[Translation from Swedish into English]

VÄXJÖ DISTRICT COURT
Environmental Court

PART JUDGMENT
11 January 2007

Case no.
M 3340-05

issued in
Växjö

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APPLICANT
Nordvästra Skånes Renhållnings AB
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THE MATTER
Permit for the operation at Filborna recovery facility, City of Helsingborg, County of Skåne

AV KAMMARKOLLEGIET AUKTORISERAD TRANSLATOR * NR 591 *

FINAL JUDGMENT

Permit

The Environmental Court grants Nordvästra Skånes Renhållnings AB a permit for environmentally hazardous activities as referred to in the Environmental Code to, in the area within the land unit Väla 7:4 in the City of Helsingborg specified in the application,

first, annually accept, sort, treat, store in the interim and landfill at most 800,000 tonnes of waste, excluding uncontaminated soil for construction purposes, of which at most

a) 275,000 tonnes may be treated biologically through composting or anaerobic digestion (AD),
b) 120,000 tonnes of non-hazardous waste may be incinerated,
c) 100,000 tonnes of non-hazardous waste may be landfilled,
d) 75,000 tonnes of hazardous waste may be landfilled,

second, as a mean value over a three-year period annually accept, treat and landfill 150,000 tonnes of contaminated materials,

third, accept, treat and landfill 20,000 tonnes of metal hydroxide sludge from Sakab's long-term storage facility,

fourth, retain buildings and facilities and erect the new buildings and facilities as described in the application, among these including a waste incineration plant with a maximum total installed fuel capacity input of 65 MW.

The permit for receipt covers those types of waste specified in Appendix 8 of the Company's supplement to its application of 22 May 2006.

[A handwritten note indicating:] Åberg's/M. Bengtsson Å Borgardt

The permit for interim storage comprises maximum momentaneous quantities of waste as follows:

Non-hazardous waste	**tonnes**
residual household and industrial waste	20,000
sludge and sludge compost	10,000
finished compost and soil mixtures	1,000
biofertilizer	1,000
fertilizer	500
asphalt	6,000
concrete	1,000
timber	7,000
material for recovery	1,000
paper	3,000
Hazardous waste	
general goods	500
pumpable fluids	500
electrical and electronic waste (WEEE)	250
impregnated timber	100
tar asphalt	100
contaminated materials	2,000

The permit for biological treatment in a combi-reactor plant (KRT), box composting (Biodegma) and composting of garden waste and sludge applies until and including the year 2012.

The permit for treatment of contaminated materials only comprises the methods composting, soil washing, chemical oxidation and thermal evaporation.

The permit for landfill covers those kinds of waste specified in Appendix 4, tab C of the Company's main application. In total, a further 4 million m^3 may be landfilled.

The permit for incineration covers the following categories and quantities of waste.

Waste category	Type of Waste	Annual quantity (tonnes)
- Q1	- Recycled wood chips	15,000
- Q1	Sorted combustible household waste	70,000
- Q1	Sorted combustible industrial waste	50,000
- Q8	- Bioash (re-incineration)	10,000
- Q1	homogenised slaughter house waste	15,000
- Q9	- sewage sludge, dewatered	10,000
	Total	120,000

To the extent that the waste covered by the permit constitutes sorted combustible waste, it may only be landfilled subject to the precondition that the Swedish Environmental Protection Agency issues regulations concerning exemption from the prohibition on landfilling sorted combustible waste or the County Administrative Board grants a special exemption from the said prohibition.

To the extent that the waste covered by the permit constitutes organic waste, it may only be landfilled subject to the precondition that the Swedish Environmental Protection Agency issues regulations concerning exemption from the prohibition on landfilling organic waste or the County Administrative Board grants a special exemption from the said prohibition.

To the extent that the waste covered by the permit does not satisfy the limit values for leaching prescribed by the Swedish Environmental Protection Agency's Regulations concerning landfill, criteria and procedures for receipt of waste at facilities for landfilling of waste (NFS 2004:10), waste may only be landfilled subject to the precondition that the regulatory authority grants a special exemption from the Regulations.

The Environmental Court grants, in accordance with Section 24 of the Ordinance on the Landfill of Waste, a deviation from the requirement for a geological barrier so that the joining with Phase 1:7 can be executed in such a way as described in the application.

Conditions

In addition to the requirement ensuing from ordinances and regulations, the following conditions shall apply for the permit.

1. The operation - including actions to mitigate loss or nuisance to human health or the environment - shall be conducted essentially in the manner that the Company has specified or undertaken in the case, unless otherwise indicated by this judgment (permit).
2. Waste that is to be treated may not be stored for a period longer than three years.
3. Waste that is to be landfilled or incinerated may not be stored for a period longer than one year.
4. Sorting, interim storage and treatment of non-hazardous waste that takes place outdoors shall be undertaken on a hardened water-repellent surface with collection and diversion of runoff water to the general leachate system.
5. Chemical products and hazardous waste shall be stored and in general handled so that spillage and leakage cannot contaminate the surroundings or reach the municipal sewerage network. Chemical products and hazardous waste, with the exception of electrical and electronic waste, non-chipped impregnated timber and tar asphalt, shall be stored on a surface that is impermeable, bunded and protected from precipitation. Storage tanks for chemicals specially intended for outdoor use do not need to be stored under a roof. The collection volumes within the respective bunded areas shall correspond at least to the largest tank/cistern volume plus 10% of the aggregate volume of other tanks/cisterns. Storage tanks and cisterns shall be equipped with level control. The requirement concerning overflow storage volume applies from one year from when this permit has entered into final legal force.
6. In conjunction with the use of ammonia, the volume of the ammonia storage tank may not exceed 60 m^3. There must be detectors that alarm and shut off the inward flow of ammonia in the event of leakage.
7. Treatment and interim storage prior to treatment of contaminated soil and petrol station sludge shall be conducted on an impermeable surface and with the collection of runoff water, which after oil separation shall be diverted to the general leachate system. Biological treatment of contaminated materials shall be conducted with the addition of nutrients and bulking agents and continue for at least six months, including one summer period, until the concentration of non-polar hydrocarbons is less than 5000 mg/kg TS. Soils, that are not classified as hazardous waste, may following completion of treatment be stored on an area that has only been hardened.

8. Soils contaminated with oil or other hydrocarbons and similarly petrol station sludge, shall during the first two months of the process, be treated under cover with the air outlet channelled to a biofilter.
9. Soils that, following treatment, still are deemed to be hazardous waste may not be used as settlement filling material, embankment construction material or for temporary and final capping of a landfill site.
10. Prior to treatment of each new kind of contaminated material (considering the composition of contaminants) and before the treatment process with any of the methods covered by the permit are applied for the first time, the composition of contaminants, treatment technique, mitigation measures, criteria for the material when the treatment is complete and energy use are to be reported to the regulatory authority no later than six weeks in advance. If the matter concerns the use of a mobile facility for thermal treatment of contaminated materials, a dispersion calculation shall also be reported unless the regulatory authority otherwise decides.
11. Before new areas for landfill, including Phase 1:7, are constructed, the Company shall report to the regulatory authority at least three months in advance how the quality control of the basal liner is to be undertaken and also a Construction Quality Assurance Plan (CQA) for the works.
12. Prior to the excavation of previously landfilled material (Landfill Mining – LFM), the Company shall report to the regulatory authority at least six weeks in advance the area, the quantity and type of material together with the planned mitigation measures.
13. Treatment of hazardous waste shall take place on impermeable surface supplied with protection against precipitation and with a separate disposal of leachate.
14. Active tipping faces shall be covered daily. Asbestos waste ought to be covered in such a way and with such material that any packaging is not ripped apart. Landfilling of hazardous waste shall take place under protection from precipitation pending final capping.
15. The existing landfill site shall be permanently capped within ten years from the landfill having ceased to accept waste. All finalised parts of the landfill site shall no later than one year after this judgment (permit) has entered into final legal force, have been provided with an odour-reducing layer pending final capping.
16. All handling of animal waste shall be enclosed.
17. The combined heat and power (CHP) plant shall be designed with the following steam conditions: 40 bar, 400 °C.
18. The flue gases from the CHP plant shall be bled off by a chimney with a minimum height of 53 metres above ground.

19. Fly and bottom ash created at the facility shall be gathered and stored separately. Storage, handling and transport shall take place in sealed containers.
20. When measuring emissions, emissions during start/stop and dry-out firing of masonry are not included. 'Start/stop' means that part of the start/stop process where the load does not exceed 40% of the nominal capacity for all of the fuel for at least 20 minutes in succession.
21. In the case of technically unavoidable operational stops and operational outages at the facility or faults with measuring equipment, such emission/discharge of contaminants to the atmosphere and water which exceed the values fixed may not endure for a period longer than four hours in succession. Moreover, the aggregate operational time under such operational conditions must not exceed 60 hours per year.
22. The content of contaminants in outlet air from the biofuel-fired boiler house may as a guideline value* not exceed the following concentrations**.
    particulate matter 150 mg/Nm^3 (O_2 content 6%)
    nitrogen oxides (NO_X) 390 mg/Nm^3 (O_2 content 6%)
    carbon monoxide 390 mg/Nm^3 (O_2 content 6%)
23. Noise from the operation outdoors at dwellings may not give rise to higher equivalent noise levels than
    50 dB (A) weekdays, daytime (07:00-18:00)
    40 dB (A) at night (22:00-07:00)
    45 dB (A) other times
    The values specified above shall be reduced by 5 dB (A) units if the noise contains impulse noise or audible tone components. Instantaneous noise at night may not exceed 55 dB (A).
24. Noise from the operation may not, as guideline value*, outdoors at business premises that are not noisy operations give rise to higher equivalent noise levels than
    60 dB (A) weekdays, daytime (07:00-18:00)
    50 dB (A) at night (22:00-07:00)
    55 dB (A) other times
25. There shall be an up-to-date quality control programme specifying measurement methods, measurement frequency and evaluation method.

26. Written instructions shall be available first, for the control and classification of incoming waste, second, for interim storage, treatment and landfill of waste and also for maintenance of the leachate treatment system.
27. The applicant shall, at least three months in advance, before final capping of each landfill phase, report to the regulatory authority on how the quality assurance of the impermeable layer is to be conducted and also provide a Construction Quality Assurance plan for the works.

* 'Guideline value' means a value that if it is exceeded leads to an obligation for the permit holder to implement measures to ensure that the value can be maintained.
** 'Nm^3' means the volume in cubic metres of dry gas at an air pressure of 101.3 kPa and the temperature 273 K.

Delegated issues

The Environmental Court transfers to the regulatory authority, in accordance with Chapter 22, Section 25 of the Environmental Code, the power to determine further conditions concerning the following:

- Measures under Sections 21 and 26 of the Ordinance on the Landfill of Waste
- Measures resulting from notifications under Conditions 10, 11, 12 and 27
- Use of waste materials for construction purposes in addition to Condition 9
- Quality control of the operation

Postponed issues

The Environmental Court postpones, in accordance with Chapter 22, Section 27 of the Environmental Code, the issue of what conditions are to apply *first*, as regards the discharge of treated leachate and runoff water, *second*, mitigation measures against penetrating groundwater and also measures to in general limit the quantity of leachate, *third*, the emission of nitrogen compounds from the CHP and, *fourth*, measures to combat nuisance smells in the surroundings. During the probationary period the Company shall investigate the following:

U1. Technical and financial preconditions to through local treatment of leachate and runoff water be able to divert this water directly to the recipient.

U2. Technical and financial preconditions to reduce the quantity of penetrating groundwater and also through treatment of various substreams, etc., to limit the occurrence of contaminated water.

U3. Technical and financial preconditions for limiting the emission of nitrogen oxides and, in those cases where a facility with flue gas cleaning through selective non-catalytic reduction (SNCR) or selective catalytic reduction (SCR) is installed, of ammonia and nitrous oxide.

U4. The relative contribution of various sources to nuisance smells (qualitative and quantitative), the effect of measures taken and proposals for further measures to ensure that the operation in the course of normal operation does not cause nuisance smells in its surroundings. This investigation should be conducted in consultation with the municipal environment and public health office and include a representative 'odour panel'.

The results of the investigations with proposals for conditions are to be submitted to the Environmental Court within the following periods:
U1. 1 January 2010.
U2. 1 January 2011.
U3. Three years after when the CHP has been finally commissioned. The Company shall notify the Environmental Court of this.
U4. 1 January 2011.

Until such time as the Environmental Court decides otherwise, the following provisional regulations shall apply:
P1. Leachate from the landfill and runoff water from operation surfaces shall be treated locally before being diverted to the municipal sewerage network. However, in the case of high flows, untreated leachate may be diverted into the municipal sewerage network via the discharge point L1.

P2. The content of contaminants in outgoing water from the treatment of oil-contaminated water and pumpable industrial sludge, from vehicle washing, from evaporation of oil emulsions, aqueous sludge and aqueous solutions and also from the washing plant for cleaning of packaging, containers and tanks, may as a guideline value* not exceed the following concentrations:

COD	7,000 mg/l
lead	0.25 mg/l
cadmium	0.025 mg/l
copper	0.25 mg/l
zinc	1 mg/l
total chrome	0.25 mg/l
mercury	0.005 mg/l
nickel	0.5 mg/l

P3. The content of contaminants in air emitted from the CHP, in conjunction with the use of SNCR or SCR, may not as a guideline value and monthly mean value exceed the following concentrations:

ammonia 10 mg/Nm^3 (O_2 content 11%)

nitrous oxide 30 mg/Nm^3 (O_2 content 11%)

P4. Only the following kinds of waste may be treated at the Biodegma facility:

- compostable fractions from sorted-at-source residual household waste
- sludge
- fertilizer
- digestate from Line 3
- contaminated materials

P5. The treatment of residual household waste and sorted-at-source organic household and food industry waste shall no later than 1 January 2010 take place indoors with appropriate purification of the ventilation air.

P6. Hazardous waste that may be assumed to cause nuisance smells shall be dealt with indoors or under cover.

P7. The Company shall inform the regulatory authority and investigate the cause if odours causing nuisances arise.

Classification

The new landfill sites that are covered by this permit shall be referrable to the classes 'landfill site for hazardous waste' and 'landfill site for non-hazardous waste'.

Environmental impact statement

The Environmental Court approves in this case the environmental impact statement drawn up.

Startup period

The operation as regards the new parts of the facility shall have been started up no later than five years from this judgment (permit) having entered into final legal force. Otherwise, this permit lapses as regards those parts.

Provision concerning previous permits

When the permit under this judgment has entered into final legal force, it replaces the previous permits and decisions concerning the operation issued by the National Licensing Board for Environment Protection and the County Administrative Board, respectively.

Security

This permit may only be utilised and the operation conducted subject to the precondition that the Company has, in order to safeguard the obligations applicable for the operation being performed, provided financial security of at least SEK 73 million. This security shall be presented in the form of a surety or guarantee in accordance with Chapter 2, Section 25 of the Enforcement Code and be considered by the Environmental Court by a separate procedure. This security shall be kept by the County Administrative Board for the County of Skåne.

Provision concerning entry into force

This judgment (permit) enters into force immediately.

EARLIER DECISIONS

The operation at the facility has previously been considered for a permit several times by the National Licensing Board for Environmental Protection in accordance with the Environmental Protection Act. The following decisions are relevant:

1. 22 December 1992 – permit to treat waste, etc., at Filborna.
2. 9 June 1994 – Government decision, amendment of Condition 2.
3. 7 February 1995 – permit for certain extended treatment of waste.
4. 31 October 1995 – permit for modification of the biogas plant and the wastepaper plant.
5. 25 May 1998 – permit for certain extended operation.

The County Administrative Board has during the years 2004 to 2006 made several decision concerning the operation at the Filborna plant. Among these may be mentioned in particular the approval of the adaptation plan of 8 July 2005.

THE APPLICATION

Localisation

The Filborna recovery facility is located approximately five km east of the centre of Helsingborg, directly west of the E6 motorway. The facility is surrounded by embankments on three sides and by Rödkille landfill site in the east. The nearest dwellings lie about 500 metres east of the facility. The nearest residential areas are the village of Väla by, Dalhem and Hjortshög, which lie about 1 to 1.5 km from the facility.

Development plan situation

There is a detailed development plan applicable to the area in question for the land unit Väla 7:4 and others, which has entered into force. This plan was adopted by the City Council on 26 October 1999 and refers to the Filborna waste and recovery plant. The plan conditions allow infill up to a maximum of + 90 m and a maximum chimney height above ground of 60 m. The operation does not contravene the detailed development plan.

Geology, geohydrology and hydrology

The existing parts of Filborna comprise a flat area with natural layers of soil formed by boulder clay, at points overlaid with shallow sand sediment. The thickness of the boulder clay is normally between two and six metres. The bedrock in the area comprises clay slate and sandstone and siltstone.

The area for the landfill site for hazardous waste comprises a flat ridge in northwest-southeast direction. The bedrock comprises sandstone overlaid with a clayey moraine with a thickness exceeding two metres. The parts closest to the ground surface comprise soil layers of silty, sandy moraine under an approximately 0.5-metre-thick layer of soil containing humus.

There are several separate groundwater reservoirs with various pressure conditions within the area in question. The sandstone comprises a lower aquifer in which source flows (artesian groundwater) may occur. A surface groundwater reservoir, which is drained to surrounding watercourses, is formed over the boulder clay. In parts of the area, coarse sediment overlaid with impermeable layers of boulder clay form a confined aquifer. The main groundwater flow follows the route of Väla stream westwards through the area. Towards

the northwest there is a natural surface watershed, which also functions as a watershed for the surface groundwater. In the deeper bedrock there is a groundwater gradient towards the northeast.

Filborna is naturally drained in a northwest direction via the watercourses Väla stream and Tostarp stream, being part of the water catchment area for Vege stream which empties into Skälderviken, about 17 km north of Filborna.

Technical description

Reception

Incoming waste is weighed, registered and checked at the entry control point. Waste left at the recycling centre is weighed when filled containers are moved for treatment. After registration and weighing, the transport is guided to the respective treatment plant where unloading takes place under supervision for the possible taking of samples and checks of compliance with transport documentation, etc. The reception control point will satisfy the requirements set out in the Swedish Environmental Protection Agency's Regulations on landfill, criteria and procedures for acceptance of waste at facilities for landfilling of waste (NFS 2004:10).

There is an 'extinguishing water reservoir' within the area for the emergency acceptance of fire-damaged chips and pellets in the event of fire at any of the Öresundskraft's energy plants in Helsingborg. The area is bunded.

Recovery of materials

Recovery of materials largely takes place on asphalted or hardened water-repellent surfaces. All runoff takes place via collection wells to the local leachate treatment system. When necessary, watering is provided to prevent dust. In the event of oil spillage and emergency discharges, 'collars' are used on the collection wells and absorbers are available for rapid decontamination measures. There is regular cleaning by the area being brushed mechanically. The following kinds of operation for recovery of materials form part of the operation:

- Recycling yard for the public and small businesses
- Sorting, grinding and screening of commercial waste
- Interim storage of material for recovery
- Sorting and interim storage of soil and other construction debris (return terminal)
- Treatment of street gully sludge

- Acceptance, sorting, baling, interim storage and outward transport of waste paper (newspapers, corrugated cardboard, cartons, production waste from industry, etc.)

The general public and small businesses have the opportunity of leaving waste and material for recovery with more than 20 fractions at separate reception points. The recycling yard for the general public has its own entrance and reception control point. Business customers leave their waste within an enclosed part of the sorting pad for industrial waste. The recycling yard for the general public may be moved within the area.

Sorting of residual waste from businesses is conducted on an asphalted slab of approximately 14,000 m^2. Incoming waste is set down in windrows in order to facilitate visual checks and also to simplify the sorting. The sorting is largely conducted with mobile equipment. Sorting of material capable of being recovered is done with picking equipment. A mill with a belt magnet is used to homogenise waste that cannot be utilised for recovery of materials. Screening equipment is used in order to separate the inorganic fine fractions from the ground waste: Landfill residuals are also separated from the incoming waste. In order to reduce the risk of dust and spread of contaminants with runoff water, parts of the operation will be built in.

Among other things metal, plastic and glass packaging is temporarily stored in pockets constructed with concrete support pending transport to the end user. Light-weight material is stored under a roof to avoid littering.

The materials largely comprise excavation and demolition materials and are checked visually and sorted thereafter into various interim stores. There are also bituminous mixtures for recovery. All machines, e.g., loading machinery, crushing machinery and screeners are mobile. Handling requires large areas and may be moved within the area. There is interim separate storage of tar asphalt and in conjunction with crushing a composite sample (PAH mg/kg) is taken from the store to determine how the material may be used.

Gravel and sludge from wells from the runoff water network are received for dewatering in a reception pocket with an oil-separation function. After dewatering, the aqueous phase is led to the local leachate treatment system and the solid phase is used as construction material at the facility.

The reception of waste paper is conducted under a roof in a hall. Following a manual removal of foreign material, the paper goes by transporters to an enclosed outdoor interim store. It is stored in bales or in bulk. It is assessed that the quantity of waste paper managed could be doubled by extending operating hours.

It is estimated that the following maximum momentaneous quantities of non-hazardous waste could be stored at Filborna:

- residual household and industrial waste 20,000 tonnes
- sludge and sludge compost 10,000 tonnes
- finished compost and soil mixtures 1,000 tonnes
- biofertilizer 1,000 tonnes
- fertilizer 500 tonnes
- asphalt 6,000 tonnes
- concrete 1,000 tonnes
- timber 7,000 tonnes
- material for recovery 1,000 tonnes
- paper 3,000 tonnes

It is estimated that the following maximum momentaneous quantities of hazardous waste could be stored at Filborna:

- general goods 500 tonnes
- pumpable fluids 500 tonnes
- electrical and electronic waste 250 tonnes
- impregnated timber 100 tonnes
- tar asphalt 100 tonnes
- contaminated materials 2,000 tonnes

Biological treatment

All runoff from compost areas, boxes and the biogas plant is taken via collection wells to the local leachate treatment system.

Incoming residual waste is pretreated mechanically by rough grinding/crushing, screening and magnetic separation and is divided into three main fractions - recoverable, combustible and (readily biodegradable) organic. The mechanical treatment currently takes place outdoors, but will be moved under a roof in order the reduce the risk of spreading by wind and birds.

For the extraction of energy, the organic fraction will be pressed or leached in direct conjunction with the pre-processing. The pressed liquid will be used for internal gas production or be sent for anaerobic digestion at an external facility. After pressing or leaching, the solid phase can be treated aerobically in a sealed combi-reactor or sent for incineration. It is intended that the solid phase be treated in a forthcoming line (Line 3) through sealed anaerobic digestion, alternatively closed composting, for production of vehicle gas and cover soil, respectively.

The combi-reactor plant (KRT) comprises six sealed boxes with separate ventilation systems with channels in the bottom for insufflation of air. The plant is supplied with fans and biofilters for process air. The normal treatment time is six weeks. The compost thereafter is matured in windrows for approximately 8 to 10 weeks. These windrows are turned mechanically each week. The stabilised compost is screened and currently used internally for the closure works at the landfill site. The combi-reactor plant may also be used for closed composting of other organic materials.

The treatment of sorted-at-source organic household and food industry waste is conducted through composting. The composting plant (Biodegma) comprises 20 concrete boxes, of which four are closed and fitted with a roof of GORE-TEX and channels in the bottom for the insufflation of air. After an acceptance control, the waste is mixed with crushed garden waste and composted for about three weeks in the closed boxes. The waste is thereafter moved to an aerated box without a roof. The open boxes may be covered with canvas if necessary. Maturing is conducted in windrows on a hardened water repellent surface. The finished compost is screened and sold in various soil mixtures or as soil improvement material. The Biodegma plant was closed on 1 May 2006 after the County Administrative Board imposed a requirement for it to be built in.

Parts of the sorted-at-source organic waste together with discarded packaged foodstuff is pressed into a liquid phase and a solid phase. This pressing takes place under a roof and spillage and residues of organic material

are dealt with daily. The liquid phase is transported to the biogas plant for anaerobic digestion and the production of biogas. The digestate is used as fertilizer. The solid phase is composted.

Part of the garden waste is ground and used as structure material in conjunction with the composting of purely organic waste and sewage sludge. Other garden waste is broken up in a mill and laid out in windrows or piles. Aeration takes place through regular turning of the compost. After composting, the material is screened and sold in various soil mixtures or as soil improvement material. A new turner has been used since the summer of 2005 on asphalted pads, which leads to shorter treatment times.

Filborna accepts digested sludge from municipal wastewater treatment plants (WWTPs) together with small quantities of dewatered fibre sludge from paper mills. This sludge is turned at regular intervals. A sprinkler on the compost turner enables watering if necessary in conjunction with turning. The finished compost is stacked up in large piles before it is screened and utilised.

Treatment of residual household and industrial waste takes place in the biocell reactor. In the event that reactor volume is required, the reactors can be emptied on completion of the digestion of the material. No further waste has been put into the biocell reactors since 2004.

The extraction of biogas is conducted through a gas pipe system with gas drains and gas wells. In the event of operational disruptions, the gas is disposed of using four gas flares. Measurements during the years 2001 to 2005 indicate that the collection level has been at around 80% of produced gas.

Pumpable organic residual products from the food industry, fertilizer and pressed sorted-at-source organic waste are treated in the biogas plant. The material is mixed in a reception tank and pumped through for sanitation where the material is heated up to about 70 degrees. Thereafter the temperature is reduced to around 35 degrees and pumped into the anaerobic digestion tank. The anaerobic digestion takes place under anoxic conditions for four weeks. Biogas and biofertilizer are produced in conjunction with the anaerobic digestion.

The carbon dioxide must be separated in order to be able to use the biogas as vehicle fuel. This is done in an upgrading plant through pressure increase and drying. The gas is stored in bottles in a gas store that is large enough for 7,000 Nm^3. Odorisation is undertaken to enable any leakage to be traced. The biogas is thereafter

used as vehicle fuel or introduced to the natural gas network. The Company's public petrol station is located adjacent to the entrance to Filborna and comprises two gas dispensers.

Treatment of hazardous waste

There is a facility at Filborna for the treatment of oil-contaminated water and pumpable industrial sludge. Sludge and surplus water from vehicle washing will also be treated at this facility. An automatization of the facility was undertaken during the spring of 2004. It is estimated that the expanded operation will be made possible through longer operating times.

Following the separation of coarse sediment and larger particles, the sludge is pumped from the reception basins to treatment tanks where oil, water and sludge are separated gravimetrically. The oil is managed for final disposal at an approved facility and the sludge is passed on for composting. The aqueous phase is pumped to existing collection basins and subsequently via a reservoir with an oil-separation function and aeration to the local leachate treatment system.

The sludge phase containing oil is mixed with straw, horse manure and bulking agents and composted in windrows on a hardened water-repellent surface. The composting may also be enclosed.

Evaporation of oil emulsions, aqueous sludge and aqueous solutions will be undertaken through campaigns. The waste is pumped from the reception tanks via filters to a storage tank and from there to the evaporation plant through a fine filter. The waste is divided up in the plant into an oil and aqueous phase respectively. The oil phase is transported to an approved facility for final disposal. Some of the aqueous phase is used for keg washing and the remaining aqueous phase is led off via two collection basins to the local leachate treatment system. If necessary, a further evaporation plant can be installed.

Acids and bases can be treated through neutralisation.

There is a washing plant for the internal cleansing of packaging, containers and tanks directly adjacent to the interim store for hazardous waste. Cleansing is undertaken through high pressure washing and is conducted

through campaigns using vessels that have contained similar substances. All washwater is collected and treated in a water purification plant, which may also be used for the treatment of aqueous sludge.

Interim storage for hazardous waste is enclosed and comprises one tank store and also space for acceptance, sorting and interim storage of general goods. Incoming general goods are weighed, marked, palleted and banded. They are repackaged if necessary. Oil is pumped to the water draw-off tank. The aqueous phase is moved thereafter via a sump to the water purification plant, and the oil is pumped to two storage tanks. At the tank store, which comprises eight storage tank units, waste oil, solvents and contaminated water are stored temporarily. The interim storage area has a hardened water-repellent surface and all spaces are supplied with collection gullies and sumps to collect any spillage.

Electrical and electronic products are stored either in cages, small containers or small vessels or set up on a hardened water-repellent surface. All treatment in the form of dismantling will take place on a hardened water-repellent surface or under a roof on a base that does not have drainage and which complies with the Swedish Environmental Protection Agency's Regulations and General Guidelines on commercial pre-treatment of electrical and electronic waste (NFS 2001:8).

Interim storage of refrigeration and freezer furniture takes place in containers.

Mechanical and/or manual vehicle washing will take place in a washing bay with a sealed drainage system and recovery of the washwater. Sludge and surplus water will be collected in a tank and led to the facility for treatment of oil-contaminated water and pumpable industrial sludge.

Batteries from households and activities will be accepted for sorting and subsequently either onward transported for recovery or landfill.

Treatment of contaminated materials

The acceptance and treatment of contaminated materials will be gradually expanded and take place on hardened water-repellent surfaces with the collection of leachates. The method of treatment which comes into question depends upon the nature, quantity and composition of contaminants of the materials. This treatment will normally take place through campaigns. In certain cases, mobile facilities may be utilised. The

materials treated will in the first instance be used externally, in the second instance made use of internally and finally sent for landfill.

Composting is used for biological degradable contaminants and takes place either in windrows or closed with regulated aeration. When necessary, the materials are pre-treated through, for instance, crushing or screening. Nutrients and bulking agents may be added in conjunction with composting.

Soil washing may be used for basically all kinds of contaminants and means that the contaminants are separated through various physical and/or chemical methods. Normally, pre-treatment of the material is effected through decomposition, e.g., crushing and screening. The coarsest fractions are screened out, following which there is a wet screening in several steps combined with the particles being scrubbed. Thereafter, the contaminants are separated through, for instance, gravitational separation, flotation or magnetic separation. Purified materials and contaminant concentrates are dewatered and disposed of. Process water is returned following treatment.

Chemical oxidation means that organic contaminants are oxidised with the aid of a chemical oxidising agent. Examples are the Detox method and Ion Collider technology, which have both been used at Filborna. In certain cases, chemical oxidation may be combined with composting.

The Detox method means that a granulate with percarbonate is added to the materials. This results in a release of hydrogen peroxide which in its turn reacts with the organic contaminants and breaks down the carbon chain to carbon dioxide and water. The Ion Collider technology means that the materials are mixed with a treated hydroxyl-rich water and potassium permanganate for oxidation of the contaminants.

Thermal evaporation is used for volatile or combustible contaminants. The contaminated materials are heated so that the contaminants convert into a gas phase, following which the gas is led to an incinerator for destruction. The gas released passes a flue gas cleaning plant for separation of particulate matter and other residual contaminants. If necessary, thermal evaporation is preceded by treatment through, for instance, crushing and screening.

Fuel production

Combustible material is sorted out of the incoming commercial waste as a fuel fraction. The waste is laid out in windrows for visual assessment. Thereafter, there is a mechanical picking of recoverable and inert material. The remaining material is crushed and a fine fraction is screened out of from the fuel fraction. This operation takes place on an asphalted slab with supporting walls and the collection of leachate. If necessary the area is brushed mechanically and watered. Clean and painted timber is chipped and stored. Sleepers and impregnated timber are deal with separately.

About 50% of incoming household waste is sorted out as a fuel fraction through the waste being decomposed and screened. Metallic material is separated with an overhead belt magnet. The sorting takes place outdoors but will be built to reduce the risk of negative environmental impact. Chipping and screening out of a fuel fraction from park and garden waste is conducted mechanically with mobile equipment.

All storage of sorted fuel fractions is conducted in consultation with the rescue services in order to minimise the risk of fire. Timber and chips are stored in piles of a maximum height of 4 to 5 metres together with clear space for 'fire breaks'.

Combined heating and power (CHP) plant

The Company intends to erect at Filborna for the incineration season 2008/2009 a combined heating and power (CHP) plant with a steam turbine providing a total installed fuel capacity input of 65 MW. The facility will be located within the southern area, which according to the applicable detailed development plan allows sufficient chimney height. The incineration will take place either in a fluid sand bed with 40 bar (e) and 400 °C or in a 'grid boiler' with 16 bar (e) and 220 °C. The boiler will either be erected as a block with full capacity or as two parallel lines, each with half of the specified capacity. In order to heat up and commission the auxiliary system prior to the startup of the boiler and turbine plant, the CHP will contain a small auxiliary boiler for oil, biogas or electricity of 0.75 MW.

Electrical power [*sic* is] produced in a steam turbine equipped with a generator and a district heating condenser connected to Helsingborg's district heating network. In order to facilitate the operation of the CHP when there is no need for district heating, the steam turbine will be fitted with a 'recooler'.

The cleaning of flue gas will be executed in several steps with an induced draught fan. The first step comprises one or more parallel coarse cyclones. Separated particulate matter is dampened and deposited for landfill. The remaining flue gases are dosed with activated carbon and calcium hydroxide before they are led to a textile barrier filter for separation of filter ash. Separated filter ash is dampened and deposited. Cleaned gas is emitted via a 53 m high chimney.

The fuel for the CHP will largely comprise sorted fuel fractions from household and industrial waste, recycled woodchips and bioash from the Västhamn plant. Incineration of animal residual products and sludge from municipal wastewater treatment plants may also take place. The categories and quantities of waste that will be accepted for incineration are reported in the application. A fuel building for storage of fuel needed for four days will be erected directly adjacent to the CHP. Animal residual products are stored in a separate storage tank.

Kind of fuel	**unit**	**max. quantity/year**
Recycled woodchips	tonnes/year	15,000
Sorted combustible fractions	tonnes/year	
- household waste	tonnes/year	70,000
- industrial waste	tonnes/year	50,000
Bioash from the Västhamn plant	tonnes/year	10,000
animal by-products	tonnes/year	15,000
landfill gas	GWh/year	25
sewage sludge, digested	tonnes/year	10,000
light oil, reserve fuel	m^3/year	250
maximum annual quantity of waste	*tonnes/year*	*120,000*

The estimated quantities of ash created at the CHP have been calculated to be approximately 9,000 tonnes per year. This ash is dealt with and reused after some treatment, in the first instance as construction material within the facility.

There are five existing boiler house units within the facility, with burners for biogas for the internal heat supply. The total capacity is approximately 1,200 kW. The Company also plans to erect a biofuel-fired boiler house with an installed capacity input of approximately 1.5 MW.

Landfill

Waste types for landfill are reported in the application. Landfill at the existing landfill site for non-hazardous waste will be finalised by the end of 2008 and permanently capped in accordance with the adaptation plan approved by the County Administrative Board. Further surfaces for landfill of non-hazardous waste are planned north of the existing landfill site. Prior to each phase, soil surveys will be conducted and necessary mitigation measures taken to satisfy the requirements set out in the Ordinance on the Landfill of Waste (2001:512).

Existing landfill cells for carbon and bioash will be finalised by the end of year 2008.

Landfill of asbestos has previously taken place in special landfill cells within the ash landfill site. However, the landfill of asbestos currently takes place in a clay-sealed lagoon within that part of the landfill area where closure works are in progress. Asbestos will in the future be deposited in the landfill site for hazardous waste.

The landfill of waste that has solidified and contains metal has previously taken place in special landfill cells. In the future, it is planned that this waste will be deposited in the landfill site for hazardous waste.

The landfill site for hazardous waste will be built up in cells. This area will in the first stage be approximately 250 x 200 metres and estimated to have capacity for approximately 500,000 m^3. The infill will be undertaken through campaigns over several weeks one or more times each year. The covering layer will be laid successively and, when necessary, temporary coverage with canvas or the like will be used. The landfill will take place with the use of wheeled loaders and bulldozers. The waste will be compacted in order to avoid settlement. During the first year of the landfill site, it is planned that 20,000 tonnes of metal hydroxide sludge from Sakab's long-term storage facility will be accepted and deposited at the landfall site for hazardous waste.

The landfill site for hazardous waste will be supplied with a bottom barrier (liner) of geomembrane and the new areas for landfill of non-hazardous waste with a bottom barrier of natural material, stone powder or bentonite. A draining material layer of 0.5 metres will be laid above the bottom barrier.

The landfill site for hazardous waste and the new areas for landfill of non-hazardous waste will be supplied with an artificial geological barrier of natural, fine-grained material and bentonite with a permeability of at most 1×10^{-10} m/s.

The final capping will be laid in stages and comprise a levelling area, a profiling layer, a capping liner, a drainage layer, a covering layer and a top layer to satisfy the demands contained in the Ordinance on the Landfill of Waste (2001:512). This design is basically the same for all stages, though the material included and the number of layers may vary. Quality control of the final capping measures will be performed by an independent geotechnician.

In total, a further 4 million m^3 of waste may be landfilled at Filborna. The final height will be + 90 m in accordance with the detailed development plans.

There may be excavation of previously landfilled material, known as 'Landfill Mining'. It is not currently possible to provide any detailed description of the place, procedure or kinds of materials involved.

Leachate and runoff water treatment

Today, leachate and runoff water affected are mostly led from the facility to the municipal sewerage network via the discharge point L7. Small quantities of untreated water are diverted from the discharge point L1 to the sewerage network via a municipal pumping station. In the event of high flows, the leachate is also fed to a gravitational pipe towards the wastewater treatment plant. This is done in the event of such high flows that the water levels at the lowest point of the facility rise and there is a risk of runover to other parts of the leachate system occurring. It is considered that this will occur in the event of flows exceeding approximately 50 l/s.

The water that is discharged at point L7 is pretreated in a local purification system that comprises four separate ponds (lagoons) for regulation, aeration, settlement and maturation with a total volume of approximately 75,000 m^3. In the case of extreme flows, there will be flooding in parts of the area. The damming threshold will, according to calculations, be capable of dealing with a 100-year rain.

The total quantity of leachate and runoff water from Filborna varies between 100,000 and 300,000 m^3 per year. These great variations are due to, among other things, precipitation and evaporation. There is both an annual and daily equalisation through storage. It is estimated that the ongoing final capping for the existing landfill site will reduce the formation of leachate by about 40-50,000 m^3 per year.

The local purification system will during the years 2005/2006 be extended with a chemical purification step for the reduction of ammonium nitrogen. Moreover, measures will be taken to prevent water becoming stagnant and there will be further aeration and addition of oxygen. The system for water from the treatment of industrial sludge will be extended with a filter stage and also aeration of the retention pond. Endeavours will be made to filter the leachate. The leachate from the landfill site for hazardous waste may be treated with more advanced technology, for instance reverse osmosis (RO).

In the longer term, the Company is endeavouring for it to be possible for the leachate and runoff water following local treatment to be diverted directly to the recipient and is consequently investigating the technical and financial preconditions to do so. This investigation is being conducted together with the principal for an adjacent landfill site, Rökille.

Transport

The number of vehicle movements to and from the facility is currently approximately 800 per day (400 vehicles) excluding the general public, which only comprise a marginal proportion of the traffic load on the entrance roads. In order to reduce the transports, a two-kilometre-long pipeline is planned for the supply of biofertilizer to the slurry tanks of farmers. The transports from the facility will reduce also through the future operations at Filborna, for example, the CHP and the landfill site for hazardous waste. The extended operation is therefore considered to only entail a marginal increase in the traffic load on the entrance roads. A new interchange at the junction of Hjorthögsvägen/E6 will also mean that transport to and from the facility are shortened. It is also assessed regionally that the extended operation will result in reduced transport needs, as the waste will be disposed of locally instead of being transported to other facilities.

Environmental impact statement

Emissions to the atmosphere

All incineration entails some emission of flue gases. However, after flue gas cleaning, the emissions from the CHP entering the surroundings will be very small. On the basis of previous experience, the estimated emission quantities for released levels are under the limit value for emissions specified in the Swedish Environmental Protection Agency's Regulations on Waste Incineration (NFS 2002:28).

Composting and anaerobic digestion (AD) may cause inconveniences and nuisances for residents and operations within the immediate vicinity of the facility. The dispersion calculations conducted indicate, however, that the odour from the degradation of organic waste at the landfill site will probably have a greater dissemination than the odour from composting and anaerobic digestion. Through the landfill site being permanently capped and also improved encapsulation of treated material that can cause odour, pressing of organic waste for sealed anaerobic digestion, improved technology for turning compost windrows, treatment of ventilation air and increased extraction and use of the landfill gas, it is considered that the risk of inconveniences and nuisances will reduce. It is, however, impossible to completely avoid any odour in the absolutely nearest area.

Dust and littering may be a problem in conjunction with certain parts of the facility. Light waste from the sorting of industrial waste may be spread by the wind. These problems may be limited by building in parts of the operation and the sweeping and watering of roads and working surfaces.

Through coverage of waste and minimising the active tipping face, problems with small rodents and birds can be limited. If necessary, birds will be shot and measures taken to combat small rodents.

Transports to and from the facility are considered to not be disruptive for nearby residents or cause emissions to the atmosphere in the form of, among other things, carbon dioxide.

Emissions to water

Heightened conductivity levels in the surface water downstream of the facility indicate a limited impact from the existing landfill site. Downstream along the Väla stream in a westerly and north-westerly direction there are also indications of a limited impact in the form of heightened levels of chloride, nitrogen and COD in the

groundwater. However, through the final capping of the older parts of the landfill site, decontamination of an older part of Filborna, Stentippen [the Stone Tip], and planned measures for treatment of the leachate, the leachate quantities and leaching of contaminants will gradually reduce. Within the framework of the closure of the existing landfill site, the Company will also investigate the possibilities of limiting the inflow of groundwater to the area or creating a hydrological barrier through diversion or pumping.

Noise and vibrations

The placement/localisation of the facility, with protective embankments on three sides and the Rökille landfill site on the fourth side, means that it is well protected from the noise perspective. It is assessed that noise levels at the nearest dwellings will not exceed the Swedish Environmental Protection Agency's guidelines for external industrial noise.

Other

No land units have direct views into the facility. The vegetation layer means that the landfill site blends better with the landscape. The CHP's chimney will, however, influence the landscape profile.

For the extended operation, grazing land, planted energy forest and certain forestry land will be utilised. The areas that are specified as having a protective value in the comprehensive and detailed development plan, however, are not affected. The area of operation is fenced in and not accessible for outdoor recreational activities.

Storage of combustible waste entails a risk of fire. The fire risk is reduced, however, by the establishment of special routines in collaboration with the rescue services, for instance limitations of storage heights and fire breaks. The risk of fire in the landfill site is limited through compacting, coverage and control of incoming waste. A contingency plan for emergency preparedness in the event of fire or other accident has been drawn up in collaboration with the rescue services.

THE APPLICATIONS

Nordvästra Skånes Renhållnings AB (NSR) has requested that the Environmental Court issues a permit for the Company to, at the Filborna recovery facility, located on the land unit Väla 7:4 in the City of Helsingborg

first, annually accept, sort, treat, store in the interim and landfill at most 800,000 tonnes of waste, excluding uncontaminated soil for construction purposes, of which at most

a) 275,000 tonnes may be treated biologically through composing or anaerobic digestion,
b) 120,000 tonnes may be incinerated
c) 100,000 tonnes of non-hazardous waste may be landfilled,
d) 75,000 tonnes of hazardous waste may be landfilled,

second, as a mean value over a three-year period annually accept, treat and landfill 150,000 tonnes of contaminated materials,

third, accept, treat and landfill 20,000 tonnes of metal hydroxide sludge from Sakab's long-term storage facility,

fourth, retain existing building facilities and erect the new buildings and facilities that are otherwise needed for the operation.

To the extent that the above-mentioned waste constitutes sorted combustible waste, it may only be landfilled subject to the precondition that the Swedish Environmental Protection Agency makes regulations concerning exemptions from the prohibition on landfilling sorted combustible waste or the County Administrative Board grants a special exemption from the said prohibition.

To the extent that the above-mentioned waste constitutes organic waste, it may only be landfilled subject to the precondition that the Swedish Environmental Protection Agency issues regulations concerning exemptions from the prohibition on landfilling organic waste or the County Administrative Board grants a special exemption from the said prohibition.

To the extent that the above-mentioned waste does not satisfy the limit values for leaching out prescribed by the Swedish Environmental Protection Agency's Regulations concerning landfill, criteria and procedures for receipt of waste at facilities for landfilling of waste (NFS 2004:10), waste may only be landfilled subject to the precondition that the regulatory authority grants a special exemption from the Regulations.

II The Company requests that the Environmental Court, pursuant to Section 24 of the Ordinance on the Landfill of Waste (2001:512), should grant a deviation or exemption from the requirement for a geological barrier contained in Section 19 of the said Ordinance for the joining of Phase 1:7 with the existing landfill site.

III The Company requests that the Environmental Court should provide for a probationary period for determination of the issue of whether the discharge of treated leachate and runoff water may be made directly to the recipient and in such case what final conditions are to apply for such a discharge for three years after the judgment (permit) in this case has entered into final legal force. Upon the expiry of the probationary period, the Company shall report to the Environmental Court on the technical and financial preconditions for such a discharge and also, in such case, proposals for the final conditions that are to apply.

IV The Company also requests that the Environmental Court should provide for a probationary period for the determination of the issue of performance of first, mitigation measures against penetrating groundwater, second, measures to in general limit the quantity of leachate for four years after the judgment (permit) in this case has entered into final legal force. Upon the expiry of the probationary period, the Company shall report the need of and also the technical and financial preconditions for the execution of such measures.

V The Company similarly requests that the Environmental Court should provide for a probationary period to determine the issue of discharge of nitrogen oxides, ammonia and nitrous oxide from the CHP for three years after the time a facility with cleaning of flue gas through selective non-catalytic reduction (SNCR) or selective catalytic reduction (SCR) has been permanently commissioned. Upon the expiry of the probationary period, NSR shall report to the Environmental Court on the technical and financial preconditions for limiting the discharge of nitrogen oxides, ammonia and nitrous oxide together with proposals for the final conditions that are to apply.

VI Finally, the Company requests that the Environmental Court should determine the startup period to be five years and also allow the Company the right to utilise the permit notwithstanding the judgment (permit) not having entered into final legal force.

Proposals for probationary period conditions

During the probationary period (**III**), the levels in outgoing water from the treatment of petrol station and industrial sludge and the treatment of oil emulsions, aqueous sludge and aqueous solutions should not as a guideline value exceed the following levels:

COD	7,000 mg/l
Lead	0.25 mg/l
Cadmium	0.025 mg/l
Copper	0.25 mg/l
Zinc	1 mg/l
Total chrome	0.25 mg/l
Mercury	0.005 mg/l
Nickel	0.5 mg/l

During the probationary period (**V**), as a guideline value and a monthly mean value, in flue gases released the concentration of ammonia may not exceed 15 mg/Nm^3 dry gas at 11% O_2 and the concentration of nitrous oxide may not exceed 40 mg/Nm^3 dry gas at 11% O_2.

Proposal for conditions

1. Unless otherwise stated in the conditions specified below, the operation, including measures to reduce water and air pollution and also other disruptions to the surroundings, be essentially conducted in compliance with what the Company has stated or in general undertaken to do in this case.
2. Biological treatment of contaminated materials shall be undertaken with the addition of nutrients and bulking agents on a hardened water-repellent surface within a collection area for leachate until such time as the concentration of non-polar hydrocarbons in the compost is less than 5,000 mg/kg TS. This treatment shall furthermore continue for at least half of one year including one summer period.
3. The interim storage of hazardous waste and storage of chemicals is to take place under a roof and on a hardened water-repellent and bunded surface. The requirement for a roof shall, however, not apply to electrical and electronic waste, impregnated timber, tar asphalt and enclosed tanks for chemicals intended for outdoor use.
4. All handling of animal waste shall be enclosed.
5. Flue gases from the incinerator plant shall be released through a chimney with a height of at least 53 metres over ground level.
6. Fly and bottom ash generated at the facility shall be gathered up and stored separately in order to facilitate the environmentally best possible onward treatment. Storage, handling and transport shall take place in sealed containers so that leachate cannot contaminate land and water and also so that dust nuisances do not arise.

7. When measuring emissions, emissions during start/stop and dry-out firing of masonry shall not be included. 'Start/stop' means that part of the start/stop process where the load does not exceed 40% of the nominal capacity for all of the fuel for at least 20 minutes in succession.
8. In the case of technically unavoidable operational stops and outages at the facility or faults with measuring equipment that entail exceeding the applicable discharge/emission levels, the incineration of waste may continue for a maximum of four hours. The aggregate operational time under such operational conditions may amount to at most 60 hours per year.
9. Before new land is utilised for landfill, the Company shall report to the regulatory authority on how the provision of an artificial geological barrier and a bottom barrier is to be executed.
10. The Company may utilise materials containing contaminants that upon reception or after treatment do not exceed the acceptance criteria proposed in Table 5.3, the Swedish Association of Public Cleansing and Solid Waste Management's (*Svenska Renhållningsverksföreningen – RVF*) Report 2002:09, Appendix 6, flap C, for construction purposes at landfill sites. The quantity of materials utilised is to be reported annually by the Company in an environmental report.
11. Leachate from the landfill and runoff water from operation surfaces shall be treated locally before being diverted into the municipal sewerage network. However, in the case of high flows, untreated leachate may be diverted into the municipal sewerage network via the discharge point L1.
12. If odours causing nuisances arise, the Company shall investigate the cause of this in consultation with the regulatory authority.
13. Noise from the operation shall be limited so that as a guideline value it does not give cause to higher equivalent noise levels outdoors at the nearest dwellings than

    50 dB (A) weekdays, daytime (07:00-18.00)
    40 dB (A) at night (22:00-07.00)
    45 dB (A) other times

    Instantaneous noise at night may not exceed 55 dB (A).
14. Noise from the operation shall be limited so that as a guideline value it does not give cause to higher equivalent noise levels outdoors at business premises than

    60 dB (A) weekdays, daytime (07:00-18.00)
    50 dB (A) at night (22:00-07.00)
    55 dB (A) other times

15. The Environmental Court transfers, in accordance with Chapter 22, Section 25, third paragraph of the Environmental Code, the right for the regulatory authority to prescribe those further conditions that may be required in respect of
    - treatment of contaminated materials
    - the provision of a geological barrier, bottom barrier and leachate collection for the new landfill sites,
    - the design of protection against surface leakage of contaminants for the new landfill sites,
    - the performance of closure and after-treatment measures,
    - disposal of leachate in the event of operational disruptions or temporary flows in excess of the treatment capacity installed,
16. In the case of operational disruptions, the regulatory authority is empowered to grant deviations from the applicable conditions and regulations. In this connection, the regulatory authority has the right to determine further conditions.

The Company also proposes as regards composting of petrol station sludge and similarly emissions from the biofuel-fired boiler, that those conditions continue to apply as the County Administrative Board has issued by its decisions of 29 January 2004 and 22 August 2006, respectively.

Security

The Company proposes a security of SEK 200 per m^2 for areas utilised for landfill but not yet finalised (currently 25 ha) together with SEK 20 million for treatment of leachate, handling of landfill gas and control and quality control over a 30-year period after closure of the landfill site. It is proposed that this security could be reduced in pace with the final capping being executed, following approval by the regulatory authority.

The Company proposes a security of SEK 3 million for the interim storage of approximately 3,000 tonnes of hazardous waste. The average cost of the disposal of hazardous waste has consequently been calculated to be approximately SEK 1,000 per tonne.

STATEMENTS OF VIEWS

The National Board of Fisheries states the following:
The impact on general fishery interests of the application affects Väla stream and Tostarp stream as leakage of leachate from the landfill site may impact these streams. There is no information in the environmental impact statement of the presence of fish in the watercourses. According to the National Board of Fisheries' electrofishing records, Väla stream has been surveyed at three places. Only the existence of nine-spined stickleback has been observed. The Board considers that these watercourses that may be affected by the

operation applied for are of little general fishery interest. No special conditions that affect fish are proposed. The impact on the aquatic fauna should, however, be monitored through a control programme.

The County Administrative Board for the County of Skåne states essentially the following:
It ought to be made clear first, on which code in the Swedish Standard Industrial Classification (SNI) the assessment is based and second, the SNI of other relevant codes. This is needed in order for it to be possible to conduct efficient supervision and for the correct fee for consideration and supervision to be charged.

The application documents ought to cover all of the current and planned operations conducted and which will be conducted in the area and which the permit will cover. Among other things, it is not indicated whether or not the Company's facility for upgrading of vehicle gas is included in the application.

The waste that may possibly be excavated out of the biocell reactors ought to be deemed to be a subset of the total quantity of waste brought to the waste treatment plant and thereby form a basis for the classification of the operation and also requirements concerning mitigation measures and precautionary measures. The materials should be dealt with within the facility and will contribute to the total environmental impact of the operation.

According to the experience of the County Administrative Board, nuisance smells from the facility have for many years adversely affected both residents and business operators in the area around the waste treatment plant. Approximately 10,000 people live and work in the surrounding area where the nuisance smells have been said to exist. The Company has taken certain measures to improve the processes for biological treatment, but the odour problem remains. The County Administrative Board is for this reason doubtful as to whether the Company's biological processes satisfy the requirements for the best possible technology according to Chapter 2, Section 3 of the Environmental Code. Furthermore, the localisation is very poor.

The assessment of the County Administrative Board is that the operational problems that have arisen concerning the biogas plant have been rectified so that the feed of waste, anaerobic digestion and also the upgrading of biogas to vehicle fuel can take place without any substantive contribution to the odour from the facility.

The handling of organic waste ought to be limited to the input of waste to the biogas plant, anaerobic digestion in the biogas plant and also measures such as pressing of organic waste and the introduction of the liquid phase to the biogas plant and upgrading of biogas to vehicle fuel. The County Administrative Board considers that the application should be rejected to the extent that it relates to residual biological treatment such as dealing with waste in the KRT, Biodegma (box composting) and biological treatment of park and garden waste and sludge. Biological treatment of contaminated materials may be accepted if certain precautionary measures are taken. Nor should any excavation of previously landfilled material in the biocell reactors be permitted, as there is a great risk of odour nuisance arising.

The storage of waste may be deemed to be a recovery process as referred to in R 13, Appendix 4, of the Waste Ordinance (2001:1063). The County Administrative Board wishes, however, to point out that a maximum storage time is three years according to Section 5 of the said Ordinance. The Company cannot count on obtaining a special exemption in order to be allowed to landfill the combustible and organic waste. This is particularly so considering that the Company has stated that some part of the nuisance smells comes from the landfill site.

The County Administrative Board considers that the Company ought to utilise the time up to and including 31 December 2008 to, for the waste that has been landfilled, design the topography of the landfill site in an appropriate way. After 2008, a new phase for landfill of non-hazardous waste ought have been put into operation and only the final capping works conducted in the present area.

In order not to limit the possibilities of achieving a sufficiently good final cover, for example regarding thickness, the filling height ought also to be specified for the landfilled quantities excluding final capping.

In order to reduce leakage and the risk of nuisance to the surrounding residents, the closure works at the existing landfill site ought to be completed as soon as possible when it is considered that there is no longer any risk of serious settlement. The Company should report on a plan specifying times for the execution of the final capping and its completion. The County Administrative Board considers that the Company ought to undertake to implement the final capping at the existing landfill site (Phase 1) within ten years from when the landfill has ceased. The covering layer should be at least 1.5 metres thick counted from the capping liner, i.e., where the protective layer and drainage layer are included.

The Company should report in a better way on how large the quantities of groundwater are that penetrate into the existing landfill site and also provide proposals for measures to reduce the upward penetration of groundwater. To only impose requirements for final capping at the landfill site and at the same time allow uncontrolled quantities of water to penetrate from underneath should not be accepted. The Company ought to be required to commission an investigation to investigate how the groundwater flows are to be reduced.

It ought to be clarified what criteria determine when the leachate from the surfaces for treatment of contaminated materials is to be treated before it is transferred to the local leachate treatment.

The County Administrative Board considers that transfer of leachate from Filborna waste treatment plant to the municipal wastewater treatment plant should not be allowed. It should be a precondition that there is local disposal of leachate for the operation to continue. There are large areas within the facility that instead of being utilised for planned future landfill could possibly be utilised for a local processing of leachate. The County Administrative Board does not oppose a request for a probationary period, provided that a local solution is put in place. The Company ought to propose discharge levels that can apply during the probationary period. The issue of the treatment of water from oil sludge and the evaporation plant together with pumpable industrial sludge ought to be included in the probationary period investigation commissioned.

The County Administrative Board considers that the request concerning CHP ought to be expressed as total installed fuel capacity input. It should be clearly indicated by the judgment (permit) that the CHP is a waste incineration plant that is covered by the Ordinance on waste incineration (2002:1060) and the Swedish Environmental Protection Agency's Regulations on Waste Incineration (NFS 2002:28), that is to say, not a waste co-incineration plant.

The County Administrative Board considers that a CHP with a total installed fuel capacity input of 65 MW should not be erected at Filborna recovery facility, as the heat that arises in the operation should be utilised to the greatest possible extent. The County Administrative Board may, however, accept a solution where the CHP is erected as two boilers, but there the Company undertakes not to erect the other boiler before the

Company can demonstrate that the heat produced at the CHP can basically be utilised. Moreover, the capacity of the first boiler should not exceed half of the total installed fuel capacity input and the facility should furthermore be designed in accordance with the alternative proposed in the application, with higher steam conditions, and thereby create a greater proportion of electricity generation, as the district heating network is saturated with residual heat. The startup period ought to be five years for the first boiler and ten years for the second.

There is reason to limit both the emission of nitrous oxide and ammonia to the atmosphere. The emission of nitrogen oxides from the facility, and similarly the incineration of animal by-products, ought to be included in the investigation commissioned during the probationary period. The target value during the probationary period for emissions of nitrogen oxides ought to be 100 mg NO_x/Nm^3 dry gas (O_2 content 11%).

It ought to be clarified what mitigation measures will be implemented in conjunction with the handling of animal by-products at the CHP, for example, the transfer of fuel to the storage tank, bunding of the storage tank and measures to avoid odour problems. Similarly, it ought to be clarified which mitigation measures will be implemented in conjunction with the handling of sludge that is to be incinerated from the wastewater treatment plant. The County Administrative Board considers that this processing should be enclosed and exhaust air cleaned in order to avoid the occurrence of odour nuisances. The Company should report its views on, through flue gas condensation, making use of the energy in the relatively viewed more damp flue gases in conjunction with the incineration of sludge.

The transport of bioash from the Västhamn plant should take place enclosed. Otherwise, the Company should report on what measures it intends to take to avoid spillage in conjunction with transport and unloading.

It should be clarified whether the handing of batteries reported applies to all kinds of batteries. Moreover, the maximum momentaneous quantity of hazardous waste in interim storage within the facility should be reported.

The County Administrative Board considers that the term 'three-year period' relating to contaminated materials should be clarified in such a way that it commences 1 January of the year in which the judgment (permit) enters into final legal force. Prior to treatment of each new kind of contaminated material (considering the composition of contaminants) and before a treatment process is applied for the first time, the composition of contaminants, treatment technique, mitigation measures, criteria for the material when the treatment is complete and energy use are to be reported to the regulatory authority.

Contaminated materials that are treated biologically should be covered or the treatment take place in an enclosed facility during the first two months of the process. The exhaust air from the treatment should be fed through a biofilter.

It ought to be clarified whether the process water from soil washing is disposed of after completion of treatment. It ought also to be clarified whether there are occasions where the process water must be disposed of in conjunction with treatment of contaminated materials through chemical oxidation. The Company ought to propose criteria that determine whether the process water ought to be treated locally or disposed of through an approved treatment plant.

It ought to be clarified in the judgment (permit) that treatment of contaminated materials through thermal evaporation is covered by the Ordinance on waste incineration (2002:1060) and associated regulations. It ought to be clarified whether it is possible to utilise the energy in the flue gases created in conjunction with

thermal evaporation. The County Administrative Board considers that it is appropriate to impose such a requirement, if it is possible. The dispersion calculation should be supplemented to also cover the facility for thermal evaporation.

The County Administrative Board accepts the Company's final proposal for security.

The Company's application comprises, among other things, several phases of landfill with an aggregate landfill volume of several million cubic metres of waste, which with the current reduced landfill volumes will facilitate landfill and other waste management for several decades to come. The environmental impact of the operation can therefore be difficult to comprehend overall, particularly for the areas that will not be put into use for waste management for many years. The facility also lacks a local means of disposal of leachate, with discharges direct to the recipient. Moreover, there are problems with the inflow of groundwater and great problems with odour that are unresolved. The County Administrative Board therefore considers that the permit, except for the CHP and the biogas plant, should be limited to apply for 10 years.

The County Administrative Board proposes the following conditions.

1. Nuisances as a consequence of the operation should be prevented. If nuisances nonetheless arise, the applicant shall, in consultation with the regulatory authority, immediately implement further measures to combat the nuisances.
2. This permit may not be utilised before financial security has been presented.
3. Chemical products and hazardous waste shall be stored and in general dealt with so that spillage and leakage cannot contaminate the surroundings or reach the municipal sewerage network. Chemical products and hazardous waste, except for electrical and electronic waste, non-chipped impregnated timber and tar asphalt, shall be stored on a surface that is impermeable, bunded in and under roof. Storage tanks for chemicals specially intended for outdoor use do not need to be stored under a roof. The collection volumes within the respective bunded areas shall correspond at least to the largest tank/cistern plus 10% of the aggregate volume of other tanks/cisterns. Storage yanks and cisterns shall be equipped with level control.
4. Contaminated leachate from storage, treatment and landfill areas shall be collected and purified to an appropriate extent for discharge to the recipient.
5. Prior to the treatment of each new kind of contaminated material (considering the composition of contaminants) and before a treatment procedure is applied for the first time, the composition of contaminants, treatment technique, mitigation measures, criteria for the final treatment of the material and energy use are to be reported to the regulatory authority. Before making use of a mobile facility for thermal treatment of contaminated materials, a dispersion calculation shall be reported unless the regulatory authority otherwise decides.
6. (withdrawn)
7. Contaminated materials that are treated biologically should be covered during the first two months of the process. The exhaust air from the treatment should be fed through a biofilter during this period. Biological treatment of contaminated materials shall be undertaken with the addition of nutrients and bulking agents on a surface that has been hardened with asphalt or corresponding material within the collection area for leachate, until such time as the concentration of non-polar hydrocarbons is less than 5,000 mg/kg TS. This treatment shall furthermore continue for at least half of one year including one summer period.

8. Noise from the activity may not, as a guideline value, give cause to higher equivalent noise levels outdoors at dwellings is [*sic* than] 50 dB (A) daytime (07:00-18:00) weekdays, 40 dB (A) at night (22:00-07:00) every day and 45 dB (A) other times. The permitted noise level is reduced by 5 dB (A) units if there are audible tone components and/or bursts of noise. The instantaneous noise level every day, as a guideline value, at the nearest dwellings amounts to at most 55 dB (A).
9. Noise from the operation may not, as a guideline value, give rise to a higher equivalent noise level outdoors at business premises that are not noisy operations than 60 dB (A) daytime (07:00-18:00) weekdays, 50 dB (A) at night (22:00-07:00) every day and 55 dB (A) other times. The permitted noise level is reduced by 5 dB (A) units if there are audible tone components and/or bursts of noise.
10. The final cover above the capping liner (that is to say draining, protective and vegetation layers) shall be at least 1.5 metres thick.
11. The Company shall within two years investigate how the groundwater flow shall be reduced.
12. All handling and storage of waste shall be conducted on sealed hardened water-repellent surfaces.
13. Storage of chipped timber that contains hazardous substances shall be conducted with protection from precipitation.
14. The handling of the wastewater treatment plant's sludge for incineration shall be conducted enclosed and the exhaust air cleaned.
15. The flue gases from the CHP shall be bled off by the chimney with an additional height of at least 53 metres above ground.
16. In conjunction with the use of ammonia, the volume of the ammonia storage tank may not exceed 60 m^3. Detectors that signal an alarm and close off the inflow of ammonia in the event of leakage shall be installed.
17. Fly and bottom ash generated at the facility shall be gathered up and stored separately in order to facilitate the environmentally best possible onward treatment. Storage, handling and transport shall take place in sealed containers so that leachate cannot contaminate land and water and also so that dust nuisances do not arise.
18. A quality control programme specifying measurement methods, measurement frequency and evaluation method shall be in place.

Delegation of powers to the regulatory authority

- Measures according to Section 21 of the Ordinance on the Landfill of Waste

The Company's proposed Condition 8 ought to be worded as follows.

- In the case of technically unavoidable operational stops, operational outages at the facility or faults with measuring equipment, such emission of contaminations to the atmosphere and water which exceed the values fixed may not endure for a period longer than four hours in succession. Moreover, the aggregate operational time under such operational conditions must not exceed 60 hours per year.

The Company's proposed Condition 10 should be governed through supervision. If the Condition is to remain, it ought to be worded as follows:

- The Company may not utilise materials with contamination levels in access of the acceptance criteria proposed in Table 5.3 of Appendix 6, flap C of the Swedish Association of Public Cleansing and Solid Waste Management's Report 2002:09 for construction purposes at landfill sites. Nor may materials be utilised if the limit values specified in the Swedish Environmental Protection Agency's

Regulations concerning landfill, criteria and procedures for receipt of waste at facilities for landfilling of waste (NFS 2004:10) are exceeded. The quantity of materials utilised for construction purposes is to be reported annually by the Company in an environmental report.

The County Administrative Board accepts the Company's proposal that Condition 11 should apply during a probationary period.

The Company's proposed Condition 12 ought be worded as follows.

- The Company shall inform the regulatory authority when odours causing nuisances arise.

The Company ought to, during a probationary period, investigate the need and the possibility of introducing further mitigation measures that limit the dispersion of odour when processing animal by-products and sludge from a wastewater treatment plant. The Company ought to also investigate possible measures to reduce the emission of nitrogen oxides, ammonia and nitrous oxide to the atmosphere, what reductions may be achieved and at what costs. During the probationary period and until such time as otherwise decided, the following provisional regulations ought to apply.

- When using SNCR, SCR or similar technology, the emission of nitrous oxide and ammonia respectively to the atmosphere from the air from the incineration plant may not exceed 30 mg N_2O/Nm^3 (O_2 content 11%) and 10 mg NH_3/Nm^3 (O_2 content 11%). These limit values shall apply as guideline values for the monthly mean value.

The Environment Committee for the City of Helsingborg approves the application and basically states the following:
Recurrent odour nuisances from the Company's operations have occurred ever since the second half of the 1990s. The Committee considers that a final solution to the odour problem from the facility must be provided if the Company is to run the existing and future operation in the long term at the current location and with such scope. All closed parts of the landfill site that have not yet been permanently capped in a satisfactory way and which may give cause to gas release must be immediately furnished with an effective odour-reducing layer pending after-treatment. The area that is kept open for landfilling ought to be limited in size as much as possible and covered over on an ongoing basis. Moreover, the pretreatment of the residual waste should be built in so that the ventilation air is channelled via a biofilter for odour reduction. This measure is also considered to prevent problems with birds and littering.

As regards the screening of waste that is taken out after treatment in the combi-reactor plant and which is now conducted openly, it is proposed that the Company be ordered to execute certain measures with the aim of reducing the odour problems. If the problems remain with the risk of odour, the Company ought to be ordered to also build in that part and channel ventilation air via odour-reducing equipment. The Company ought to also be ordered to, as investigation conditions, first, further investigate the sources of odour from the operation (both quantitatively and qualitatively), second, execute the remaining measures required to minimise the causes of these problems. The overall objective ought to be that the operation under normal operation does not give cause to nuisance smells at dwellings.

The following ought to be prescribed as provisional conditions during the period of investigation:

- The target values for 2007 should be that the number of days with nuisance smells at dwellings is less than 50 days and in total 100 hours.
- The target values for 2008 should be that the number of days with nuisance smells at dwellings is less than 25 days and in total 50 hours.

The Company ought to submit to the Environmental Court an investigation together with proposals for final conditions as regards the odour issue no later than 30 June 2009.

The Environment Committee supports the Company's proposals for noise conditions. However, the word 'nearest' should be removed to avoid ambiguity.

The Environment Committee similarly supports the Company's application for a probationary period for the question of the diversion of leachate and runoff water, but is of the opinion that the investigation that is to be conducted during the probationary period ought to be supplemented with a report concerning what measures may be implemented to further limit the quantity of leachate (e.g. penetrating groundwater) that arises. The Environment Committee expects that the bottom barrier as regards leakage of leachate will satisfy the requirements of the Ordinance on the Landfill of Waste.

Hazardous waste which it may be assumed will cause nuisances to the surroundings, for example through odour, out to be exempted from the permit. Moreover, the area that is to be constructed for the treatment of hazardous waste before landfill ought to be designed with impermeable material, with a system for separate disposal of leachate and also if possible supplied with a roof superstructure.

As regards the CHP, the annual mean values for particulate matter, TOC, hydrogen chloride, hydrogen fluoride, sulphur dioxide, nitrogen oxides and carbon monoxide specified by the Company ought to be fixed as guideline values. The commitments concerning enclosed treatment of waste that may cause nuisances ought to be confirmed as conditions. In general, the CHP ought to be designed in such a way that the greatest possible electrical power is generated. The Environment Committee expects that the plant will not eliminate the use of residual heat in the district heating network, but that any cutbacks will then instead be made at other energy-producing facilities.

Procurement of transport services should be supplemented with demands concerning training in environmentally adapted driving for the drivers engaged. In those cases when vehicles with renewable fuels are not available, the Company should only engage hauliers with vehicles of the highest possible environmental class according to the Act on Motor Vehicle Exhaust Emission Control and Motor Fuel (2001:1080).

The fire in the Company's interim store for hazardous waste on 24 June 2006 caused indirect damage to Väla stream by the discharge of contaminated extinguishing water into a ditch that empties into the stream. The fauna in the stream has been manifestly harmed. The Environment Committee is of the view that it would not be reasonable to allow a risk of water from the hardened water-repellent surfaces within the 'chemicals section' being discharged into Väla stream. The Company should therefore erect a holding pool for such contaminated water for disposal or other similar measure with the same aim.

In general, the Company should review the risks of discharge of extinguishing water to the recipient in the event of a major fire scenario within its entire area of operation, with the aim of collecting and dealing with such contaminated water. The operation applied for regarding a landfill for hazardous waste should also be given attention in this context.

Börje Wigström, Dalhemsvägen 126 A, Helsingborg, expresses his anxiety about the health effects that atmospheric emissions from the system for anaerobic digestion and upgrade of biogas may cause. He stresses that the operation causes strong nuisance smells in the surroundings. He attaches 676 signatures from people opposing the expansion of the operation at Filborna.

Stig Persson, Silvåkragatan 50 and Rolf Sönne, Silvåkragatan 46, Helsingborg, claim that the odour nuisances have increased in strength in recent times. They demand measures to combat the odour, alternatively that the facility is closed pending the development of technology.

Leif Komét, Gamla vägen 2, Helsingborg, refers to the anxiety that residents in the village of Väla by feel about the planned incineration plant and the health effects that the flue gases may cause. He attaches signatures from approximately 40 households in Väla by.

Thomas Nilsson, Brohultsvägen 72, Helsingborg, claims that odour nuisances from the Filborna plant are increasing.

Ruth Nilsson, Tyringegatan 12, Helsingborg, requests that the odour problems are remedied as soon as possible.

Christel Dahlberg, Dalhemsvägen 73 c, and Inga Jönsson, Dalhemsvägen 73 a, Helsingborg, state that the air from the recycling yard has become increasingly worse over the years. They have physical complaints due to the odour and are anxious about the health and environmental impact of the emissions from the operation.

The Company, in response to statements of views, basically states the following:
The bottom fauna surveys are conducted within the framework of internal quality control, which is considered to be sufficient.

It is sufficient to classify the operation in order to determine the level of consideration. The SNI code is of no legal relevance.

The Company's application covers those operations that are described in the application documents, and thus also the facility for upgrading of vehicle gas.

The Stentippen [the Stone Tip] is an older part of Filborna waste treatment plant that has been decontaminated and after-treated during 2005-2006. This is now finalised and not covered by the application. The emptying of existing biocell reactors is a part of ongoing processing of waste that has already been accepted at the facility.

The Company does not share the County Administrative Board's opinion that the main cause of odour is the biological treatment. Measurements indicate that the diffuse leakage of landfill gas from the landfill site is the largest overall source of odour. Therefore, the ongoing final capping is the most important measure to reduce the odour nuisances from the facility. The objective is that the final capping of the existing landfill site shall be completed in 2012. The need for landfill for organic waste will reduce in the future through the new treatment lines for anaerobic digestion and incineration.

Measures were taken as regards the processing of residual household waste in the combi-reactor plant during the summer of 2006. Further measures will be implemented at the turn of the year 2006/2007 in the form of the exchange of the screener for the finished compost and the collecting and treatment of outgoing air from the screening. The planned encapsulation of the pretreatment of household waste is estimated to take place during 2007. In the somewhat longer perspective, the Company is planning an extension of the final anaerobic digestion, which will mean that the production of vehicle gas will be given priority and the need for

composting will reduce. Taken overall, the Company undertakes to, within four years from the permit having entered into final legal force, have reorganised the treatment of organic residual household waste and sorted-at-source organic household and food industry waste so that it is conducted indoors with appropriate treatment of the ventilation air.

Furthermore, the biofuel-fired boiler house and the CHP will be able to utilise ventilation air and residual gases from other operations at the facility, which will lead to the destruction of any smelly substances.

The composting of park and garden waste and digested sludge from wastewater treatment plants takes place on hardened water-repellent surfaces within a part of the facility located more than 1,000 m from the nearest residential areas. Straddled compost turners with high capacity are used to set down and turn the compost, which means that the turning of the compost can take place at intervals adapted to the various materials. The Company considers that the composting satisfies the requirement for best possible technology and is customary at large facilities in Sweden.

The Company withdraws the application for continued treatment of waste in biocell reactors. It is estimated that it will be possible to excavate the existing biocell reactors without any risk of odour nuisances following conclusion of treatment.

The Company wishes to utilise the Biodegma plant in the future for treatment of the following kinds of waste:

- compostable fractions from sorted-at-source residual household waste
- sludge
- fertilizer
- digestate from Line 3
- contaminated materials

Section 5 of the Waste Ordinance (2001:1063) does not apply to the storage of waste at a place where the waste has not been generated but is to be removed or recovered. Storage of sorted combustible waste will, however, normally not last longer than three years.

The principles for connecting Phase 1:7 to the existing landfill site are set out in the supplement to the application. The detailed design will be conducted in consultation with the regulatory authority. Uneven settlements in older underlying cells may be avoided by the gradual construction and packing of the terrace before the capping liner and drainage layer are put down.

The final capping design will determine the height at which the landfill can take place. The landfill will not take place at such a height that the function of the final capping is jeopardised. Final capping of the existing landfill site will take place stage by stage subsequently in accordance with the approved adaptation plan. It is inappropriate to specify a time within which the final capping must have been made. Considering that the maximum frost depth for Helsingborg has been estimated to be 1.2 m, it is considered that a covering layer of 1 to 1.5 m is sufficient.

From an average annual collected leachate quantity of 260,000 m^3, 60,000 m^3 has been assessed as comprising penetrating groundwater. The Company has no objection to the Environmental Court issuing a

probationary period to determine the issue of measures for protection against penetrating groundwater to the existing landfill site. This probationary period ought to be fixed at four years.

Visual checks of any oil in the preponds will take place before leachate from the surfaces for treatment of contaminated materials is led to the local purification system for leachates. If necessary, the water will be returned to the sludge hopper for the receipt of petrol station sludge for treatment.

The local treatment of leachate and runoff water from the facility is considered to be sufficient for no adverse effect to arise in conjunction with the operation of the municipal wastewater treatment plant or regarding the possibility of disposing of sludge from the wastewater treatment plant. General guideline values for industrial waste water (ABVA) apply to discharges to the wastewater treatment plant. There is no reason to in addition to this propose guideline values during the probationary period. The Company opposes local disposal being a precondition for continued operation, and maintains that the issue of discharges being released directly to the recipient should be determined after the end of the proposed probationary period.

The issue involves a 'waste incineration plant' and not a 'waste co-incineration plant'. The application now only relates to the southern of the two localisation alternatives. The Company wishes to keep the choice open for which steam conditions may be chosen for the new waste incineration plant. It is only after negotiations with prospective purchasers of the energy produced that it will be possible to see which alternative would ultimately provide a reasonable acceptance charge for the waste received.

The electricity and heat produced possibly ought to be viewed as being a product. In the same way as a regulatory authority should not make any independent assessment of whether goods produced should be allowed to be put out onto the market, the authority should not assess whether it is possible to sell a product that is manufactured or the electricity and heat that is produced. It cannot be excluded that the CHP at Filborna will occasionally be compelled to cool residual heat. In such case, this can be conducted with the aid of an air cooler which will not have any impact outside the area of operation.

There are no legal powers to impose demands that the operator of the activity should split up its operation as suggested by the County Administrative Board. As long as the localisation satisfies requirements contained in Chapter 2, Section 4 of the Environmental Code, no further demands may come into question.

The management of animal by-products is completely enclosed. The exhaust air is normally supplied to the hot part of the boiler for destruction. If the boiler is not in operation, the air is ventilated to the atmosphere via activated carbon. Sludge from the wastewater treatment plant comes to the facility in covered containers and is unloaded to a store where there is negative pressure. The exhaust air is disposed of in the manner described above.

It is not planned to have any flue gas condensation plant, as the estimated moisture content for the fuel mix in question only lies around 40%. The bioash from the Västhamn plant is fed out in a wet condition and does not cause dust. The management of and the feed to the boiler will take place in covered enclosed transporters. Both loading and unloading of the bioash takes place on hardened water-repellent surfaces that are easy to keep clean through hosing down.

The Company considers that there is insufficient reason to introduce a condition for the emission of nitrous oxide and ammonia. The Company intends, however, to in conjunction with the use of nitrogen oxide-reducing measures run the facility so that the emissions of ammonia and nitrous oxide are also limited to low levels.

Batteries collected that cannot be recovered will be landfilled in cells at the landfill site for hazardous waste.

The Company's application intends, as a mean value over a three-year period annually (i.e., three calendar years), to accept, treat and landfill 150,000 tonnes of contaminated materials. The Company does not have any objection to reporting as proposed by the County Administrative Board before the treatment of each new kind of contaminated material, etc., and undertakes to submit such reports to the regulatory authority.

The Company proposes that the current conditions for composting petrol station sludge should also in the future apply to biological treatment of oil-contaminated materials. Process water from soil washing and chemical oxidation is treated internally as a component part of the respective treatment. If the general guideline values for industrial waste water (ABVA) are not exceeded, discharge is made to the municipal wastewater treatment plant. Process water is dealt with externally if necessary.

The Ordinance on waste incineration and the Swedish Environmental Protection Agency's Regulations on Waste Incineration are applicable to the facility for thermal treatment. This treatment will be conducted through campaigns with mobile facilities. It cannot be deemed to be environmentally justifiable to impose demands for prospective energy contained in flue gases to be utilised from a mobile facility. Facility-specific data may be included in the report that the Company has undertaken to make prior to the treatment of each new kind of contaminated material and before a treatment process is applied for the first time.

The Company maintains its proposals for financial security for the landfill operation. Sewage sludge that has not been composted is not used for the final capping. The Company proposes a security of SEK 3 million for the interim storage of approximately 3,000 tonnes of hazardous waste. The average cost of the disposal of hazardous waste has consequently been calculated to be approximately SEK 1,000 per tonne.

A time restriction on the permit would entail great uncertainty for the Company in conjunction with new, major investments that are planned. As regards landfill, the mitigation measures will be taken to satisfy the requirements contained in the Ordinance on the Landfill of Waste. Furthermore, the Company has accepted that the issue of mitigation measures against groundwater infiltration is put on a probationary period. The environmental impact associated with the landfill may consequently be deemed to have been sufficiently investigated. The Company opposes a time limit on the permit.

The Company has the following views on the proposals for conditions made by the County Administrative Board:

1. A condition should be structured in such way that it is clearly indicated what is required of the operator of the activity. The Company opposes the proposed condition.
2. The Company assumes that the issue of financial security will be dealt with in the final judgment (permit).
3. The Company revises its proposal, item 3.
4. See comments above regarding the diversion of leachate and the Company's revised proposed conditions, item 12.

5. No conditions are necessary set against the background of the Company's undertaking; see also the Company's proposed conditions, item 16.

6-7. See comments above regarding contaminated materials.

8-9. The Company approves the proposals.

10. See comments above regarding final capping.

11. See comments above regarding protection against penetrating groundwater.

12. The application indicates that all handling of waste outdoors will be conducted on hardened water-repellent surfaces. It is not necessary to have any separate condition.

13. Chipping of impregnated timber will be conducted through a campaign. It is therefore considered not justified to prescribe that chipping should take place under a roof. Storage of chipped impregnated timber can take place with protection from precipitation.

14. Set against the background of the handling of digested sludge not being considered to cause any odour nuisances, the Company opposes the proposed condition.

15. The Company accepts the condition.

16. Storage of ammonia is covered by the proposal for conditions regarding the storage of chemical products. It is not necessary to have any separate condition.

17. The Company accepts the condition.

18. The provisions of the Environmental Code on internal quality control apply to the operation. It is not necessary to have any separate condition.

The Company considers that it has not been established that there are any special circumstances justifying the authorisation of the regulatory authority to prescribe conditions that may be required for the quality control of the operations and measures under Sections 21 and 26 of the Ordinance on the Landfill of Waste.

The Company does not have any objection to, as a trial, supply those parts of the existing landfill site that have not been permanently capped with some form of odour reducing cover, for example a methane oxidation layer (MOL) or an impermeable plastic sheet, pending final capping.

When the existing landfill site has been permanently capped, the landfill of organic waste has ceased and the treatment of organic household waste is conducted enclosed, the Company's goal is that nuisance smells will not occur more often than the target values proposed by the Environment Committee. It is, however, inappropriate to prescribe target values as conditions for the operation, as a condition must be structured in such a way that it clearly indicates what is required of the operator of the activity in order for the condition to be met. The issue of contravention of a condition having occurred must be established on objective grounds. Generally, odour is a nuisance or disruption that is difficult to gauge. The Company has, however, proposed a condition that entails that the Company must if nuisance smells arise investigate the cause of this in consultation with the regulatory authority. It may also be appropriate in this connection to discuss how it should be determined which odour is to be deemed to be disrupting.

The Company has nothing against the word 'nearest' dwellings being removed. The proposed condition corresponds, however, with the practice of the Environmental Court concerning 'noise conditions'.

The Company has no objection to the probationary period proposed above in respect of penetrating groundwater also referring to the issue of execution of measures to in general limit the quantity of leachate.

It is currently not possible to specify what kinds of hazardous waste will be considered to possibly entail a risk of causing nuisances to the surroundings such as, e.g., odour, without an assessment being made in each individual case in conjunction with the reception check. The storage of hazardous waste pending landfill will be conducted on a hardened water-repellent surface with protection from precipitation.

No reason has been established to prescribe additional limit values for the CHP than those applicable according to the Swedish Environmental Protection Agency's regulations on waste incineration.

When procuring transport, the Company will apply the procurement rules of the City of Helsingborg. Large parts of the transport to and from the facility are conducted by external hauliers.

As a result of experiences from the fire in the Company's interim store for hazardous waste, the area in front of the new interim store will be connected to a collection system for water so that runover cannot occur to the surroundings but instead to an internal basin. There are sealed tanks for the collection of any leakage from the interim store itself.

In the case of any fire within other parts of the facility, the extinguishing water will normally run off to the existing leachate ponds. At present, a review is being conducted of the need to supplement and/or improve the collection system for extinguishing water.

REASONS FOR JUDGMENT (PERMIT)

Environmental impact statement

The Environmental Court makes the assessment that the environmental impact statement, with the supplements made during the processing of this case, now satisfies the requirements for such a statement as prescribed by Chapter 6 of the Environmental Code. The environmental impact statement ought therefore to be approved.

Permissibility – limitation of time

Waste management has been conducted at Filborna for a long time. The operation has been gradually changed from a pure landfill site to a multifaceted facility for the treatment and recovery of waste. The proximity to developed areas has at the same time entailed recurrent complaints of nuisance smells in the surroundings.

The applicant and the consulting authorities are in part in disagreement about the source of the nuisance smells. The Company considers that the diffuse leakage of landfill air is the greatest overall source and that the ongoing final capping is consequently the most important measure to reduce the odour nuisances from the facility. The County Administrative Board for its part considers that the nuisance smells largely emanate

from the biological treatment processes. The County Administrative Board has therefore requested a rejection of that part of the application relating to management of waste in a combi-reactor plant (KRT), box composting (Biodegma) and composting of garden waste and sludge.

Otherwise, the County Administrative Board has requested that the permit, except for the CHP and the biogas plant, is subject to a time limit of ten years. As reasons it was stated that the environmental impact from the operation may be difficult to comprehend overall, particularly for the areas that will not be put into use for waste management for many years. The facility also lacks a local means of taking care of leachate with discharges directly to the recipient. Moreover, there are problems with the inflow of groundwater and great problems with odour that are unresolved.

The Environmental Court makes the following assessment.

The nuisance smells from the operation have at least intermittently been greater than what reasonably ought to be tolerated by people present in its vicinity. The investigation in the case, however, does not provide a clear answer concerning exactly what or which parts of the facility or operation generate these nuisances. To the extent that the odour emanates from the existing landfill site, the release of smelly substances will reduce when this is finalised and after-treated. The Company has also undertaken to supply those parts of the existing landfill site with some form of odour-reducing cover pending final capping. However, it appears likely that the biological treatment processes have intermittently caused strong nuisance smells. There is therefore reason to carefully deliberate on the future permissibility of these parts of the operation.

The Company has in recent times implemented a number of measures with the aim of reducing the odour from the combi-reactor plant. A new compost turner is used in conjunction with the composting of park and garden waste. An undertaking has also been given to rearrange the treatment of organic residual household waste and sorted-at-source organic household and food industry waste so that it is conducted indoors with appropriate treatment of the ventilation air.

The Environmental Court considers that as, first, it has not yet been possible to evaluate the effect of the newly implemented measures, second, the planned encapsulation may possibly noticeably improve the odour

situation, there is not sufficient reason to now refuse a continued permit for the biological treatment processes now in question. The permit for the processes ought, however, to be limited in time to six years in order to thereafter enable an unprejudiced review, when experience has been gained of the measures implemented and planned.

It is considered that the current diversion of contaminated water to the municipal wastewater network could take place without any risk of significant nuisance. Nor has the Municipality opposed the receipt of this water also in the future. The Company has similarly undertaken to investigate the possibilities of both limiting the leachate quantities and further purification of contaminated water. The Environmental Court finds that, except for that stated above concerning certain biological treatment processes, there is no reason to limit the permit in time.

Otherwise, there are no impediments under the Environmental Code against the operation applied for. A permit shall therefore be granted.

Scope of the permit

The Environmental Court does not consider that there is cause to specify SNI codes in the permit. It is sufficient with the description of the various parts of the operation provided by the applicant in its application. In accordance with established practice, the permit for the CHP shall also be limited to a total installed capacity input.

Otherwise, the permit should be specified to relate to the receipt, interim storage and landfill of the respective kinds of waste, and similarly the incineration of those categories of waste specified by the Company in the application. The treatment methods for contaminated materials and the information required according to Chapter 22, Sections 25 a and 25 b of the Environmental Code should be specified in the permit. Reasons have not been shown to, as the Environment Committee suggested, exempt certain kinds of hazardous waste from the permit.

General regulations

The operation shall be subject to the applicable parts of, among other things, the Waste Ordinance (2001:1063), the Ordinance on the Landfill of Waste (2001:512) (the Landfill Ordinance), the Ordinance on waste incineration (2002:1060), the Ordinance on Operator Self-inspections (1998:901) together with the

Swedish Environmental Agency's Regulations on Waste Incineration (NFS 2002:28), and concerning Handling of Combustible Waste and Organic Waste (NFS 2004:4) and similarly concerning landfill, criteria and procedures for receipt of waste at facilities for landfilling of waste (NFS 2004:10). Requirements with corresponding content ought then not to be expressed as conditions (see the Environmental Court of Appeal judgment of 1 December 2000 in Case no. M 7173-99).

The Company has requested a deviation or exemption from the requirement for a geological barrier as referred to in Section 19 of the Landfill Ordinance for the joining of Phase 1:7 with the existing landfill site (Phase 1:6). According to Section 24 of the Landfill Ordinance, the Environmental Court may grant such an exemption provided this can be done without risk of damage, injury or nuisance to human health or the environment.

The deviation requested means that the existing landfill site would be finalised with an impermeable layer that also comprises a bottom barrier for the adjoining new landfill. The bottom barrier is intended to be designed with at least a thickness of 0.5 m and a permeability $<10^{-9}$ m/s. In addition, a 0.5 m drainage layer shall be laid together with geotextile before waste is landfilled. The County Administrative Board has opposed the application with reference to the risk of settlement in the older underlying landfill cell. Set against this, the Company has asserted in rebuttal that it is largely excavated materials that have previously been landfilled at the site.

The Environmental Court makes the following assessment.

The proposed design means that there will not be any geological barrier under that part of the landfill site that adjoins the existing landfill site. On the other hand, the bottom barrier will be designed with a permeability corresponding to the demands for a constructed geological barrier. To completely refrain from adjoining a new landfill site against an existing one would reduce the efficient use of land.

To adjoin a new landfill site to an existing one with an 'intermediate cover' has been approved for several similar landfill sites in recent times. The Environmental Court considers that the drainage layer gradient in combination with the impermeable layer ought to provide a satisfactory lead off of water infiltrating towards the bottom level of the new landfill site. Settlement may be avoided through the gradual construction and packing before the impermeable layer is laid. The risk of nuisance nonetheless arising as a consequence of settlement in the existing landfill site is considered to be more than outweighed by the efficient resource

management of available landfill land that would be gained by having them adjoining. Deviations from requirements for a geological barrier therefore ought to be allowed for the joining with Phases 1:6 and 1:7.

Conditions

'General conditions' ought to be prescribed in the customary manner. In general, the conditions shall be prescribed that put into concrete terms the general rules of consideration in a clear and controllable way.

Conditions for storage, storage areas, management of contaminated materials, etc.

It is stated in Section 5 of the Waste Ordinance that interim storage is such storage as occurs for a period shorter than three years before it is recovered or treated, alternatively one year before it is disposed of. According to Appendix 4 of the said Ordinance, storage of waste that is to undergo a specified recovery process is as such to be deemed to be a recovery process. The Company has stated that the storage of sorted combustible waste normally does not last for a time longer than three years.

The Environmental Court considers that storage of waste for an unspecified time can cause pollution that tends to resemble such that arises at a landfill site. The environmental impact of this is not described. Storage ought therefore to be limited to times corresponding to those applicable for interim storage. Section 42 of the Waste Ordinance contains provisions about the obligation to keep records about the operation.

A fundamental requirement for all outdoor handling of waste within the area of operation is that handling takes place on a hardened water-repellent surface so that drainage water can be led off to the leachate system. That this is to be done is indeed indicated by the technical description, but as the mitigation measures appear to be fundamental from the environmental protection perspective they ought nonetheless to be governed through a special condition. It is, however, not reasonable to demand that the surface should be so impermeable that asphalting is required.

For the handling of chemicals and hazardous waste, and particularly as regards the use of ammonia, conditions should be fixed in accordance with the proposal made by the County Administrative Board. The Company has requested that the requirement concerning overflow storage volume should apply first after one year. The Environmental Court considers that to be reasonable.

The Company has already been conducting composting of sludge containing oil from vehicle care facilities, oil separators, etc. This operation has been governed among other ways through the County Administrative

Board's decision on conditions of 29 January 2004. The treatment of contaminated materials now planned has great similarities as regards the risk of environmental impairment of the atmosphere and water. The Environmental Court considers that all handling of contaminated soil should be conducted on surfaces that are sealed through asphalt or corresponding material. Composting should initially take place with the addition of nutrients and bulking agents and take place over one summer period. In accordance with the Company's request, composting may be discontinued when the concentration of non-polar hydrocarbons is less than 5000 mg/kg TS.

The Environmental Court considers that requirements for capping and diversion of air via a filter ought to apply for materials that have been contaminated by hydrocarbon. On the basis of experience, the main part of the volatile hydrocarbons dissipate during the first two months of the treatment.

The applicant has proposed a condition governing the use of waste materials for construction purposes within the facility. The Environmental Court considers that it ought to be specified as a condition that the Company may not use soils that should be considered to be hazardous waste. Otherwise, this issue should be transferred for decision by the regulatory authority.

The Company has undertaken to, prior to treatment of each new kind of contaminated material and before a treatment process is applied for the first time, submit such report as proposed by the Country Administrative Board. This ought to be prescribed as a condition.

A condition concerning the reporting obligation in respect of the basal liner for new landfill areas ought to be prescribed in line with the unanimous view of the parties.

The planned excavation of previously landfilled material (Landfill Mining) has not been described in detail in the application. The County Administrative Board has expressed concerns that, among other things, nuisance smells could possibly arise in conjunction with the excavation of biocells. The Company has undertaken to consult before excavation is commenced in order to stop the operation if nuisance smells should arise. The Environmental Court considers that Landfill Mining may be one way of utilising the land more efficiently and that it may be important, considering the risk of settlement, to excavate the biocells before further material is landfilled above. On the other hand, the risk of nuisances through odour and dust ought

not to be ignored. A reporting procedure for all forms of excavation ought therefore to be prescribed, combined with a delegation to the regulatory authority to determine further conditions.

The Environment Committee considers that the area, that has been put in order for the treatment of hazardous waste before landfill, should be designed with an impermeable material (concrete or bituminous concrete), with a system for separate disposal of leachate and also if possible supplied with a roof superstructure. The Company has accepted this. This ought to be prescribed as a condition.

In order to reduce the risk of contamination of penetrating rainwater, conditions should also be prescribed concerning the daily coverage of active tipping faces, special handling of asbestos waste and protection of hazardous waste.

The Company has undertaken to permanently cap the existing landfill site within ten years from the landfill having ceased, and also to furnish those parts that are not permanently capped with some form of odour-reducing cover. This should be prescribed as conditions, and similarly that all handling of animal waste should be enclosed.

Conditions for the CHP

According to Chapter 2, Section 5 of the Environmental Code, everyone who conducts an operation should conserve energy. The Company has reported two alternative designs for the CHP with different steam conditions (16 bar, 220 °C resp. 40 bar, 400 °C). In both cases it is expected that the existing residual heat in the district heating network will be suppressed with 261 GWh resp. 129 GWh. The Environmental Court considers that the waste of heating energy, which the secondary effect in the form of suppression of residual heat involves, must be taken into account within the framework of this assessment and it ought as a condition to be prescribed that the plant shall be designed according to the alternative that produces the optimum steam conditions. This does not involve any assessment of the product because the principal purpose of the plant, as the Company has chosen to present its application, is to incinerate waste, not to produce energy.

Unanimity prevails concerning both the height of the chimney at the CHP and the processing of fly and bottom ash, and also which emissions are to be included in conjunction with measurement.

Conditions should be fixed in accordance with the proposal of the County Administrative Board concerning the longest time [*sic* allowed for emissions] in conjunction with technically unavoidable operational stops, operational outages or faults with measuring equipment.

Corresponding time in the event of a breakdown to the purification equipment is governed by the Swedish Environmental Protection Agency's Regulations on Waste Incineration (NFS 2002:28).

There is otherwise no reason to prescribe further limit values for atmospheric emissions from the CHP beyond those applicable according to the Environmental Protection Agency's Regulations on Waste Incineration, with the exception of nitrogen oxides (see below under Probationary period).

Conditions for the boiler house

Conditions ought to apply for the biofuel-fired boiler house to the effect that they correspond to those prescribed by the County Administrative Board through its decision of 22 August 2006.

Conditions for noise

For a long time, limit values for the noise at surrounding dwellings have applied for the operation. There is no reason to change these to guideline values. The Company and the County Administrative Board have proposed that the noise levels by business premises should also be regulated. The Environmental Court finds that, account being taken of the nature of the surrounding developed areas, there is cause to regulate the noise and that it would be appropriate for guideline values to be adopted in this case.

Conditions for quality control, etc.

According to Chapter 22, Section 25 of the Environmental Code, a permit judgment should contain provisions concerning supervision, inspection and control such as quality control of emissions/discharges specifying measurement method, measurement frequency and evaluation method. The Ordinance on Operator Self-inspections (1998:901) does not in this connection contain an exhaustive regulation of the matter, and similarly nor does it provide any link to a certified environmental management system.

The Environmental Court therefore considers that it ought to be indicated by conditions that an up-to-date quality control programme should be in place. It ought to be delegated to the regulatory authority to impose conditions concerning quality control in more detail. In this connection, the views of the National Board of Fisheries are to be taken into account.

Other conditions

The Environment Committee has expressed anxiety about certain kinds of hazardous waste possibly giving cause to nuisances owing to, for example, odour. The Company has for its part emphasised that it considers

it to be one of its obligations to accept waste generated within the catchment area. According to Chapter 2, Section 2 of the Environmental Code, everyone who conducts an operation shall obtain the knowledge required with regard to the nature and scope of the activity to protect human health and the environment against damage, injury or nuisance. This appears to be particularly important for the Filborna facility where, for instance, individual maintenance measures may lead to nuisance smells. Conditions ought therefore to be prescribed to the effect that written instructions are to be available for various components of work of relevance from the environmental protection perspective. This ought to include an assessment of whether a particular kind of waste may possibly cause nuisance smells (see also Probationary period).

The same requirements for a duty to report as apply for the basal liner ought to be applied in advance of final capping, with the power for the regulatory authority to prescribe further conditions. There is no cause to regulate now the thickness of the final capping.

In addition to this, the regulatory authority ought to be delegated the power to determine conditions concerning the execution of protection against surface pollution leakage (Section 21 of the Landfill Ordinance) and concrete measures to combat the nuisances referred to in Section 26 of the Landfill Ordinance. There is no reason to prescribe special conditions now for transports or fire protection.

The Company has also requested that the regulatory authority should be afforded power to grant deviations from the applicable conditions and regulations in the event of breakdowns. According to Chapter 22, Section 25 of the Environmental Code, the Environmental Court may transfer power to the regulatory authority to determine conditions of minor importance. Temporary changes to the conditions are governed by Chapter 24, Section 8 of the Environmental Code. The Environmental Court finds that there is no legal basis on which to grant the Company's application.

Probationary period

The Company has requested that the Environmental Court should place the following issues on a probationary period:

- Whether the discharge of treated leachate and runoff water can be made directly to the recipient,
- design of mitigation measures against penetrating groundwater and measures in general to limit the amount of leachate,
- emissions of nitrogen oxides, ammonia and nitrous oxide from the CHP.

The Company has similarly accepted the Environment Committee's request to also put the issue of nuisance smells on a probationary period.

The Environmental Court considers that a probationary period is needed to conduct further investigations and gain experience of the new additional parts of the operation and mitigation measures. As regards existing operations, the reporting time should be fixed as a set date, while the time for the CHP should be linked to the time it is put into service.

Provisional regulations concerning water should apply in accordance with the Company's application. For the content of ammonia and nitrous oxide, the Environmental Court assesses that it is technically possible to maintain the levels requested by the County Administrative Board. The Company has not shown the opposite. It is not necessary to have any special target value for NO_X.

The Company should be granted the right to during the probationary period, as regards nuisance smells, utilise the Biodegma plant for the kinds of waste specified at the main hearing. It is very important that the encapsulation of the biological waste processing proposed by the Company is implemented as soon as possible. The Environmental Court considers that it ought to be possible to implement this within three years.

Startup period

According to Chapter 22, Section 25 of the Environmental Code, the time within which the startup of an environmentally hazardous activity must have taken place should be stated in the permit judgment. In this case, the judgment covers, first, the existing operation at Filborna, second, an extension/change to the scope of the operation in various respects compared with the previous permits and, third, completely new facilities such as a CHP.

The Company has requested that the startup period is determined to be five years and also stated that this period should relate to the utilisation of the permit as such, regardless of whether individual facility parts have been established.

With the operation being 'started up' it is meant that the permit is utilised in a particular respect, i.e., that a facility is commenced, a change commenced, etc. As regards existing operations the provision is primarily aimed at the cases which require building activities. The time limit is linked to the commencement of the

environmentally hazardous activity that is to be conducted at the existing facility after the changes have been implemented. The building works or other works that are commenced to erect or modify a facility or operation do not mean that the time limit is broken (Bjällås-Rahmn, *Miljöskyddslagen* [the Environmental Protection Act], p. 107).

For the operation at Filborna, a startup period means that the Company is given time to erect and put into operation the CHP, put in order new landfill areas and commence landfilling, complete areas for treatment of contaminated soil so that the treatment may be commenced when the need arises, and to in general implement the building and facility works allowed by the permit. Measures that take place after the startup period has expired must be preceded by a new permit review or application. The permit thus lapses in those respects that have not been realised within the startup period. According to Chapter 24, Section 2 of the Environmental Code, a startup period may be extended under certain circumstances.

The Environmental Court considers that the startup period should be determined to be five years in accordance with the Company's application.

Previous permits

The Company's application resulted from, as regards the existing operation, the requirements under the Ordinance (2004:989) concerning the review of some environmentally hazardous activities and also the transitional provisions to the Ordinance (1998:899) concerning Environmentally Hazardous Activities and Protection of Public Health. As it consequently ensues from legislation and not from the applicant's own planning that a reconsideration is to be conducted, it ought to be ordered that the new permit, when it enters into final legal force, replaces the existing ones, which consequently lapse. It is thus not an issue concerning the withdrawal of a permit under Chapter 24, Section 3, first paragraph, item 6 of the Environmental Code, cf. Bengtsson, et al., *Miljöbalken en kommentar Del 2* [The Environmental Code, a commentary Part 2], p. 24:13.

Security

The applicant has estimated the costs for the final capping of the area utilised but not yet finalised to be SEK 50 million together with SEK 20 million for the treatment of leachate, dealing with the landfill gas, and control and quality control. The Company proposes a security of SEK 3 million for the interim storage of

approximately 3,000 tonnes of hazardous waste. The Company proposes that this security is reduced in pace with the final capping being executed, following approval by the regulatory authority.

The Environmental Court considers that the expenses of after-treatment and other reinstatement measures estimated by the applicant may be accepted. The future costs are influenced by both the rate that the after-treatment of existing landfill progresses and also the utilisation of new areas for landfill. There is no supporting documentation to be able to decide on a gradual change of the security.

The security shall in this case be fixed for the operation first, in accordance with the mandatory provisions contained in Chapter 15, Section 34 of the Environmental Code for landfill operations and, second, according to the general provisions contained in Chapter 16, Section 3 of the Environmental Code. In contrast to the provisions contained in Chapter 16, the provision contained in Chapter 15 does not as such contain any express regulation concerning the management of securities or concerning approval or storage.

In a case such as this, the security must be managed as part of the whole and, for both practical reasons and also to be in line with how the issue is dealt with in Chapter 16, the security should be managed with the point of departure being the rules contained in Chapter 16, Section 3 of the Environmental Code. This security shall thus be considered by the regulatory authority.

Enforcement
There is reason to grant the application for the provision on enforcement.

HOW TO APPEAL: see Appendix
Appeals no later than 1 February 2007

(signature)
Anders Bengtsson

(signature)
Bertil Varenius

Judge Anders Bengtsson, Chair, Environmental Court Judge Bertil Varenius together with expert members Lars Wennerstål and Kjell Karlsson, participated in this ruling

[Translation from Swedish into English]

Appendix

HOW TO APPEAL

If you are dissatisfied with the judgment, you can appeal against it to the Environmental Court of Appeal, Svea Court of Appeal. You can do this by writing an appeal that you send to the Environmental Court. What this appeal should include is shown under THE CONTENT OF THE APPEAL below.

The appeal must have been received by the Environmental Court **within three weeks** of the date of the judgment. The last date for an appeal is stated at the end of the judgment.

Cross-appeals

If your counterparty has appealed against the judgment, you may also submit an appeal to the Environmental Court of Appeal even if the normal time for appeal has expired (known as 'cross-appeal'). In this case, you must also send an appeal to the Environmental Court.

A cross-appeal must have been received by the Environmental Court within **one week** from the last date for an appeal stated on the last page in the judgment.

If an appeal lapses or is withdrawn, the cross-appeal cannot be considered either.

THE CONTENT OF THE APPEAL

It must be stated in the appeal

1. that it is addressed to the Environmental Court of Appeal,
2. the parties' names and domiciles and if possible their postal addresses, occupations, personal identity (ID) numbers and telephone numbers, at the same time naming the parties as appellant and counterparty,
3. the judgment appealed against by stating the name of the Environmental Court and also the date of the judgment,
4. the requested change to the Environmental Court's judgment,
5. the grounds (reasons) for the appeal, and also
6. the evidence adduced.

PLEASE NOTE

1. The appeal should thus be addressed to the Environmental Court of Appeal but submitted or sent to the Environmental Court.
2. As many copies of the document as there are counterparties in the case must be attached to the appeal. If a party has not attached a sufficient number of copies, the copies needed will be produced at the cost of the party.

Further information is provided by the Environmental Court.

Instructions for appeal – judgment (permit) under the Environmental Code (application case)

Date: 3 March 2025
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