environmental states that are a precondition for sustainable development. According to Parliament, it should be possible to achieve these objectives within one generation, or by the year 2025.

The overall objectives of the efforts to achieve sustainable development are to protect human health, to preserve biological diversity, to minimize the utilization of natural resources to ensure sustainable use and to protect the natural and cultural environment. These objectives correspond closely to the objectives of the Environmental Code.

### Reorientation of Swedish environmental policy

In addition to the overall environmental quality objectives, Parliament will also adopt intermediary objectives that are necessary for ongoing efforts to achieve the

Flourishing wetlands



environmental quality objectives. These intermediary objectives represent starting-points for a definition of more detailed environmental objectives, including concrete strategies in various sectors. Public authorities and other players will choose their own approaches in achieving these objectives. This method assumes that progress towards achievement of the objectives can be monitored. The county administrative boards and the municipalities have overall responsibility for regional and local adjustment of the national environmental objectives.

### The fifteen environmental quality objectives are:

1. Clean air
2. High-quality groundwater
3. Sustainable lakes and watercourses
4. Flourishing wetlands
5. A balanced marine environment and sustainable coasts and archipelagos
6. No eutrophication
7. Natural acidification only
8. Sustainable forests
9. A varied agricultural landscape
10. A magnificent mountain landscape
11. A good built environment
12. A non-toxic environment
13. A safe radiation environment
14. A protective ozone layer
15. Limitation of climate change

The environmental quality objectives serve as a guide to achievement of the objectives established by the Code.

The environmental quality objectives serve as a guide when it comes to assessing the implications of sustainable development and thus to implementing the Code's provisions. The Code does not, however, contain any precise rules specifying the role of the environmental quality objectives in the application of its provisions.

## The general rules of consideration

Chapter 2

### Application of the rules of consideration

The general rules of consideration must *always* be complied with and apply to all operations and measures covered by the provisions of the Code, for example the cultivation of land, the handling of chemical products, the construction of buildings or facilities and environmentally hazardous activities and transportation.

However, the rules of consideration do not apply to measures that are of minor importance, such as the choice of residence and leisure occupations. But the requirements made under these rules must not be unreasonable in relation to the inconvenience or intrusion in personal freedom that they cause. The impact of a measure on human health and the environment is the determining factor when the rules are applied and not the person who intends to take or has already taken a certain measure.

It is the person who takes a measure and thus potentially makes an impact on the environment or human health who is responsible for complying with the rules and who must pay any resulting expenses.

The general rules of consideration comprise several fundamental principles:

- Section 1 The burden of proof principle
- Section 2 The knowledge requirement
- Section 3 The precautionary principle and the best possible technology principle
- Section 4 The appropriate location principle
- Section 5 The resource management and ecocycle principles
- Section 6 The product choice principle

The Swedish environmental objectives (see preceding page) serve as a guide in connection with application of the rules of consideration.

### **The burden of proof principle**

Operators must demonstrate that their operations are undertaken in an environmentally acceptable manner with regard to the rules of consideration. The same applies to persons who are planning operations or measures. The burden of proof is always on the operator. Those who are affected by the operations do not have to prove the opposite.

In practice, this means that operators must give an account of their operations and the precautions they intend to take on the basis of investigations carried out in connection with permit applications and records of self-checks in the course of operations.

In connection with application procedures pursuant to the Environmental Code, the authorities may impose conditions to ensure compliance with the rules of consideration. Permit holders must, however, comply with the rules of consideration even in areas not covered by their permits.

### **The knowledge requirement**

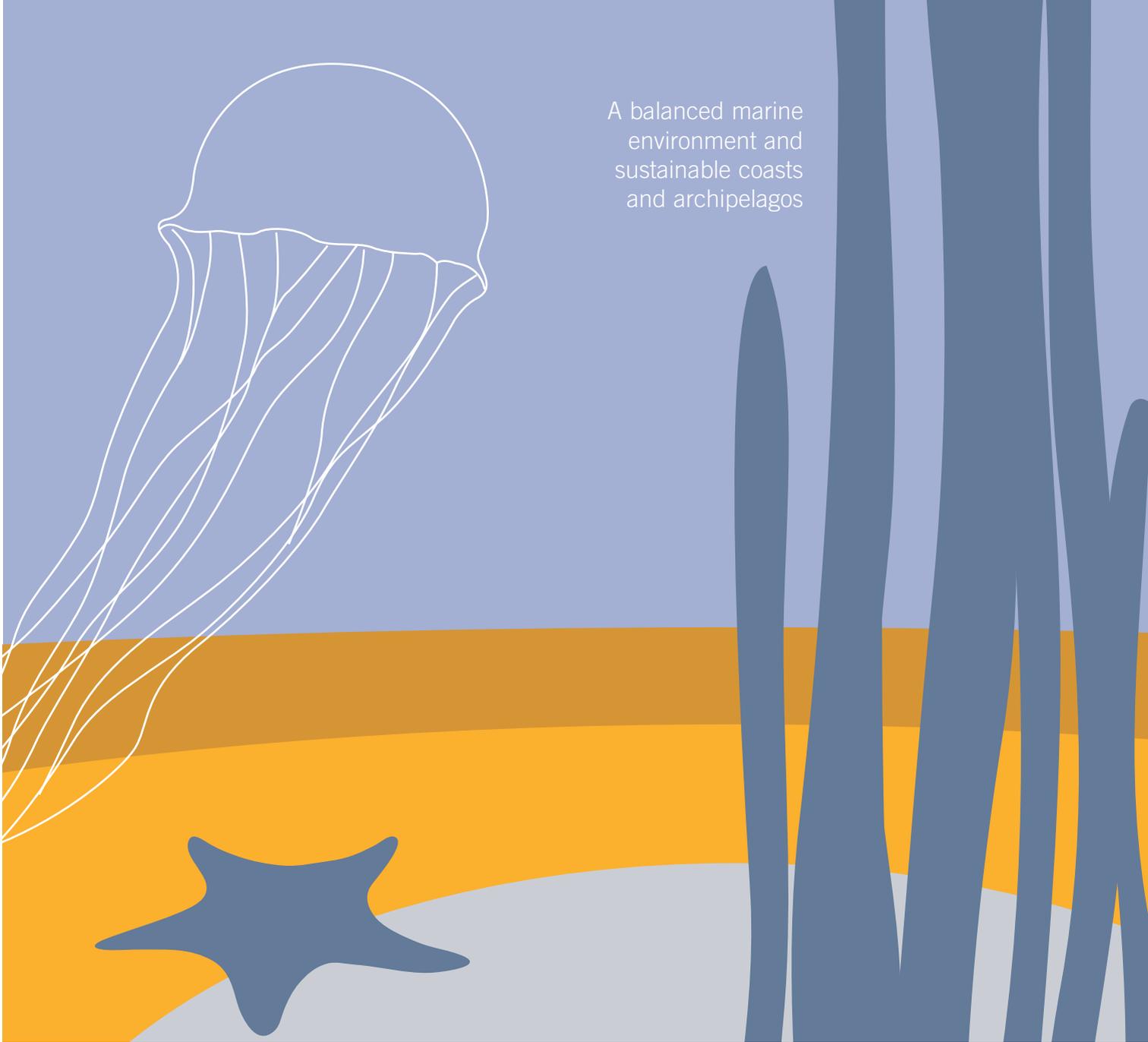
Persons who pursue an activity must possess the knowledge that is necessary in view of the nature and scope of the activity.

The knowledge requirement the importance of investigating the impact of a certain action on the environment. The purpose of the provision is to ensure that operators acquire the relevant expertise before starting operations, thus preventing damage and detriment. The extent of the requirement obviously varies depending on the nature of the operation or measure. The required knowledge may have to do with the effects of a measure on the environment and the measures that must be taken in order to limit these effects, but equally with the consequences of omitting to take a measure or restricting its scope.

In connection with the permit application procedure the applicant must describe the potential environmental impact of the operation to which the application relates and the possibility of limiting this impact. Consequently, the applicant must obtain detailed knowledge both of the operation and the area in which it will be undertaken, as well as the impact of the operation on the area. If there is no previous experience of similar operations, the applicant may be required to improve the state of knowledge by carrying out investigations of his own.

Operators must continuously keep themselves informed of their operations and the impact they make on the environment and human health. In other words, the knowledge requirement is not static, but changes over time depending on developments in knowledge, new technology and environmental changes.

Persons who pursue an activity for which a permit is not required under the Environmental Code must of course also comply with the knowledge requirement



A balanced marine environment and sustainable coasts and archipelagos

and in connection with supervision demonstrate that they possess the necessary knowledge about the activity and its effects on the environment.

### **The precautionary principle**

The precautionary principle, which is the fundamental rule of consideration in the Code, means that the mere risk of damage or detriment involves an obligation to take the necessary measures to combat or prevent adverse health and environmental effects. This rule applies to all operations that may be relevant to the objectives of the Code.

Taking precautions means limiting and reducing the risk of emissions and other damage caused by an operation. This may, for example, involve taking technical measures, choosing appropriate methods, limiting the scale of the operation, choosing suitable raw materials and fuels, using treatment equipment, avoiding emissions

in certain weather conditions, taking noise protection measures at source, only carrying out harmful operations at certain times, packaging and handling chemicals appropriately and providing information about the use and handling of various substances.

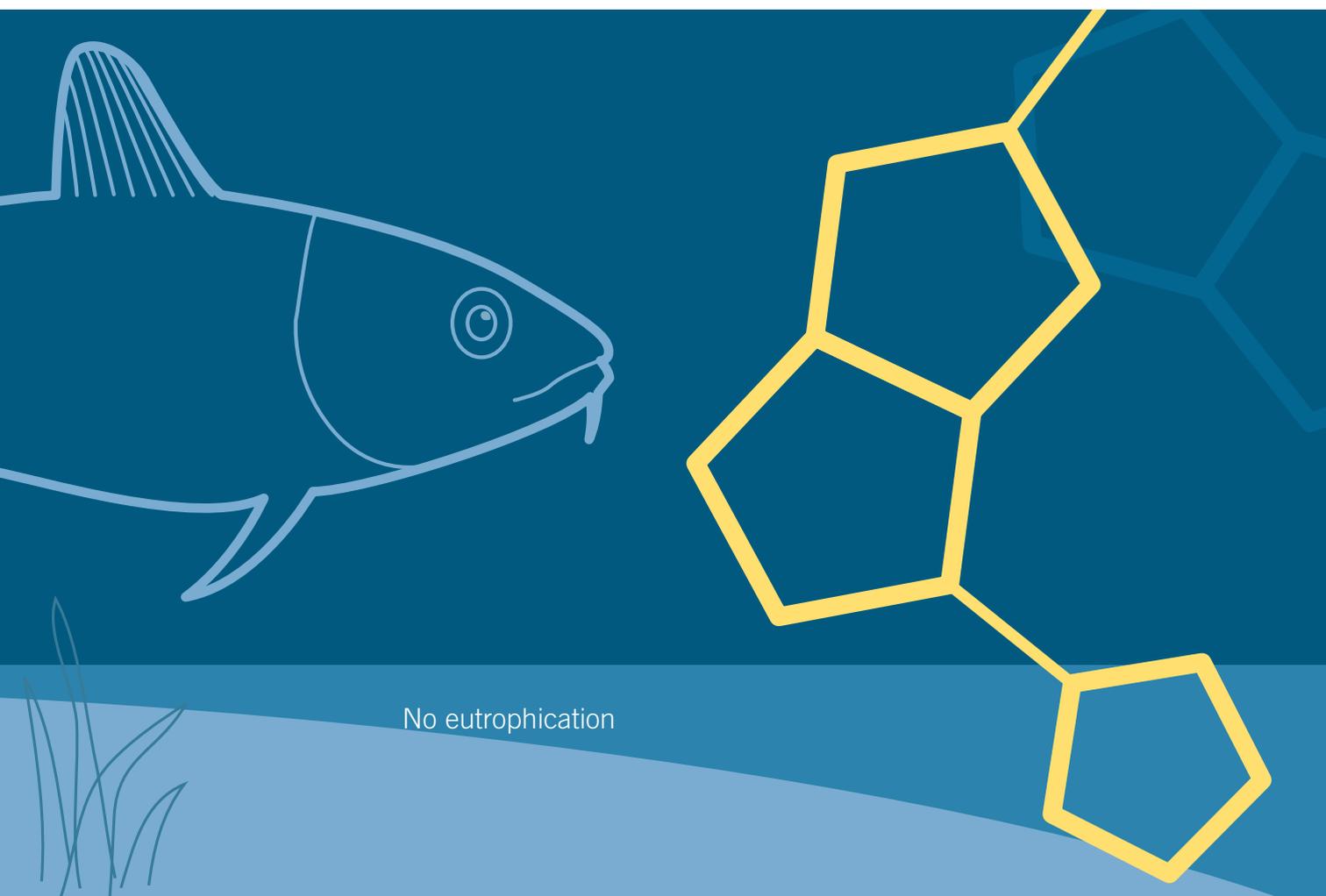
### Best possible technology

The best possible technology is to be used for professional operations. The term *best possible technology* applies to the technology used both for the operation itself and for the construction, operation and decommissioning of the plant. An essential condition for using the best technology is that it must be feasible in industrial and economic terms in the line of business concerned.

### The Polluter Pays Principle (PPP)

It is always the person who causes or is liable to cause an environmental impact who must pay for the preventive or remedial measures that must be taken to comply with the general rules of consideration. It makes no difference whether the operations are carried out on a commercial basis or not. The Polluter Pays Principle is internationally recognized.

This responsibility involves an obligation to remedy or prevent damage and detriment by taking or financing specific measures. For practical, economic and environmental reasons it is sometimes inappropriate for the responsible operator himself to carry out the measures needed to remedy damage or detriment. For one thing, it may be necessary to take measures so urgently that it is impossible to establish who



No eutrophication

is responsible. In other cases only certain persons may be authorized or able to take the necessary action.

### The appropriate location principle

In accordance with the appropriate location principle the site must, in the case of operations located in land or water areas, be appropriate with respect to the objectives of the Code and the rules concerning land and water management.

The appropriate location principle is based on the fact that the choice of site is crucial to the environmental impact that is caused by an operation and that by choosing a suitable site it is possible to minimize damage both to the environment and human health.

A report on alternative sites in an environmental impact statement provides supporting data for the choice of site. The site chosen should be the one where the operations are most compatible with the Code's rules of consideration and special land management rules.

The appropriate location principle is to be taken into account even where it is not feasible to locate an operation far from the proposed site since it involves utilization of a specific natural resource, for example a gravel pit, a forest or a waterfall section.

### The resource management and ecocycle principles

In accordance with *the resource management principle*, an operation must be undertaken in such a way as to ensure efficient use of raw materials and energy and minimization of consumption and waste. The preferred sources of energy are solar energy, wind energy and hydropower, as well as biologically renewable energy sources.

In accordance with *the ecocycle principle*, it must be possible to use, reuse, recycle and dispose of all materials extracted from the natural environment in a sustainable manner with the minimum use of resources and without damaging the environment. The ultimate goal of this principle is to maintain closed material loops.

Both principles are applicable to all operations and measures that are not of minor importance. The application of both principles should be conducive to development towards a more resource-efficient society in terms of the use of raw materials and other materials and towards environmentally sound production of goods. It may, however, be difficult to apply the principles where there is a conflict of environmental interests. For instance, the use of recycled materials in production is a sound resource management approach, but at the same time this may give result in more harmful emissions than the use of virgin raw materials.

When it comes to applying these two principles to the manufacture of a product, a lifecycle analysis is helpful, since the consumption of raw materials and energy varies at different stages. A car consumes certain resources at the production stage, others in connection with use and others again when it is disposed of.

### The product choice principle

The product choice principle consists in refraining from the use or sale of chemical products that may involve hazards to human health or the environment should be avoided if other, less dangerous products can be used instead.

This principle applies to all those who use or sell a product. It therefore also applies to private individuals. In practice, the choice of product is up to the user, who can best decide whether a product serves his purpose or not. But manufac-

turers, importers and suppliers are often in a better position than the user to find alternatives for different needs.

The product choice principle cannot be replaced by the precautionary principle, but should be applied in parallel. The intrinsic characteristics of a product must be assessed and compared with other alternatives every time a choice is made. The product choice principle should always be applied where there is a choice, not just the first time. There is thus a strong link here with the knowledge requirement and the principle that the best available technology should be used.

### **The reasonableness principle**

All the rules of consideration are to be applied in the light of benefits and costs. The conditions associated with operations must be based on environmental considerations while not involving unreasonable expense. A line must be drawn where the benefit to the environment does not make up for the cost of the precautions to be taken.

Application of the reasonableness principle also means that interests other than purely environmental interests must also be taken into account. For example, a measure must not be allowed to cause excessive inconvenience and infringement of personal liberty. It is also important to consider whether the measure is taken within the context of economic activity or whether it is taken by a person acting as a private individual.

Furthermore, the conditions imposed must not be so strict as to jeopardize the objectives adopted by the Government and Parliament with respect to the total defence.

It is the operator who, in accordance with the burden of proof principle, must demonstrate that the cost of a protective measure is not justified from an environmental point of view or that it represents an unreasonable burden.

### **The stopping rule**

Where an operation or measure is liable to cause substantial damage even though the necessary precautions are taken in accordance with the Environmental Code, it must not be permitted unless special reasons exist. This stopping rule is applicable to all operations and measures within the sphere of application of the Code. The risk of damage must not be insignificant and it must be possible to assess the risk with some degree of probability.

The stopping rule sets an absolute minimum level of acceptable health and environmental protection, regardless of economic concerns or the significance of the operation. The stopping rule should be applied when the other rules of consideration set forth in the Code are not sufficient to ensure adequate protection against dangerous operations and measures.

Where a reviewing authority considers it necessary to apply the stopping rule, it must decide to prohibit the operation or order that it be discontinued.

If the authority considers that the operation is nevertheless justified for special reasons, the matter must be left to the Government for a decision. A special reason in this connection might be that the operation provides employment.

If an activity is liable to lead to a significant deterioration in the living conditions of a large number of people or substantial detriment to the environment, the Government may only permit it in exceptional circumstances.

If the operation is liable to be detrimental to public health, not even the Government can permit it.

Natural acidification  
only



The purpose of the provisions concerning land management is to specify important areas of interest to community development that are to be given priority when decisions are made concerning land use. The interests referred to in the provisions are to be protected as far as possible from such changes in land use as would be detrimental to them.

The provisions concerning land management take into account both conservation interests and utilization interests. Areas where conservation interests exist, and which should therefore be protected, are large unspoiled areas, areas that are particularly sensitive from an ecological point of view, areas with great natural and cultural assets and areas that are particularly valuable for recreation purposes.

Agriculture and forestry, reindeer husbandry, fishing and agriculture, areas where there are deposits of materials, site-related facilities such as deep-water harbours and areas used for the purposes of the total defence are examples of utilization interests.

## **Areas of national interest enjoy special protection**

In specific areas the abovementioned conservation and utilization interests may be designated national interests by the Government, which means that they enjoy even stronger protection against modification.

Certain geographical areas possess such valuable natural and cultural assets that they are mentioned specifically in the text of the Code as national interests. No development that is liable to reduce the value of the national interest may be undertaken in these areas. The geographical areas designated in the Code are:

- areas that are valuable for tourism and recreation;
- unspoiled coasts and heavily developed coasts;
- undeveloped mountain areas;
- rivers that must not be harnessed for hydropower; and
- the Stockholm national urban park.

## **No obstacle to local development**

The provisions on national interests apply mostly to very large areas. They are therefore not intended to prevent the development of urban areas and local industry or total defence installations or the extraction of certain substances and materials. Permit application procedures relating to development in these areas therefore focus on finding suitable alternative locations near the localities concerned and on appropriate project implementation that is consistent with the purposes of the provisions.

Sustainable  
forests



Environmental quality standards are adopted in order to address actual or potential environmental problems. These standards establish a minimum environmental quality with respect to land, water, air or other aspects of the environment in a geographical area. The standards specify the levels of pollution or other impacts that human beings or the environment can be subjected to without any risk of significant detriment. The levels are established on the basis of scientific criteria.

## **Standards indicate minimum acceptable quality**

The standards do not specify permissible emission levels, but the environmental quality that must be achieved in the area. Environmental quality is expressed as a specified environmental state with respect to the occurrence of pollution and certain other impacts such as noise.

An environmental quality standard may specify the occurrence of a chemical product in land, surface water or groundwater, the air or the environment in general, or a limit value for noise, vibrations, light or radiation.

## **The standards are binding on public authorities**

The Government issues rules concerning environmental quality standards. These standards are binding on central and local authorities in connection with application procedures, supervision and the issuance of regulations. Feasibility assessments in accordance with the rules of consideration must not permit infringement of an environmental quality standard. The standards thus represent a minimum level in connection with the application of the rules of consideration.

Central and local authorities must comply with the standards in connection with planning, including spatial planning. This means that such planning must be undertaken in such a way as to facilitate compliance with the standards.

## **Action programmes**

Where an environmental standard is not achieved, the Government may decide that an action programme must be drawn up. Action programmes prepared by a municipality must be adopted by the municipal council. They must specify what concrete measures are to be taken, the authorities responsible for ensuring that the measures are taken and a time limit by which the quality standard must be achieved.

## **Existing standards**

Environmental quality standards have been adopted with respect to nitrogen dioxide, sulphur dioxide and lead levels in outdoor air. The standards have been adopted in compliance with the EC Directives on air quality.

## The purpose and function of environmental impact statements

An environmental impact statement must be prepared by an operator before submitting a permit application and must be attached to the application. The cost of preparing environmental impact statements is borne by the operator. Together with a regulated consultation process the assessment should provide the best possible decision guidance data from the point of view of the environment and health.

In connection with the consultation process which takes place prior to the drafting of an environmental impact statement the operator must obtain and compile available data and consult the other parties, authorities and organisations concerned, as well as the public. The purpose of the environmental impact statement process is to detect knowledge gaps and increase understanding of the environmental, health and natural resource issues involved in the project. The project must be modified in the light of the consultation process both as regards the choice of alternatives and preventive measures. The process eventually results in a document – the environmental impact statement – that describes the effects of the planned operation on human health and the environment and on the management of natural resources.

## When are environmental impact statements required?

An environmental impact assessment is to accompany an application for a permit relating to environmentally hazardous activity and health protection (chapter 9), water operations (chapter 11), quarrying operations and game enclosures (chapter 12) and the Government's consideration of permissibility provided in chapter 17.

A varied agricultural  
landscape



Environmental impact statements are also required under other legislation. Such requirements, which are wholly or partly consistent with the provisions of the Environmental Code, are contained in the Civil Aviation Act, the Roads Act, the Certain Pipelines Act, the Certain Peat Deposits Act, the Minerals Act, the Construction of Railways Act and the Electricity Act.

The legislation on planning contains provisions concerning a special type of environmental impact statement which is adapted to the course of the planning process. The provisions of the Environmental Code do not apply to such environmental impact statements.

## The right to access to private land and special protection areas

Chapter 7

### Implications of the right of access to private land

The public right of access to private land is established in the Instrument of Government (the Swedish Constitution Act). This right of access is not defined in the Environmental Code or any other statutory provisions. However, according to the Environmental Code, any person who exercises the right of access to private land or is in the countryside for any other reason shall treat it with due care and consideration. The right of access to private land must not be exercised in such a way as to damage the natural environment or cause the owner of a property significant damage or inconvenience. The right applies regardless of who owns the land.

The right of access to private land is provided under customary law and entitles the public:

- to walk, cycle, ride, ski and be in the countryside provided that there is no risk of damage to crops, forest plantings or other sensitive land. This does not include the right to enter or cross a private property;*
- to pick wild berries, flowers, fungi, fallen branches and dry brushwood lying on the ground;*
- to put up a tent for a day or two on land that is not used for agriculture and is far from housing of any kind;*
- to light a fire, if great care is taken and rocks are not damaged;*
- to use a boat in lakes and streams;*
- to go ashore, temporarily moor a boat and bathe, except near the grounds of a house or where access is prohibited to a bird or seal sanctuary.*

### Special protection areas

A person whose activities are likely to damage the natural environment must prevent the damage in accordance with the general rules of consideration. Exercising the right of access to private land may involve such an obligation, and a public authority may require appropriate action to be taken in accordance with the Code. If the right of access takes the form of organized recreation, the impact on the environment may be so great that the county administrative board must be consulted before any measures are taken.

The Code contains provisions protecting certain types of areas. The purpose of these protective provisions is usually to protect valuable natural and cultural assets, but they also protect the right of access to private land. In special protection areas the right of access may be restricted in certain areas, for example wildlife sanctuaries.

### National parks

If the state owns a large continuous land or water area of great value that is worth preserving in its natural state, the Government may, following approval by Parliament, designate the area a national park. If the state does not own the area, it must first acquire the land, for example by compulsory purchase.

### Nature and culture reserves

A land or water area may be designated a nature or culture reserve by a county administrative board or municipality if this is necessary in order to preserve biological diversity, conserve valuable natural or cultural environments or meet recreational needs in the area. There must be a strong public interest in protecting the area. The state or a municipality may acquire the land by compulsory purchase, but reserves can also be established on private land.

### Natural monuments

Certain distinctive natural objects, such as large trees, 'rauks' (limestone formations on the island of Gotland), erratic blocks and kettle holes, may need protection to preserve them for the future. The county administrative board or the municipality can in that case declare such a natural object, including the surrounding area, a natural monument.

### Habitat protection areas

The purpose of habitat protection is to protect various types of small habitats which are known to be important for biological diversity. Some of these small habitats are specifically protected by law. They include tree-lined roads, clearance cairns and stone walls, as well as ponds and wetlands on agricultural land. This protection does not apply in the immediate vicinity of built-up areas. Other habitats may be protected by special decision of a county administrative board or a county forestry board.

### Animal and plant sanctuaries

If it is necessary to protect an animal or plant species in a certain area, the county administrative board or municipality may issue regulations restricting the right to hunting or fishing or the right of the public or landowners to enter the area.

## Environmental protection zones

If a large land or water area is susceptible to pollution, or if an environmental quality standard has not been met in a certain area, and special regulations may be necessary in order to remedy the situation, the Government may declare the area an environmental protection zone.

## Water protection areas

A land or water area that is used or is likely to be used for water catchments may be declared a water protection area by a county administrative board or municipality. Water catchments means 'removal of surface water or groundwater for the purposes of water supply, heat generation or irrigation'. The water protection area should be sufficiently large to make it possible to use the raw water, after it has been treated in the normal way, for the intended purpose. Consequently the water protection area can be much larger than the water catchment.

## Natura 2000

Work is under way in the EU on the establishment of a European ecological network of protected areas. This network is called Natura 2000. The areas to be included in the network will represent various types of unspoiled natural environments or contain species that are worthy of protection. The network is regulated by two Directives: the Bird Directive (79/409/EEC) and the Species and Habitat Directive (92/43/EEC). Natura 2000 is currently being built up, and the European Commission will take a decision on its future in 2004.

# Shore protection

Chapter 7

Sea-shores and the shores of all lakes and watercourses are protected in a buffer zone extending up to 100 metres on either side of the shoreline. The purpose of shore protection is both to assure public access to private land in the shore area and to maintain good living conditions for plant and animal species on land and in water.

Certain measures are prohibited in shoreline protection areas. Examples of such measures are the construction of new buildings, alterations to buildings, excavation, the building of structures or devices to keep out the public or other measures that may significantly affect animal and plant species. Buildings and measures that are necessary for the purposes of agriculture, fishing, forestry or reindeer husbandry are permitted, however.

## Exemptions can be granted in special circumstances

Exemptions from shore protection may be granted in special circumstances. The scale of the measure or the structure and the present and future importance of the area are taken into account. Normally, exemptions should not be granted in areas that are of particular importance with respect to nature conservation or recreation. Exemptions must not be granted if there is any question of unacceptable impacts on biological assets. They may, however, be granted where the site is situated on land that has already been developed or outdoor recreational exercise facilities are to be built.

The county administrative boards decide whether to grant exemptions, but they can delegate these powers to municipalities. This does not apply, however, to the construction of defence installations or public highways.



### Areas exempted from shore protection

A shore area that is obviously irrelevant to the purposes of shore protection may be exempted by the county administrative board. So far, however, such exemptions have rarely been granted. Areas covered by a detailed development plan or special area regulations or the Planning and Building Act may also be exempt in special circumstances.

## Protection of animal and plant species

Chapter 8

### Legal protection

The Environmental Code provides for the legal protection of animals and plants in a part or the whole of the country. Decisions protecting a species are taken by the Swedish Environmental Protection Agency when they relate to the country as a whole and otherwise by the respective county administrative board. Killing, injuring or capturing wild animals, taking or damaging the eggs, spawn, roe or nests of such animals or removing, damaging or taking seeds or other parts from wild plants may be prohibited. Such a prohibition can be imposed where there is a risk of a species becoming

extinct or being subjected to depredation or where it is necessary for compliance with Sweden's international undertakings with respect to the protection of a species.

### **Prohibitions against the release of alien species**

In order to protect wild animal or plant species or the natural environment, a ban may be imposed on the release of animal or plant species into the environment. Instead of a prohibition, the release of such species may be associated with special conditions. The purpose of this provision is to prevent the active introduction of species outside their natural area of distribution where this is liable to be harmful to other species, but obviously the intention is not to prevent the natural spread of species outside their original area of distribution. This provision is also in line with Sweden's commitments under the Convention on Biological Diversity.

### **Rules on the trade in species**

Trade, whether legal or illegal, and other commercial transactions involving animals and plants may pose a threat to the survival of species. Sweden is bound by several international agreements whose purpose is to prevent this trade.

There are provisions on the trade in and other dealings with specimens of living animal and plant species that are in need of protection. The rules relate to imports and exports, transportation, housing, preparation and exhibition of animals and plants, eggs, spawn, roe and nests and other products extracted from animals or plants.

## **Environmentally hazardous activities and health protection**

Chapter 9

The term 'environmentally hazardous activities' is defined in the Environmental Code as all use of land, buildings or facilities that in one way or another causes emissions to land, air or water or involves the risk of detriment to human health or the environment. Three main types of activities are defined.

#### **1. Discharges of wastewater etc.**

Discharges of wastewater, solid matter or gas from land, buildings or facilities into land or water areas or groundwater are always defined as environmentally hazardous activities. The discharges into groundwater referred to in this connection are direct discharges and not discharges due to infiltration.

#### **2. Other discharges and emissions or pollutants**

Damage may be caused by other kinds of emissions or pollutants due to the use of land, buildings or facilities, for example agricultural land, transport facilities and landfill sites. Damage may also be caused by indirect emissions or discharges, for example discharges into groundwater of leachates from a landfill site due to infiltration.

#### **3. Noise, vibration, light, radiation etc.**

Damage or nuisances may occur in the vicinity of the harmful activity due to noise, vibrations, light, ionizing and non-ionizing radiation or similar impacts. The light referred to here may emanate from advertising devices and traffic facilities etc.

Examples of similar impacts are insects, airborne bacteria and viruses, sounds other than noise, sparks or mental stress.

The term 'environmentally hazardous activities' relates to all environmental impacts, regardless of whether they are local, regional, national or global. However, the provisions do not apply to mobile impact sources, such as aircraft. Airports, however, are stationary sources and are covered by the provisions.

'Environmentally hazardous activities' also include temporary impacts. The term may therefore apply to a mobile structure or device, for example a stone crusher, that operates on a site for a very short space of time.

## **Permit and notification requirements**

Permits must be obtained for the establishment, operation and in some cases modification of environmentally hazardous activities on a certain scale. The structures and operations for which permits must be obtained are covered by a separate Ordinance. Permit applications are considered by environmental courts or county administrative boards.

In certain cases a supervisory authority may require a permit for an activity for which a permit is not normally required if it considers that the activity involves a risk of significant pollution or other significant damage. An operator may also apply for a permit on his own initiative.

The supervisory authority in the municipality must be notified in the case of certain operations and structures that make a minor environmental impact. These are also covered by a separate Ordinance.

## **Health protection**

In accordance with the precautionary principle, operators must take steps to prevent damage or detriment being caused to human health or the environment by their operations. The purpose of health protection measures is to prevent or eliminate impacts on human health.

'Detriment to human health or the environment' is defined in the Environmental Code as any disturbance that is liable to have adverse effects on health in medical or hygienic terms which are not minor or temporary. Detrimental effects include heat, cold, draughts, humidity, noise, air pollutants, radon, fungal damage and similar effects and are linked to the physical environment. The disturbances referred to are ones that are not minor or of a temporary nature. Assessments are made without reference to economic or technical aspects.

A minor disturbance is one that only has an adverse effect on certain individuals, rather than the majority of people. However, particularly sensitive persons, such as allergy sufferers, must be given special consideration.

## **Special housing requirements**

In order to prevent adverse effects on human health, residential buildings must satisfy certain basic requirements. They must provide adequate protection against heat, cold, draughts, humidity and noise. They must have satisfactory ventilation and let in sufficient daylight. They must provide access to water and facilities for maintaining an adequate standard of personal hygiene.

A non-toxic  
environment



### **Municipalities are responsible for supervising health protection**

Municipalities have a special responsibility for supervising health protection in residential buildings, hospitals and educational establishments, hotels, meeting rooms and similar premises and buildings.

Municipalities may issue regulations where necessary in order to prevent adverse effects on human health in the municipality.

Here are some examples of activities that may be covered by such regulations:

- \* vehicle engine idling
- \* the installation of toilets other than water toilets
- \* the protection of surface water sources and private groundwater sources
- \* temporary prohibition of fire lighting and bonfires of leaves etc.
- \* restrictions or conditions relating to the playing of street music in public places

## Applicability of the provisions

If an area is so polluted that it is liable to damage human health or the environment, a supervisory authority may require the person or persons responsible to take remedial measures to eliminate the damage. These provisions apply to pollutants above land, in the soil, in groundwater, in water areas or in buildings or structures where the building or structure itself is contaminated. The provisions are applicable regardless of whether or not the contamination was caused deliberately.

The date when the pollution took place is irrelevant to the application of the provisions, since the general statutory periods of limitation do not apply to liability for remediation. However, only contamination caused by environmentally hazardous activities undertaken after June 30 1969 will incur liability under the Environmental Code.

## Operators are liable in the first instance

The person liable for remedial measures is normally the person who carries or carried on the activity that caused the pollution. A person who causes the spread of pollution from a polluted area, for example by excavation operations, is also considered an operator. If an operator can show that he is only responsible for a small proportion of the pollution, this is to be taken into account when the extent of liability is assessed. If the pollution was caused by several operators, they are jointly liable.

## Property owners are liable in the second instance

If an operator is not able to carry out or pay for the remediation of a polluted property, any person who acquired the property after January 1 1999 and was aware of the pollution at the time of acquisition, or ought to have discovered it then, will be liable for remediation. In the case of purchases of private houses, only a buyer who is aware of the pollution will be liable.

## Compulsory notification

Regardless of whether or not the area was previously deemed to be polluted, the owner or user of a property must immediately notify the supervisory authority where any pollution is discovered on the property that may cause damage or detriment to human health or the environment.

## Environmental hazard zones

If a land or water area is so seriously contaminated that restrictions on the use of the land or other precautions are necessary in view of the risks to human health or the environment, the county administrative boards must by decision declare the area an environmental hazard zone.

'Water operations' is a generic term for operations in or involving water. These operations include:

1. the construction and alteration of structures in water areas, the removal of water from or excavation in water areas, as well as other measures whose purpose is to change the depth or position of the water
2. the diversion and recharging of groundwater
3. land drainage, i.e. measures undertaken to drain land

## Right to use water

Right of use is a key concept in the legislation concerning various kinds of water operations. Water in the natural environment circulates constantly in the hydrological cycle and cannot be owned in the normal sense. Instead, persons may have the right to use water in various ways. Owners of properties containing water have a general right of use.

## Conditions applying to water operations

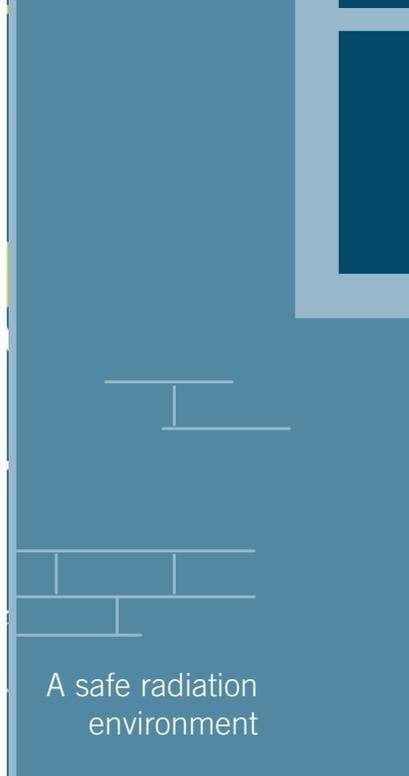
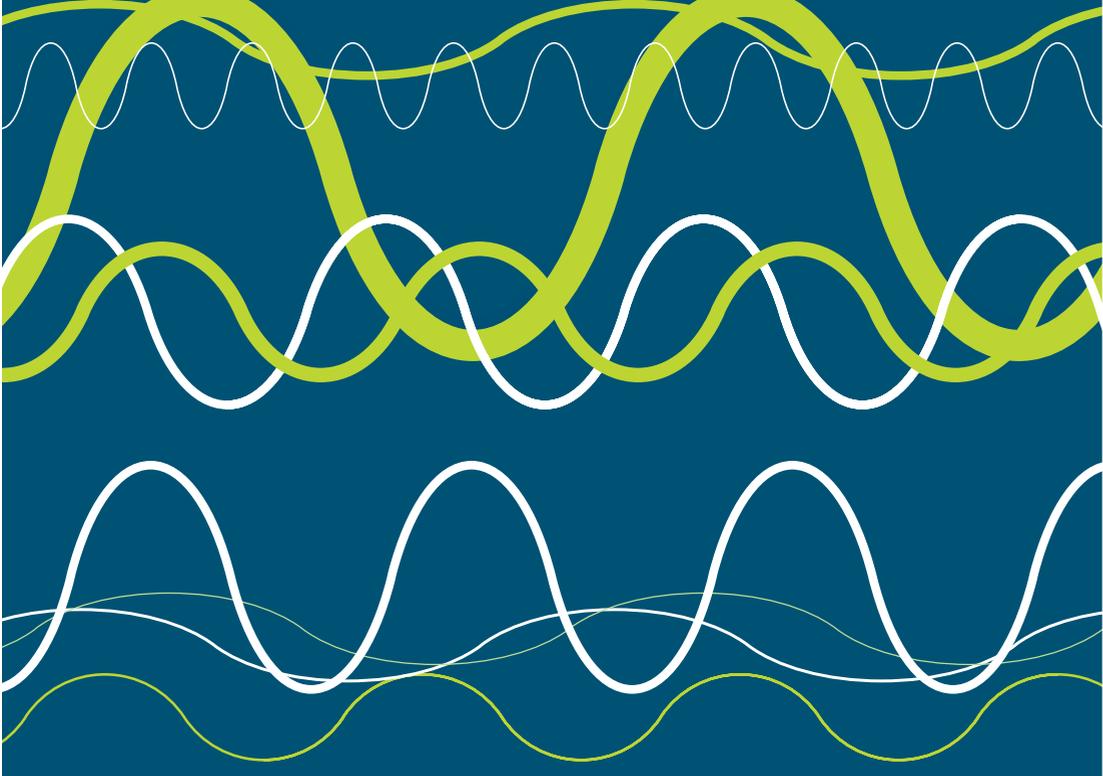
The basic rules governing all water operations are, as for all activities to which the Environmental Code applies, the general rules of consideration. The Code also stipulates that water operations may only be undertaken if the benefits from the point of view of public and private interests are greater than the costs and damage associated with them. The purpose of this provision is to prevent water operations that are not justified in terms of the public economy.

Furthermore, water operations must not be prejudicial to other activities which are likely to involve the same water source in the future and which serve important public or private purposes. For example, it may be necessary to adapt a bridge to future boat traffic. This provision applies where the operations can be carried out subject to this condition without unreasonable expense.

## Permits must usually be obtained for water operations

A permit must be obtained unless public or private interests are manifestly not harmed by the impact of water operations on water conditions. Permits are not required for private water sources, structures for the breeding of fish, mussels or crustaceans or facilities for heat generation using surface water or groundwater. However, permits for or notification of such structures and facilities may be required under other provisions of the Code.

Land drainage must not be undertaken without a permit except for the purposes of peat extraction in certain cases. A permit must be obtained even where it is obvious that the effects of the operations on water conditions are not prejudicial either to public or private interests. In some parts of the country land drainage is prohibited altogether. In such areas an exemption from the prohibition must be applied for before a permit application is submitted. Permits may also be required for other measures connected with the drainage of land where they may have a permanent adverse effect on plant and wildlife.



A safe radiation environment

# Quarrying, notice of consultation and environmental concerns in agriculture

Chapter 12

## Quarrying and extraction

A certain permission from the county administrative board is required for the quarrying of rock, stone, gravel, sand, clay, soil, peat or other types of soil. An environmental impact assessment must be attached to the application and the operator must normally furnish a financial security corresponding to the cost of any remedial measures.

Permits are not required for quarrying for personal use, unless the county administrative board has issued a rule making the permits compulsory in such cases too. 'Personal use' in this connection means the extraction of materials to be used on and for the purposes of the person's property.

When applications for quarrying permits are considered, the demand for the material to be extracted is balanced against the damage that the quarrying operation is likely to cause to wildlife and the environment in general. A permit must not be granted for a quarrying operation that is likely to be detrimental to the habitat of any endangered, rare or care-demanding animal or plant species. Biological diversity thus takes precedence over development in comparisons of the importance of these two interests. When applications for permits for the extraction of topsoil are considered, county administrative boards are also to take into account the need of cultivable agricultural land.

## Compulsory notice of consultation where an activity is liable to have a significant impact on the natural environment

If an activity or measure for which a permit or notification is not required is liable to have a significant impact on the natural environment, the operator must issue a notice of consultation to the supervisory authority. Examples of activities for which permits may be required are large-scale excavation and drainage works, the con-

struction of power line routes, the conversion of arable land to forest land, the erection of radio and telecommunications masts, organized recreation and the dumping of excavation and demolition residues. Notice of consultation may also be required in the case of quarrying operations for personal use.

County administrative boards may prescribe that a notice of consultation must always be issued for certain operations or measures in a part or the whole of the country. A notice of consultation must be issued at least six weeks before commencement of the operation or measure. Such notices must be in writing and include a map of the operation site and, where necessary, an environmental impact assessment.

### Environmental concerns in agriculture

The Environmental Concerns in Agriculture Ordinance contains provisions designed to reduce the leakage into water and air of nutrients due to manuring and crop production. County administrative boards may grant exemptions from these rules in special circumstances. The number of animals on holdings with more than 10 livestock units may be restricted where this is necessary for environmental reasons.

## Genetic engineering

Chapter 13

Genetic engineering is an area of biotechnology in which genetic material is deliberately modified, for example by transferring individual genes with certain characteristics. A genetically modified organism is an organism in which the genetic material has been modified in a way that does not occur naturally by mating or natural recombination.

Genetic engineering is regulated mainly by EC Directives. The Directives have been incorporated into Swedish law by the provisions of the Environmental Code and the Genetically Modified Organisms Ordinance.

The Environmental Code contains special provisions relating to genetic engineering, whose purpose is to ensure that ethical concerns are taken into consideration. These provisions apply in connection with:

- \* *contained use*, i.e. where the organism does not come into contact with the public or the environment, for example in a laboratory, a bioreactor or a sufficiently well-sealed greenhouse;
- \* *deliberate release*, where the organisms are not contained, but are planted outside, for example;
- \* *the placing on the market of the organisms*, i.e. where such organisms are offered for sale or made available to others.

### Consideration of ethical concerns

Under the provisions of the Environmental Code our right to modify nature is linked to responsible stewardship of natural resources. This responsibility is particularly evident in connection with genetic engineering. Apart from the general rules of consideration, certain ethical concerns must therefore be taken into account in order to prevent serious disturbances in ecological systems and to ensure that various genetic applications are not regarded as objectionable or contrary to accepted practice and public order. Furthermore, they must not cause animals unnecessary suffering.

The provisions concerning genetic engineering stipulate, among other things, that an investigation must be carried out before a genetically modified organism is used in any of the three cases mentioned above. Assessments of the health or environmental damage that may be caused by the organism must be based on this investigation.

The licensing authorities in individual cases are various central line agencies such as the National Chemicals Inspectorate, the Swedish Board of Agriculture, the National Food Administration and the Medical Products Agency.

### **The Swedish Gene Technology Advisory Board**

The Swedish Gene Technology Advisory Board is responsible for promoting, by advisory activities, ethically defensible and safe use of genetic engineering with a view to protecting human and animal health and the environment. The Board submits an opinion on all permit application procedures relating to genetic engineering. It consists of 14 members, seven of whom are Members of Parliament. The chair must be a jurist with experience as a judge.

## **Chemical products**

Chapter 13

The general rules of consideration laid down in the Environmental Code also apply to the handling of chemical products. The product choice principle applies particularly to persons who use or sell chemical products. The rules on chemical products apply equally to biotechnical organisms.

### **Manufacturers and importers must perform assessments**

To be able to apply the product choice principle, persons who handle chemical products must be informed of the risks associated with handling. Manufacturers and importers of chemical products must therefore carry out the necessary investigations.

Such investigations are to include an assessment of the characteristics of the product in terms of health and environmental protection. The investigations must also indicate the measures that are necessary in order to protect human health and the environment in connection with handling and the measures that should be taken to dispose of the waste generated by the products. If new information indicating that the product may have adverse effects subsequently becomes available, the manufacturer or distributor of the product must immediately notify the authority concerned.

### **Product information requirement**

Chemical products that are professionally manufactured in Sweden or imported into this country must be registered in a product register. Manufacturers and importers of such products must report their products to the product register.

Professional manufacturers, importers and distributors of products must provide any information about the data generated by their investigations that is necessary in order to protect human health or the environment (product information). Product information is to be supplied on warning labels or information sheets accompanying the products. It is particularly important that information supplied to consumers is easy to understand.

## Pesticides

Pesticides may only be approved if they are acceptable from the point of view of health and the environment and there is an obvious need of control in the intended area of use. Approval decisions are of limited duration.

Chemical or biological pesticides must be applied in such a way as not to damage human health or cause other nuisances and to minimize the environmental impact. Pesticides must not be applied outside the designated area of application.

Pesticides must not be applied from aircraft. Pesticides used for the purpose of controlling deciduous brush must not be applied over forest land.

# Waste and producer responsibility

Chapter 15

”Waste” means according to the Environmental Code any object, matter or substance belonging to a specific waste category which the holder disposes of or intends or is required to dispose of. The waste categories are described in a separate Ordinance and correspond to those in the European Waste Catalogue (EWC).

The definition of waste applies regardless of whether it is of any economic value to the person who disposes of it or whether it is to be reused by another person.

## The municipalities’ responsibilities

All municipalities must adopt a municipal waste management regime and a waste disposal plan. The waste management regime lays down rules for the disposal of waste in the municipality, and the waste disposal plan contains data on waste quantities and streams in the municipality and on the measures taken by the municipality to reduce the quantity and dangerousness of the waste.

Municipalities are responsible for transporting household waste to a treatment facility and recycling or disposing of it. They are also responsible for the removal of discarded refrigerators and freezers, and also for accepting and removing oil refuse, toilet waste and certain other types of waste from ships in port.

This responsibility does not extend to waste separated from household waste, for which producers are responsible. Municipalities must provide appropriate collection systems for discarded batteries and then sort and remove the batteries that are handed in for recycling or disposal.

Transportation of household waste may only be undertaken by the person engaged by the municipality for the purpose. Consequently, property owners must not themselves transport household waste to a waste disposal plant except under the conditions specified in the waste management regime.

## Requirements concerning deliverers and carriers of waste

Persons who in their professional activities generate waste other than household waste and persons who dispose of such waste on a professional basis must supply information about the nature, composition and quantity of such waste, its origin and where it is delivered. This information is to be given to the relevant municipal committee.

Waste may only be removed on a professional basis by persons who have obtained the necessary permit. However, a permit is not required for the transportation of waste which is to be reused.

Those who remove waste generated by their own activities do not need to obtain



A protective  
ozone layer

a permit, but must submit relevant notification. Exemptions are granted where the waste generated is less than 10 tonnes or 50 cubic metres per year.

### Permits for hazardous waste

Hazardous waste, as defined in the Hazardous Waste Ordinance, may only be removed, placed in intermediate storage, recycled and disposed of by enterprises that hold a special permit. Enterprises that handle hazardous wastes must have the necessary technical, economic and human resources to deal with the waste in an appropriate manner from the point of view of the environment and health protection.

Producers of hazardous waste are responsible for ensuring that the waste is removed by a holder of the requisite permit and that those who receive the waste for treatment or disposal have a permit for such operations. Records must be kept of all transports of hazardous waste.

### Producer responsibility

Producers are responsible for the collection, removal, reuse, recycling and disposal of certain types of waste. This means that they have overall responsibility for all aspects of waste management. The types of waste to which the producer responsibility system currently applies are:

- \* *wastepaper*, i.e. newspapers, advertising brochures, catalogues and directories etc.
- \* *tyres*, i.e. tyres for cars, buses etc., but not bicycle tyres
- \* *packaging*, i.e. products, regardless of the materials used, produced for the purpose of containing, protecting, handling, supplying and presenting products – from raw materials to end products and from producers to users and consumers
- \* *cars*, i.e. motor vehicles weighing less than 3,500 kg.
- \* *electrical and electronic products (from July 1 2001)*
- \* *lead batteries*. Professional manufacturers, importers, distributors or retailers of lead batteries are also subject to a form of producer responsibility since they are required to accept discarded batteries and take them to a waste disposal or recycling plant.

### New rules on combustible and organic waste

Combustible waste must be stored and removed separately from other waste. After January 1 2002, combustible waste must not be landfilled but disposed of in such a way that the energy content is recovered. The landfilling of organic waste will be prohibited after January 1 2005.

### Household composting arrangements must be reported to the municipality

Property owners who wish to compost, bury or dispose of waste other than garden waste in some other way on their property must report this to the municipality. In that case the rules of consideration apply to property owners.

# Common rules concerning the consideration of cases and matters

The rules on application procedures laid down in chapter 16 apply to all matters covered by the Environmental Code. Apart from these common rules, special rules apply to certain types of operations.

The common rules on permit application procedures are basically as follows:

- \* Applicants must show that they have complied with the general rules of consideration by reporting the measures they have taken to the reviewing authority.
- \* The authorities apply the same criteria to all cases and matters considered by them, i.e. the objectives of the Environmental Code, the general rules of consideration, the adopted environmental quality standards and the rules on special protection areas.
- \* Associated projects are also considered in connection with such procedures, for example new roads that need to be built in connection with the establishment of an operation.
- \* Applications may be denied in cases where the applicant has not complied with previous decisions.
- \* Decisions may be made subject to certain conditions.
- \* Decisions may be of limited duration.
- \* Financial securities may be required for remedial measures. The state, municipalities, county councils and associations of municipalities shall not be required to furnish a security.
- \* Permits must not conflict with the planning provisions currently in force.
- \* Environmental quality standards must not be infringed.
- \* Conditions may apply to more than one operation where several operators have agreed to take joint measures.
- \* Permits may be made subject to the following conditions:
  - an examination of the area concerned must be carried out
  - specific measures must be taken with a view to conservation of the area
  - specific measures must be taken to compensate for any encroachment.

## The Government's consideration of permissibility

### Operations for which government permission must be obtained

The Government always considers the permissibility of certain operations specified in the Environmental Code. These operations include large-scale process industries, energy and waste disposal facilities, motorways, railways and airports.

The Government can also assess the permissibility of other operations where such operations are liable to conflict with the purposes of the Code to a significant

extent. Public authorities which receive information about such operations must notify the Government.

### **The permissibility procedure**

In connection with the permissibility procedure the Government undertakes a review to assess whether the operation satisfies the conditions applying to such operations.

The permissibility procedure does not replace the permit application procedure, but consists of an assessment of whether or not an operation is permissible under the basic rules laid down in the Environmental Code. In connection with the subsequent permit application procedure, the reviewing authority imposes any special conditions that will apply to the operation, for example any precautionary measures that need to be taken.

### **The municipal veto**

In most cases reviewed by the Government, the operation may only be permitted by the Government subject to the approval of the municipal council.

This veto does not apply to water structures, railways, motorways, public navigation channels and airports, and in certain cases facilities for intermediate storage or final disposal of nuclear material or waste. Such structures and facilities may be permitted by the Government even if the municipal council has an adverse opinion.

However, permission must not be granted if an appropriate site has been designated for the activity in another municipality which is likely to approve the site or where another site is considered more appropriate for the activity (the appropriate location principle).

## **Common rules on supervision**

Chapter 26

The rules concerning supervision laid down in the Environmental Code apply to all measures and operations covered by its provisions. The rules empower public authorities to intervene even where operations and measures are not specifically covered by the Code.

In principle, the rules of the Code also apply to private individuals, even though the Code stipulates that the rules of consideration only apply to measures that are not of negligible significance in individual cases.

In order to ensure that operations comply with the provisions of the Code, a supervisory authority may take the following measures:

provide information and advice in individual cases

issue orders and injunctions and

issue a notice of prosecution and decide to impose environmental penalty charges.

The advice supplied by the supervisory authority is not binding on operators and should therefore be given verbally.

### **Orders and injunctions**

Supervisory authorities may order an operator to take any measures that are necessary to ensure compliance with the provisions of the Environmental Code. Pursuant to such an order an operator may be required to take certain measures, to supply certain information or to carry out certain investigations. The operator may also be

required to apply for a permit for an operation or a measure even if such activities are not subject to permit requirements. Normally, orders must not impose any restrictions relating to permits that have already been granted.

Orders are always presented in writing and are binding on those to whom they are addressed. A supervisory authority may decide that an order is to apply with immediate effect even if an appeal is lodged. Orders may be made subject to a penalty of a fine.

If a supervisory authority concludes that an operation or measure causes or is liable to cause serious damage to human health and the environment, it may be prohibited.

## **Environmental offences and notice of prosecution**

The Environmental Code lists offences which carry a penalty of a fine or imprisonment not exceeding two years. The statutory limitation period for offences against the provisions of the Environmental Code is usually five years.

If a supervisory authority finds that an operation or measure involves infringement of the provisions of the Code, it must report this to the public prosecutor where there is reason to suspect that an offence has been committed. In that case, it is not for the authority itself to determine whether the offence is likely to lead to a conviction or whether it may be considered minor. This is the task of the criminal investigation, which must establish whether the offence was intentional or due to negligence, the person who is liable for the offence and related matters. Notices of prosecution are submitted to police authority or public prosecutor.

## **Environmental penalty charges**

Environmental penalty charges are administrative charges imposed in amounts between SEK 5,000 and 1,000,000 that are payable by operators pursuant to a decision by the supervisory authority. Such charges are imposed where operators fail to comply with certain rules issued pursuant to the Environmental Code, for example where an operation for which a permit must be obtained is started without a permit or where an operation has not been reported to the authorities in accordance with the rules. Penalty charges can be imposed for infringements of about 50 rules.

A separate Ordinance specifies the infringements for which supervisory authorities can impose environmental penalty charges, as well as the respective amounts. The charges are always imposed immediately following infringement of a rule. It makes no difference whether the infringement is intentional or due to negligence or whether it damaged the environment or human health or benefited the operator in any way. However, environmental penalty charges must not be imposed where this is manifestly unreasonable.

Before the supervisory authority concerned decides to impose a penalty charge, an investigation must be carried out and the operator given the opportunity to make a statement. Decisions are appealable.

## **Self-checks as a complement to supervision**

The Environmental Code emphasizes the importance of effective supervision and the authorities' obligation to exercise supervision. However, most of the supervision is in fact carried out by the operators themselves in connection with their self-checks. The basic obligation to carry out self-checks is implied in the general rules of consideration, but there is also a specific provision to this effect.

Furthermore, a separate Ordinance issued pursuant to the Code requires records of self-checks to be made for operations that are subject to notification and permit requirements. The obligation to carry out self-checks means that the operator himself must monitor the effects of his operations on the environment and take measures on his own initiative that are necessary for compliance with the provisions of the Code and rules, judgments, decisions etc. issued pursuant to it.

Many operators have, moreover, introduced environmental management systems, i.e. voluntary commitments to monitor their activities that go beyond the scope of the Code's provisions.

## Compensation and environmental damage

Chapter 31–33

### Compensation

The Environmental Code contains provisions on the compensation to be paid to landowners for public interventions for the purpose of protecting natural assets or certain natural resources. Compensation may be paid where land is requisitioned or where significant difficulties arise for current land use. If substantial damage is caused in connection with the current use of the property, the property owner is entitled to compulsory purchase in lieu of compensation.

Compensation may also be paid for damage and intrusion in connection with an inspection by a supervisory authority. The compensation is paid by the state or the municipality, depending on the authority involved. The property owner must bring an action for compensation before an environmental court.

### Compensation for environmental damage

Persons who pursue an activity that has caused bodily injury, material damage or pecuniary loss may be liable for compensation. Such compensation is only payable where the damage was caused by an operation involving the pollution of water, alteration of the groundwater level, pollution of air or soil, noise or vibrations or similar impacts. Persons who have suffered damage or loss in this connection can bring an action before an environmental court.

### Environmental damage insurance and environmental remediation insurance

Persons who undertake environmentally hazardous activities which are subject to permit or notification requirements must normally pay contributions both to an environmental damage insurance scheme and an environmental remediation insurance scheme, the annual amount being paid in advance. The Government has established the insurance conditions.

Compensation is paid by the remediation insurance scheme for the cost of remediating a contaminated area, if the person who is liable under the Environmental Code cannot pay.

Compensation is paid by the environmental damage insurance scheme if the person who has caused the damage does not have the financial resources to pay, if the right to claim compensation has lapsed or if it is impossible to determine who is responsible for the damage.

Limitation of  
climate change





REGERINGSKANSLIET

**Ministry of the Environment**

SE-103 33 Stockholm