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# Human population and activities at Simpevarp

# **Site Description**

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December 2004

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This report concerns a study which was conducted for SKB. The conclusions and viewpoints presented in the report are those of the authors and do not necessarily coincide with those of the client.

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# Abstract

The Swedish Nuclear Fuel and Waste Management Co (Svensk Kärnbränslehantering AB, SKB) is in the process of selecting a safe and environmentally acceptable location for a deep repository of radioactive waste. Two alternative locations are under investigation. These are Forsmark, Östhammars kommun<sup>1</sup> and Simpevarp/Laxemar, Oskarshamns kommun. SKB has expressed the importance of describing the humans and their activities in these areas and therefore has this synthesis concerning the human population in Forsmark been produced.

The description is a statistical synthesis, mainly based upon statistical data from SCB (Statistics Sweden) that has been collected, processed and analysed. The statistical data has not been verified through site inspections and interviews. When using statistical data, it is advisable to note that the data becomes more unreliable if the areas are small, with small populations.

The data in this description is essential for future evaluations of the impact on the environment and its human population (environmental impacts assessments). The data is also important when modelling the potential flows of radio nuclides and calculating the risk of exposure in future safety assessments.

The actual area for the study is in this report called "the Simpevarp area", an area of 127.0 km<sup>2</sup> near Oskarshamn nuclear power plant. The land use in Simpevarp area differs notably from the land use in Kalmar län. The forest area is far more dominating in Simpevarp area than in Kalmar län and it represents as much as 89% compared to 63% of the total area. Only 4.4% of the area is arable land compared to 11.6% in Kalmar län and only 0.3% is of other type (wetlands, bare rock, quarries, pites etc) compared to 15.6% in the county.

The main observation is that Simpevarp area is a sparsely populated area located in a relatively lightly populated county. In 2002, the population density was 7.4 inhabitants/km<sup>2</sup>, three times lower than in Kalmar län. The demography statistics show no upward trend, instead there is a slow downward trend in Simpevarp area as well as Oskarshamns kommun and Kalmar län. Both the building statistics and the statistics concerning the number of work places indicate that the Simpevarp area is a region without growth.

Most (83.6%) of the people that work within Simpevarp area (employed day-time population) are occupied within the sector electricity-, gas- and water supply, sewage and refuse disposal. This dominance is due to Oskarshamn nuclear power plant (OKG). Among the employed population living in Simpevarp area (employed night-time population), only 15.1% is working within the same sector. Consequently, there is a considerable ingoing commuting into the Simpevarp area. The net commuting is positive in the Simpevarp area, as well as in Misterhult församling and Oskarhamns kommun, meaning the ingoing commuting is larger than the outgoing. The net commuting is negative in the county as a whole. Among the people living in the Simpevarp area Mining and manufacturing is the largest type of business (24.6%).

The forests are influenced by forestry; app one third of the forest within the regional model area is younger than 30 years. The average age of the productive forest is app 53 years. About 1/4 of the logging products are used for pulp production, and the rest as timber.

<sup>&</sup>lt;sup>1</sup> Kommun = municipality. For other Swedish terms see List of terms

Kalmar län is the fifth largest fishing county in Sweden and it answers for more commercial fishing than the rest of the east coast altogether. Fishermen in Borgholm and Västervik kommun catch the main part of the fish.

Simpevarp area is most likely a frequently visited area for outdoor activities, such as hunting, fishing, hiking as well as picking of wild berries and mushrooms. As the forest area is very dominating in the area, the amount of wild berries and mushrooms are probably larger per unit area than in the county and country. The hunting of moose is more extensive in Misterhult parish than in Kalmar län. Almost twice as many (1.7 times) moose have in average been harvested per km<sup>2</sup> since the season 1997/1998. The hunting of roe deers is most extensive in Götaland, especially in Kalmar län, Skåne län and Hallands län. The archipelago along Simpevarp area is used for outdoor life, mainly boatlife, sunbathing, camping, canoeing and fishing.

# Sammanfattning

Svensk Kärnbränslehantering AB, SKB, ansvarar för att hitta en säkerhetsmässigt och miljömässigt lämplig plats för det framtida djupförvaret av använt kärnbränsle. Två tänkbara lokaler undersöks nu närmare. Dessa är Simpevarp i Oskarshamns kommun samt Forsmark i Östhammars kommun.

På uppdrag av SKB har därför SwedPower AB tagit fram en beskrivning över de människor som bor i Simpevarpsområdet och hur de använder sig av marken inom området. Arbetet har innefattat insamling av tillgängligt material (i huvudsak statistiskt material från SCB), bearbetning och analys av materialet samt i vissa fall beräkningar. Det har inte ingått i uppdraget att verifiera det statistiska materialet genom platsbesök. Det bör även noteras att den statistiska osäkerheten ökar när man väljer att studera små områden med liten befolkning, vilket är fallet i denna studie.

Materialet kommer att vara värdefullt i miljökonsekvensbeskrivningsarbetet samt vid flödes- och dosmodellering i säkerhetsanalysarbetet. Det är även viktigt att ha en grundlig nulägesbeskrivning "baseline" inför det framtida övervakningsprogrammet.

Det egentliga området för denna beskrivning kallas i rapporten för "the Simpevarp area", ett område på 127 km<sup>2</sup> runt Oskarshamns kärnkraftverk. Området består av 14 delområden, varav åtta är delavrinningsområden som namngivits av limnologiska institutionen i Uppsala. De övriga delområdena är OKG-halvön, öarna Hålö, Ävrö och Äspö samt två kustområden som avgränsas av det regionala modellområdet. Data har samlats in för Simpevarp area samt alla delområden inom Simpevarp area. Data har även samlats in för skärgårdsöarna inom Misterhult församling.

För att kunna få fram en högkvalitativ platsbeskrivning har även jämförande data samlats in för fyra större geografiska områden. Dessa är huvudavrinningsområdet (72/73), Misterhult församling, Oskarshamns kommun samt Kalmar län. Data har så långt som möjligt samlats in för en tidsserie på 10 år, vilket ger en bättre och säkrare beskrivning av en variabel än data från ett enskilt år. Med flerårig variabeldata kan även trender synliggöras och beskrivas.

Det statiska materialet visar att Simpevarp area är ett glesbefolkat område i ett relativt glesbefolkat län. År 2002 bodde det 7,4 invånare per kvadratkilometer i området medan befolkningstätheten i länet var 21,0. Statistiken visar inga tecken på en uppåtgående trend, istället har befolkningen minskat något de senaste tio åren. Vidare har antalet arbetsställen minskat långsamt sedan 1997. Inga flerbostadshus eller småhus har byggts i området sedan 1993, då 19 lägenheter färdigställdes. Det kan således konstateras att området inte är något tillväxtområde. Några få bygglov har dock beviljats sedan 1996, så nybyggnationer lär förekomma även om inte byggstatistiken visar detta.

Den klart dominerande sektorn bland den förvärvsarbetande dagbefolkningen (arbetar i området) är energiproduktion, vattenförsörjning och avfallshantering. Sektorn livnär 83,6 % av den förvärvsarbetande dagbefolkningen, varav en stor andel arbetar på Oskarshamns kärnkraftverk. Endast 13,7 % av den förvärvsarbetande nattbefolkningen (bosatt i området) arbetar inom denna sektor. Det är följaktligen en markant inpendling till Simpevarp area, vilket medför att nettopendling i området är positiv. År 2001 var nettopendlingen +676. Av totalt 395 förvärvsarbetande invånare pendlade 287 ut ur området.

Hälften av fastigheterna i området är småhusfastigheter enligt Fastighetstaxeringsre gistret. Fritidshusen utgör 21 %, vilket är en mindre andel än i församlingen där de utgör 31,5 %. Märkligt nog har antalet lantbruksfastigheter ökat mellan 1996 och 2002. Detta överrensstämmer inte med statistiken över aktiva lantbruk från Jordbruksverket (Lantbruksregistret). Ökningen kan tänkas bero på avstyckningar.

Markanvändningen i Simpevarp area skiljer sig påtagligt från markanvändningen i Kalmar län. Endast 4,4 % av arealen utgörs av jordbruksmark och endast 0,3 % av annan mark (våtmark, berg, täkt etc) jämfört med 11,6 % respektive 15,6 % i Kalmar län. Skogsmarken är klart dominerande i Simpevarp area och utgör hela 88,5 % av den totala arealen, vilket kan jämföras med 62,5 % i länet.

Stora delar av områdets skogar är utnyttjade i skogsbruket; ungefär en tredjedel av skogen inom regionala modellområdet är yngre än 30 år. Medelåldern på de produktiva skogarna är ca 53 år. Ungefär en fjärdedel av den avverkade skogen används för massatillverkning och resterande 75 % blir timmerved.

Simpevarp area är sannolikt ett välbesökt område för friluftsliv, såsom jakt, fiske, vandring, svamp och bärplockning. Skogsmarken är betydligt mer dominerande i Simpevarp area än i Kalmar län och Sverige som helhet. Mängden bär och svamp per ytenhet inom området borde därmed vara större än i länet och i riket. Sedan säsongen 1997/1998 har det i genomsnitt fällts 1,7 gånger fler älgar per kvadratkilometer i Misterhult församling jämfört med Kalmar län i stort. Naturreservat är ofta attraktiva områden för friluftsliv och det finns två mindre reservat i området; Talldungen och Stenhagen. Ostkustleden löper genom området och det finns två mindre vandringsleder; Äspöleden och Simpevarvet. Laxemar badplats ligger inom området och det finns en marina vid Oskarshamnsverket, tillhörande OKG. Kylvattensutsläppet vid OKG lockar badgäster sommartid. Vattnet runt Oskarshamnsverket är även en attraktiv fågellokal. Skärgården utmed Simpevarp area utnyttjas för friluftsliv, främst båt- och badliv, camping, paddling och fiske. Figeholms båtklubb, Kärrsviks båtklubb och Löjvikens bryggförening ligger precis utanför Simpevarp area liksom Figeholm Golf och Country Club samt Figeholm Fritid och konferens med 80 campingplatser.

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# 1 Introduction

The Swedish Nuclear Fuel and Waste Management Company (Svensk Kärnbränslehantering AB, SKB) is in the process of selecting a safe and environmentally acceptable location for a deep repository of radioactive waste. Since the spring 2002, two alternative locations have been the subject of preliminary site characterisation. These are Forsmark in Östhammars kommun and Simpevarp/Laxemar in Oskarshamn kommun. More information about the site investigations and the planned schedule for the whole process of planning and construction of the deep repository is found in the report Geovetenskapligt program för platsundersökning vid Simpevarp /SKB, 2001/.

# 1.1 Aim with this description

It is important for SKB to obtain a good understanding of the human population and the human activities within the investigation areas around Forsmark and Simpevarp, as part of the basis for future safety assessments and monitoring programmes. With a good knowledge of the human population and its land use, the potential pathways of exposure to radionuclides can be identified and characterised. Characterisation of the population and its land use are also important in the Environmental Impact Assessment (EIA). Land use may, in some cases, also affect the deep repository, chiefly through mineral extraction and mining.

The aim of this synthesis is therefore to provide a compilation of data concerning the people in the area and their land use. The data can be used to:

- Evaluate the effect of development and operation of the deep repository on the environment and its human population (EIA).
- Establish a "baseline" for future impact and safety assessments as well as monitoring programmes.
- Model material flows in the biosphere and calculate the risks of exposure to radionuclides for future safety assessments.

The variables associated with human land use and their application in assessments and monitoring programmes were first characterised in the year 2000 /Lindborg and Kautsky, 2000/. A more detailed description over the available variables concerning the biota was produced in /Berggren and Kyläkorpi, 2002/. The report included information on land use such as agriculture, forestry, hunting and fishing as well as outdoor life. Some data were obtained, but only for the latest available year and only for a few geographic areas.

This report assembles data for the variables above and for additional variables related to land use, such as horticulture, aquaculture, mineral extraction and water supply. This report also assembles demographic data for the area.

A baseline survey would not be robust if it were based upon data for a single year. The present synthesis has therefore gathered data for a time series of ten years, wherever such a time series has been available. If not, a shorter time series has been acquired.

The outcome of this synthesis is a site description of the population in terms of density, age-structure and vital events (life history statistics), where and how the people live, how they make a living and how they commute in and out of the area. The site description

also includes human activities in terms of land use, such as production of barley, wood extraction, water withdrawal (abstraction) and water use, harvest of wildlife. Observed trends in these characteristics are described.

Furthermore, the degree of self-sufficiency in Misterhult församling (parish) is roughly estimated as well as the in-coming and out-going flow of organic products. The degree of self-sufficiency is a theoretical figure over the potential self-sufficiency, where the production in the parish is ratioed with the consumption. By studying the flow of locally produced food products the site description aims to clarify the amount of products that are consumed by a small local population respectively by a larger regional or national population.

# 1.2 Concept

A quantitative description concerning the human population and the human activities in Forsmark and Simpevarp has been produced. The task has included collection of available data (mainly statistical data from SCB, Statistics Sweden), processing and analysis. The result is a statistical synthesis. The statistical data has not been verified through inspection and interviews.

In order to achieve a site description of high quality, six different levels of resolution have been used (see Figure 1-1). The primary area for this study is called "the Simpevarp area" and it is composed of 14 subareas. Eight of those are drainage areas that have been named Simpevarp 5, 6, 7, 9, 10, 13, 17 and 18, by the department of Limnology at Uppsala



*Figure 1-1. The levels of resolution included in the human site description. The areas are listed in Table 2-1.* 

University /Brunberg, 2004, personal communications/. The other six subareas have been defined and namned by SwedPower as OKG peninsula, Ävrö, Hålö, Äspö, Coastal area south and Coastal area north. Statistics have also been obtained for the archipelago within Misterhult församling (parish). The islands Ävrö and Äspö are also included in the archipelago (see Figure 1-2). It should be noticed that only parts of the communities Figeholm and Fårbo are within subarea 18.

Comparable data for four larger areas have been included to enable us to draw conclusions from the statistical material. These geographic areas are the main drainage area (72/73), Misterhult församling (parish), Oskarshamn kommun (municipality) and Kalmar län (County).



Figure 1-2. The Simpevarp area and its subareas.

# 2 Data quality and processing

# 2.1 General

The data for this report were compiled during the autumn of 2003. Most of the data were obtained from SCB (Statistics Sweden). When one single data item is found within a geographic area, SCB adjusts this single object to a "false" zero for reasons of secrecy. If two objects are found, the count is adjusted to three /SCB, 2003d/. This can result in incoherence between the sum of values for different categories and the total number (as an example the total number of inhabitants and the sum of inhabitants per age class). As SKB has chosen to divide the Simpevarp area into small subareas with few inhabitants, this is a potentially significant source of error. Irrespective of this deliberate reporting bias, such sparsely populated areas may result in data with higher statistical uncertainty.

Normally, zeros are missing in SCB:s statistical material, no matter whether they are "true" or "false" zeros, according to SCB /Sehlin, 2003, Personal communication/. However, in this statistical material some zeros have been delivered (see Table 4-16–Table 4-17). They can be interpreted as "false" zeros according to SCB /Haldorson, 2003, Personal communication/. In this report, zeros have been added to the tables that were missing some data.

Wherever possible the data has been collected for a time series of ten years. However, data for a time period of ten years has not been available for all variables, so shorter time series occur as well. By assembling data for time series, a mean value could be calculated and trends could be analysed.

The variables in this site description are most often shown as an actual value from the latest year for which data were available (normally 2002), a mean value with a standard deviation, a minimum value, a maximum value and a value per unit area (e.g. kg/km<sup>2</sup> or 10<sup>6</sup> m<sup>2</sup>). When calculating numbers per unit area, the following area values have been used:

Geographic area	Area (km² or 10 <sup>6</sup> m²)	Source
Simpevarp 5	26.8	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 6	2.0	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 7	2.1	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 9	2.8	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 10	41.1	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 13	1.1	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 17	6.9	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp 18	9.1	Calculated based on the polygons in ArcGIS (see Figure 1-2).
OKG peninsula	2.2	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Hålö	0.6	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Ävrö	1.8	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Äspö	0.9	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Coastal area North	21.4	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Coastal area South	8.1	Calculated based on the polygons in ArcGIS (see Figure 1-2).

Table 2-1. Area	sizes.
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Geographic area	Area (km² or 10 <sup>6</sup> m²)	Source
Archipelago (land area, including Ävrö and Äspö that are islands)	25.5	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Simpevarp area (including 14 subareas)	127.0	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Main drainage area (72/73)	227.5	Calculated based on the polygons in ArcGIS (see Figure 1-2).
Misterhult församling (parish)	407.9	/SCB, 2003f, internet/.
Oskarshamns kommun (municipality)	1,047	/Länsstyrelsen i Kalmar län et al. 2002/.
Kalmar län (County)	11,171	/Länsstyrelsen i Kalmar län et al. 2002/.
The Country	410,934	/Länsstyrelsen i Kalmar län et al. 2002/.

# 2.2 Human population

### 2.2.1 Demography

#### Input data

Population data has been obtained from SCB for all levels of resolution and for a time series of ten years, 1993–2002 /SCB, 2003g/. The variables characterised were the number of inhabitants at the 31<sup>st</sup> of December divided in five age classes (0–15, 16–24, 25–44, 45–64 and  $\geq$  65 years) as well as population changes (in-migration, out-migration, live births and deaths).

The number of inhabitants is very low in some of the subareas. The demographic statistics for these subareas is therefore not fully reliable. Simpevarp 13 has only a couple of inhabitants in 2002 and in some years there has been none. The subareas OKG peninsula, Hålö, Ävrö and Äspö do not have any inhabitants and that is why there are no statistics for these areas.

Furthermore, when calculating the net population change for each year (in-migration and live births minus out-migration and deaths) one can see that the net change figures are not fully equal to the difference between the numbers of inhabitants in two consecutive years (the number of inhabitants in December in year 2 minus the number of inhabitants in December in year 1). It is obvious that SCB cannot achieve a precise determination of population characteristics.

#### Data processing

The population density, that is the number of inhabitants per unit area, has been calculated. Mean values for the other demographic variables have been calculated as well as a mean value for the population density (minimum and maximum values and standard deviations (SD) have also been calculated). The number of inhabitants per age class has been calculated as a percentage in order to be able to compare the age structures at the different levels of resolution. A net population change (in-migration and live births minus outmigration and deaths) has also been calculated.

## 2.2.2 Health

#### Input data

Health data in terms of ill-health figures were obtained from Statistics Sweden /SCB, 2003g/. The measure of ill-health used is the number of days with sickness benefit due to illness, rehabilitation and occupational injury, as well as days with early retirement pension per person between 16 and 64 years of age.

Ill-health data has been obtained for all levels of resolution and for a time series of five years, 1998–2002. The ill-health data has been acquired for the population as a whole (16–64 years) and by sex. According to Statistics Sweden, the statistics from 1998–2002 cannot be compared with older statistics. For that reason, statistics from earlier years have been excluded. There are no health data for the subareas OKG peninsula, Hålö, Ävrö and Äspö as these subareas are uninhabited.

The measure of ill-health used is the number of days with sickness benefit due to illness, rehabilitation or occupational injury, as well as days with early retirement pension. The figure is related to all persons between 16 and 64 years of age.

When calculating an ill-health figure for a very small population, such as the subareas, individual ill-health has a significant impact on the statistics and the ill-health figure can fluctuate considerably over time.

#### Data processing

A mean value for each time series has been calculated, together with minimum- and maximum values and a standard deviation (SD).

## 2.2.3 Properties and new building

#### Input data

Data on the number of properties, by category, has been obtained from SCB for all levels of resolution and for the years 1996 and 2002 /SCB, 2003g/. The variation in the characteristics of properties is very small between years, which is why only two different years are included in this synthesis. The categories are farms, one- or two-dwelling buildings, multi-dwelling buildings, holiday houses and other.

Statistics concerning the number of newly constructed and completed dwellings have been obtained from SCB for all levels of resolution and for a time series of ten years, 1993–2002 /SCB, 2003g/. However, there are not many figures from the areas smaller than the parish as the construction of new dwellings is very rare in these areas.

Statistics concerning the number of building permits for business premises and dwellings have also been obtained from SCB for all levels of resolution and for a time series of seven years, 1996–2002 /SCB, 2003g/. When it comes to building permits, there are not many figures from the areas smaller than the main drainage area (72/73) as the construction of new dwellings and business premises is very rare in these areas.

The statistics concerning building permits and completed dwellings are not fully coherent. In order for the permit to remain valid, construction must begin within two years of issue of a permit and be completed within five years from the start of construction. Normally 99% of the building permits lead to a completed building, according to /Nilserik Sahlén, 2003, Personal communication/. According to SCB, the discrepancy between the two data sets is probably due to delayed reporting from the municipal administration. Furthermore, the statistics of the number of properties are not fully consistent to the data the number of building permits and completed dwellings.

#### **Data processing**

The property density, that is the number of properties per unit area, has been calculated. Furthermore, the types of properties have been calculated as a percentage of the total amount. Mean values for the variables concerning new buildings have been calculated as well as mean values for the number of building permits per unit area and the number of completed dwellings per unit area. Minimum, maximum and standard deviation (SD) of the mean have also been calculated.

## 2.2.4 Employment

#### Definitions

The term employment comprises paid employment and self-employment, full-time as well as part-time.

The term employed day-time population comprises people that have their workplace in the area in question. These people may, or may not, be registered or residents in the area.

The term employed night-time population, refers to those working persons that are also registered in the area in question. People registered in an area may, or may not, also be residents in the area. As long as they are registered in the area, regardless of where they actually live, they are included in the employed night-time population if they have an employment. The location of the employment, within or outside the area, is not relevant to their categorisation.

The non-employed population between 20 and 64 years of age are those that are studying, unemployed, early retired, in the military service or non-employed of other reason.

#### Input data

Statistics concerning employed night- and day-time population, non-employed population as well as the number of work places have been obtained from SCB. The data is based on the population between 20 and 64 years of age.

When using an area smaller than the municipality there is, according to Statistics Sweden, an underestimate in the employed day-time population, commuting and work places, as the address data for work places are incomplete. Some of the work places cannot be located geographically. The underestimate is considered to be approximately 10%, according to Statistics Sweden. This is most likely the reason why the net commuting figure is not exactly equal to the difference between the employed night- and day-time populations.

#### Employed night- and day-time population

#### Input data

Data on the employed night- and day-time populations have been obtained for all levels of resolution and for a time series of five years, 1997–2001 /SCB, 2003g/. The number of working inhabitants is shown by type of business according to SE-SIC Swedish Standard Industrial Classification, (Table 2-2).

#### Table 2-2. Employment categories.

- 1 Agriculture, forestry, hunting, fishing.
- 2 Mining and manufacturing.
- 3 Electricity-, gas- and water supply. Sewage and refuse disposal.
- 4 Construction.
- 5 Trade and communication.
- 6 Financial intermediation, business activities.
- 7 Education and research.
- 8 Health and social work.
- 9 Personal and cultural activities.
- 10 Public administration etc.
- 11 Unknown activity.

#### **Data processing**

The number of workers per type of business has been calculated as a percentage of the total number of workers in order to be able to compare the Employment between different levels of resolution. Mean values for the variables concerning Employment have been calculated. Minimum- and maximum values and standard deviations (SD) have also been calculated.

#### Work places

#### Definition

A work place is every address, property or group of properties where a company runs a business. A company has at least one work place. The following conditions must be met if an additional work place is to be registered to a company:

- some type of business operation must be conducted at the site,
- the operation must be geographically located at the site,
- the operation must be conducted for a long (permanent) period of time,
- employed personnel must be present, at least to the level of 50% of an employee-year per year.

#### Input data

The number of work places has been obtained for all levels of resolution and for a time series of six years, 1997–2002 /SCB, 2003g/. The work places are shown by type of business according to SE-SIC Swedish Standard Industrial Classification, coarse classification (see above).

#### **Data processing**

The number of work places per type of business has been calculated as a percentage of the total number of work places in order to be able to compare the share of work places between different levels of resolution.

Mean values for the time series have been calculated. Minimum- and maximum values and standard deviations (SD) have also been calculated.

#### Commuting

#### Input data

Statistics concerning in- and outgoing commuting have been obtained for all levels of resolution and for one year, 2001 /SCB, 2003g/. There is no detailed information about the commuters. It is possible though to obtain data from SCB on the municipality and county from which the commuters are coming or to which they are going to.

#### Data processing

The net commuting has been calculated in order to see whether it is inward (positive number) or outward (negative number).

#### Non-employed population

#### Input data

Data on the non-employed population have been obtained from Statistics Sweden for all levels of resolution and for a time series of five years, 1997–2001 /SCB, 2003g/. The number of non-employed inhabitants is shown by category. The categories are studying, unemployed, joining the military service, early retirement and other.

#### Data processing

The number of non-employed inhabitants per category has been calculated as a percentage of the total number of non-employed inhabitants in order to be able to compare the non-Employment between different levels of resolution. Furthermore, the non-employed population has been calculated as a percentage of the total population. Mean values for the time series have been calculated. Minimum- and maximum values and standard deviations (SD) have also been calculated.

# 2.3 Human activities

#### 2.3.1 Land use

#### Input data

The area of land use, by category, for Kalmar län has been obtained from Statistics Sweden /SCB, 1998/. The land use by category in the Simpevarp area has been obtained from the vegetation classification carried out by /Boresjö-Bronge and Wester, 2003/.

#### Processing

The areas have been calculated through geoprocessing in ArcGIS. The areas have been calculated as a percentage of the total area in order to be able to compare the land use in Kalmar län and the Simpevarp area.

#### 2.3.2 Forestry

#### Input data

Data for calculating wood extraction from the Simpevarp model area was retrieved from the local forestry management plan /AssiDomän, 1999/. For a more detailed description of the forests of the area, see /Kyläkorpi, 2004/.

#### Processing

The amount of wood extracted from the model area during the past 10 years was calculated based on data from the forestry management plan /AssiDomän, 1999/.

This was achieved by multiplying the average volume of mature forest of the area with the forest area that is 0–9 years old. Therafter this sum was divided by 10.

## 2.3.3 Agriculture

#### General

Data for this study has been gathered from the following sources

- The Register of Enterprises in Agriculture and Forestry, later referred to as the Farm Register (Lantbruksregistret, LBR) produced by SCB.
- The Agricultural Yearbooks 2003, published by Jordbruksverket (the Swedish Board of Agriculture).
- Statistiska Meddelanden från Jordbruksverket och SCB.
- Dairy production statistics by Swedish Milk (Svenska Mjölk), published in the Agricultural Yearbook 2003.
- Egg production statistics by Swedish Egg (Svenska Ägg), published in the Agricultural Yearbook 2003.
- Statistics from Livsmedelsverket (National Food Administration).
- General data on agricultural production by LivsmedelsSverige, an interest group consisting of members from Livsmedelscentrum Lund, Livsmedelsverket, Livsmedelsföretagen (Li), Lantbrukarnas riksförbund LRF, Konsumentverket, Sveriges lantbruksuniversitet SLU, Svensk Dagligvaruhandel, och Sveriges Hotell- och Restaurangföretagare.
- Facts on Agriculture and livestock, summaries on research projects at SLU, Sveriges Lantbruksuniversitet.

Most of the information on land areas, crops and animals has been derived from the Farm Register and has then been complemented with average animal production statistics from other sources. National statistics and data for counties, municipalities and parishes can be acquired directly from SCB and Jordbruksverket at no cost and other production-related data can be viewed on the homepages of the above-mentioned organisations.

SCB have carried out an annual registration of enterprises (farms, holdings) in agriculture and forestry since 1968, but the data collection method has been modified several times since then. Data on all farms in Sweden were updated in 1999 and before that in 1995 and 1990. Since 2000 data have not been gathered on all farms. Instead, the questionnaires have been sent only to a selected group of those who have applied for agricultural support. Complete registration of all farms will be carried out again in 2003, 2005 and 2007 in relation to claims from the EU. Due to the changes in data gathering methodology over the years all comparisons should be made with great caution.

Enterprises (farms) involved in agriculture, animal husbandry and horticulture are recorded in the Farm Register. As data are gathered from only those farms that had more than 2 hectares of arable land or a significant number of livestock, this means that land used only for forestry or grazing is not classified as an agricultural enterprise (farm) and is therefore excluded from the Farm Register. This means that for example the large forestry companies are excluded from the Farm Register. As the production data is recorded by farm, this means that when only one farm – even with a considerable amount of land and livestock – is found in the search area, no numbers can be due the protection of the farm owners personal integrity. It should also be noted that the values describe the situation as it is recorded in June every year, not annual average values.

Farms included in the Farm Register are divided into the three following categories:

- 1. Farms with at least 2 hectares arable land.
- 2. Farms with less than 2 hectares arable land but a considerable number of animals.
- 3. Horticultural cultivations with a greenhouse area larger than 200 m<sup>2</sup> or a minimum 2,500 m<sup>2</sup> outdoors cultivation area; household cultivation and private gardens are not included.

The following statistical information is recorded for every enterprise

- Farm land classification (ha) in the following categories: The area of arable land, grazing land, forest, other type of farm land.
- Number of animals in the farm: Dairy cows, cows for breeding, heifers, bulls and bullocks older than 1 year, sheep and lambs, boars, sows and other pigs, chickens and laying hens.
- The following crops and the cultivation area (ha) in the farm: Winter and spring wheat, rye, barley, oats, triticale, mixed grain, leguminous plants (peas, processing peas brown beans), potatoes (table potatoes and potatoes for processing), sugar beet, oil seed crops (winter and spring rape, winter and spring turnip rape), horticultural plants (vegetables, flowers, pot plats, fruit, berries), green fodder and plants for silage, grass on arable land for hay and silage, seed lay, temporary grasses and also the arable area that is used as pasture and the area not utilized at all.

#### Arable area and number of farms

#### Input data

Statistics on the number of farms and on arable land from SCB were studied so that the relative significance of agriculture both locally and regionally could be discussed. As there were less than two farms in Simpevarp 5, 6, 7, 9, no specific data for these areas was delivered. With the help of Vegetation Mapping /Boresjö-Bronge and Wester, 2003/, the amount of arable land was estimated by geoprocessing the data in ArcGIS.

#### Data processing

The average number of farms (1990–199) for Kalmar län, Oskarshamns kommun and Misterhult församling and 1995–1999 for the Simpevarp area was divided by the area (km<sup>2</sup>) to establish an estimate for farm density in all areas.

As there were so few farms in areas 1, 2 and 4 no statistics could be shown directly for these areas. The numbers for the areas with known agricultural activities (10, 17 and 18) were subtracted from the numbers for the total area. Data acquired in this way were used in calculations. When additional data for the coastal areas (North and South) were acquired in the second phase, no statistics for the coastal area south were delivered due to low number of farms. It was possible, however, to deduce numbers for the Coastal South by subtracting the coastal north and the other already known areas from the Simpevarp area.

The acreage of land classified as arable in the Farm Register was acquired from SCB. This number was compared with the arable area identified by geoprocessing data from Vegetation Mapping /Boresjö-Bronge and Wester, 2003/ in ArcGIS. Having compared these two results it became evident that the arable land can be interpreted in different ways.

#### **Crop Production Statistics**

#### Input data

SCB delivered data for the Simpevarp area (1995, 1999) and Misterhult församling, Oskarshamns kommun and Kalmar län (1990, 1995, 1999) on how many hectares of the arable area have been used for cultivation of wheat, rye, barley, oats, triticale, mixed grain, leguminous plants, green fodder, plants for silage, potatoes, sugar beets, linseed, oil seed crops (rape and turnip rape), horticultural plants and how many hectares have been used as pasture or not utilized at all.

Data on the expected yield (standard yield estimates for 2002, 2003) and statistics on harvested yield both for yield per hectare and the total yield (1997–2002) were acquired from SCB. The estimates for standard yields for the ongoing season are published in June every year. Preliminary results for the yield per hectare and for the total production are calculated in August every year. Final results for crop yields per hectare and for the total production statistics is available for the following geographical resolutions:

- Sweden.
- 8 production areas (PO8-areas).
- 21 counties.
- 106 yield survey districts (SKO-areas).

The standard yield as is an estimate of the yield that can be expected if the weather and other conditions that influence the crops are normal. Estimates are computed for winter and spring wheat, rye, spring barley, oats, winter and spring rape, winter and spring turnip rape, and for table and processing potatoes. Since 1998, a revised model for estimating the standard yields has been implemented. The mean of the yield data for the last 15 years plus an estimated yearly increase forms the standard yield of a region. The model is valid for all crops and all regions. The standard yield estimate for a specific crop is calculated only if the crop is grown in the area to major extent. Since 1998 no estimates for fodder and silage plants has been produced. /Jordbruksverket och SCB, 2003a,b/.

Statistics on crop yield per hectare (hektarskörd) and total production (total skörd) have been calculated for more than 35 years. Between 1968–1995, data was gathered by using a method based on probability sampling and physical measurements with samples taken from the fields. The system was altered in 1995 and statistics were based on data gathered with both the help of interviews and measurements taken in test areas in 32 out of 106 yield prognoses areas (SKO-areas) all over Sweden. Since 1998 statistics on cereals, peas and oil seed crops are based entirely on interview surveys and since 1999 the statistics for potatoes are gathered by post enquires to a sample of farmers. The selected farms represent a random sample throughout the country. Yields per hectare at the farm level area are calculated by dividing the production by the crop area of the farm. The total production has been calculated from final data on usage of arable land /Jordbruksverket och SCB, 2003a,b,c/.

For this study, data on both harvested crops (yield per hectare and total yield) and the estimates for standard yield have been acquired from Agricultural Yearbook 2003 /Jordbruksverket och SCB, 2003a/. The standard yield estimates for the years 2002 and

2003 were available. Statistics for areas used for cultivation of crops are from the years 1995 and 1999 and the average area was used in calculations. The yield estimates are from 2002. This has to be taken account in the calculations by relating the standard yield in 2002 to the average of harvested yield over a longer period in this study to the data on harvested yield in 1997–2002.

#### Data processing

Two different estimated for crop production has been estimated: the average yearly production in 1990–1999 and the production in 1999. The average cultivated area (1990–1999) and the area in 1999 used for cultivation of each crop in Misterhult församling and the Simpevarp area according to data from SCB have been multiplied by the standard yield estimate (2002) for respective crop. The standard yield estimates for 2002 were used in calculations instead of separate estimates for each year 1990, 1995 and 1999. As the yields vary from year to year, the estimates for standard yield in 2002 can be set into a wider perspective by comparing the harvested yields in Sweden (1997–2002) (see Table 2-4).

The Simpevarp area and Misterhult församling are located within the Standard yield area (SKO area) 0814 (see Figure 2-1). Although a wide selection of cereals was cultivated in the Simpevarp area and Misterhult församling in 1990–1999, only the standard yield estimates for barley and oats have been computed by SCB for the Standard yield area 0814. The remaining necessary estimates for wheat, rye and leguminous plants have been taken from the estimates for Kalmar län (see Table 2-3) and used in calculations.



Figure 2-1. The Simpevarp area and the Standard yield area 0814.

Standard Yield, kg/ha				
	SKO area 0814	SKO area 0814 Kalmar län		
	2002	2003	2002	2003
Winter wheat	0	0	6 096	6 223
Spring wheat	0	0	5 046	5 264
Rye	0	0	3 825	3 885
Barley	3 415	3 350	3 803	3 897
Oats	3 475	3 485	3 681	3 774
Mixed grain	0	0	0	0
Triticale	0	0	0	0
Table potoes	0	0	0	0
Potatoes for processing	0	0	31 639	31 551
Peas	0	0	39 283	38 464
Winter rape	0	0	2 441	2 514
Spring rape	0	0	1 594	1 718
Winter turnip rape	0	0	0	0
Spring turnip rape	0	0	1 250	1 433
Sugar beet	0	0	44 641	44 216

#### Table 2-3. Standard yield for SKO-area 814 and Kalmar län.

Source: SCB, Farm register

The estimates for standard yield have been used in calculations instead of the result for harvested yield per hectare. The values of actual harvested yields per hectare (kg/ha) were also available, but since the standard yield estimates are computed and revised based on the 15 year' average, these estimates were considered more appropriate for this study. /Jordbruksverket och SCB, 2001, 2002a-d, 2003b-g/.

The yield and variation for different crops in the whole country 1997–2002 was studied briefly. As shown in yield for different crops in Sweden has varied from 80%–120% of the average of the time period 1997–2002 (see Table 2-5). As the year 2002 was slightly above the average, some 3% by judging the harvested yields in Sweden 1997–2002 (see Table 2-5) this factor should be taken into consideration when estimating the average yearly yield over a longer period. Since 1998 the standard yield estimate for green fodder and silage are no longer available through SCB. The harvested yield of temporary grasses per hectare in Sweden in 2002 is known, however. This number (see Table 2-4) has been used when calculating the yield for grass, hay and silage plants in the Simpervarp area.

Since the yields vary from year to year depending on weather, it is interesting to take a look at the yield variation. As we can see in Table 2-6, the yields for different crops vary considerable over this time period. The year 2002 was a relatively good year, with the yield for most crops a little over the long time average (about 4%). The preliminary results for the year 2003 have been excluded from the calculations as well as the yield for linseed, which varies significantly due to changes in measuring methods.

### Table 2-4. Yield per hectare (kg) in Sweden 1997–2002.

Sweden, yield (kg) per hectare							
	1997	1998	1999	2000	2001	2002	2003 (prelim.)
Winter wheat	6 210	5 740	6 320	6 100	6 040	6 470	5 630
Spring wheat	5 350	4 820	5 060	5 100	4 650	4 960	4 950
Rye	4 810	4 640	4 790	5 430	5 270	5 330	4 930
Winter barley	4 970	5 360	4 930	5 090	5 270	5 390	4 620
Spring barley	4 390	3 730	3 820	3 970	4 140	4 340	4 240
Oats	4 120	3 650	3 450	3 960	3 550	4 100	4 000
Triticale	4 920	4 600	4 730	4 600	4 410	5 540	4 620
Mixed grain	3 700	2 920	2 820	3 470	3 230	3 580	3 500
Table potoes	35 640	34 720	28 820	26 720	26 160	26 470	
Potatoes for processing	37 420	47 440	37 620	38 700	35 820	35 050	
Sugar beets	44 200	43 400	46 400	46 900	48 500	48 600	46 626
Peas	3 490	1 780	2 720	2 660	2 860	3 130	3 280
Winter rape	2 300	2 990	2 860	3 250	3 100	2 910	2 860
Spring rape	1 840	1 950	2 040	2 010	1 980	2 110	1 920
Winter turnip rape	1 510	1 630	1 880	1 750	1 460	1 760	1 490
Spring turnip rape	1 540	1 460	1 670	1 550	1 550	1 510	1 360
Linseed	1 280	420	950	770	780	1 700	1 850
Temporary grasses						5 240	

Source: SCB, Farm Register

#### Table 2-5. Comparison of yields in Sweden 1997–2002.

Comparison of Yields in Swed	len 1997-2002					
	Average 1997-2002 (kg/ha)	Min (kg/ha)	Max (kg/ha)	Min (% of average)	Max (% of average)	2002 (% of average)
Winter wheat	6 147	5 740	6 470	93	105	105
Spring wheat	4 990	4 650	5 350	93	107	99
Rye	5 045	4 640	5 430	92	108	106
Winter barley	5 168	4 930	5 390	95	104	104
Spring barley	4 065	3 730	4 390	92	108	107
Oats	3 805	3 450	4 120	91	108	108
Triticale	4 800	4 410	5 540	92	115	115
Mixed grain	3 287	2 820	3 700	86	113	109
Table potoes	29 755	26 160	35 640	88	120	89
Potatoes for processing	38 675	35 050	47 440	91	123	91
Sugar beets	46 333	43 400	48 600	94	105	105
Peas	2 773	1 780	3 490	64	126	113
Winter rape	2 902	2 300	3 250	79	112	100
Spring rape	1 988	1 840	2 110	93	106	106
Winter turnip rape	1 665	1 460	1 880	88	113	106
Spring turnip rape	1 547	1 460	1 670	94	108	98
Linseed excluded						

Source: SCB, Farm Register

Normalized Yields in Sweden 1997-2002 (% of average)									
	1997	1998	1999	2000	2001	2002			
Winter wheat	101	93	103	99	98	105			
Spring wheat	107	97	101	102	93	99			
Rye	95	92	95	108	104	106			
Winter barley	96	104	95	98	102	104			
Spring barley	108	92	94	98	102	107			
Oats	108	96	91	104	93	108			
Triticale	103	96	99	96	92	115			
Mixed grain	113	89	86	106	98	109			
Table potoes	120	117	97	90	88	89			
Potatoes for processing	97	123	97	100	93	91			
Sugar beets	95	94	100	101	105	105			
Peas	126	64	98	96	103	113			
Winter rape	79	103	99	112	107	100			
Spring rape	93	98	103	101	100	106			
Winter turnip rape	91	98	113	105	88	106			
Spring turnip rape	100	94	108	100	100	98			
Linseed	130	43	97	78	79	173			
Average (linseed excluded)	101.9	96.8	98.6	101.0	97.9	103.8			

#### Table 2-6. Normalized Yields in Sweden 1997–2002.

Source: SCB, Farm Register

#### Animal Production Statistics

#### Input data

Data on the number of livestock in the Simpevarp area in 1995 and 1999 was delivered by SCB. Data on the total animal production and the number of livestock in Sweden was derived from the Farm Register trough publications /Jordbruksverket och SCB, 2002e, 2003a,e,g, 2004/ and compared with data acquired from summaries of academic research organisations close to consumers and food industry /SLU, 1997; LivsmedelsSverige, 2004a–g, internet; Svensk Fågel, 2004, internet; Swedish Meats, 2004, internet/.

In the national statistics the data was classified in several categories. Data on the Simpevarp area was coarser; only the total amount of sheep, chickens and pigs other than breeding boars and sows were known.

#### Data processing

The necessary estimates (average yearly production per animal) were derived from the national statistics in 1997–2002. The total number of slaughtered cattle, pigs, sheep, lambs and chickens was divided with the total number of animals in each group so that an estimate for the percentage of the yearly slaughtered animals was established. The total quantities of slaughtered cattle, pigs, sheep, lambs and chickens were divided by the total number of slaughtered animals in each group, which gave an estimate for the average slaughter weight for each. In a similar manner the total number of dairy production was divided with the total number of dairy cows in order to produce an estimate for the yearly milk production per cow. The total egg production was divided with the number of fowls older than 20 weeks in order to estimate the yearly egg production per fowl. /Jordbruksverket och SCB, 2003a/. These estimates have then been compared with general information on animal production acquired academic sources /SLU, 1999/ and organisations close to consumers and food industry /LivsmedelsSverige, 2004a–g; Svenska Fågel, 2004, internet;

Swedish Meats, 2004, internet; Clausson 2004, personal communication; Strandberg, 2004, personal communication; Eklund, 2004, personal communication; Alarik M, 2001/.

According the Agricultural Yearbook 2003 /Jordbruksverket och SCB, 2003a (p 225)/ 'the production of beef was 142,300 ton, the production of mutton 3,900 ton and the production of pork 283,800 ton'. When the Tables 15.1, 15.2 and 15.3 are studied more closely /Jordbruksverket och SCB, 2003a (p 232–233)/ we see that they give the number of slaughtered animals and the slaughtered quantities, that is the weight of carcasses, which is not the same as the weight of meat regardless of what was said earlier in p 225. This was confirmed by Annette Palm from Jordbruksverket /Palm 2004, personal communication; Jordbruksverket, 2002/.

As it is necessary to estimate the amount of meat derived from the slaughtered quantities, an estimate for the meat percent has to be established, preferably for each animal group separately. For the time being the only available meat percent estimate is for pigs (57%) and it has been used in all calculations, also with cattle, sheep. The average Swedish pig carcass, if defined according to EUROP system (a carcass with the head and bones), contains approximately 57% meat /SLU, 1997/. This estimate has then been used in calculations for pigs, cattle and sheep. The meat percent for a chicken is somewhat higher, 75%, and that of a hen 65% /Strandberg, 2004, personal communication/.

The animal production in Misterhult församling and in the Simpevarp area has been estimated using the national animal production estimates described above and the numbers on livestock in Simpevarp församling in 1990, 1995 and 1999 and data delivered directly from SCB for this study.

#### Production of milk and beef

There are approximately 420,000 dairy cows while the total number of cattle is some 1.6 million Sweden. Both the total number of cattle and the number of dairy cows decreased significantly since the 1980's; the total number of cattle by 300,000 and the number of dairy cows by 240,000. The decreasing trend has continued, not as dramatically, though, in the 90's and in the beginning of 21<sup>st</sup> century. /Jordbruksverket och SCB, 2003a/. The average size of herd has increased, now being some 40 dairy cows (2003) when it was less than 30 in 1995. The corresponding average sizes for breeding cattle herds were a little over 40 (1995) and almost 60 (2003).

The production cycle of beef and milk is as follows. A heifer is inseminated by the age of 15–18 months and then gives birth to her first calf at the age of two years. Thereafter she has a calf once a year and gives milk during 10 months every year. An average dairy cow is then slaughtered at the age of 5 years after she has given birth to 3 calves. However, some cows are allowed to survive beyond 5 years.

Most of the young animals that are slaughtered at the age of 18 months are bulls. The tradition of slaughtering calves than have only been fed milk is changing and very few calves are slaughtered so young but a considerable number are slaughtered at the age of 6 months. Almost all of the heifers become dairy cows and are slaughtered later at the age of 5 years.

With the help of the total number of dairy cows and the delivered milk in Sweden in 1997–2002 (see Table 2-7) we can estimate that a dairy cow produces approximately 7,495 kg milk per year. When this estimate is compared with the number given by /LivsmedelsSverige, 2004f, internet/, which is approximately 8,000 litres milk by dairy cow a year, it seems that we have a reliable estimate.

Table 2-7. Production of beef in Sweden (1	1997–2002).
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Cattle - Beef production										
	Average	1997	1998	1999	2000	2001	2002			
Number of cattle	1 700 830	1 780 823	1 738 496	1 712 920	1 683 767	1 651 511	1 637 465			
Number of slaughtered cattle	485 208	518 639	486 096	479 681	489 989	463 986	472 855			
Slaughtered cattle as a percentage of total number of cattle	28.5	29.1	28.0	28.0	29.1	28.1	28.9			
Slaughtered quantities of cattle (1000 ton)	142	144.71	138.54	139.75	145.43	139.12	142.30			
Average slaughter weight of cattle (kg)	292.2	279.0	285.0	291.3	296.8	299.8	300.9			

Jordbruksverket och SCB 2003a

When the results in Table 2-7 are studied we see that approximately 28.5% of the total number of cows, adult cattle, heifers, bull, bullocks and calves (as recorded in June every year) are slaughtered every year. Slaughtered cattle consists of several different types: calves, bullocks, bulls, heifers, adult cattle and bulls and their average slaughter weights vary from approximately 110 kg up to almost 320 kg. In order to simplify the calculations the total amount of slaughtered quantity has been devided with the number of slaughtered cattle. The average slaughter weight 290 kg is somewhat more than the average slaughter weight of a cow and slightly less than the average slaughter weight of full grown cattle /LivsmedelsSverige, 2004e, internet/.

In these calculation we make the assumption that the meat percentage of the slaughter weight of cattle is 57, the same estimate as with slaughtered pigs /SLU, 1997/. This estimate corresponds rather well with the estimate of 50% given by Stefan Clausson from Swedish Meats /Clausson, 2004, personal communication/.

#### Table 2-8. Production of milk in Sweden (1997–2002).

Cattle - Milk production							
	Average	1997	1998	1999	2000	2001	2002
Dairy cows	438 134	467 981	449 130	448 520	427 621	418 471	417 082
Dairy cows as a percentage of total number of cattle	25.8	26.3	25.8	26.2	25.4	25.3	25.5
Milk production (ton)	3 277 667	3 276 000	3 278 000	3 299 000	3 297 000	3 290 000	3 226 000
Milk produced per cow a year (kg)	7493.5	7000.3	7298.6	7355.3	7710.1	7862.0	7734.7
Milk produced per cow a day (kg)	21.0	19.7	20.5	20.7	21.7	22.1	21.7

Jordbruksverket och SCB 2003a

#### Production of mutton

There are approximately 430,000 sheep and lambs in Sweden (2002). Mutton is still produced on a relatively small scale. The domestic production equals only 50% of the consumption and has not increased in spite of all efforts. Since most of the lambs are born at the beginning of the year and slaughtered at the age of 5–6 months the supply of fresh mutton can satisfy the demand only during the autumn season. Most of the lambs are slaughtered at the age of 5–6 months when they weigh approximately 40 kg which in its turn produces a carcass of 18–23 kg /LivsmedelsSverige, 2004b, internet/.

The following estimates were used in calculations (see Table 2-9):

The number of slaughtered sheep is estimated to be approximately 14.3% of the total number of sheep and the number of slaughtered lambs is 69.4% of the total number of lambs. The average slaughter weight of a sheep is around 25.9 kg and the average slaughter weight of a lamb 18.1 kg, slightly lighter than what the numbers from /LivsmedelsSverige, 2004b, internet/ suggest. Even though a sheep is physically rather different from a pig, the same estimate for meat percentage (57%) has been used when the amount of mutton has been estimated.

#### Table 2-9. Production of Mutton in Sweden (1997–2002).

Sheep and Lambs - Mutton production							
	Average	1997	1998	1999	2000	2001	2002
Sheep	196 487	194 948	186 707	193 644	198 268	207 623	197 734
Lambs	238 653	247 154	234 482	243 605	233 666	243 971	229 037
Total number of sheep and lambs	435 140	442 102	421 189	437 249	431 934	451 594	426 771
Sheep as a percentage of the total number	45.2	44.1	44.3	44.3	45.9	46.0	46.3
Lambs as a percentage of the total number	54.8	55.9	55.7	55.7	54.1	54.0	53.7
Number of slaughtered sheep	27 971	31 226	27 911	27 850	28 301	27 205	25 332
Number of slaughtered lambs	165 406	158 892	155 401	162 729	173 849	170 221	171 345
Slaughtered sheep as a percentage of the total number	14.3	16.0	14.9	14.4	14.3	13.1	12.8
Slaughtered lambs as a percentage of the total number	69.4	64.3	66.3	66.8	74.4	69.8	74.8
Slaughtered quantities of sheep (1000 ton)	0.72	0.78	0.71	0.71	0.73	0.72	0.69
Slaughtered quantities of lambs (1000 ton)	2.99	2.73	2.78	2.95	3.18	3.13	3.17
Total quantity of slaughtered sheep and lambs (1000 ton)	3.71	3.51	3.49	3.66	3.91	3.85	3.86
Average weight of a slaughtered sheep (kg)	25.9	25.0	25.4	25.5	25.8	26.5	27.2
Average weight of a slaughtered lamb (kg)	18.1	17.2	17.9	18.1	18.3	18.4	18.5

Jordbruksverket och SCB 2003a

#### Production of pork

There are almost 1,900,000 pigs in Sweden in 2002 of which some 10% sows and 2% boars. However, every year, over three million pigs are slaughtered in Sweden. At first this number seems to be totally incorrect but we can study the numbers more closely. First we know that the total number of animals represents the situation as is recorded in the beginning of June every year and the number of slaughtered animals represents the total number of animals slaughtered during the whole course of the year.

A closer look at a pig's life cycle makes this odd ratio between the total number of pigs and the number of slaughtered pigs more reasonable. A sow's pregnancy lasts normally 16 weeks and then she gives birth to 6–10 piglets. One single sow can therefore produce over 20 piglets every year. Most of the pigs are slaughtered at the age of 6–7 months /LivsmedelsSverige, 2004d, internet/

The following estimates have been used in calculations (see Table 2-10):

The number of slaughtered pigs is estimated to be 170% of the total number of pigs as it is recorded in June every year. The meat percentage of a carcass (of the slaughter weight according to the EUROP system when the head is included) is estimated to be 57% /SLU, 1997/.

#### Table 2-10. Production of Pork in Sweden (1997–2002).

Pigs - Pork production							
	Average	1997	1998	1999	2000	2001	2002
Total number of boars, sows and other pigs	2 073 927	2 351 201	2 286 030	2 115 213	1 917 917	1 891 456	1 881 743
Number of slaughtered pigs	3 552 668	3 914 568	3 872 887	3 797 533	3 251 100	3 197 802	3 282 118
Slaughtered pigs as a percantage of the total number	171.4	166.5	169.4	179.5	169.5	169.1	174.4
Total quantiety of slaughtered pigs (1000 ton)	302.98	325.35	330.41	325.43	276.98	275.87	283.81
Average weight of a slaughtered pig (kg)	85.3	83.1	85.3	85.7	85.2	86.3	86.5
Jordbruksverket och SCB 2003a							

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#### Production of eggs and chicken meat

The total number of chickens and hens in Sweden is approximately 6.3 million out of which almost 5 million lay eggs (June 2002). The number has been rather stable during the 90's but has started to decrease during the 21<sup>st</sup> century. Almost 77 million chickens are slaughtered every year.

Before the statistics on chicken and eggs in /Jordbruksverket och SCB, 2003a; Svenska Ägg, 2004, internet/ is studied more closely a few words of warning are necessary.

Firstly statistics available on laying hens is misleading. Data on hens, fowls and chickens are only presented in two catecories and their names are rather obscure: 'höns, 20 veckor eller äldre', translated in the column title as 'fowls' and 'kycklingar av värpras', translated as 'laying hens'. After discussions with Jordbruksverket /Tranberg, 2004, personal commication; Eklund, 2004, personal communication/ we can conclude that fowls produce eggs and the so-called 'laying hens' are chickens younger than 20 weeks that will become laying hens. When the total egg production is divided by the total number of fowls we get an estimate for the average yearly production that is slightly less than 20 kg or almost one egg a day. This number correlates with data acquired from other sources /LivsmedelSverige, 2004g internet; Svensk Fågel, 2004, internet/.

No data on 'slaughter chickens', that is the number of chickens alive in the beginning of June that will be slaughtered during the coming 12 month period can be found in publications showing the number of live animals in Sweden /Jordbruksverket och SCB, 2004, 2003a/. Per Eklund /Eklund 2004, personal communication/ was able to extract data directly from the Farm Register for years 1995, 1999, 2000 and 2002 but since this data were not of even quality (the numbers for 2000 were from August and clearly differing from others) it was excluded from this study. The number of the yearly slaughtered chickens has been acquired from the animal production statistics /Jordbruksverket och SCB, 2003g/ and then the percentage of slaughtered chickens has been counted as a percentage of the total number of live chickens and fowls in June every year /Jordbruksverket och SCB, 2004, Jordbruksverket och SCB, 2003a (Tables 6.1, 6.15 and 6.16)/ even though this total number does not contain the slaughter chickens.

The production cycle of eggs and chicken meat can briefly summarized as follows. Those chickens that are to become laying hens are sorted out at the age of 14–15 weeks while the rest are slaughtered. The normal hen lays her first egg at the age of 18–19 weeks. The first eggs are often quite small weighing some 45–50 g but they soon increase in size. By the age of 25–30 weeks egg production reaches a level of almost one egg a day. The active laying period ends around the age of 75–78 weeks, after which the hen is slaughtered. Since the egg production continues throughout the year without special seasons there is a steady flow of new hens brought up all the time /LivsmedelsSverige 2004a,g, internet; Svensk Fågel 2004, internet/.

The following estimates (see Table 2-11 and Table 2-12) have been used in calculations:

A fowl lays in average 18.7 kg eggs per year. The number of slaughtered chickens is estimated to be 925% of the total number of fowls (laying hens) and chickens (young chickens that will become laying hens). The meat percentage (meat/slaughter weight) is estimated to be 75%.

The following estimates derived from the national statistics (see Table 2-13) have been used when estimating the animal production in Misterhult församling and in the Simpevarp area.

### Table 2-11. Production of Chicken Meat in Sweden (1997–2002) .

Average	1990	1995	1997	1998	1999	2000	2001	2002
5 664 296	6 391 943	6 100 270	5 724 509	5 361 748	5 647 509	5 669 655	5 686 894	4 731 837
75.0	74.6	77.1	75.3	71.3	71.9	77.4	76.8	75.5
1 892 229	2 175 676	1 811 509	1 881 407	2 154 682	2 202 333	1 654 063	1 721 342	1 536 819
25.0	25.4	22.9	24.7	28.7	28.1	22.6	23.2	24.5
7 556 525	8 567 619	7 911 779	7 605 916	7 516 430	7 849 842	7 323 718	7 408 236	6 268 656
			65 987 000	62 345 000	66 608 000	66 608 000	68 617 000	73 355 000
925.2			867.57	829.45	848.53	909.48	926.23	1 170.19
90.76				79.8	86.6	89.9	96.1	101.4
1.34				1.28	1.30	1.35	1.40	1.38
	Average 5 664 296 75.0 1 892 229 25.0 7 556 525 925.2 90.76 1.34	Average         1990           5 664 296         6 391 943           75.0         74.6           1 892 229         2 175 676           25.0         25.4           7 556 525         8 567 619           925.2         90.76           1.34	Average         1990         1995           5 664 296         6 391 943         6 100 270           75.0         74.6         77.1           1 892 229         2 175 676         1 811 509           25.0         25.4         22.9           7 556 525         8 567 619         7 911 779           925.2         90.76         1.34	Average         1990         1995         1997           5 664 296         6 391 943         6 100 270         5 724 509           75.0         74.6         77.1         75.3           1 892 229         2 175 676         1 811 509         1 881 407           25.0         25.4         22.9         24.7           7 556 525         8 567 619         7 911 779         7 605 916           925.2         -         -         867.57           90.76         -         -         -           1.34         -         -         -	Average         1990         1995         1997         1998           5 664 296         6 391 943         6 100 270         5 724 509         5 361 748           7 5.0         7 4.6         77.1         75.3         71.3           1 892 229         2 175 676         1 811 509         1 881 407         2 154 682           2 5.0         2 5.4         2 2.9         2 4.7         2 8.7           7 556 525         8 567 619         7 911 779         7 605 916         7 516 430           6 5 987 000         6 5 987 000         6 2 345 000         925.2         8 667.57         79.8           90.76         -         -         79.8         1.34         1.28	Average         1990         1995         1997         1998         1999           5 664 296         6 391 943         6 100 270         5 724 509         5 361 748         5 647 509           75.0         74.6         77.1         75.3         71.3         71.9           1 892 229         2 175 676         1 811 509         1 881 407         2 154 662         2 202 333           25.0         25.4         22.9         24.7         28.7         28.1           7 556 525         8 567 619         7 911 779         7 605 916         7 516 430         7 849 842           65 987 000         62 345 000         66 608 000         62 345 000         66 668 000           925.2          867.57         829.45         848.53           90.76          79.8         86.6           1.34          1.28         1.30	Average         1990         1995         1997         1998         1999         2000           5 664 296         6 391 943         6 100 270         5 724 509         5 361 748         5 647 509         5 669 655           75.0         74.6         77.1         75.3         71.3         71.9         77.4           1 892 229         2 175 676         1 811 509         1 881 407         2 154 682         2 202 333         1 654 063           25.0         25.4         22.9         24.7         28.7         28.1         22.6           7 556 525         8 567 619         7 911 779         7 605 916         7 516 430         7 849 842         7 323 718           65 987 000         62 345 000         66 608 000         66 608 000         9025.2         867.57         829.45         848.53         909.48           90.76         79.8         86.6         89.9         1.34         1.28         1.30         1.35	Average         1990         1995         1997         1998         1999         2000         2001           5 664 296         6 391 943         6 100 270         5 724 509         5 361 748         5 647 509         5 669 655         5 668 694           75.0         74.6         77.1         77.3         71.3         71.9         77.4         76.8           1 892 229         2 175 676         1 811 509         1 881 407         2 154 682         2 202 333         1 654 063         1 721 342           2 5.0         25.4         22.9         24.7         28.7         28.1         22.6         23.2           7 556 525         8 567 619         7 911 779         7 605 916         7 516 430         7 849 842         7 323 718         7 408 236           65 987 000         62 345 000         66 608 000         66 608 000         66 608 000         68 617 000           925.2         867.57         829.45         848.53         909.48         926.23           90.76         79.8         86.6         89.9         96.1         1.34         1.28         1.30         1.35         1.40

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#### Table 2-12. Egg Production in Sweden (1997–2002).

Egg production							
	Average	1997	1998	1999	2000	2001	2002
Eggs delivered to wholesalers (1000 ton)	68.4	69.6	68.7	67.5	65.1	71.5	68.2
Total production 1 000 ton (35% of production not delivered to wholesale trade)	102.3	107.0	106.0	107.0	102.0	98.0	94.0
Fowls	5 470 359	5 724 509	5 361 748	5 647 509	5 669 655	5 686 894	4 731 837
Eggs produced by a hen per year (kg)	18.7	18.7	19.8	18.9	18.0	17.2	19.9
Number of eggs produced by a hen per year (á 62,5 g)	300.0	299.1	316.3	303.1	287.8	275.7	317.8
Number of eggs produced by a hen per day (á 62,5 g)	0.8	0.8	0.9	0.8	0.8	0.8	0.9

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#### Table 2-13. Animal Production in Sweden (1997–2002).

Animal Production Statistics in Sweden 1997-2002				
Cattle				
Milk (kg) produced by a cow per year	7 493.5			
Milk (kg) produced by a cow per day	21.0			
Dairy cows as a percentage of total number of cattle	25.8			
Slaughtered cattle as a percentage of total number of cattle	28.5			
Average slaughter weight of cattle (kg)	292.2			
Sheep and lambs				
Sheep as a percentage of the total number	45.2			
Lambs as a percentage of the total number	54.8			
Slaughtered sheep as a percentage of the total number	14.3			
Slaughtered lambs as a percentage of the total number	69.4			
Average slaughter weight of a sheep (kg)	25.9			
Average slaughter weight of a lamb (kg)	18.1			
Pigs				
Slaughtered pigs as a percantage of the total number	171.4			
Average slaughter weight of a pig (kg)	85.3			
Fowls and chickens				
Fowls as a percentage of the total number	75.0			
Chickens as a percentage of the total number	25.0			
Slaughtered chickens as a percentage of the number of fowl and chickens	925.2			
Average slaughter weight of a chicken (kg)	1.3			
Weight (kg) of eggs produced by hen per year	18.7			
Number of eggs produced by hen per year (à 62,5 g)	300.0			
Number of eggs produced by hen a day (à 62,5 g)	0.8			

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# 2.3.4 Horticulture

#### Input data

Statistics concerning the number of horticultural holdings in Kalmar län has been obtained from /SCB, 2003a/. The report includes the number of holdings in each county, but no data at any smaller areas. Accordingly, it is not possible to demonstrate the actual number of holdings at other levels of resolution through the statistics from SCB.

The publication Fakta om Kalmar län /Länsstyrelsen i Kalmar län et al. 2002/ gives us some information on where in the county the horticultural cultivation is most extensive. Together with some help from /Gula Sidorna, 2003, internet/ we can guess the figure for Misterhult församling. Gula Sidorna, however, do not cover all the enterprises that exist, especially not when searching for a certain type of business.

## 2.3.5 Aquaculture

#### Input data

The number of enterprises in Kalmar län has been obtained from /SCB, 2003b/. The report includes the number of holdings in each county, but not in any smaller areas. The number of enterprises and their location in the Oskarshamns kommun has been obtained from /Oskarshamns kommun, 2003a/. The number of enterprises can therefore be demonstrated for all levels of resolution. There are no available data over the amount of production in Oskarshamns kommun.

### 2.3.6 Mineral extraction

#### Input data

Data on mineral extraction leases within the county of Kalmar was gathered from Länsstyrelsen i Kalmar län /Axheden, 2003, personal communication/. The information consisted of an Excel-file with data on the leases within the county.

#### Data processing

The Excel-file was converted into a dBase-file and imported to ArcGIS. Thereafter, the various administrative themes were used as overlays to sort out the leases within the different areas.

## 2.3.7 Water supply

#### Input data

Statistics on water use and water withdrawal were purchased from Statistics Sweden for two levels of resolution, the county and the municipality, and for three different years, 1990, 1995 and 2000 /SCB, 2003g/.

The water withdrawal is divided into groundwater and surface water and is also distinguished into private supply and public waterworks. The water use is divided in the categories household, agriculture, industry and others. The category "Industry" does not include the water use within nuclear power plants. The category "Others" includes water use in business sectors such as government services, trading, hotels and restaurants, construction and transportation. Water use within holiday houses is included in the "Household" figure. These distinctions are based on the statistics in /SCB, 2003c/.

The survey performed in 2000 was not comprehensive at the municipal level. There are no data concerning agricultural water use and no data on groundwater and surface water withdrawals. Likewise there are no data concerning water withdrawal from private water supplies.

The fresh water use at Oskarshamn Power Group (OKG) has been obtained from an Environmental Impact Assessment for Oskarshamn power plant /OKG, 2004/ through /Eriksson, 2003, Personal communication/. The use of seawater for cooling is not included in this report.

#### Data processing

As there were no available data on water use within the parish or at smaller areas these figures have to be calculated based on specific assumptions. The figures on water use and water withdrawal in 2000 at the parish and smaller areas are therefore estimated and not precise.

The following assumptions, used by Statistics Sweden /SCB, 2003c/, are applied:

- The average water use per person within households is 189 litres per day.
- The holiday houses are on average used by three persons for 60 days per year.

The following assumptions have been used in this synthesis:

- All the holiday houses have summer water and private sewage. According to /SCB, 2003c/ the water use in holiday houses with summer water and private sewage is 100 litres per person and day.
- The average water use per farm in the municipality in 1995 is applied for smaller areas, that is 875 m<sup>3</sup> per farm (203,000 m<sup>3</sup>/232 farms /SCB, 2001/).
- The number of work places in the parish (and smaller areas) has been calculated as a percentage of the work places in the municipality in 2000. The percentage is assumed to be tolerably equal to the percentage water use within the industry other business sectors.
- The distribution between water withdrawals by public waterworks and private water supply in the municipality in 1995, is assumed to be applicable at the smaller areas.
- The distribution between water withdrawals from groundwater and surface water in the municipality in 1995, is assumed to be applicable at the smaller areas.

According to the figures from Statistics Sweden the average water use within households in Oskarshamn in 2000 is 162 litres per day (water use in holiday houses included) and not 189 as stated in /SCB, 2003c/. The calculated value for Misterhult församling is therefore probably an overestimate.

The fresh water use by Oskarshamn Power Group (OKG) has been added to the calculated figures for the parish and smaller areas. OKG uses the lake Götemar, i.e. surface water, as a private water supply.

## 2.3.8 Coastal fishing

#### Catch by commercial fishermen

#### Input data

Statistics concerning the commercial sea fisheries were obtained from Fiskeriverket, Avdelningen för Fiskerikontroll (the National Board of Fisheries, Department of Fisheries Control). The figures included three levels of resolution (the county, the municipality and the postcode areas within the municipality) and a time series of eight years, 1995–2002 /Fiskeriverket, 2003/. The data from 1995 were excluded as they differed remarkably from the other data and were therefore considered improbable. The catch data varies markedly between the other years, which can be seen in Table 4-62, when comparing the latest figure (2002) and the mean value.

Fiskeriverket registers all commercial fishing vessels with a length of more than 5 metres. Professional fishermen with vessels above 12 metres are required to record information about their catch in a logbook according to EU regulations. Beside information on the catch (kg/species) they must report the type of fishing gear and the fishing position (longitude, latitude). The logbook is associated with the vessel, but it can also be related to the fishermen that own the vessel. Fishermen with short vessels are required to keep a logbook when trawling. If they are not trawling they only need to keep a fishing journal every month. The journal shall contain obtained catch (kg/species), but it needs not contain the exact position for the catch.

Fiskeriverket is responsible for controlling catches and landing of fish as well as for the official fishery statistics. The statistics are based on information that comes from fishing logbooks, fishing journals, landing declarations and sales notes.

has produced catch data per postcode area in Oskarshamns kommun, which is possible as the catch, as registered in the logbook- or journal, gives the address of the fisherman who compiles the record. It is possible to see what parish/es a postcode zone includes through /Posten, 2003, internet/. The data obtained from Fiskeriverket includes a postcode zone that is partly within Misterhults församling. The single fisherman living in that particular postcode zone is assumed to be living in Misterhult församling. Thus, the catch statistics at the parish level are not fully reliable. The catch data cannot be demonstrated at smaller areas. Other sources of error are, of course, missing accounts despite the obligation, and inaccuracies in the logbooks and journals.

Fiskeriverket keeps statistics of the catch within an offshore grid (EU-grid). The grid size is approximately  $30 \times 30$  nautical miles ( $56 \times 56$  km). The data only comprise the catch from the logbook-keeping vessels, as these vessels report the tackle position. Second, the catch is registered in the square where the tackle is placed, but that does not necessarily mean that the fish has been caught in that particular square. Fishing boats can trawl a long distance and therefore catch the main part of the fish in a neighbouring square /Lundgren, 2003, Personal communication/. The catch data at each EU-square varies therefore considerably between years, which can be seen in Table 4-62, when comparing the latest figure (2002) and the mean value.

Grid data has been obtained for nine squares off the coast of Kalmar län. These are 41G6–45G6 and 41G7–45G7 (see Figure 2-2).



Figure 2-2. A map showing the catch grids outside the coast of Kalmar.

#### Data processing

The offshore-grid was obtained in paper form from Fiskeriverket. The grid was in the world coordinate system WGS 1984 (latitude and longitude). The coordinates were digitalized and converted to coordinate system RT 1990 2.5 gon West in ArcGIS.

The catch per unit area for each EU-square was calculated. The water area within each square was obtained through geoprocessing in ArcGIS. Mean values for the total catch and the catch per unit area were calculated together with minimum and maximum values and standard deviations (SD) of the mean. The dominating species were calculated as a percentage of the total catch.

#### Number of fishermen

#### Input data

The National Board of Fisheries does not have data over the total number of fishermen as claimed by /Berggren and Kyläkorpi, 2002/. The data obtained from Fiskeriverket for 1995–2002, does only include the number of logbook- or journal keeping fishermen (one fisherman per vessel) /Fiskeriverket, 2003/. The total number of fishermen is larger.

The data from 1995 were excluded as they differed remarkably from the other data and were therefore considered improbable. The number of logbook- or journal keeping fishermen varies significantly between different years, which seem unlikely. The data is therefore not completely reliable.

The smallest area obtained is the postcode zones within Oskarshamns kommun. The parish affiliation within some postcode zones is uncertain. The number of fishermen in Misterhult församling is therefore more unreliable than the figures for the municipality and County (see above).

#### Data processing

In 2002 the number of commercial fishermen in Kalmar län were 177 according to /Länsstyrelsen i Kalmar län et al. 2002/. According to the data obtained from the National board of Fisheries, the number of logbook- or journal-keeping fishermen were 54, which is 30% of 177. In order to estimate a number of fishermen, the number obtained from Fiskeriverket has been multiplied by 3.28.

A mean value of the number of fishermen has been calculated as well as a minimum- and maximum values and standard deviation (SD) of the mean.

#### Landing declarations and sales notes

#### Input data

The number of commercial/authorized receivers in the county and the amount of landed fish has been obtained from Fiskeriverket for the year 2002 /Fiskeriverket, 2003/. The figures include information about the ultimate use of the catch – human consumption or animal food.

The landed amount declared by the receivers in the county is not equal to the amount of fish caught by fishermen living in the county. The receivers can obtain fish from vessels coming from other counties and the local fishermen can sell their fish further either on their own or to receivers in other counties.

The authorized receivers are obliged to leave landing declarations in accordance with the statute book from Fiskeriverket, FIFS 1995:23 /Berggren and Kyläkorpi, 2002/. Despite this obligation, missing accounts occur and some trade occurs to other receivers. According to FIFS, a catch below 50 kg does not need to go through authorized receivers /SCB and Fiskeriverket, 2004/.

#### 2.3.9 Outdoor life

#### In general

#### Input data

The average time spent on sports and outdoor activities has been obtained from /SCB, 2003e/. The study included a population between 20 and 84 years of age.

#### Data processing

The total amount of outdoor hours per year in Misterhult församling has been calculated. Children and youths are normally outdoors more than adults, especially children. However, the average time outdoors obtained from the national study has been used in the calculations. The number of outdoor minutes per day and person was multiplied with the number of inhabitants in 2002 and 365 days.

#### Hunting of wildlife

#### Moose- Input data

Statistics concerning hunting permits and harvest of moose were purchased from Länsstyrelsen i Kalmar län (the County Administrative Board of Kalmar) for three levels of resolution (the parish, municipality and county) and for a time series of seven years, 1997–2003 /Länsstyrelsen i Kalmar län, 2003b/. The hunting season starts in October (depending on the part of the country) and ends on the 31<sup>st</sup> of January. The latest figure is from the season that ended in 2003.

Four different hunting zones exist; A, B, E and Ä-zones. Länsstyrelsen i Kalmar län gives hunting permits for adult moose in A-zones. Harvest of one moose is permitted in a B-zone, whereas harvest of one calf is permitted in an E-zone. Hunting without a license is accepted within an Ä-zone (moose protection area) as long as there is a management plan.

Figures concerning carcass weight have been obtained from /Svensk Viltförvaltning AB, 2003/. This report gives a local account of the carcass weights and is therefore more accurate than the figures that are given by Svenska Jägareförbundet (the Swedish Association for Hunting and Wildlife Management). The carcass weights are lower in Ankarsrum, north of the Simpevarp area, due to a generally low average age. The figure of the carcass weight for a moose calf has been obtained from Jägareförbundet, since this figure is missing in the synthesis from Ankarsrum.

The carcass weight, that is the body without the head, intestines and the lower parts of the legs, is normally 55% of the total live weight, according to Svensk Viltförvaltning AB /Cederlund, 2003, Personal communication/. The utilized carcass weight (bones excluded) for moose has not been found in any publication. According to Svensk Viltförvaltning AB approximately 80% of the carcass weight can be utilized.

#### **Moose – Data processing**

The hunting zones and the moose protection areas can be extended over an administrative border such as the parish boundary. The hunting statistics for each hunting zone are registered with the parish, in which the main part of the hunting zone is located. The total hunting area can, therefore, be larger than the land area of the parish. When calculating the number of harvested moose per unit area (km<sup>2</sup>), the total hunting area has been used. The calculated value is applied to the associated parish.

The average number of harvested moose per km<sup>2</sup> in the parish is applied to the main drainage area, the Simpevarp area and its subareas. This is presumed to be realistic as the landscapes are comparable. The number of harvested moose has been calculated based on the average value and the different area figures.

The carcass weight has been calculated based on the figures given by Svensk Viltförvaltning AB and Svenska Jägareförbundet. According to Svensk Viltförvaltning AB the carcass weight in Ankarsrum is 151 kg for a bull and 146 kg for a cow (mean value for 1997–2001). These figures may be compared to the carcass figures from /Svenska Jägareförbundet, 2003a/, which are 180–230 kg for a bull, 170–200 kg for a cow and 70 kg for a calf. When calculating we have chosen to use a carcass weight of 151 kg for a bull, 146 kg for a cow and 70 kg for a calf.

When calculating the live weights, the carcass weights have been divided by 0.55 and when calculating the utilized carcass weight, the carcass weights have been multiplied by 0.80.

The live-, carcass-, and utilized carcass weights at the smaller areas (the main drainage area (72/73), Simpevarp area and its subareas) has been calculated based on the mean number of harvested moose per km<sup>2</sup> and the mean distribution between harvested bulls, cows and calves in the parish. Hunting on the islands in the archipelago has been assumed to be almost non-occurring as the islands, except Ävrö, are excluded in the polygon over Oskarshamns Norra jaktvårdskrets (Oskarshamns North hunting association). The hunting in the Archipelago is therefore presumed to be equal to the hunting in Ävrö.

#### Other wildlife - Input data

The estimated number of harvested wildlife other than moose has been obtained from Jägareförbundet for one level of resolution and for a time series of five years, 1997–2001 /Svenska Jägareförbundet, 2003e/. The level of resolution is Oskarshamns Norra jaktvårdskrets. The association covers a district of 669 km<sup>2</sup>, which is 64% of the land area in Oskarshamns kommun.

Svenska Jägareförbundet collects voluntary reports from the local hunting associations. About 35 species, mainly birds, are included in the reports. To achieve a high reliability the reports should cover at least 50 percent of the hunting area. Today, those requirements are not normally fulfilled. According to Svensk Viltförvaltning AB, the actual harvested numbers are higher than what these figures show.

We have chosen to include hunting of roe deer and hare, both common (European) hare and alpine (mountain) hare, in this synthesis. These three species are hunted for consumption. The other species are hunted at a very limited scale.

Live weights for roe deer have been obtained from Svensk Vilförvaltning AB /Cederlund and Liberg, 1995/. An adult buck weights 22–28 kg, an adult goat weights 21–27 kg and a fawn weights 12–16 kg. The carcass weight of roe deer is approximately 55% of the live weight and the utilized carcass weight is approximately 80% of the carcass weight according to Svensk Vilförvaltning AB

The distribution between harvested adult roe deer and fawns has been obtained from /Kindberg, 2002/. Of the harvested roe deer, 31% are on average fawns, 42% are on average bucks and 27% are goats.

An adult common hare weighs 4–6 kg and an alpine hare 3–5 kg according to the information at /Svenska Jägareförbundet, 2003b–c/. No figures concerning the carcass weight have been found. We were advised by Svensk Viltförvaltning AB to estimate the carcass weight at 55% of the live weight and the utilized carcass weight as 80% of the carcass weight.

#### **Other wildlife – Data processing**

To estimate the number of harvested roe deer and hares at the parish and smaller areas, the harvested number per unit area in the hunting zone was applied.

The live weight is assumed to be 25 kg for a buck, 24 kg for a goat and 14 kg for a fawn. Furthermore, the live weights are assumed to be 5 kg for a common hare and 4 kg for an alpine hare. The total live weight of roe deer has been calculated based on the average distribution between bucks, goats and fawns given by Jägareförbundet /Kindberg, 2002/.

When calculating the carcass weights, the live weights have been multiplied by 0.55. When calculating the utilized carcass weights, the carcass weights have been multiplied by 0.80.
#### **Recreational fishing**

#### Catch by sport fishermen – Input data

The amount of recreational fishing within Kalmar län is not very well analysed and therefore there is no available data.

Fiskeriverket (the National Board of Fisheries) has carried out a national survey concerning recreational fishing /Fiskeriverket, 2000/. 55% of the population aged between 16 and 74 years expressed some interest in fishing according to this study. A majority (75%) of the interested population considered themselves as sport fishermen and they caught on average 18 kg fish that year. A minority (9%) were subsistence fishermen that caught on average 67 kg. The rest were so called generalists that use both nets and rods. There are no data on the extent of recreational fishing within Uppsala län.

#### Catch by sport fishermen – Data processing

A theoretical value of the yearly catch can be calculated based on the information in /Fiskeriverket, 2000/, presuming that 55% of the population between 16 and 64 years are sport fishermen that catch 18 kg per year. This seems like a very high figure, but as it is the only available data today it is used. When calculating a population between 16 and 64 years old has been used, although the national survey included a population between 16 and 74 years old. Our demography data has only five age classes, where " $\geq$  65 years" is the highest, so it is not detailed enough to get a value for a population between 16 and 74 years.

#### Sport fishing clubs and attractive fishing waters – Input data

In order to obtain a sufficient description of the recreational fishing, the number of sport fishing clubs and attractive fishing waters has been included in this synthesis. Figures concerning these variables was obtained from /Sveriges Sportfiske- och fiskevårdsförbund, 2003, internet/ and from /Oskarshamn Turistbyrå, 2003, internet/.

#### Other outdoor activities

The number of jogging tracks, open-air baths, marinas and guest harbours and their location has been obtained through GIS-data from the County Administrative Board of Kalmar.

When it comes to the number of golf courses, hiking trails, ornithological areas, canoe routes, camping grounds and boat renters the figures have been obtained from different internet sites during the autumn of 2003. These figures have not been confirmed by other sources.

The picking of wild berries and mushrooms has been calculated based on the information in /Berggren and Kyläkorpi, 2002/.

## 2.3.10 Degree of self-sufficiency

The degree of self-sufficiency has been calculated for one level of resolution, the parish, using data on production of a number of food resources in the parish divided by the consumption of the population living in the same area. This means that the output is the theoretical degree of self-sufficiency, not the actual utilisation of local food resources within the area. The production figure is a mean value for the years 1990, 1995 and 1999. The consumption figures have been calculated by multiplying the population figure within the parish in 2002 by the mean consumption rates in Sweden in 2001 as given by /Jordbruksverket, 2003/.

## 3 Input data –an overview

A summary of all the variables, data sources and most of the processing steps are presented in Table 3-1 below. For more detailed information and discussion of the various issues relating data and processing, please refer to the previous section.

Variable	Time series	Data source	Most detailed resolution obtained	Processing
Demography				
Total population and population per age class	1993– 2002	Statistics Sweden	subarea	A mean value for 1993–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
				The population density has been calculated.
				The number of inhabitants per age class has been calculated as a percentage
Population changes (Births, deaths, in- migration and	1993– 2002	Statistics Sweden	subarea	A net population change (in-migration and live births minus out-migration and deaths) has been calculated in order to determine if it is negative or positive.
out-migration)				A mean value for 1993–2002 was calculated for the variables (together with minimum and maximum value and standard deviation (SD) of the mean).
Health				
III-health	1998– 2002	Statistics Sweden	subarea	A mean value for 1998–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Properties and buildings				
Type of properties	1996 and	Statistics Sweden	subarea	The number of properties per category has been calculated as a percentage
	2002			The property density has been calculated.
Building permits	1996– 2002	Statistics Sweden	subarea	A mean value for 1993–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Completed dwellings	1993– 2002	Statistics Sweden	subarea	A mean value for 1993–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
				The density has been calculated, that is number of new dwellings per unit area
Employment				
The employed night-time	1997– 2002	Statistics Sweden	subarea	The number of workers per type of business has been calculated as a percentage
by types of business (20–64 y)				A mean value for 1997–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).

#### Table 3-1. Variable, data source and processing summary.

Variable	Time series	Data source	Most detailed resolution obtained	Processing
The employed day-time	1997– 2002	Statistics Sweden	subarea	The number of workers per type of business has been calculated as a percentage
population by types of business (20–64 y)				A mean value for 1997–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Work places by types of	1997– 2002	Statistics Sweden	subarea	The number work places per type of business has been calculated as a percentage
business				A mean value for 1997–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Commuting	2001	Statistics Sweden	subarea	The net commuting was calculated for 2001
The total non-employed population	1997– 2001	Statistics Sweden		The number of non-employed inhabitants per category has been calculated as a percentage
(20–64 y)				The total number of non-employed was claculated as a precentage of the total population
				A mean value for 1997–2002 has been calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Forestry	1999	AssiDomän	Subarea	The amount of wood extracted from the model area during the past 10 years was calculated by multiplying the average volume of mature forest of the area with the forest area that is 0–9 years old. Therafter this sum was divided by 10.
Agriculture				
Horticulture				
Number of holdings	2002	Länsstyrelsen i Kalmar län and Gula Sidorna		The number of holdings in Misterhult församling has been estimated with some guidance from /Länsstyrelsen i Kalmar län et al. 2002/ and /Gula Sidorna, 2003, internet/.
Production of fruit, berries and vegetables	-	-	none	-
Aquaculture				
Number of enterprises	2002	Oskarshamn kommun	parish	The number of enterprises and their location has been established through Oskarshamn key plan.
Production for consumption	-	-	none	-
Mineral extraction	2003	Länsstyrelsen i Kalmar län (County administrative board of Kalmar)	Subarea	The number of mineral leases and their location has been established through GIS-assessment.
Water supply				
Water use, by category; households, agriculture, industry and other	1990, 1995 and 2000	Statistics Sweden	Municipality	The water use within smaller areas has been calculated based on some assumptions, see chapter 2.

Variable	Time series	Data source	Most detailed resolution obtained	Processing
Water withdrawal subdivided in private and public supply	1990, 1995 and 2000	Statistics Sweden	Municipality	The water withdrawal within smaller areas has been calculated based on some assumptions, see chapter 2.
Water withdrawal subdivided in groundwater and surface water	1990, 1995 and 2000	Statistics Sweden	Municipality	The water withdrawal within smaller areas has been calculated based on some assumptions, see chapter 2
Commersial fishing				
Number of fishermen	1995– 2002	Fiskeriverket	Postcode zones within Oskarshamns kommun	The number of logbook or journal keeping fishermen were obtained from the National Board of Fisheries. The number of fishermen in Misterhult församling were estimated with the guidance in the Swedish Post's postcode catalogue. The number was multiplied by 3.28 to get a rough estimate of the total number of fishermen, see chapter 2.
Total catch by fishermen living in the geographic areas	1995– 2002	Fiskeriverket	Postcode zones within Oskarshamns kommun	When calculating the total catch by the fishermen living in Misterhult församling the average catch per fisherman in Oskarshamns kommun for 2002 has been used.
Total catch per EU-square	1995– 2002	Fiskeriverket		The mean catch during 1995–2002 and the catch per unit area has been calculated.
Out-door life				
Harvested moose in number	1997– 2003	Länsstyrelsen i Kalmar län	Parish	The number of harvested moose from the different hunting zones has been summarised for the last hunting season (ended in 2003). The harvested number in smaller areas has been calculated based on the number per unit area in the parish.
				A mean value for 1997–2003 was calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Harvested moose in weight		Svenska Jägareförbundet, and		The live weight has been calculated based on information from Svensk Viltförvaltning AB.
(live-, carcass- and utilized carcass weight)		AB		The carcass weight has been calculated based on carcass data from Svensk Viltförvaltning AB and Svenska Jägareförbundet.
				The utilized carcass weight has been calculated based on information from Svensk Viltförvaltning AB
Harvested roe deer in number	1997– 2001	Svenska Jägareförbundet	Oskarshamns north hunting association (Oskarshamns norra jaktvårdskrets)	The latest coarse estimated number of harvested roe deer per km <sup>2</sup> was obtained from Jägareförbundet. The actual number of harvested roe deer within smaller areas was calculated from the number per unit area.
				A mean value for 1997–2001 was calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Harvested roe deer in weight		Svenska Jägareförbundet, and		The total live weight has been calculated based on data from Svenska Jägareförbundet.
(live-, carcass- and utilized carcass weight)		Svensk Viltförvaltning AB		The carcass weight and the utilized carcass weight have been calculated based on information from Svensk Viltförvaltning AB.
				A mean value for 1997–2001 was calculated (together with minimum and maximum value and standard deviation (SD) of the mean).

Variable	Time series	Data source	Most detailed resolution obtained	Processing
Harvested of hares in number (alpine hare and common hare)	1997– 2001	Svenska Jägareförbundet	Östhammars hunting association (Östhammars jaktvårdskrets)	The latest coarse estimated number of harvested hares per ha in Östhammars jaktvårdskrets was obtained from Svenska Jägareförbundet. This number was applied to the parish and smaller areas.
				A mean value for 1997–2001 was calculated (together with minimum and maximum value and standard deviation (SD) of the mean).
Harvested hares in weight (live-,		Jägareförbundet and Svensk Viltförvaltning		The total live weight has been calculated based on data from Svenska Jägareförbundet.
carcass- and utilized carcass weight)		AB		The carcass weight and the utilized carcass weight have been calculated based on information from Svensk Viltförvaltning AB.
Picking of wild berries	1997	Berggren and Kyläkorpi, 2002	Country	The picking (litres per square kilometre land area) has been calculated based on the estimated amount picked in Sweden.
Picking of mushrooms	1997	Berggren and Kyläkorpi, 2002	Country	The picking (litres per square kilometre land area) has been calculated based on the estimated amount picked in Sweden.
Number of attractive fishing waters	2003	Oskarshamn Turistbyrå	parish	
Number of sport fishing clubs	2003	Sveriges sportfiske- och fiskevårdsförbund	Municipality	
Catch by sport fishermen	2002	Fiskeriverket	Country	A theoretical value has been calculated based on the information in the report Fiske 2000.
Number of golf courses	2003	Oskarshamns kommun	Municipality	
Number of jogging tracks	2003	Oskarshamns kommun	Simpevarp area	
Number of areas for country walks	2003	Länsstyrelsen i Kalmar län	Simpevarp area	
Number of attractive spots for bird watching	2003	Oskarshamnsbygdens fågelklubb	Parish	
Number of canoe routes	2003	Kanotguiden	Parish	
Number of canoe renters	2003	Kanotguiden	Parish	
Number of open air baths	2003	Oskarshamns kommun	Simpevarp area	
Number of camp sites and holiday villages	2003	Oskarshamns kommun	Parish	
Number of marinas	2003	Oskarshamns kommun	Simpevarp area	
Number of guest harbours	2003	Oskarshamns kommun	Simpevarp area	
Number of boat renters	2003	Oskarshamns kommun and Oskarshamn Turistbyrå	Parish	

## 4 Results

## 4.1 Human population

### 4.1.1 Demography

There were in total 940 inhabitants within the Simpevarp area in 2002 (see Table 4-2). About half of them live within Simpevarp 18 in which part of Fårbo and Figeholm is located. That gives the Simpevarp area a population density of seven inhabitants per square kilometre and Simpevarp 18 a population density of as much as 45 inhabitants per square kilometre (2002) (see Table 4-3 and Table 4-4). This figure can be compared with the population density in Oskarshamns kommun at 25 inhabitants per kilometre and Kalmar län at 21, in 2002 (see Table 4-4 and Figure 4-1). The population density in the Simpevarp area is by that means three times lower than in Kalmar län.

Note that there is sometimes incoherency between the sum of values for the different age groups and the total number of inhabitants. This is a result of the deliberate reporting bias that has been mentioned before.

The population density in coastal area north was as low as 1.3 inhabitants per square kilometre in 2002. There are only three inhabitants within Simpevarp 13 and no inhabitants in OKG peninsula, Ävrö, Hålö and Äspö. The population density in the other subareas as well as the archipelago vary between just under three and nine inhabitants per square kilometre (see Figure 4-1). The density in the main drainage area (72/73) is approximately at the same level as the Simpevarp area.

The population density in the Simpevarp area and larger areas show a slow downward trend during the last ten years, 1993–2002 (see Figure 4-1). The decline depends primarily on an excess of deaths over births (Table 4-4).

The population density in the subareas has been almost unchanged between 1993 and 2002. An exception is Simpevarp 18, where we can see a small decline (see Figure 4-2). The decline depends primarily on an excess of deaths over births (Table 4-3).

When comparing the age structure in 2002 between the different levels of resolution, it is clear that the age class 45–64 is normally the largest group (see Table 4-2). Two subareas differ from this; in Simpevarp 5 the age class  $\geq 65$  is the largest and in Simpevarp 17 the age class 25–44 is a bit larger than age class 45–64 (Table 4-1). Simpevarp 6, 7, 9 and 13 have very few inhabitants and people over 45 years of age dominate them.

The distribution of the human population within Misterhult församling is visualised in Figure 4-3. 1,381 inhabitants are living within a radius of 10 km from Oskarhamn nuclear power plant, while 24 are living within a radius of 2 km from the power plant.

				1								
Geographic	Year	No. of in-	0-15 y		16-24 y	′	25-44 y		45-64	у	>6	) y
area		habitants	men wo	omen	men wo	omen	men wo	omen	men v	vomen	men	women
Simpevarp 5	2002	241	20	23	8	10	26	22	32	28	30	42
percentage distribution	2002		17.8%		7.5%		19.9%		24.9%	6	29.	9%
mean value	93-02	243	24	25	10	10	24	27	32	25	26	41
standard deviation		10.0	4.5	2.2	2.4	1.8	1.4	3.3	1.1	3.8	3.3	1.8
min value		221	17	23	7	7	22	22	20	20	10	38
		221	17	20	,	40	22	22	23	20	13	30
		257	31	29	14	13	20	32		30	30	43
Simpevarp 6	2002	14	0	0	0	0	0	0	4	3	0	3
percentage distribution	2002		0.0%		0.0%		0.0%		50.0%	6	21.4	4%
mean value	93-02	13	2	0	0	0	2	1	3	3	0	2
standard deviation		0.9	1.4	0.0	0.0	0.0	1.4	1.4	1.4	0.4	0.0	1.6
min value		12	0	0	0	0	0	0	0	3	0	0
max value		14	3	0	0	0	3	3	4	4	0	3
Simnevarn 7	2002	7	0	0	0	0	0	0	0	3	0	0
porcontage distribution	2002		0.0%	Ű	0.0%	Ű	0.0%	Ŭ	12.0%	ζ.	0.0	10/2
	2002	0	0.0 %	_	0.0 %	_	0.0 %	~	42.37	°	0.0	/0
mean value	93-02	6	0	0	0	0	0	0	2	2	0	0
standard deviation		0.7	0.0	0.0	0.0	0.0	0.0	0.0	1.6	1.4	0.0	0.9
min value		5	0	0	0	0	0	0	0	0	0	0
max value		7	0	0	0	0	0	0	3	3	0	3
Simpevarp 9	2002	16	0	0	0	0	0	3	3	4	4	0
percentage distribution	2002		0.0%		0.0%		18.8%		43.8%	6	25.	0%
mean value	93-02	18	0	0	0	0	1	1	3	3	4	3
standard deviation	00 02	17	0.0	0.0	0.0	0 0	1.5	15	03	0.5	0.6	15
		1.7	0.0	0.0	0.0	0.5	1.5	1.5	0.5	0.5	0.0	1.5
min value		15	0	0	0	0	0	0	3	3	3	0
max value		20	0	0	0	3	3	3	4	4	5	4
Simpevarp 10	2002	147	11	11	3	8	15	14	27	26	14	18
percentage distribution	2002		15.0%		7.5%		19.7%		36.1%	6	21.	3%
mean value	93-02	168	13	17	9	7	19	21	27	26	14	15
standard deviation		12.2	4.1	3.9	3.8	2.0	3.6	4.3	2.0	1.8	1.5	2.0
min value		147	8	11	3	3	14	14	24	24	12	12
max value		180	20	24	15	10	24	26	31	29	16	18
Simpoverp 12	1006	2	- 20	24	0	0	- 24	20	0	20	10	0
	1990	3	0	0	0	0	0	0	0	0	0	0
Simpevarp 13	1997	3	0	0	0	0	0	0	0	0	0	0
Simpevarp 13	2002	3	0	0	0	0	0	0	3	0	0	0
Simpevarp 17	2002	53	6	3	4	3	8	7	8	5	5	4
percentage distribution	2002		17.0%		13.2%		28.3%		24.5%	6	17.	2%
mean value	93-02	49	5	3	2	3	8	6	8	4	6	4
standard deviation		3.6	0.9	1.4	1.7	1.4	1.5	0.6	1.2	0.5	0.7	0.7
min value		44	4	0	0	0	5	5	6	4	5	4
max value		54	6	5	4	4	10	7	10	5	7	6
Cimenou are 10	2002	400	25	22	10		10	27	10	50	26	70
Simpevarp 16	2002	409	35	33	10	21	40	31	00	, 59 ,	30	12
percentage distribution	2002		16.6%		7.6%		18.8%		30.6%	ò	26.4	1%
mean value	93-02	446	36	47	19	22	46	47	61	55	41	72
standard deviation		17.8	2.5	9.5	5.0	4.2	3.2	4.8	3.7	3.9	3.4	2.1
min value		409	33	33	10	14	40	37	56	50	36	68
max value		464	40	60	27	27	50	51	66	63	45	75
OKG peninsula,	93-02	0	0	0	0	0	0	0	0	0	0	0
Hålö, Ävrö, Äspö												
Archinelago	2002	124	8	9	3	4	8	8	25	25	19	15
norcontage distribution	2002	12-1	13 7%	Ŭ	5.6%	-	12.0%	Ŭ	40.3%	. 20	27	10/
,	2002	100	13.7%		5.0%	_	12.9%	40	40.37	°	27.4	+ /0
mean value	93-02	130	9	11	3	5	11	10	21	24	21	16
standard deviation		4.6	1.3	2.2	1.3	1.2	2.5	1.4	3.2	1.8	1.5	0.6
min value		124	7	8	0	3	7	7	17	22	19	15
max value		138	11	15	5	6	15	12	25	27	23	17
Coastal_north	2002	27	0	3	0	4	0	0	8	5	3	3
percentage distribution	2002		11.1%		14.8%		0.0%		48.1%	6	22.	2%
mean value	93-02	33	1	5	0	3	2	3	6	5	4	3
standard doviation	30 52	2 0	1 /	1 0	0.0	21	1 0	0.0	10	0.0	0.5	1 0
		3.0	1.4	1.9	0.9	2.1	1.0	0.9	1.0	0.9	0.5	1.3
		27	U	3	U	U	U .	U	3	4	3	0
max value		37	3	8	3	5	4	3	8	7	4	5
Coastal_south	2002	22	0	3	0	0	0	3	9	4	0	0
percentage distribution	2002		13.6%		0.0%		13.6%		59.1%	6	0.0	%
mean value	93-02	20	0	2	0	0	1	3	7	2	1	2
standard deviation		2.5	0.9	1.6	0.0	0.0	1.5	1.1	2.0	1.8	1.5	1.6
min value		16	0	0	0	0	0	0	3	0	0	0
max value		22	3	3	0	0	4	4	9	4	3	4

### Table 4-1. Population in Simpevarp subareas and the archipelago

Input data: Population by age and sex, Source: Statistics Sweden, Registret över totalbefolkningen

Calculated: Inhabitants per age class expressed as a percentage, a mean value with standard deviation, minimum- and maximum value

Geographic	Year	No. of in-	0-1	5 у	16-	24 y	25-4	14 y	45-6	64 y	>6	5 y
area		habitants	men	women	men	women	men	women	men	women	men	women
Simpevarp area	2002	940	75	76	33	45	96	91	155	133	93	143
percentage distribution	2002		16.1	1%	8.	3%	19.	9%	30.	6%	25	.1%
mean value	93-02	986	84	98	44	42	105	109	144	125	98	137
standard deviation		26.1	11.0	13.7	6.2	3.2	6.5	11.1	6.9	9.1	2.5	5.0
min value		940	71	76	33	36	96	91	135	111	93	130
max value		1 014	104	117	52	46	115	123	155	134	102	144
Main drainage area												
(72/73)	2002	2 161	187	190	85	84	214	212	372	339	206	272
percentage distribution	2002			17.4%		7.8%		19.7%		32.9%		22.1%
mean value	93-02	2 322	216	226	117	108	243	254	359	316	208	275
standard deviation		105.3	26.4	26.8	21.8	15.3	20.6	29.4	16.5	22.3	3.5	5.5
min value		2 161	173	190	85	84	214	212	332	277	204	267
max value		2 425	251	277	148	129	282	301	378	340	215	283
Misterhult församling	2002	2 709	225	236	108	111	264	262	461	427	275	340
percentage distribution	2002			17.0%		8.1%		19.4%		32.8%		22.7%
mean value	93-02	2 879	260	277	137	134	303	305	435	396	283	349
standard deviation		120.1	32.1	30.0	21.3	14.0	27.2	29.8	21.8	24.2	8.8	7.0
min value		2 709	210	236	108	111	264	262	400	354	273	340
max value		2 987	304	330	168	152	358	358	461	427	297	361
Oskarshamns kommun	2002	26 161	2 488	2 397	1 303	1 143	3 381	3 087	3 693	3 601	2 180	2 888
percentage distribution	2002			18.7%		9.3%		24.7%		27.9%		19.4%
mean value	93-02	26 784	2 618	2 446	1 469	1 357	3 502	3 208	3 603	3 481	2 142	2 959
standard deviation		442.6	89.3	63.2	161.9	162.3	84.9	77.2	114.6	105.2	27.2	34.5
min value		26 161	2 487	2 364	1 292	1 143	3 364	3 087	3 406	3 289	2 112	2 888
max value		27 264	2 721	2 539	1 692	1 606	3 579	3 290	3 736	3 611	2 185	2 992
Kalmar län	2002	234 627	20896	19818	14 046	13 046	28 700	27 207	32 316	31 341	20 599	26 658
percentage distribution	2002			17.4%		11.5%		23.8%		27.1%		20.1%
mean value	93-02	239 133	22 439	21 348	14 427	13 309	30 331	28 693	30 842	30 015	20 724	27 006
standard deviation		3 717.8	1 030.2	945.1	634.8	662.5	1 177.5	985.9	1 101.7	912.3	230.4	185.2
min value		234 627	20 896	19 818	13 712	12 605	28 700	27 207	28 984	28 475	20 453	26 658
max value		244 057	23 662	22 459	15 419	14 357	31 786	29 851	32 316	31 341	21 097	27 191

### Table 4-2. Population in the Simpevarp area and larger areas.

Input data: Population by age and sex, Source: Statistics Sweden, Registret över totalbefolkningen

Calculated: Inhabitants per age class expressed as a percentage and a mean value with standard deviation,

minimum- and maximum value

Geographic area	Year	Number of inhabitants	Inhabitants per km <sup>2</sup> and	Population changes	In- migrated	Out- migrated	Live births	Deaths
		31-dec	10 <sup>6</sup> m <sup>2</sup>					
Simpevarp 5	2002	241	9.0	1	14	16	3	0
mean value	93-02	243	9.1	-1.6	21.4	20.9	2.2	4.3
standard deviation		10.0	0.4	11.9	7.2	6.7	1.5	1.8
min value		221	8.2	-15	13	13	0	0
max value		257	9.6	22	37	33	4	6
Simpevarp 6	2002	14	7.0	3	3	0	0	0
mean value	93-02	13	6.7	0.0	0.9	0.9	0.0	0.0
standard deviation		0.9	0.5	2.0	1.4	1.4	0.0	0.0
min value		12	6.0	-3	0	0	0	0
max value		14	7.0	3	3	3	0	0
Simpevarp 7	2002	7	3.3	3	3	0	0	0
mean value (SD)	93-02	6	2.8	0.3	0.6	0.3	0.0	0.0
standard deviation		0.7	0.4	2	1.3	0.9	0.0	0.0
min value		5	2.4	-3	0	0	0	0
max value		7	3.3	3	3	3	0	0
Simpevarp 9	2002	16	5.7	0	0	0	0	0
mean value	93-02	18	6.4	0.0	0.3	0.3	0.0	0.0
standard deviation		1.7	0.6	0.0	0.9	0.9	0.0	0.0
min value		15	5.4	0	0	0	0	0
max value		20	7.1	0	3	3	0	0
Simpevarp 10	2002	147	3.6	-8	3	11	3	3
mean value	93-02	168	4.1	-2.9	9.7	13.3	1.9	1.2
standard deviation		12.2	0.3	3.9	5.0	3.3	1.7	1.5
min value		147	3.6	-9	3	8	0	0
max value		182	4.4	3	17	18	4	3
Simpevarp 13	2002	3	2.7	0	0	0	0	0
mean value	93-02	1	0.8	0.0	0.0	0.0	0.0	0.0
standard deviation		1.4	1.3	0.0	0.0	0.0	0.0	0.0
min value		0	0.0	0	0	0	0	0
max value	0000	3	2.7	0	0	0	0	0
Simpevarp 17	2002	53	1.1	5	(	5	3	0
mean value	93-02	49	7.1	0.9	4.8	4.5	0.6	0.0
standard deviation		3.6	0.5	4.0	2.8	3.4	1.3	0.0
min value		44	0.4	-/	0	10	0	0
Simpovers 19	2002	54	1.0	5	9	10	3	0
Simpevarp 10	2002	409	40 1	-20	23	27.2	20	9
	93-02	17.0	49.1	-1.0	41.0	0.0	2.0	0.3
		17.0	2.0	13.1	6.1 22	9.0	2.7	1.7
max value		409	51.0	-20	20	20	7	11
	1003	404	0.0	-3	43	40	, 0	0
	93-02	0	0.0	-0	0	0	0	0
Archinelago	2002	124	4.9	-2	5	7	0	0
mean value	93-02	124		-2	92	8.4	03	15
standard deviation	50-02	4.6	0.2	-0.4	4.5	3.6	0.0	1.0
min value		124	4.9	-7	-1.0	5.0	0.0	0
max value		138	5.4	11	17	° 16	3	3
Coastal north	2002	27	1.3	-3	0	3	0	0
mean value	93-02	33	1.0	-0.5	0.9	14	0.0	0.0
standard deviation	00 02	3.0	0.1	29	1.4	19	0.0	0.0
min value		3.0 27	1.3	-5	۰.۰ ۱	 N	0.0	0.0
max value		37	1.5	-J 2	ر د	5	0	0
Coastal south	2002	22	27	0	0	0 0	0	0
mean value	93-02	22	2.7	-0.5	16	15	0 0	0 A ()
standard deviation	00 02	25	0.3	3.3	22	1.6	0.0	1.3
min value		0	2.0	-6	0	0	0.0	0
max value		23	2.8	5	5	3	0	3

### Table 4-3. Population and vital statistics in the subareas and the archipalago.

Source: Statistics Sweden, number of inhabitants, inmigrated, outmigrated, live births and deaths .

Calculated: Inhabitants per unit area and net population change, mean value with standard deviation, minimum- and maximum value

#### Table 4-4. Population and vital statistics in the Simpevarp area and larger areas.

Geographic	Year	Number of	Inhabitants	Population	In-	Out-	Live	Deaths
area		inhabitants	per km2 and	changes	migrated	migrated	births	
		31-dec	10 <sup>6</sup> m <sup>2</sup>			g		
Simpevarp area	2002	940	7.4	-13	50	66	15	12
mean value	93-02	986	7.8	-9	71	73	8	15
standard deviation		26.1	0.2	14	13	12	4	4
min value		940	7.4	-27	50	59	3	9
max value		1 023	8.1	17	92	97	15	21
Main drainage area (72/73)	2002	2 161	9.5	-37	101	138	24	24
mean value	93-02	2 322	10.2	-18	160	166	18	30
standard deviation		105.3	0.5	48	81	81	5	4
min value		2 161	9.5	-67	101	99	10	24
max value		2 477	10.9	94	339	390	25	35
Misterhult församling	2002	2 709	6.6	-30	116	148	31	29
mean value	93-02	2 879	7.1	-22	176	186	23	36
standard deviation		120.1	0.3	55.7	74.4	86.2	5.7	4.3
min value		2 709	6.6	-92	116	137	12	29
max value		3 080	7.6	110	340	428	31	43
Oskarshamns kommun	2002	26 161	25	23	907	847	288	325
mean value	93-02	26 784	26	-45	888	885	275	323
standard deviation		442.6	0.4	118.4	112.6	75.2	37.7	14.3
min value		26 161	25.0	-206	787	771	230	303
max value		27 264	26.0	150	1 178	1 023	338	343
Kalmar län	2002	234 627	21	-77	6990	6158	2100	3009
mean value	93-02	239 133	21	-730	6 439	6 539	2 320	2 950
standard deviation		3 717.8	0.3	1 128.1	1 127.3	605.1	411.0	64.2
min value		234 627	21.0	-2 015	5 205	5 560	1 991	2 859
max value		244 057	21.8	1 524	9 278	7 737	3 154	3 072

Source: Statistics Sweden, number of inhabitants, inmigrated, outmigrated, live births and deaths.

Calculated: Inhabitants per unit area and net population change, mean value with standard deviation, minimum- and maximum value



*Figure 4-1.* Population density development in the Simpevarp area and larger areas, between 1993 and 2002.



Figure 4-2. Population density development in the subareas, between 1993 and 2002.



*Figure 4-3.* The distribution of population in Misterhult församling, based on demography statistics in squares of 200 metres.

## 4.1.2 Health

The ill-health has in general increased during the time period 1998 to 2002 according to the statistics delivered from SCB. In the Simpevarp area and in larger areasthe ill-health has increased from approximately 35 days per person in 1998 to approximately 48 days per person (see Table 4-6 and Figure 4-4). The ill-health is 20% higher in the Simpevarp area than in Kalmar län, when comparing the mean value.

The ill-health has varied to a great extent during the last ten years in the subareas (see Figure 4-5). That is quite natural as the population is small and changes in individual status have large effects. Coastal area south has the highest ill-health, considerable over the mean value for the municipality and county (see Figure 4-5 and Table 4-5). In Simpevarp 10 and 6 men have a higher ill-health than women (mean value 98-02). In general, however, the ill-health among women is higher.

Geographic area	Year	ill-health	ill-health	ill-health
		total	men	women
Simpevarp 5	2002	39.8	46.9	32.0
mean value	98-02	40.0	52.0	27.9
standard deviation		7.3	10.9	5.0
min value		27.5	35.1	19.2
max value		44.9	60.4	32.0
Simpevarp 6	2002	97.2	103.0	90.0
mean value	98-02	99.9	107.1	92.6
standard deviation		6.0	11.2	2.5
min value		92.5	93.8	90.0
max value		106.3	121.0	96.3
Simpevarp 7	2002	48.8	0.0	0.0
mean value	98-02	9.8	0.0	0.0
standard deviation		21.8	0.0	0.0
min value		0.0	0.0	0.0
max value		48.8	0.0	0.0
Simpevarp 9	2002	89.0	92.3	86.4
mean value	98-02	42.3	28.5	53.8
standard deviation		34.3	40.7	50.0
min value		0.8	0.0	1.0
max value		89.0	92.3	109.8
Simpevarp 10	2002	59.5	52.0	67.4
mean value	98-02	55.5	48.1	63.5
standard deviation		13.9	14.0	15.6
min value		34.1	24.0	44.5
max value		70.4	57.8	85.0
Simpevarp 13	93-02	0.0	0.0	0.0
Simpevarp 17	2002	31.5	31.6	31.4
mean value	98-02	29.5	14.9	50.9
standard deviation		5.0	12.9	17.3
min value		21.5	1.4	31.4
max value		34.8	31.6	75.3
Simpevarp 18	2002	41.9	39.5	44.2
mean value	98-02	41.1	32.1	50.3
standard deviation		4.8	5.6	9.4
min value		36.4	25.8	39.9
max value		47.7	39.5	60.9
OKG peninsula, Hålö				
Ävrö, Äspö	93-02	0.0	0.0	0.0
Archipelago	2002	36.7	40.8	32.9
mean value	98-02	39.4	29.1	48.8
standard deviation		11.5	16.5	13.3
min value		25.8	8.9	32.9
max value		55.0	43.6	69.0
Coastal_north	2002	56.6	9.3	94.5
mean value	98-02	43.0	4.9	71.4
standard deviation		15.2	7.0	24.5
min value		19.8	0.0	36.0
max value		56.8	15.3	94.6
Coastal_south	2002	101.0	44.7	185.5
mean value	98-02	102.2	37.0	216.4
standard deviation		15.3	24.4	52.8
min value		84.8	2.1	182.5
max value		121.6	67.6	307.0

### Table 4-5. III-health in the subareas and the archipelago (inhabitants 16-64 years).

Source: Statistics Sweden, a total ill-health figur and ill-health by sex.

The ill-health figur is the number of days per person (16-64 years) with sickness benefit due to

illness, rehabilitation and occupational injury, as well as days with early retirement pension.

Calculated: mean value with standard deviation, minimum- and maximum value and the increase since 1998.

	Table 4-6.	III-health in the Sim	pevarp area and	larger areas	(inhabitants	16–64 y	ears).
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Geographic area	Year	ill-health	ill-health	ill-health
		total	men	women
simpevarp area	2002	52.3	50.6	54.0
mean value	98-02	47.5	41.5	54.0
standard deviation		5.6	6.0	7.3
min value		40.0	36.0	44.0
max value		52.7	50.6	63.6
Main drainage area (72/73)	2002	49.4	39.9	59.4
mean value	98-02	41.7	32.2	51.8
standard deviation		5.6	4.8	7.1
min value		36.3	27.2	43.1
max value		49.4	39.9	59.4
Misterhult församling	2002	49.1	38.8	60.0
mean value	98-02	42.1	32.3	52.4
standard deviation		5.6	4.0	7.8
min value		36.2	28.3	42.9
max value		49.1	38.8	60.1
Oskarshamn kommun	2002	47.7	35.3	60.8
mean value	98-02	37.4	28.9	46.6
standard deviation		6.5	4.0	9.2
min value		30.7	24.9	36.9
max value		47.7	35.3	60.8
Kalmar län	2002	44.7	36.8	52.9
mean value	98-02	39.6	33.4	46.0
standard deviation		4.5	2.9	6.3
min value		33.8	29.7	38.1
max value		44.7	36.8	52.9

Source: Statistics Sweden, a total ill-health figur and ill-health by sex.

The ill-health figur is the number of days per person (16-64 years) with sickness benefit due to

illness, rehabilitation and occupational injury, as well as days with early retirement pension.

Calculated: mean value with standard deviation, minimum- and maximum value and the increase since 1998.



Figure 4-4. Ill-health in the Simpevarp area and larger areas, between 1993 and 2002.



Figure 4-5. Ill-health in the subareas, between 1993 and 2002.

## 4.1.3 Properties and buildings

#### Type of properties

There were altogether 131 holiday houses, 129 farms, 14 multi dwelling houses, 312 oneor two dwelling houses and 43 other buildings in the Simpevarp area in 2002 (see Table 4-8). The number of properties per square kilometre is lower in the Simpevarp area than in Kalmar län. Compared to the parish, the density of farms, one- or two dwellings, multidwellings and other properties are higher in Simpevarp area. The density of holiday houses is lower in the Simpevarp area than in the parish. This is in accordance with the fact that the Simpevarp area has a higher population density than the parish.

It is remarkable that the number of farms in the Simpevarp area has increased from 117 to 129 between 1996 and 2002. That does not correspond to the development of work places within the sector Agriculture, forestry, fishing and hunting during the same time, (see page 67). The number of work places has instead decreased. Besides farms, the number of properties has been rather stable since 1996.

The Simpevarp area has almost the same distribution of properties as Kalmar län (see Table 4-8).

Simpevarp 7 and 13 contain merely a few farms (see Table 4-7). The holiday houses are most dominating in Simpevarp 7, which also has the highest density of holiday houses among the subareas. The subarea OKG peninsula, where OKG is situated, contains only four holiday houses and three other houses, which most likely belong to OKG. There are no inhabitants in Simpevarp 9, but most likely a minor holiday population. Multi-dwelling houses are only found in Simpevarp 10 and 8 that are the most densely populated areas. There are no properties within Simpevarp 10–12.

The holiday houses are very predominant in the archipelago and they account for 54% of the total number of properties in 2002. The density is 5 holiday houses per square kilometre.

# Table 4-7. Number of properties by type of property in the subareas and the archipelago.

Geographic area	Year	Farms	One- or	Holiday-	Multi-	Other
			two dwelling	houses	dwelling	
Ssimpevarp 5	1996	3	89	9	4	19
Ssimpevarp 5	2002	5	87	11	4	16
percentage distribution	2002	4.1%	70.7%	8.9%	3.3%	13.0%
number/square kilometre	2002	0.19	3.25	0.41	0.15	0.60
Ssimpevarp 6	1996	3	6	3	0	0
Ssimpevarp 6	2002	4	6	3	0	0
percentage distribution	2002	30.8%	46.2%	23.1%	0.0%	0.0%
number/square kilometre	2002	2 00	3 00	1 50	0.00	0.00
Simpeyarn 7	1996	4	0.00	0	0	0.00
Simpevarp 7	2002	5	0	0	0	0
porcontago distribution	2002	100.0%	0.0%	0.0%	0.0%	0.0%
	2002	100.0%	0.0%	0.0%	0.0%	0.0%
number/square kilometre	2002	2.38	0.00	0.00	0.00	0.00
Simpovarp 9	1996	5	8	3	0	0
Simpevarp 9	2002	35.3%	0 47 1%	ى 17.6%	0.0%	0.0%
percentage distribution	2002	2 1/	47.1%	17.0%	0.0%	0.0%
Simplyarp 10	1002	2.14	2.00	28	0.00	0.00
Simpevarp 10	2002	20 51	43	20	0	3
orreprised distribution	2002	J1 5%	40 32 5%	23 6%	0.0%	2 404
pumber/square kilometre	2002	41.370	0.97	23.0%	0.0%	2.4%
Simpeyarn 13	1996	0	0.37	0.71	0.00	0.07
Simpevarp 13	2002	3	0	0	0	0
percentage distribution	2002	100.0%	0.0%	0.0%	0.0%	0.0%
number/square kilometre	2002	2 73	0.00	0.00	0.00	0.00
Simpeyarp 17	1996	7	11	26	0	0.00
Simpevarp 17	2002	7	15	21	0	0
percentage distribution	2002	16.3%	34.9%	48.8%	0.0%	0.0%
number/square kilometre	2002	1.01	2.17	3.04	0.00	0.00
Simpevarp 18	1996	9	123	20	10	19
Simpevarp 18	2002	13	125	21	12	19
percentage distribution	2002	6.8%	65.8%	11.1%	6.3%	10.0%
number/square kilometre	2002	1.43	13.74	2.31	1.32	2.09
OKG peninsula	1996	0	0	4	0	3
OKG peninsula	2002	0	0	4	0	3
percentage distribution	2002	0.0%	0.0%	57.1%	0.0%	42.9%
number/square kilometre	2002	0.00	0.00	1.82	0.00	1.36
Hålö	1996	0	0	0	0	0
Hålö	2002	0	0	0	0	0
percentage distribution	2002					
number/square kilometre	2002	0.00	0.00	0.00	0.00	0.00
Âvrö	1996	0	0	0	0	0
Avrö	2002	0	0	0	0	0
percentage distribution	2002					
number/square kilometre	2002	0.00	0.00	0.00	0.00	0.00
Aspö	1996	0	0	0	0	0
Aspo	2002	0	0	0	0	0
percentage distribution	2002	0.00	0.00	0.00	0.00	0.00
	2002	0.00	0.00	0.00	0.00	0.00
Archipelago	1990	44	40	114	0	7
Archipelago	2002	22 10/	20 89/	F4 29/	0.0%	2.0%
number/square kilometro	2002	22.1% 2 N2	20.0%	J4.2%	0.0%	2.9% 0.27
Coastal north	1002	2.00	1.90	10	0.00	0.27
Coastal north	2002	9 15	12	55 19	0	4
nercentage distribution	2002	28 20/	12 22 60/	23 1210/	0 0.0%	5 5 7%
number/square kilometre	2002	20.3 /0 0 70	۰ 56 مر 1 56		0.0 %	0.1/0
Coastal south	1996	20	10	20	0.00	0.14
Coastal south	2002	20	11	23	0	0
percentage distribution	2002	37.7%	20.8%	41.5%	0.0%	0.0%
number/square kilometre	2002	2.47	1.36	2.72	0.00	0.00

Source: Statistics Sweden, Fastighetstaxeringsregistret 1996-01-01 och 2002-01-01

Calculated: the number per square kilometre and the percentage distribution of the types of properties

Geographic area	Year	Farms	One- or two dwelling	Holiday- houses	Multi- dwelling	Other
Simpevarp area	1996	117	316	135	13	46
Simpevarp area	2002	129	312	131	14	43
percentage distribution	2002	20.5%	49.6%	20.8%	2.2%	6.8%
number/square kilometre	2002	1.02	2.46	1.03	0.11	0.34
Main drainage area (72/73)	1996	147	774	477	31	85
Main drainage area (72/73)	2002	251	783	482	34	78
percentage distribution	2002	15.4%	48.1%	29.6%	2.1%	4.8%
number/square kilometre	2002	1.10	3.44	2.12	0.15	0.34
Misterhult församling	1996	237	998	668	34	113
Misterhult församling	2002	388	1012	707	38	101
percentage distribution	2002	17.3%	45.1%	31.5%	1.7%	4.5%
number/square kilometre	2002	0.95	2.48	1.73	0.09	0.25
Oskarshamn kommun	1996	811	6133	1582	405	604
Oskarshamn kommun	2002	1225	6318	1612	423	576
percentage distribution	2002	12.1%	62.2%	15.9%	4.2%	5.7%
number/square kilometre	2002	1.17	6.03	1.54	0.40	0.55
Kalmar län	1996	11917	59555	23909	4129	7166
Kalmar län	2002	18467	61749	25095	4266	7087
percentage distribution	2002	15.8%	52.9%	21.5%	3.7%	6.1%
number/square kilometre	2002	1.65	5.53	2.25	0.38	0.63

#### Table 4-8. Number of properties by type of property at larger areas.

Source: Statistics Sweden, Fastighetstaxeringsregistret 1996-01-01 och 2002-01-01 Calculated: the number per square kilometre and the percentage distribution of the types of propertie s

#### New buildings

According to the building statistics no one- or two dwellings have been built in the Simpevarp area since 1993. Nineteen multi dwelling buildings were built in the Simpevarp area (Simpevarp 18) in 1993, but nothing more after that (see Table 4-9 and Table 4-10). No dwellings are planned in the nearest future since no building permits have been granted during the last years (see Table 4-11).

A few permits for construction of business premises have been granted in the Simpevarp area (Simpevarp 9) and the main drainage area since 1996 (see Table 4-12). Accordingly, the building statistics indicate that the Simpevarp area is a region without growth, which corresponds to the demographical statistics.

A few permits for construction of dwellings have been granted in the main drainage area since 1996. According to this, some dwelling there should have been completed within the main drainage area since 1996.

Fewer dwellings per square kilometre are built in the parish compared to the municipality and county. In the municipality and county the construction is continuous with some new dwellings annually. In the parish on the other hand, the construction is more occasional.

Geographic area	Year	One- or two	multi	Total	No. per km2
		dwellings	dwellings		and 10 <sup>6</sup> m <sup>2</sup>
Simpevarp 5	93-02			0	0
Simpevarp 6	93-02			0	0
Simpevarp 7	93-02			0	0
Simpevarp 9	93-02			0	0
Simpevarp 10	93-02			0	0
Simpevarp 13	93-02			0	0
Simpevarp 17	93-02			0	0
Simpevarp 18	1993	0	19	19	2.09
Simpevarp 18	94-02	0	0	0	0
OKG peninsula	93-02			0	0
Hålö	93-02			0	0
Ävrö	93-02			0	0
Äspö	93-02			0	0
Archipelago	93-02			0	0
coastal_north	93-02			0	0
Coastal_south	93-02			0	0

## Table 4-9. Completed dwellings in the subareas and the archipelago.

Source: Statistics Sweden

Calculated: number per unit area

Geographic area	Year	One- or two	multi	Total	No. per km2
		dwellings	dwellings		and 10 <sup>6</sup> m <sup>2</sup>
Simpevarp area	2002	0	0	0	0.00
mean value	93-02	0	1.9	1.9	0.02
standard deviation		0.0	6.0	6.0	0.1
min value		0	0	0	0.00
max value		0	19	19	0.19
Main drainage area (72/73)	2002	0	0	0	0.00
mean value	93-02	0	3.8	3.8	0.02
standard deviation		0.0	12.0	12.0	0.1
min value		0	0	0	0.00
max value		0	38	38	0.17
Misterhult församling	2002	0	0	0	0.00
mean value	93-02	1.1	3.8	4.9	0.01
standard deviation		1.9	12.0	11.8	0.0
min value		0	0	0	0.00
max value		5	38	38	0.09
Oskarshamn kommun	2002	6	6	12	0.01
mean value	93-02	6.8	35.9	42.7	0.04
standard deviation		4.3	60.3	61.7	0.1
min value		1	0	5	0.00
max value		15	180	191	0.18
Kalmar län	2002	30	206	236	0.02
mean value	93-02	73.2	227.3	300.5	0.03
standard deviation		48.8	186.9	227.6	0.0
min value		28	14	108	0.01
max value		175	666	841	0.08

### Table 4-10. Completed dwellings in the Simpevarp area and larger areas.

Source: Statistics Sweden

Calculated: mean value with standard deviation, minimum- and maximum value, number per unit area

Geographic area	Year	Dwellings	Business	Total	No. per km2
			premises		and 10 <sup>6</sup> m <sup>2</sup>
Simpevarp 5	96-02	0	0	0	0.00
Simpevarp 6	96-02	0	0	0	0.00
Simpevarp 7	96-02	0	0	0	0.00
Simpevarp 9	96-02	0	0	0	0.00
Simpevarp 10	96-02	0	0	0	0.00
Simpevarp 13	96-02	0	0	0	0.00
Simpevarp 17	96-02	0	0	0	0.00
Simpevarp 18	96-02	0	0	0	0.00
OKG peninsula <sup>1</sup>	2002	0	0	0	0
mean value	96-02	0	1.9	1.9	0.84
standard deviation		0.0	1.8	1.8	0.8
min value		0	0	0	0.00
max value		0	4	4	1.82
Hålö	96-02	0	0	0	0.00
Ävrö	96-02	0	0	0	0.00
Äspö	96-02	0	0	0	0.00
Archipelago	2002	0	3	3	0.12
mean value	96-02	0	1.3	2.3	0.1
standard deviation		1.1	1.6	2.4	0.1
min value		0	0	0	0.00
max value		3	3	6	0.24
coastal_north	96-02	0	0	0	0.00
coastal_south	96-02	0	0	0	0.00

Table 4-11. Building permits for business premises and dwellings the subareas and the archipelago.

<sup>1</sup> no statistics were delivered for subarea 9 for the years 96,01 and 02.

The number is assumed to be zero these years.

Source: Statistics Sweden

Calculated: mean value with standard deviation, minimum- and maximum value, number per unit area

Geographic area	Year	Dwellings	Business premises	Total	No. per km2 and 10 <sup>6</sup> m <sup>2</sup>
Simpevarp area	2002	0	0	0	0.00
mean value	96-02	0	2.4	2.6	0.02
standard deviation		0.0	2.4	2.6	0.0
min value		0	0	0	0.00
max value		0	6	6	0.05
Main drainage area (72/73)	2002	3	5	7	0.03
mean value	96-02	3	6	8	0.04
standard deviation		1.8	2.4	3.6	0.0
min value		0	3	5	0.02
max value		6	9	15	0.07
Misterhult församling	2002	3	5	8	0.02
mean value	96-02	4	7	12	0.03
standard deviation		2.5	3.4	5.3	0.0
min value		3	3	6	0.01
max value		10	13	20	0.05
Oskarshamn kommun	2002	17	34	51	0.05
mean value	96-02	13	34	47	0.04
standard deviation		6.2	11.4	16.3	0.0
min value		4	19	25	0.02
max value		23	52	68	0.06
Kalmar län	2002	164	163	327	0.03
mean value	96-02	133	158	291	0.03
standard deviation		23.3	18.6	25.0	0.0
min value		88	125	258	0.02
max value		164	182	327	0.03

# Table 4-12. Building permits for business premises and dwellings in the Simpevarp area and larger areas.

Source: Statistics Sweden

Calculated: mean value with standard deviation, minimum- and maximum value, number per unit area

## 4.1.4 Employment

#### Employed population

Electricity-, gas- and water supply, sewage and refuse disposal is a very dominating sector within the Simpevarp area (and the main drainage area and the parish) and it holds 83.6% of the employed day-time population (see Table 4-17). This dominance is due to Oskarshamn nuclear power plant, in subarea OKG peninsula, that has about 900 employees. If we instead look at the employed night-time population, only 15.1% works within the same sector (see Table 4-15). Consequently, there is a considerable ingoing commuting into the Simpevarp area and Simpevarp 9 (see Table 4-21). The second largest type of business among the day-time population within the Simpevarp area is health and social work. Almost all of them work within Simpevarp 18 (see Table 4-16).

Among the people living in the Simpevarp area (night-time population) mining and manufacturing is the largest type of business (24.6%), followed by health and social work (16.5%). This corresponds to the situation in the main drainage area and higher levels of resolution (see Table 4-13–Table 4-15).

When considering the number of work places within the Simpevarp area, the sector Agriculture, forestry, hunting and fishing is dominating. In the main drainage area and larger areas the number of work places is also predominant within Agriculture, forestry, hunting and fishing (see Table 4-18–Table 4-20).

The number of work places has decreased in the Simpevarp area between 1997 and 2002. That corresponds to the development in Kalmar län and Oskarshamns kommun. In Misterhult församling, on the other hand, the number of work places has increased a bit.

The net commuting is negative in all subareas except subarea OKG peninsula, where the ingoing commuting is significant. The net commuting is positive in the Simpevarp area and larger areas, except the county as a whole.

When it comes to the two most populated subareas (Simpevarp 10 and 18), the most dominating type of business among the employed night-time population is mining and manufacturing (see Table 4-13–Table 4-14). Among the employed day-time population in these two subareas, Personal and cultural activities is dominating in Simpevarp 10 while health and social work is dominating in Simpevarp 18 (Table 4-16). In Simpevarp 10 the number of work places is numerous considering the size of the day-time population (see Table 4-18). Almost <sup>3</sup>/<sub>4</sub> of the employed day-time population in the archipelago is working within education and research, all at one single work place. Half of the work places in the archipelago are within Agriculture, forestry, hunting and fishing (Table 4-19).

# Table 4-13. Employed night-time population (20–64 years), by type of business, subareas.

			1	2	3	4	5	6	7	8	9	10	11
			g, fishing		supply. al			lsiness			ties		
			stry, huntin	nufacturing	- and water fuse dispos		munication	nediation, bu	research	ial work	ultural activi	ration etc.	ty
			ulture, for	ig and ma	ricity-, gas age and re	truction	e and com	ncial interr ities	ation and	th and soc	onal and c	c administ	iown activ
Geographic area	Year	Total	Agric	Minir	Elect	Cons	Frad	-inal activ	Educ	Heal	oers	lldu	Jnkr
Simpevarp 5	2001	93	0	32	6	0	10	10	3	21	10	0	0
percentage distribution	2001		0.0%	34.4%	6.5%	0.0%	10.8%	10.8%	3.2%	22.6%	10.8%	0.0%	0.0%
mean value	97-01	86	1	25	6	2	12	7	2	20	10	0	0
standard deviation		76	1	5 20	1	2	2 10	2	2	3 16	1	0	0
max value		93	3	32	8	4	14	10	4	23	11	0	0
Simpevarp 6	2001	5	0	0	0	0	0	0	0	0	0	0	0
percentage distribution	2001		0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	5	1	0	0	0	0	0	0	1	0	0	0
standard deviation		1	2	0	0	0	0	0	0	1	0	0	0
min value		5	0	0	0	0	0	0	0	0	0	0	0
Simpeyarp 7	2001	4	0	0	0	0	0	3	0	0	0	0	0
percentage distribution	2001	-	0.0%	0.0%	0.0%	0.0%	0.0%	75.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	4	0	0	1	0	0	1	0	0	0	0	0
standard deviation		1	0	0	2	0	0	2	0	0	0	0	0
min value		3	0	0	0	0	0	0	0	0	0	0	0
max value Simpeyaro 9	2001	4	0	0	3	0	0	3	0	0	0	0	0
percentage distribution	2001	0	0.0%	0.0%	37.5%	0.0%	37.5%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	8	0	0	4	0	1	0	0	0	0	0	0
standard deviation		1	0	0	1	0	1	0	0	0	0	0	0
min value		7	0	0	3	0	0	0	0	0	0	0	0
max value	0004	9	0	0	5	0	3	0	0	0	0	0	0
Simpevarp 10	2001	70	0 8.6%	9 12.9%	ە 8.6%	15 7%	8 11.4%	5 7 1%	8 11.4%	17 1%	3 4.3%	0.0%	3 43%
mean value	97-01	76	7	14	8	.0.1 /0	10	4	7	11		1	
standard deviation		6	1	4	2	2	2	1	2	1	2	2	2
min value		70	6	9	6	7	8	3	5	9	0	0	0
max value		84	9	18	10	11	12	5	9	12	3	3	4
Simpevarp 13	2001	0	0	0	0	0	0	0	0	0	0	0	0
standard deviation	97-01	1	0	0	0	0	0	0	0	0	0	0	0
min value		0	0	0	0	0	0	0	0	0	0	0	0
max value		3	0	0	0	0	0	0	0	0	0	0	0
Simpevarp 17	2001	20	3	3	4	0	4	3	3	3	0	0	0
percentage distribution	2001		15.0%	15.0%	20.0%	0.0%	20.0%	15.0%	15.0%	15.0%	0.0%	0.0%	0.0%
mean value	97-01	19	4	2	4	1	1	2	1	4	0	0	0
min value		17	3	2	4	0	2	2	0	3	0	0	0
max value		22	5	4	5	3	4	3	3	5	0	0	0
Simpevarp 18	2001	172	3	43	37	12	23	12	9	23	6	5	0
percentage distribution	2001		1.7%	25.0%	21.5%	7.0%	13.4%	7.0%	5.2%	13.4%	3.5%	2.9%	0.0%
mean value	97-01	178	1	44	41	13	21	10	11	23	7	7	0
min value		0 170	0	12	с 36	د 11	ۍ 18	2	۱ ۵	21	2	2	0
max value		188	3	46	47	18	24	12	12	27	9	9	0
OKG, Hålö, Ävrö, Äspö	97-01	0											-
Coastal north	2001	14	0	4	3	0	3	3	0	4	0	0	0
percentage distribution	2001		0.0%	28.6%	21.4%	0.0%	21.4%	21.4%	0.0%	28.6%	0.0%	0.0%	0.0%
mean value	97-01	14	0	5	2	0	1	3	0	3	0	0	0
standard deviation		2	0	1	2	0	2	0	0	2	0	0	0
min value		12	0	4	0	0	0	3	0	0	0	0	0
max value		16	0	7	3	0	3	3	0	4	0	0	0
Coastal_south	2001	10	0	3	0	0	3	3	0	0	0	0	0
percentage distribution	2001		0.0%	30.0%	0.0%	0.0%	30.0%	30.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	8	0	1	1	0	3	3	0	0	0	0	0
standard deviation		2	0	2	2	0	0	0	0	0	0	0	0
min value		6	0	0	0	0	3	3	0	0	0	0	0
max value		10	0	3	3	0	3	3	0	0	0	0	0

Source: Statistics Sweden, Registerbaserad arbetsmarknadsstatistik,

according to SE-SIC Swedish Standard Industrial Classification, coarse classification

Calculated: mean value with standrad deviation, minimum- and maximum value, percentage distribution of the type of busines s

# Table 4-14. Employed night-time population (20–64 years), by type of business, the archipelago.

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Archipelago	2001	49	3	7	5	3	9	3	7	10	0	0	0
percentage distribution	2001		6.1%	14.3%	10.2%	6.1%	18.4%	6.1%	14.3%	20.4%	0.0%	0.0%	0.0%
mean value	97-01	51	4	9	6	3	5	4	7	8	0	0	2
standard deviation		3	1	2	1	0	2	1	1	2	0	0	1
min value		48	3	7	5	3	4	3	5	7	0	0	0
max value		55	5	12	7	3	9	6	8	10	0	0	3

Source: Statistics Sweden, Registerbaserad arbetsmarknadsstatistik,

according to SE-SIC Swedish Standard Industrial Classification, coarse classification

Calculated: mean value with standrad deviation, minimum- and maximum value, percentage distribution of the type of business

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Simpevarp area	2001	395	12	97	54	29	52	35	23	65	18	7	3
percentage distribution	2001		3.0%	24.6%	13.7%	7.3%	13.2%	8.9%	5.8%	16.5%	4.6%	1.8%	0.8%
mean value	97-01	399	14	97	62	29	52	27	23	62	18	10	5
standard deviation		11	3	4	9	1	2	5	3	3	3	2	2
min value		388	11	90	52	27	50	21	18	59	15	7	3
max value		418	19	100	72	30	56	35	25	65	21	13	9
Main drainage area (72/73)	2001	984	24	238	128	76	129	81	51	181	45	22	9
percentage distribution	2001		2.4%	24.2%	13.0%	7.7%	13.1%	8.2%	5.2%	18.4%	4.6%	2.2%	0.9%
mean value	97-01	998	28	240	152	74	127	72	47	179	41	24	14
standard deviation		21	6	12	20	2	5	7	4	4	5	3	4
min value		972	23	220	128	71	123	66	41	174	33	21	9
max value		1025	36	251	173	76	135	81	51	185	45	28	20
Misterhult församling	2001	1217	52	294	142	89	156	94	68	229	51	31	11
percentage distribution	2001		4.3%	24.2%	11.7%	7.3%	12.8%	7.7%	5.6%	18.8%	4.2%	2.5%	0.9%
mean value	97-01	1220	54	290	165	89	153	87	62	223	48	32	19
standard deviation		18	4	12	20	2	7	6	5	5	4	3	5
min value		1196	50	269	142	86	147	80	53	217	42	29	11
max value	0001	1243	59	297	186	90	163	94	68	229	51	35	24
Oskarsnamn kommun	2001	12029	184	3327	802	740	1537	933	821	2596	551	435	97
percentage distribution	2001	14070	1.5%	21.1%	6.7%	0.2%	12.8%	7.8%	0.8%	21.6%	4.6%	3.6%	0.8%
mean value	97-01	11879	194	3298	882	725	1561	881	784	2474	545	426	110
standard deviation		134	9	08	66	13	31	39	40	78	12	10	11
min value		11/13	184	3173	802	710	1525	826	/1/	2418	527	414	97
max value	2001	12029	205	3391	949	746	1602	933	821	2596	556	435	128
	2001	101591	2 00/	20209	1 60/	5 40/	14 00/	7 0%	0401	21002	5 402	4291	1410
percentage distribution	2001	00547	3.0%	20.9%	1.0%	5.4%	14.9%	7.9%	0.3%	21.2%	5.4%	4.2%	1.4%
standard deviation	97-01	99047 1668	১৬/ 9 133	20304 352	1009	0230 183	1010/ 241	1313 597	1011	20150	0∠00 147	4104 71	107
min value		97349	3824	25919	1631	5048	14756	6541	7229	20390	5101	4113	1418
max value		101591	4148	26902	1774	5525	15342	8060	8451	21502	5482	4297	1878

## Table 4-15. Employed night-time population (20–64 years), by type of business in the Simpevarp area and larger areas.

Source: Statistics Sweden, Registerbaserad arbetsmarknadsstatistik,

according to SE-SIC Swedish Standard Industrial Classification, coarse classification

Calculated: mean value with standrad deviation, minimum- and maximum value, percentage distribution of the type of business

# Table 4-16. Employed day-time population (20–64 years), by type of business the subareas and the archipelago.

			1 D	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishin	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Simpevarp 5	2001	29	0	0	0	0	5	0	8	6	10	0	0
percentage distribution	2001		0.0%	0.0%	0.0%	0.0%	17.2%	0.0%	27.6%	20.7%	34.5%	0.0%	0.0%
mean value	97-01	27	3	1	0	0	4	2	6	7	2	0	0
standard deviation	0. 0.		5	. 3	0	0	1	-	2	. 1	-	0	0
min value		10	0	0	0	0	2	-	4	6	-	0	0
min value		10	0	0	0	0	-	0	4	0	0	0	0
max value	0004	35	9	/	0	0	5	8	8	8	10	0	0
Ssimpevarp 6	2001	0	0	0	0	0	0	0	0	0	0	0	0
mean value	97-01	1	1	0	0	0	0	0	0	0	0	0	0
standard deviation		2	2	0	0	0	0	0	0	0	0	0	0
min value		0	0	0	0	0	0	0	0	0	0	0	0
max value		3	3	0	0	0	0	0	0	0	0	0	0
Simpevarp 7*	97-01	0	0	0	0	0	0	0	0	0	0	0	0
Simnevarn 9*	97-01	0	0	0	0	0	0	0	0	0	0	0	0
Simpevarp 0	2001	31	24	0	0	3	3	0	0	0	0	0	0
porcontage distribution	2001	01	77 /0/	0.0%	0.0%	0.7%	0.7%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
,	2001		11.4%	0.0%	0.0%	9.1%	9.1%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	18	12	0	0	2	3	0	0	0	0	0	1
standard deviation		11	9	0	0	2	1	0	0	0	0	0	1
min value		9	4	0	0	0	3	0	0	0	0	0	0
max value		31	24	0	0	5	4	0	0	0	0	0	3
Simpevarp 13*	97-01	0	0	0	0	0	0	0	0	0	0	0	0
Simpevarp 17	2001	3	3	0	0	0	0	0	0	0	0	0	0
percentage distribution	2001		100.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
moon value	07.01	3	3	0.0 /0	0.070	0.070	0.070	0.070	0.070	0.070	0.0 /0	0.070	0.070
	57-01	3	J	0	0	0	0	0	0	0	0	0	0
standard deviation		1	1	0	0	0	0	0	0	0	0	0	0
min value		3	3	0	0	0	0	0	0	0	0	0	0
max value		4	4	0	0	0	0	0	0	0	0	0	0
Simpevarp 18	2001	137	0	0	0	3	15	4	0	112	3	0	0
percentage distribution	2001		0.0%	0.0%	0.0%	2.2%	10.9%	2.9%	0.0%	81.8%	2.2%	0.0%	0.0%
mean value	97-01	111	0	0	0	1	9	3	0	91	6	0	0
standard deviation		22	0	0	0	2	7	1	0	16	2	0	0
min value		87	0	0	0	0	0	3	0	75	3	0	0
max value		127	0	0	0	2	15	1	0	110	0	0	0
	2001	905	0	0	905		15	4	0	112	9	0	
	2001	695	0	0	400.00/	0	0	0	0	0	0	0	0
percentage distribution	2001		0.0%	0.0%	100.0%	U.U%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	1007	0	0	1007	0	0	0	0	0	0	0	0
standard deviation		81	0	0	81	0	0	0	0	0	0	0	0
min value		895	0	0	895	0	0	0	0	0	0	0	0
max value		1087	0	0	1087	0	0	0	0	0	0	0	0
Hålö	97-01	0											
Ävrö	97-01	0											
Äsnö	97-01	0											
Archinolago	2001	57	3	0	0	0	3	0	12	0	10	0	0
norcontago distribution	2001	51	5 20/	0.00/	0.00/	0.00/	5 20/	0.00/	73 70/	0.00/	17 50/	0.00/	0.0%
,	2001		5.5%	0.0%	0.0%	0.0%	5.5%	0.0%	13.1%	0.0%	17.5%	0.0%	0.0%
mean value	97-01	35	3	0	0	0	1	0	28	0	4	0	0
standard deviation		21	0	0	0	0	1	0	17	0	4	0	0
min value		3	3	0	0	0	0	0	0	0	0	0	0
max value		57	3	0	0	0	3	0	42	0	10	0	0
Coastal_north	2001	4	0	4	0	0	0	0	0	0	0	0	0
percentage distribution	2001		0.0%	100.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-01	۵	1	2	0	0	0	0	0	0	0	0	0
standard doviation	01-01	7		2	0	0	0	0	0	0	0	~	0
		3	3	2	0	0	0	Ű	0	0	0	0	0
min value		0	U	0	0	0	U	U	U	U	0	0	U
max value		8	7	4	0	0	0	0	0	0	0	0	0
Coastal_south*	97-01	0	0	0	0	0	0	0	0	0	0	0	0

\* a "false zero" hiding a one

Source: Statistics Sweden, Registerbaserad arbetsmarknadsstatistik, 20-64 years of age

according to SE-SIC Swedish Standard Industrial Classification, coarse classification

Calculated: mean value with standard deviation, minimum- and maximum value, percentage distribution of the type of business

## Table 4-17. Employed day-time population (20–64 years), by type of business in the Simpevarp area and larger areas.

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Simpevarp area	2001	1071	27	5	895	5	26	4	14	84	11	0	0
percentage distribution	2001		2.5%	0.5%	83.6%	0.5%	2.4%	0.4%	1.3%	7.8%	1.0%	0.0%	0.0%
mean value	97-01	1137	22	5	1007	3	17	5	8	64	6	0	1
standard deviation		47	4	3	81	3	8	4	4	15	3	0	1
min value		1071	18	3	895	0	8	3	4	50	3	0	0
max value		1182	27	10	1087	5	26	12	14	84	11	0	3
Main drainage area (72/73)	2001	1422	35	185	895	24	48	7	26	160	38	0	4
percentage distribution	2001		2.5%	13.0%	62.9%	1.7%	3.4%	0.5%	1.8%	11.3%	2.7%	0.0%	0.3%
mean value	97-01	1485	30	175	1007	25	46	10	28	141	18	0	5
standard deviation		45	4	8	81	2	8	4	2	15	12	0	2
min value		1422	24	163	895	21	36	7	25	126	7	0	4
max value		1524	35	185	1087	27	55	17	30	160	38	0	8
Misterhult församling	2001	1494	45	190	895	27	54	11	68	162	38	0	4
percentage distribution	2001		3.0%	12.7%	59.9%	1.8%	3.6%	0.7%	4.6%	10.8%	2.5%	0.0%	0.3%
mean value	97-01	1540	40	177	1007	26	51	16	56	144	18	0	6
standard deviation		33	5	10	81	3	8	4	15	13	12	0	2
min value		1494	32	164	895	21	40	11	30	130	7	0	4
max value		1578	45	190	1087	30	59	20	68	162	38	0	8
Oskarshamn kommun	2001	13043	144	3783	987	805	1555	1003	860	2807	549	456	94
percentage distribution	2001		1.1%	29.0%	7.6%	6.2%	11.9%	7.7%	6.6%	21.5%	4.2%	3.5%	0.7%
mean value	97-01	12936	153	3779	1080	781	1623	947	820	2657	547	445	104
standard deviation		97	11	101	72	23	70	32	47	91	16	10	9
min value		12809	144	3617	987	744	1555	922	744	2579	521	432	94
max value		13043	165	3895	1154	805	1740	1003	860	2807	562	456	119
Kalmar län	2001	99878	3810	26518	1634	5281	14248	7627	8438	21431	5438	4055	1398
percentage distribution	2001		3.8%	26.6%	1.6%	5.3%	14.3%	7.6%	8.4%	21.5%	5.4%	4.1%	1.4%
mean value	97-01	97682	3968	26527	1700	5115	14212	6817	7853	20634	5244	3929	1683
standard deviation		1659	131	362	53	117	265	561	507	487	126	76	190
min value max value		95871 99878	3810 4145	26062 27078	1634 1767	4982 5281	13785 14500	6236 7627	7195 8438	20263 21431	5101 5438	3862 4055	1398

\* Subarea 3, 4 and 6 were delivered with zeros, indicating that it is one employee in reality (false zero).

Source: Statistics Sweden, Registerbaserad arbetsmarknadsstatistik,

according to SE-SIC Swedish Standard Industrial Classification, coarse classification

Calculated: mean value with SD, minimum- and maximum value, percentage distribution of the type of business

#### Table 4-18. Work places by type of business, Simpevarp subareas.

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Simpevarp 5	2002	14	3	0	0	0	4	0	0	3	0	0	0
percentage distribution	2002		21.4%	0.0%	0.0%	0.0%	28.6%	0.0%	0.0%	21.4%	0.0%	0.0%	0.0%
mean value	97-02	13	4	0	0	0	3	1	0	3	0	0	0
standard deviation		1	1	0	0	0	1	2	0	0	0	0	0
min value		12	3	0	0	0	3	0	0	3	0	0	0
max value	0000	14	4	0	0	0	4	3	0	3	0	0	0
Simpevarp 6	2002	3	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
percentage distribution	2002	2	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
standard deviation	97-02	0	1	0	0	0	0	0	0	0	0	0	0
		3	0	0	0	0	0	0	0	0	0	0	0
max value		3	3	0	0	0	0	0	0	0	0	0	0
Simpeyarp 7	2002	3	0	0	0	0	0	0	0	0	0	0	0
percentage distribution	2002		0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-02	3	1	0	0	0	0	0	0	0	0	0	0
standard deviation		0	1	0	0	0	0	0	0	0	0	0	0
min value		3	0	0	0	0	0	0	0	0	0	0	0
max value		3	3	0	0	0	0	0	0	0	0	0	0
Simpevarp 9	2002	4	3	0	0	0	0	0	0	0	0	0	0
percentage distribution	2002		75.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-02	5	3	0	0	0	0	0	0	0	0	0	2
standard deviation		1	0	0	0	0	0	0	0	0	0	0	2
min value		4	3	0	0	0	0	0	0	0	0	0	0
max value		7	4	0	0	0	0	0	0	0	0	0	3
Simpevarp 10	2002	20	12	0	0	3	3	0	0	0	0	0	3
percentage distribution	2002	20	60.0%	0.0%	0.0%	15.0%	15.0%	0.0%	0.0%	0.0%	0.0%	0.0%	15.0%
standard doviation	97-02	20	12	0	0	1	ى 1	0	0	0	1	0	4
		7	4	0	0	0	0	0	0	0	0	0	3
max value		27	16	0	0	3	3	0	0	0	3	0	5
Simpeyarp 13	97-02	0	10	0	0	0	0	0	0	0	0	0	
Simpevarp 17	2002	12	7	0	0	0	0	3	0	0	0	0	0
percentage distribution	2002		58.3%	0.0%	0.0%	0.0%	0.0%	25.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-02	9	8	0	0	0	0	1	0	0	0	0	0
standard deviation		2	1	0	0	0	0	1	0	0	0	0	0
min value		7	7	0	0	0	0	0	0	0	0	0	0
max value		12	10	0	0	0	0	3	0	0	0	0	0
Simpevarp 18	2002	25	4	0	0	0	3	3	0	6	3	0	7
percentage distribution	2002		16.0%	0.0%	0.0%	0.0%	12.0%	12.0%	0.0%	24.0%	12.0%	0.0%	28.0%
mean value	97-02	24	1	3	0	0	3	3	0	7	4	0	5
standard deviation		3	2	1	0	0	0	1	0	1	1	0	2
min value		20	0	0	0	0	3	0	0	6	3	0	3
max value	07.00	28	4	3	0	0	3	3	0	8	5	0	/
OKG, Halo, Avro, Aspo	97-02	0	2	2	0	0	0	0	0	0	0	0	0
Coastal_nonin	2002	0	50.0%	50.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-02	10	50.0 %	30.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %	0.0 %
standard deviation	57-02	3	2	0 0	0	n n	2	0	n N	n	n	n	2
min value		6	- 3	3	0	0	0	0	0	0	0	0	-
max value		13	8	3	0	0	3	0	0	0	0	0	3
Coastal_south	2002	4	3	0	0	0	0	0	0	0	0	0	0
percentage distribution	2002		75.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97-02	3	3	0	0	0	0	0	0	0	0	0	0
standard deviation		1	0	0	0	0	0	0	0	0	0	0	0
min value		3	3	0	0	0	0	0	0	0	0	0	0
max value		4	3	0	0	0	0	0	0	0	0	0	0

Source: Statistics Sweden; Företagsdatabasen (FDB), according to SE-SIC Swedish Standard Industrial Classification, coarse classification Calculated: mean values with standard deviation, minimum- and maximum values, percentage distribution of the type of business

#### Table 4-19. Work places by type of business, archipelago.

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Archipelago	2002	22	11	0	0	3	0	3	0	0	0	0	3
percentage distribution	2002		50.0%	0.0%	0.0%	13.6%	0.0%	13.6%	0.0%	0.0%	0.0%	0.0%	13.6%
mean value	97-02	19	11	0	0	3	0	1	0	0	0	0	3
standard deviation		2	1	0	0	0	0	1	0	0	0	0	C
min value		17	10	0	0	3	0	0	0	0	0	0	3
max value		22	12	0	0	3	0	3	0	0	0	0	3

Source: Statistics Sweden; Företagsdatabasen (FDB), according to SE-SIC Swedish Standard Industrial Classification, coarse classification Calculated: mean values with standard deviation, minimum- and maximum values, percentage distribution of the type of busines s

#### Table 4-20. Work places by type of business, the Simpevarp area and larger areas.

			1	2	3	4	5	6	7	8	9	10	11
Geographic area	Year	Total	Agriculture, forestry, hunting, fishing	Mining and manufacturing	Electricity-, gas- and water supply. Sewage and refuse disposal	Construction	Trade and communication	Financial intermediation, business activities	Education and research	Health and social work	Personal and cultural activities	Public administration etc.	Unknown activity
Simpevarp area	2002	87	36	4	3	3	10	6	0	8	4	0	14
percentage distribution	2002		41.4%	4.6%	3.4%	3.4%	11.5%	6.9%	0.0%	9.2%	4.6%	0.0%	16.1%
mean value	97-02	90	39	4	2	1	11	4	0	9	5	0	14
standard deviation		5	4	1	2	2	2	1	0	1	1	0	1
min value		85	35	4	0	0	8	3	0	8	4	0	13
max value		97	45	5	3	3	13	6	0	10	7	0	16
Main drainage area	2002	176	65	8	3	7	24	15	3	15	11	0	28
percentage distribution	2002		36.9%	4.5%	1.7%	4.0%	13.6%	8.5%	1.7%	8.5%	6.3%	0.0%	15.9%
mean value	97-02	180	65	11	2	6	26	14	3	16	11	0	29
standard deviation		7	3	2	2	1	2	2	0	2	2	0	2
min value		172	62	8	0	4	24	13	3	15	8	0	27
max value		189	70	13	3	7	29	18	4	19	14	0	33
Misterhult församling	2002	263	105	14	0	12	31	24	3	16	16	0	41
percentage distribution	2002		39.9%	5.3%	0.0%	4.6%	11.8%	9.1%	1.1%	6.1%	6.1%	0.0%	15.6%
mean value	97-02	253	100	16	0	9	31	19	3	17	14	0	43
standard deviation		12	4	2	0	1	3	3	0	2	2	0	4
min value		236	94	14	0	8	27	16	3	15	11	0	40
max value		269	105	19	0	12	35	24	4	20	17	0	49
Oskarshamn kommun	2002	2237	493	116	14	142	368	373	45	107	254	18	307
percentage distribution	2002		22.0%	5.2%	0.6%	6.3%	16.5%	16.7%	2.0%	4.8%	11.4%	0.8%	13.7%
mean value	97-02	2337	540	125	13	138	385	340	39	120	243	18	377
standard deviation		58	35	5	1	3	16	31	4	6	9	1	42
min value		2237	493	116	12	134	368	299	35	107	231	18	307
max value		2404	582	130	14	142	406	373	45	123	254	19	420
Kalmar län	2002	25229	6979	1635	132	1418	3957	3511	465	1133	2646	145	3208
percentage distribution	2002		27.7%	6.5%	0.5%	5.6%	15.7%	13.9%	1.8%	4.5%	10.5%	0.6%	12.7%
mean value	97-02	25558	7086	1602	142	1354	4027	3090	432	1089	2399	163	4175
standard deviation		365	283	29	6	47	72	285	37	47	183	9	616
min value		25229	6794	1557	132	1305	3957	2752	380	1027	2168	145	3208
max value		26223	7482	1635	148	1418	4150	3511	474	1136	2646	171	4886

Source: Statistics Sweden; Företagsdatabasen (FDB), according to SE-SIC Swedish Standard Industrial Classification, coarse classification Calculated: mean values with standard deviation, minimum- and maximum values, percentage distribution of the type of busines s

Geographic area	Number of persons						
	Outgoing-	Ingoing-	Net				
	commuting	commuting	commuting				
Simpevarp 5	65	17	-48				
Simpevarp 6	3	0	-3				
Simpevarp 7	3	0	-3				
Simpevarp 9	6	0	-6				
Simpevarp 10	48	19	-29				
Simpevarp 13	0	0	0				
Simpevarp 17	17	0	-17				
Simpevarp 18	139	118	-21				
OKG peninsula	0	895	895				
Hålö	0	0	0				
Ävrö	0	0	0				
Äspö	0	0	0				
Coastal_north	13	3	-10				
Coastal_south	9	0	-9				
Archipelago	42	50	8				
Simpevarp area	287	963	676				
Main drainage area (72/73)	436	1017	581				
Misterhult församling	538	1002	464				
Oskarshamn kommur	n 1 283	2 408	1125				
Kalmar län	20 259	18 485	-1774				

#### Table 4-21. Commuting.

Source: Commuting 2001 (20-64 years), Statistics Sweden,

Registerbaserad arbetsmarknadsstatistik

Calculated: the net commuting

#### Non-employed population

Out of the total population within the Simpevarp area, 11.9% were non-employed in 2001, which is comparable with Oskarshamns kommun and Kalmar län (see Table 4-23). The reason for non employment differs though. A larger amount in the Simpevarp area was early retired and non-employed of "other" reasons. The number of unemployed was lower and the number of students was considerably lower. Among the subareas within the Simpevarp area the non employment is highest in coastal area south (in 2001) (see Table 4-22). The percentage of non-employed inhabitants has decreased since 1997, in the Simpevarp area as well as the larger areas (see Figure 4-6).

Geographic area	Year	Inhabitants	Percent non	Total	Studying	Un-	Military	Early-	Other
		0-100 y	employed of			employed	service	retirement	
			the inhabitants						
Simpevarp 5	2001	241	8.7%	21	3	5	0	6	8
distribution	2001				14.3%	23.8%	0.0%	28.6%	38.1%
mean value	97-01	241	13.0%	31	4	7	0	8	12
standard deviation		13		6	1	2	0	2	3
min value		221	8.7%	21	3	5	0	6	8
max value		257	15.8%	35	5	9	0	10	15
Simpeyarp 6	2001	12	25.0%	3	0	0	0	3	0
distribution	2001				0.0%	0.0%	0.0%	100.0%	0.0%
mean value	97-01	13	22.9%	3	0	0	0	1	0
standard deviation	0. 0.		22.070	0	0	0	0	2	0
min value		12	21.4%	3	0	0	0	0	0
max value		14	25.0%	3	0	0	0	3	0
Simpeyarn 7	2001	5	0.0%	0	0	0	0	0	0
distribution	2001	0	0.070	Ũ	0.0%	0.0%	0.0%	0.0%	0.0%
mean value	97_01	6	30.0%	2	0.070	0.0 /0	0.0 /0	0.070	0.070
standard deviation	57 01	0	00.070	2	0	0	0	0	2
min value		5	0.0%	0	0	0	0	0	2
max value		6	50.0%	3	0	0	0	0	3
Simpoyorn 0	1007	10	15 99/	2	0	0	0	0	3
Simpevarp 9	1997	19	13.6%	3	0	0	0	0	3
Simpevarp 9	98-01		0.0%	0	0	0	0	0	0
Simpevarp 10	2001	155	14.8%	23	5	0	0	9	8
distribution	2001				21.7%	0.0%	0.0%	39.1%	34.8%
mean value	97-01	163	13.2%	21	2	1	0	8	9
standard deviation		7		2	2	2	0	2	1
min value		155	11.0%	19	0	0	0	5	7
max value		172	14.8%	23	5	4	0	10	10
Simpevarp 13	97-01		0.0%	0	0	0	0	0	0
Simpevarp 17	2001	49	10.2%	5	0	3	0	0	3
distribution	2001				0.0%	60.0%	0.0%	0.0%	60.0%
standard deviation		2		2	2	2	0	0	2
min value		44	11.4%	5	0	0	0	0	0
max value		49	17.4%	8	3	3	0	0	5
Simpevarp 18	2001	430	13.0%	56	7	7	0	15	26
distribution	2001				12.5%	12.5%	0.0%	26.8%	46.4%
mean value	97-01	444	11.2%	50	7	6	0	18	19
standard deviation		10		3	1	1	0	4	6
min value		430	10.6%	48	7	4	0	11	15
max value		453	13.0%	56	8	7	0	20	26
OKG peninsula	97-01	0		0					
Hålö	97-01	0		0					
Ävrö	97-01	0		0					
Äspö	97-01	0		0					
Archipelago	2001	126	15.1%	19	3	0	0	5	10
distribution	2001				15.8%	0.0%	0.0%	26.3%	52.6%
mean value	97-01	130	13.3%	17	2	3	0	4	9
standard deviation		6		2	2	2	0	1	1
min value		125	10.9%	15	0	0	0	4	7
max value		138	15.2%	19	3	4	0	5	10
Coastal_north	2001	29	13.8%	4	0	0	0	3	0
distribution	2001				0.0%	0.0%	0.0%	75.0%	0.0%
mean value	97-01	32	6.6%	2	0	0	0	1	1
standard deviation		3		2	0	0	0	2	2
min value		29	0.0%	0	0	0	0	0	0
max value		37	13.8%	4	0	0	0	3	3
Coastal_south	2001	21	33.3%	7	0	0	0	3	4
distribution	2001				0.0%	0.0%	0.0%	42.9%	57.1%
mean value	97-01	18	28.8%	5	0	0	0	2	3
standard deviation		2		2	0	0	0	2	2
min value		16	17.6%	3	0	0	0	0	0
max value		21	37.5%	7	0	0	0	3	4

#### Table 4-22. Non-employed population, Simpevarp subareas and the archipelago.

Source: Non-working population (20-64 y), by activity, Statistics Sweden, Registerbaserad arbetsmarknadsstatistik

Calculated: Percent non employed of the total population, mean value with standard deviation, minimum- and maximum value, percentage distribution of the types of categories.

Geographic area	Year	Inhabitants	Percent non-	Total	Studying	Un-	Military	Early-	Other
		0-100 y	working of			employed	service	retirement	
			the inhabitants						
Simpevarp area	2001	954	11.9%	114	12	15	0	40	46
distribution	2001				10.5%	13.2%	0.0%	35.1%	40.4%
mean value	97-01	976	12.3%	120	13	18	1	40	47
standard deviation		15		8	2	4	2	5	10
min value		954	11.2%	111	12	12	0	33	37
max value		988	13.3%	129	17	21	3	44	60
Main drainage area									
(72/73)	2001	2 202	11.0%	243	33	35	0	75	99
distribution	2001				13.6%	14.4%	0.0%	30.9%	40.7%
mean value	97-01	2 271	11.7%	266	35	48	2	80	100
standard deviation		48		18	3	10	3	8	7
min value		2 202	11.0%	243	33	32	0	67	94
max value		2 316	12.5%	282	39	52	6	85	109
Misterhult församling	2001	2 745	11.1%	306	44	37	0	92	132
distribution	2001				14.4%	12.1%	0.0%	30.1%	43.1%
mean value	97-01	2 817	11.6%	328	45	60	2	98	123
standard deviation		50		20	2	17	3	9	7
min value		2 745	11.0%	305	44	37	0	83	117
max value		2 864	12.4%	347	48	72	6	103	132
Oskarshamn kommun	2001	26 213	11.6%	3051	559	492	11	907	1082
distribution	2001				18.3%	16.1%	0.4%	29.7%	35.5%
mean value	97-01	26 568	12.7%	3 371	630	730	24	966	1 021
standard deviation		239		213	39	146	10	64	47
min value		26 213	11.6%	3 051	559	492	11	897	969
max value		26 769	13.0%	3 487	647	800	31	1 020	1 082
Kalmar län	2001	234 697	12.7%	29906	6757	4733	139	7011	11266
distribution	2001				22.6%	15.8%	0.5%	23.4%	37.7%
mean value	97-01	236 971	13.9%	32 837	7 302	7 419	248	7 571	10 298
standard deviation		1 486		1 885	484	1 589	67	594	763
min value		234 697	12.7%	29 906	6 757	4 733	139	6 881	9 707
max value		238 104	14.3%	34 002	7 789	8 172	279	7 983	11 266

#### Table 4-23. Non-employed population, the Simpevarp area and larger areas.

Source: Non-working population (20-64 y), by activity, Statistics Sweden, Registerbaserad arbetsmarknadsstatistik Calculated: Percent non employed of the total population, mean value with standard deviation, minimum- and maximum value, percentage distribution of the types of categories.



Figure 4-6. The percentage of non- employed inhabitants of the total population.

## 4.2 Human activities

### 4.2.1 Land use

The land use within the Simpevarp area differs evidently from the average land use in Kalmar län (see Table 4-24). The forest area is far more dominating in the Simpevarp area than in Kalmar län. The amount of arable land and other land types are considerably lower in the Simpevarp area.

Table 4-24.	Land use	in Kalmar	lan and	the Simpeva	arp area.

Type of land use	Kalmar län		Simpevarp area			
	Area	Percentage	Percentage			
	(hectares)	distribution	Area (hectares)	distribution		
Arable land	134878	11.6%	556.00	4.4%		
Grazing land	53007	4.5%	465.0	3.7%		
Forest	728 605	62.5%	11 251.0	88.5%		
Developed	18 551	1.6%	125.0	1.0%		
Water	49 470	4.2%	268.0	2.1%		
Other (wetlands bare						
rocks, pites etc.)	182 049	15.6%	41.0	0.3%		
Total	1 166 560	100.0%	12 706	100.0%		

Source: Land area for Kalmar län from the report Markanvändningen i Sverige (SCB, 1998), table B24.

Calculated: Land area for Simpevarp area from Vegetation Classification (Boresjö-Bronge and Wester, 2003)

## 4.2.2 Forestry

The amount of wood extracted from the model area during the past 10 years was calculated based on data from the forestry management plan /AssiDomän, 1999/ as described above. This resulted in an average amount of app 75 m3 sk/ha/yr. For a more detailed description of the forests of the area, see /Kyläkorpi, 2004/.

## 4.2.3 Agriculture

#### Agricultural Activities in the Simpevarp Area

There are farms in Simpevarp 10, 17 and 18 and in the Northern and Southern coastal areas, (see Table 4-25). It is also known that there are farms and therefore some agricultural production in Simpevarp 5, 6 and 9 but SCB cannot deliver data specifically for these areas since individual farms would then be identifiable. As the statistics for the whole area are known, estimates for areas 5, 6, and 9 have been produced by subtracting the data for 10, 17 and 18 from the data for the whole Simpevarp area.

The archipelago has not been included in the Simpevarp area. According to SCB there are too few farms in the area so that no statistics can be shown. SCB has delivered some statistics on livestock (sheep) in the area in 1995 but no conclusions can be made based on this data.

The total amount of farmland and the number of farms has decreased in Simpevarp in 1995–1999 (see Table 4-26). The number of farms has decreased by 7% (from 29 to 27) but at the same time the number of very large farms (over 100 ha) has increased from 0 to 1. A more interesting indicator is however that the amount of arable land that has increased

in the Simpevarp area in total but particularly in areas 10 and 17. This can been seen as an indicator of unused agricultural potential within the area. The time series is very short, however, and therefore no definite conclusions on trends can not been drawn based on this material. The amount of arable area can be appreciated by two different methods, though; namely by looking at the statistics from SCB and also studying satellite data /Boresjö-Bronge and Wester, 2003/ (see Figure 4-7). These methods produce different results, it becomes evident that calculations on this paper are based on statistics from SCB and they show what has been cultivated in the area in 1990–1999 but studies on what could be grown in the area should be based on data acquired through satellite mapping on potential arable land.

As the data on agriculture was available only for 1995 and 1999, the average of these two numbers or the short period of five years does not necessarily give a general picture of the recent development of agriculture in the Simpevarp area. Since statistics from 1995 and 1999 are also rather old, this information need to be supplemented as soon as new results for due to total registration of all farms in Sweden in 2003 are available through SCB.

Some general trends can be identified, however, when the local (the parish and municipality) and regional (the county) variables are studied more closely. Farms become fewer in number and larger in size regionally and locally. The number of farms decreases in almost all size classes except for the large ones. The total amount of farmland (arable land, grazing land, forest and other farm land) decreases in size, particularly the amount of arable land, while the land classified as grazing land increases. This phenomenon would be even more obvious if all land classified as arable land but not actively cultivated was included in the Farm Register's category 'grazing land'.

The Simpevarp area with its nearly 30 farms (29 in 1995 and 27 in 1999) is special in a few respects, though. The number of farms is rather stable and the amount of arable land has even increased in area 10 and 17. That is rather exceptional as both of these variables decrease in size and number locally and regionally. There seems to be some unexploited agricultural production potential in Simpevarp that is worth to take into more active use even in times when arable area decreases elsewhere. The arable land ratio (the arable land divided by total land area) is 6% in Simpevarp, which is somewhat higher than the average (4%) in the municipality of Oskarshamn. This number is relatively low, though, when compared to the arable land ratio in the county where it is almost 12%.

When looking at Simpevarp more closely, some farms can be found in the Simpevarp 1, 2, 4 and the coastal area in the South, but more significantly they are found in Simpevarp 5, 7, 8 and in the coastal area in the North. As much as one third of the farms are located within the Simpevarp 10 that is also the largest one. The arable area has increased by 23% in Simpevarp 10 in 1995–99 and by 12% in Simpevarp 7. This is rather unusual when compared with the local and regional development.

The production results, given as kg/m<sup>2</sup>, should be viewed with a critical eye. The estimates for the yearly yields (kg) in the Simpevarp area leave some space for speculation since the average arable area has been used in calculations and since the standard yield estimates for several crops were available only in Kalmar län but not on a more detailed level.

The area classified as 'arable land' in Farm Register (the average for years 1995 and 1999) is approximately 644 ha in Simpevarp. A larger part of this area (77% on average) is used for cultivating grass for silage or as pasture and some of it is not utilized at all but classified as 'bare fallow', although it is classified as 'arable land' and not as 'grazing land'. When the arable area from Farm Register (644 ha in average in 1995–99) is compared with the arable area from Vegetation Classification, (556 ha) /Boresjö-Bronge and Wester, 2003/ in the Simpevarp area, the results (see Table 4-30) are not completely coherent. In the calculations the numbers from Farm Register have been used but it is important to notice that the arable area and particularly the potential arable area can be interpreted in several ways.

## Table 4-25. Average Farm Land Area in Kalmar län, Oskarshamn, Misterhult församling and the Simpevarp area, 1990–1999.

Farm Land (ha) average 1990-1999										
	Kalmar län	Oskarshamn	Misterhult församling	Simpevarp (1995-1999)						
Arable land	130 406	4 252	1 509	644						
Grazing land	48 263	1 645	329	145						
Forest		18 804	5 060	1 987						
Other		2 651	910	532						
Total Farm Land		27 352	7 808	3 308						

Source: SCB, Farm Register

## Table 4-26. Change (%) in Farm Land Area in Kalmar län, Oskarshamn, Misterhult församling and the Simpevarp area, 1990–1999. Farm Land, change (%) 1990-1999

Faill Land, Change (%) 1990-1999										
	Kalmar län	Oskarshamn	Misterhult församling	Simpevarp (1995-1999)						
Arable land	-2	-13	-10	9						
Grazing land	69	45	36	36						
Forest		-21	-22	-12						
Other		-25	-11	-3						
Total Farm Land		-18	-16	-5						

Source: SCB, Farm Register

Arable Land Ratio			
Area	Arable land average 1990-1999 (ha)	Total land area (ha)	Arable %
Kalmar län	130 406	1 117 100	11.7
Oskarshamn	4 252	104 700	4.1
Misterhult församling	1 509	40 790	3.7
Simpevarp 1-14	644	12 713	5.8
Simpevarp 5,6,9	90	3 164	2.9
Simpevarp 10	297	4 110	7.2
Simpevarp 17	135	694	19.5
Simpevarp 18	38	912	4.2
Coastal South	8	814	1.0
Coastal North	69	2 142	3.2

#### Table 4-27. Arable Land Ratio Source: Farm Register.

Source: SCB, Farm Register

#### Table 4-28. Farm Land (ha) in the Simpevarp Area.

Farm Land in Simpevarp, average (ha) 1995-1999										
	Simpevarp area (total)	Areas 5,6,9	Area 10	Area 17	Area 18	Coastal South	Coastal North			
Arable land	644	90	297	135	44	8	69			
Grazing land	145	12	39	29	6	15	43			
Forest	1 987	334	880	343	199	56	175			
Other	532	67	164	133	22	18	129			
Total Farm Land	3 308	503	1 381	639	271	98	416			

Source: SCB, Farm Register
Table 4-29.	Farm Land in Simp	evarp, change (%)	1995–1999 Source:	Farm Register.
				· • · · · · · · · · · · · · · · · · · ·

Farm Land in Simpevarp, change (%) 1995-1999											
	Simpevarp area (total)	Areas 5,6,9	Area 10	Area 17	Area 18	Coastal South	Coastal North				
Arable land	9	3	23	12	-25	-40	-11				
Grazing land	36	58	23	160	-100	-42	79				
Forest	-12	-14	-6	0	-45	-34	0				
Other	-3	-14	-5	0	0	0	0				
Total Farm Land	-5	-10	0	7	-41	-30	4				

Source: SCB, Farm Register

## Table 4-30. Arable land, two different estimates in Simpevap.

Arable Land in Simpevarp (ha), two different data sources											
Data source	Simpevarp area	Areas 5,6,9	Area 7	Area 10	Area 13	Area 17	Area 18	Coastal South	Coastal North		
Farm Register (average 1995-1999)	644	90	no data	297	no data	135	44	8	69		
Vegetation Mapping (2003)	0	0	0	0	0	0	0	0	0		

Source: SCB, Farm Register and Boresjö-Bronge and Wester, 2003



Figure 4-7. Arable Land in the Simpevarp area.



Figure 4-8. Number of Farms in the Simpevarp area (1995–99).

Table 4-31.	Number of Farms in Co	ounty, Municipality,	Parish and the	Simpevarp area,
average 19	90–1999 Source: Farm F	Register.		

Number of Farms, average 1990-1999											
Size in hectares	Kalmar län	Oskarshamn	Misterhult	Simpevarp 14 areas (1995-1999)							
2,1-5,0	432	50	10		1						
5,1-10,0	654	62	11		4						
10,1-20,0	815	66	26		13						
20,1-30,0	516	26	9		6						
30,1-50,0	713	21	9		4						
50,1-100,0	607	14	4		2						
100.1-	178	2	1		1						
Total number	3915	242	70		28						

Source: SCB, Farm Register

# Table 4-32. Change in Number of Farms in County, Municipality, Parish and the Simpevarp area (1990–1999) Source: Farm Register.

Number of Farms, change 1990-1999 (%)											
Size in hectares	Kalmar län	Oskarshamn	Misterhult	Simpevarp 14 areas (1995-1999)							
2,1-5,0	-28	-51	-61	-100							
5,1-10,0	-22	-37	-65	-25							
10,1-20,0	-22	-2	8	17							
20,1-30,0	-27	-25	-20	-17							
30,1-50,0	-26	-27	-50	-25							
50,1-100,0	10	-13	0	-50							
100.1-	47	200	100	from 0 to 1							
Total number	-17	-28	-31	-7							

Source: SCB, Fan Register

Farm Density, farms (average 1990-1999) per km <sup>2</sup>												
	Kalmar län	Oskarshamn	Misterhult	Simpevarp area	Area 10	Area 17	Area 18	Coastal North	Coastal South			
Number of farms	0	0	0	0	11	5	3.5	3.5	1.5			
Area (km)	11 171	1 047	408	97.6	41.1	6.9	9.1	21.4	8.1			
Farms per km <sup>2</sup>	0.0	0.0	0.0	0.0	0.3	0.7	0.4	0.2	0.2			

 Table 4-33.
 Farm Density, average in 1990–1999, the Simpevarp area 1995–1999.

Source: SCB, Farm Register

## Table 4-34. Number of Farms in the Simpevarp area 1995–1999.

Number of Farms in Simpevarp area (14 areas)										
Size in hectares	1995	1999	Average 1995-1999	% change 1995-1999						
2,1-5,0	1	0	0.5	-100						
5,1-10,0	4	3	3.5	-25						
10,1-20,0	12	14	13	17						
20,1-30,0	6	5	5.5	-17						
30,1-50,0	4	3	3.5	-25						
50,1-100,0	2	1	1.5	-50						
100.1-	0	1	0.5	from 0 to 1						
Total number	29	27	28	-7						

Source: SCB, Farm Register

## Table 4-35. Number of Farms in Simpevarp areas nr 5, 6, 9.

Number of Farms in Areas 5, 6 and 9										
Size in hectares	1995	1999 /	Average 1995-1999	% change 1995-1999						
2,1-5,0	0	0	0	0						
5,1-10,0	1	0	0.5	-100						
10,1-20,0	1	1	1	0						
20,1-30,0	1	1	1	0						
30,1-50,0	1	1	1	0						
50,1-100,0	0	0	0	0						
100.1-	0	0	0	0						
Total number	4	3	4	-25						

 Table 4-36. Number of Farms in Simpevarp area nr 10.

Number of Farms in Area 10									
Size in hectares	1995	1999	Average 1995-1999	% change 1995-1999					
2,1-5,0	0	0	0	0					
5,1-10,0	1	0	0.5	-100					
10,1-20,0	4	7	5.5	75					
20,1-30,0	3	1	2	-67					
30,1-50,0	2	2	2	0					
50,1-100,0	1	0	0.5	-100					
100.1-	0	1	0.5	from 0 to 1					
Total number	11	11	11	0					

Number of Farms in Area 17										
Size in hectares	1995	1999	Average 1995-1999	% change 1995-1999						
2,1-5,0	0	0	0.0	0						
5,1-10,0	1	1	1.0	0						
10,1-20,0	1	2	1.5	100						
20,1-30,0	2	1	1.5	-50						
30,1-50,0	0	0	0.0	0						
50,1-100,0	1	1	1.0	0						
100.1-	0	0	0.0	0						
Total number	5	5	5.0	0						

## Table 4-37. Number of Farms in Simpevarp area nr 17.

## Table 4-38. Number of Farms in Simpevarp area nr 18.

Number of Farms in Area 18									
Size in hectares	1995	1999	Average 1995-1999	% change 1995-1999					
2,1-5,0	0	0	0.0	0					
5,1-10,0	0	0	0.0	0					
10,1-20,0	4	3	3.5	-25					
20,1-30,0	0	0	0.0	0					
30,1-50,0	0	0	0.0	0					
50,1-100,0	0	0	0.0	0					
100.1-	0	0	0.0	0					
Total number	4	3	3.5	-25					

#### Table 4-39. Number of Farms in Simpevarp Coastal North.

Number of Farms in Coastal North									
Size in hectares	1995	1999 Av	/erage 1995-1999	% change 1995-1999					
2,1-5,0	0	0	0	0					
5,1-10,0	0	1	0.5	from 0 to 1					
10,1-20,0	2	1	1.5	-50					
20,1-30,0	0	2	1	from 0 to 2					
30,1-50,0	1	0	0.5	-100					
50,1-100,0	0	0	0	0					
100.1-	0	0	0	0					
Total number	3	4	3.5	33					

Table 4-40. Number o	of Farms in	Simpevarp	Coastal	South.
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Number of Farms in Coastal South									
Size in hectares	1995	1999 A	verage 1995-1999	% change 1995-1999					
2,1-5,0	1	0	0.5	-100					
5,1-10,0	1	1	1	0					
10,1-20,0	0	0	0	0					
20,1-30,0	0	0	0	0					
30,1-50,0	0	0	0	0					
50,1-100,0	0	0	0	0					
100.1-	0	0	0	0					
Total number	2	1	1.5	-50					

## **Crop Production**

A relatively wide span of different crops, mainly cereals, is cultivated in the Simpevarp area, including winter wheat, barley, rye, oats, triticale, mixed grain, leguminous plants and silage plants see Table 4-41. Barley and oats were the two most important crops in the Simpevarp area in 1995–1999. The significance of barley, the major crop in the area, and leguminous plants, a newcomer, has increased while oats has decreased considerably and dropped to the same level as rye, wheat and triticale by 1999. Almost 65% of the arable area is used for growing green fodder, grass for hay and silage or as pasture in Simpevarp and 13% is not used at all. Even though this number seems high, the percentage of arable land used for similar purposes in Oskarshamn is higher, 71% while 7% is not used at all. The corresponding number for silage plants and pasture in Kalmar län considerably less, only half of the arable area is used for growing silage plants and as pasture and only 7% of the arable land is classified as bare fallow.

All the crops have been grouped in six different categories (1. cereals, 2. root vegetables – potatoes and sugar beets -, 3. vegetables and fruit, 4. leguminous plants and oil seed crops, 5. green fodder and silage and 6. other plants and not utilized land). The result can be studied in Figure 4-9, Figure 4-10, Figure 4-11 and Figure 4-12 which show that the percentage of land used for cultivation of green fodder and silage plants is considerably higher in all areas within Oskarshamns kommun than in Kalmar län in average.

Cultivated Crops average area (ha) 1990-1999				
	Kalmar län	Oskarshamn	Misterhult	The Simpevarp area
Winter wheat	8 110	29	13	5
Spring wheat	649	3	0	0
Rye	2 725	40	31	6
Barley	20 736	458	199	89
Oats	9 124	234	89	22
Rye wheat, mixed grain	4 884	141	25	4
Leguminous plants	1 102	9	9	12
Green fodder, plants for silage	52 621	92	42	14
Potatoes	1 461	7	2	0
Suger beet	2 809	0	0	0
Grass on arable land for hay or silage		2 240	739	334
Pasture, seed lay	12 690	663	203	77
Oil seed crops (rape,turnip rape)	3 198	21	3	0
Other plants	1 413	9	2	2
Bare fallow, untilled arable land	7 508	210	101	66
Pasture/arable land not utilized	822	95	52	13
Lin seed	179	0	0	0
Horticultural plants	345	0	0	0
Energy forest	30	0	0	0
Total	130 407	4 252	1509	644

Table 4-41.	<b>Cultivated Crops in</b>	Kalmar län,	Oskarshamn,	Misterhult församling a	and the
Simpevarp	area in 1990-1999.			-	

Source: SCBFarm Register

Cultivated crops in the Simpervarp area (ha)					
	1990	1995	1999	average	change (%)
Winter wheat		3	8	5	178
Spring wheat		0	0	0	0
Rye		9	4	6	-50
Barley		76	101	89	33
Oats		37	8	22	-78
Triticale wheat, mixed grain		0	7	4	from 0 to 7
Leguminous plants		0	24	12	from 0 to 24
Green fodder, plants for silage		8	20	14	151
Potatoes		0	0	0	0
Suger beets		0	0	0	0
Grass on arable land for hay or silage		333	334	334	0
Pasture, seed lay		87	67	77	-23
Oil seed crops		0	0	0	0
Other plants		4	1	2	-71
Bare fallow, untilled arable land		42	89	66	111
Pasture/arable land not utilized		18	9	13	-49
Total		616	672	644	9

## Table 4-42. Cultivated Crops (ha) in the Simpevarp area 1995–1999.

## Crop Distribution (ha) in Simpevarp area 1995–99



*Figure 4-9. Cultivated Crops (ha) in the Simpevarp Area (1995–1990).* Source: Farm Register

#### Crop Distribution (ha) in Misterhult församling 1990-99



*Figure 4-10. Cultivated Crops (ha) in Misterhult Parish 1990–1999.* Source: Farm Register





*Figure 4-11. Cultivated Crops (ha) in Oskarshamns kommun (1990–1999).* Source: Farm Register

#### Crop Distribution (ha) in Kalmar län 1990-99



*Figure 4-12. Cultivated Crops in Kalmar län (1990–1999).* Source: Farm Register

The production capacity and the fertility of the land in Simpevarp can be studied by comparing the standard yield estimates in SKO area 0814 to which the Simpevarp area belongs with the corresponding estimates in Kalmar län and the harvested yield in Sweden, see Table 4-43.

This comparison reveals that in general the expected yields for spring barley and oats in Simpevarp are slightly below the county average (90–94%) and clearly below the national average (79–85%).

Standard Yield Estimates (kg/ha)									
	SKO 0814	Kalmar län	Sweden	SKO 0814/Kalmar län (%)	SKO 0814/Sweden (%)				
Spring barley	3 415	3803	4340	90	79				
Oats	3 475	3681	4100	94	85				

Table 4-43. Comparison of Yields (kg/ha) in the Simpevarp area (SKO 0814 Area), Kalmar län and Sweden 2002.

## Table 4-44. Crop Production in Misterhult församling 1990–1999.

Crop Production in Misterhult (587,7 km<sup>2</sup>)

	1990 (ha)	1995 (ha)	1999 (ha)	% change	Average (ha)	Average yearly yield 1990-1999 (kg)	Yield 1999 (kg)	kg/m2(aver yearly yield)	kg/m2(yield 99)
Winter wheat	8	17.3	13.3	66	13	78 435	81 077	0.0001335	0.0001379
Spring wheat	0.8	0.4	0	-100	0	2 018	0	0.0000034	0.0000000
Rye	49.2	24.5	18.5	-62	31	117 555	70 763	0.0002000	0.0001204
Barley	196.7	171.7	229.1	16	199	680 154	782 377	0.0011572	0.0013311
Oats	148.6	69	48.4	-67	89	308 117	168 190	0.0005242	0.0002862
Triticale, mixed grain	27	20.4	26.9	0	25	112 936	122 664	0.0001922	0.0002087
Leguminous plants	0	0.6	26.3		9	28 066	82 319	0.0000478	0.0001401
Green fodder, plants for silage	71.3	25.4	28.4	-60	42	218 508	148 816	0.0003718	0.0002532
Potatoes	3.6	1.8	0.9	-75	2	66 442	28 475	0.0001130	0.0000484
Sugar beets	0	0	0		0				
Grass on arable land for hay or silage	726.7	747.6	741.5	2	739	3 870 264	3 885 460	0.0065854	0.0066113
Pasture, seed lay	222	234.4	152	-32	203				
Oil seed crops	8	0	0.9	-89	3	5 927	1 798	0.0000101	0.0000031
Other plants	0.5	3.5	1.1	120	2				
Bare fallow, untilled arable land	73.9	108.6	120.9	64	101				
Pasture/arable land not utilized	75.2	40.8	41.3	-45	52				
Total (ha)	1611.5	1466	1449.5	-10	1 509				

## Table 4-45. Crops (ha) in the Simpevarp area (14 areas) 1995–1999.

Crop Production in the Simpevarp area (127,1 km<sup>2</sup>)

	1995 (ha)	1999 (ha)	Average 1995-1999 (ha)	change (%)	Average yield (kg) 1995-99	Average yearly yield kg/m2	Yield 1999 (kg)	Yield 1999 kg/m2
Winter wheat	2.7	7.5	5.1	178	31 090	0.000244548	45 720	0.0003596
Spring wheat	0	0	0	0		0		
Rye	8.6	4.3	6.45	-50	24 671	0.000194062	16 448	0.0001294
Barley	76.2	101.4	88.8	33	297 391	0.00233925	346 281	0.0027238
Oats	36.8	8.1	22.45	-78	78 014	0.000613648	28 148	0.0002214
Triticale wheat, mixed grain	0	7.1	3.55 f	rom 0 to 7	16 188	0.000127333	32 376	0.0002547
Leguminous plants	0	23.7	11.85 f	rom 0 to 24	3 130	2.46203E-05	74 181	0.0005835
Green fodder, plants for silage	8	20.1	14.05	151	73 622	0.000579103	5 240	0.0000412
Potatoes	0	0	0	0				
Suger beets	0	0	0	0				
Grass on arable land for hay or silage	333.4	334	333.7	0	1 748 588	0.01375422	1 750 160	0.0137666
Pasture, seed lay	87.2	67.3	77.25	-23				
Oil seed crops	0	0	0	0				
Other plants	3.5	1	2.25	-71				
Bare fallow, untilled arable land	42.2	88.9	65.55	111				
Pasture/arable land not utilized	17.6	9	13.3	-49				
Total	616.2	672.4	644.3	9				

	1995 (ha)	1999 (ha)	% change	average (ha) 1995-1999	Aver.yearly yield, kg 1995-1999	Average yield kg/m2 (1995-1999)
Winter wheat	0	0		0		
Spring wheat	0	0		0		
Rye	3.8	4.3	13	4.05	15491.25	0.000377
Barley	29.8	30.5	2	30.15	102962.25	0.002505
Oats	11.4	3	-74	7.2	25020	0.000609
Triticale, mixed grain	0	5.6		2.8	15512	0.000377
Leguminous plant	0	23.7		11.85	37090.5	0.000902
Green fodder, plants for silage	1.4	10.1	621	5.75	30130	0.000733
Potatoes	0	0		0		
Suger beets	0	0		0		
Grass on arable land for hay or silage	164	158.4	-3	161.2	844688	0.020553
Pasture, seed lay	31.9	24.2	-24	28.05		
Oil seed crops	0	0		0		
Other plants	0.5	1	100	0.75		
Bare fallow, untilled arable land	10.8	59.8	454	35.3		
Pasture/arable land not utilized	12.5	8	-36	10.25		
Total (ha)	266.1	328.6	23	297.35		

## Table 4-46. Crops (ha) in Simpevarp Area 10 1995–1999.

Crop Production in the Simpevarp area 10

## Table 4-47. Crops (ha) in Simpevarp area 17, 1995–1999.

Crop Production in the Simpevarp area 17

	1995 (ha)	1999 (ha)	% change	average (ha) 1995-1999	Aver.yearly yield, kg (1995-1999)	Average yield kg/m2 (1995-1999)
Winter wheat	0	0		0		
Spring wheat	0	0		0		
Rye	0	0		0		
Barley	6.9	21.5	212	14	48493	0.006988
Oats	15.3	1.8	-88	9	29711	0.004281
Rye wheat, mixed grain	0	0		0		
Leguminous plant	0	0		0		
Green fodder, plants for silage	6.6	10	52	8	43492	0.006267
Potatoes	0	0		0		
Suger beets	0	0		0		
Grass on arable land for hay or silage	58.1	78.5	35	68	357892	0.051571
Pasture, seed lay	33.3	23.6	-29	28		
Oil seed crops	0	0		0		
Other plants	0	0		0		
Bare fallow, untilled arable land	7.4	7.4	0	7		
Pasture/arable land not utilized	0	0		0		
Total (ha)	127.6	142.8	12	135		

	1995 (ha)	1999 (ha)	% change	average (ha) 1995-1999	Aver.yearly yield, kg (1995-1999)
Winter wheat	0	0		0	
Spring wheat	0	0		0	
Rye	2.5	0	-100	1.25	4781.25
Barley	0	2		1	3415
Oats	4	2	-50	3	10425
Rye wheat, mixed grain	0	0		0	
Leguminous plant	0	0		0	
Green fodder, plants for silage	0	0		0	
Potatoes	0	0		0	
Suger beets	0	0		0	
Grass on arable land for hay or silage	16.5	15.2	-8	15.85	83054
Pasture, seed lay	6.5	7.3	12	6.9	
Oil seed crops	0	0		0	
Other plants	0	0		0	
Bare fallow, untilled arable land	20	10.5	-48	15.25	
Pasture/arable land not utilized	1	1	0	1	
Total (ha)	50.5	38	-25	44.25	

## Table 4-48. Crops (ha) in Simpevarp area 18, 1995–1999.

Crop Production in the Simpevarp area 18

## Table 4-49. Crops (ha) in Simpevarp Coastal North Area, 1995–1999.

Crop Production in Coastal North

	1995 (ha)	1999 (ha)	% change	average (ha) 1995-1999	Aver.yearly yield, kg 1995-1999	Average yield kg/m2 (1995-1999)
Winter wheat	0	0	0	0		
Spring wheat	0	0	0	0		
Rye	0	0	0	0		
Barley	23.8	13.7	18.75	-42	62812.5	0.00293275
Oats	4.7	1.3	3	-72	10425	0.00048675
Triticale, mixed grain	0	1.5	0.75	from 0 to 2		
Leguminous plant	0	0	0	0		
Green fodder, plants for silage	0	0	0	0		
Potatoes	0	0	0	0		
Suger beet	0	0	0	0		
Grass on arable land for hay or silage	35.9	36.5	36.2	from 0 to 37	189688	0.00885664
Pasture, seed lay	5.8	5.4	5.6	-7		
Oil seed crops	0	0	0	0		
Other plants	3	0	1.5	-100		
Bare fallow, untilled arable land	0	6.7	3.35	from 0 to 7		
Pasture/arable land not utilized	0	0	0	0		
Total	73.2	65.1	69.15	-11		

#### Table 4-50. Crops (ha) in Simpevarp Coastal South Area, 1995–1999.

Crop Production in Coastal South

	1995 (ha)	1999 (ha)	aver.	Change (%)	aver.yearly yield, kg 95-99	aver.yearly yield kg/m2
Winter wheat	2.7	7.5	5.1	177.777778	31089.6	0.0038201
Spring wheat	0	0	0	0		
Rye	8.6	4.3	6.45	-50	24671.25	0.00303146
Barley	52.4	87.7	70.05	67.3664122	239220.75	0.02939402
Oats	32.1	6.8	19.45	-78.8161994	67588.75	0.0083049
Rye wheat, mixed grain	0	5.6	2.8	from 0 to 5,6	12768	0.00156886
Leguminous plant	0	23.7	11.85	from 0 to 23,7	37090.5	0.00455746
Green fodder, plants for silage	8	20.1	14.05	151.25	73622	0.00904623
Potatoes	0	0	0	0		
Suger beet	0	0	0	0		
Grass on arable land for hay or silage	297.5	297.5	297.5	0	1558900	0.19154833
Pasture, seed lay	81.4	61.9	71.65	-23.955774		
Oil seed crops	0	0	0	0		
Other plants	0.5	1	0.75	100		
Bare fallow, untilled arable land	42.2	82.2	62.2	94.7867299		
Pasture/arable land not utilized	17.6	9	13.3	-48.8636364		
Total	543	607.3	575.15	11.8416206		

## Animal Production

When animal production is studied more closely, we see that there is a significant increase in the number of breeding cows (77%), mainly in Simpevarp 10 and 17, which correlates with the general development in the municipality and county where the change is even more evident (100–118%). At the same time the number of chickens and laying hens decreases in Simpevarp; a trend that also can be found both in Oskarshamn and Kalmar län. What is noteworthy in Simpevarp, however, is the number of sheep that has increased by 150% while no such phenomenon can be traced locally or regionally in 1995–1999. The sheep can be located in the Simpevarp 7 and the coastal area in the north.

Again the results should be viewed with a critical eye particularly when the animal populations were quite small. The calculations on animal production were based on data from SBC and in this data the animals were often grouped, for instance the total number of chicken and fowls was known but not the specific number for both. The national statistics were used in order to estimate the distribution of animals in the group.

It is also important to remember that the late 90's have been a rather special time in Swedish agriculture, as Sweden became the member of the EU in 1995. The political decisions have presumably played a major role in the process of optimising agricultural production in the area instead of factors related to climate and fertility of the land. Therefore the data available shows only what has been cultivated in the area during this specific time period instead of describing what could be grown in the area it its regional or local agricultural potential was used to full extent.

## Table 4-51. Livestock average number of heads in 1990–1999 in Kalmar län,Oskarshamn, Misterhult församling and the Simpevarp area.

Livestock, average 1990-1999	Kalmar län	Oskarshamn	Misterhult församling	The Simpevarp area
Dairy cows	44 089	1 213	316	139
Breeding cows	8 301	470	138	54
Heifers, bulls and bullocks >1 year	48 029	1 638	445	195
Calves	41 965	1 402	380	157
Sheep and lambs	51 913	1 530	329	60
Boars and sows	85 732	407	9	0
Other pigs	45 252	3 358	283	320
Fowls and chickens	773 384	929	277	201

## Table 4-52. Livestock change (%) in 1990–1999 in Kalmar län, Oskarshamn, Misterhult församling and the Simpevarp area.

Livestock, change 1990-1999 (%)	Kalmar län	Oskarshamn	Misterhult församling	The Simpevarp area
Dairy cows	-10	-20	-20	4
Breeding cows	118	100	63	77
Heifers, bulls and bullocks >1 year	20	-6	-25	-5
Calves	0	-11	-22	2
Sheep and lambs	-11	-29	-6	150
Boars and sows	9	-47	650	0
Other pigs	1	-17	448	0
Fowls and chickens	1	-72	-59	-40

#### Table 4-53. Animal production in Misterhult församling 1990–1999.

Animal production in Misterhult församling		
	1990-1999 (average)	1999
Dairy cows	316	295
Breeding cows	138	165
Heifers, bulls and bullocks >1 year	445	406
Calves	380	341
Total number of cattle	1 279	1 207
Estimate for slaughtered cattle (28,5%)	365	344
Estimate for beef (57% of average slaughter weight 292 kg)	60 686	57 255
Estimate for milk (7494 kg per cow a year)	2 370 602	2 210 730
Sheep and lambs	329	277
Estimate for sheep (45%)	148	125
Estimate for lambs (55%)	181	152
Estimate for number of slaughtered sheep (14% of all sheep)	21	17
Estimate for number of slaughtered lambs (69% of all lambs)	125	105
Estimate for slaughtered sheep (kg), average slaughter weight 25,9 kg	537	452
Estimate for slaughtered lambs (kg), average slaughter weight 18,1 kg	2 260	1 903
Estimate for mutton, kg (57% of slaughter weight)	1 594	1 342
Boars and sows	9	15
Other pigs	283	422
Total number of pigs	292	437
Estimate for number of slaughtered pigs (171% of all pigs)	500	747
Estimate for slaughtered pigs (kg), average slaughter weight 85,3 kg	42 641	63 742
Estimate for pork, kg (57% of slaughter weight)	24 305	36 333
Fowls and chickens	277	156
Estimate for fowls (75% of all fowls and chickens)	208	117
Estimate for number of slaughtered chickens (925% of all chickens and hens)	2 562	1 443
Estimate for slaughetered chickens, kg (average slaughter weight 1,3kg)	3 331	3 604
Estimate for chicken meat (75% of slaughter weight)	2 498	2 703
Estimate for egg production (18,7 kg per hen a year)	3 885	2 188

## Table 4-54. Animal Production in the Simpevarp area, calculations (1995–1999).

Animal	Production	in t	the	Simpevarp	area

	1995	1999	Average 1995-1999	% change
Dairy cows	136	142	139	4
Breeding cows	39	69	54	77
Heifers, bulls and bullocks >1 year old	200	190	195	-5
Calves	155	158	157	2
Total number of cattle	530	559	545	5
Estimate for slaughtered cattle (28,5% of the total number of cattle)	151	159	155	5
Estimate for beef (57% of average slaughter weight 292 kg)	25 141	26 516	25 829	5
Estimate for milk (7494 kg per cow a year)	1 019 184	1 064 148	1 041 666	4
Sheep and lambs	34	85	60	150
Estimate for sheep (45%)	15	38	27	150
Estimate for lambs (55%)	19	47	33	150
Estimate for number of slauhtered sheep (14% of all sheep)	2	5	4	150
Estimate for number of slaughtered lambs (69% of all lambs)	13	32	23	150
Estimate for slaughtered sheep (kg), average slaughter weight 25,9 kg	55	139	97	150
Estimate for slaughtered lambs (kg), average slaughter weight 18,1 kg	234	584	409	150
Estimate for mutton, kg (57% of slaughter weight)	165	412	288	150
Boars and sows	0	0	0	
Other pigs	320	320	320	0
Estimate for number of slaughtered pigs (171% of all pigs)	547	547	547	0
Estimate for slaughtered pigs (kg), average slaughter weight 85,3 kg	46 676	46 676	46 676	0
Estimate for pork, kg (57% of slaughter weight)	26 605	26 605	26 605	0
Fowls and chickens	250	151	201	-40
Estimate for fowls (75% of all fowls and chickens)	188	113	150	-40
Estimate for number of slaughtered chickens (925% of all chickens and hens)	2 313	1 397	1 855	-40
Estimate for slaughetered chickens, kg (average slaughter weight 1,34 kg)	3 099	1 872	2 485	-40
Estimate for chicken meat (75% of the slaughter weight)	2 324	1 404	1 864	-40
Estimate for eggs (18,7 kg per hen a year)	3 506	2 118	2 812	-40

## Table 4-55. Animal Production in Simpevarp area 10, calculations (1995–1999).

Animal Productin in Simpevarp area 10				
	1995	1999	% change1995-1999	Average 1995-1999
Dairy cows	54	60	11	57
Breeding cows	16	37	131	27
Heifers, bulls and bullocks >1 year old	104	75	-28	90
Calves	66	65	-2	66
Cattle total	240	237	-1	239
Estimate for slaughtered cattle (28,5% of all cattle)	68	68	-1	68
Estimate for beef (57% of average slaughter weight 292 kg)	10 995	10 857	-1	10 926
Estimate for milk (7769 kg per cow a year)	404 730	449 700	11	427 215
Sheep and lambs	0	0		0
Boars and sows	0	0		0
Other pigs	0	0		0
Fowls and chickens	100	58	-42	79
Estimate for number of slaughtered chickens (925% of all chickens and hens)	925	537	-42	731
Estimate for slaughetered chickens, kg (average slaughter weight 1,3kg)	1 203	697	-42	950
Estimate for chicken meat (75% of the slaughter weight)	902	523	-42	712
Estimate for number of fowls (75% of all fowls and chickens)	75	44	-42	59
Estimate for eggs (18,7 kg per hen a year)	1 403	813	-42	1 108

## Table 4-56. Animal Production in Simpevarp area 17, calculations (1995–1999).

Simpevarp area 17				
	1995	1999	% change1995-1999	Average 1995-1999
Dairy cows	60	72	20	66
Breeding cows	0	0		0
Heifers, bulls and bullocks >1 year	26	61	135	44
Calves	50	41	-18	46
Cattle total	136	174	28	155
Estimate for slaughtered cattle (28,5% of all cattle)	39	50	28	44
Estimate for beef (57% of average slaughter weight of 292 kg)	6 451	8 254	28	7 352
Estimate for milk production (7494 kg per cow a year)	449 640	539 568	20	494 604
Sheep and lambs	0	52	from o to 52	26
Sheep (estimate 45%)	0	23	from 0 to 23	12
Lambs (estimate 55%)	0	29	from 0 to 29	14
Estimate for number of slaughetered sheep (14% of all sheep)	0	3	from 0 3	2
Estimate for slaughetered lambs (69% of all lambs)	0	20	from 0 to 20	10
Estimate for slauhtered sheep (kg), average weight 25,9 kg	0	85	from 0 to 85	42
Estimate for slaughtered lambs (kg) average weight 18,1 kg	0	357	from 0 to 357	179
Estimate for mutton production (57% of slaughter weight)	0	252	from 0 to 252	126
Boars and sows	0	0	0	0
Other pigs	0	0	0	0
Pork production, kg (estimate)	0	0	0	0
Fowls and chickens	30	30	0	30
Estimate for the number of slaughtered chickens (925 % of all fowls and chickens)	278	278	0	278
Estimate for slaughetered chickens, kg (average slaughter weight 1,3 kg)	361	361	0	361
Estimate for chicken meat (75% of the slaughter weight)	271	271	0	271
Estimate for number of fowls (75 % of all hens and chickens)	23	23	0	23
Estimate for egg production (18,7 kg per fowl a year)	421	421	0	421

## Table 4-57. Animal Production in Simpevarp area 18, calculations (1995–1999).

Simpevarp area 18				
	1995	1999	% change1995-1999	Average 1995-1999
Dairy cows	0	0		0
Breeding cows	5	0	-100	3
Heifers, bulls and bullocks >1 year	6	0	-100	3
Calves	2	0	-100	1
Cattle total	13	0	from 13 to 0	7
Estimate for slaughtered cattle (estimate 28,5%)	4	0	from 4 to 0	2
Estimate for beef production (57% of average slaughter weight of 292 kg)	617	0	from 617 to 0	309
Sheep and lambs	0	0	0	0
Boars and sows	0	0	0	0
Other pigs	0	0	0	0
Fowls and chickens	0	5	from 0 to 5	3
Estimate for slaughtered chickens (925% of all fowls and chickens)	0	46	from 0 to 46	23
Estimate for chicken meat (75% of average slaughter weigth of 1,3 kg)	0	45	from 0 to 45	23
Estimate for the number of fowls (75% of all fowls and chickens)	0	4	from 0 to 4	2
Estimate for egg production (18,7 kg per fowl a year)	0	70	from 0 to 70	35

## Table 4-58. Animal Production in Simpevarp Coastal North, calculations (1995–1999.

Simpevarp Coastal North				
	1995	1999	Average 1995-99	% change
Dairy cows	11	10	11	-9
Breeding cows	6	9	8	50
Heifers, bulls and bullocks >1 year old	24	17	21	-29
Calves	10	21	16	110
Total number of cattle	51	57	54	12
Estimate for slauhtered cattle (28,5% of all cattle)	15	16	15	12
Estimate for beef, 57% of slaughter weight (ever. 292 kg)	2 419	2 704	2 562	12
Estimate for milk (7495 kg per dairy cow a year)	82 445	74 950	78 698	-9
Sheep and lambs	0	33	17	from 0 to 33
Estimate for number of sheep (45%)	0	15	7	from 0 to 15
Estimate for number of lambs (55%)	0	8	4	from 0 to 8
Estimate for slaughtered sheep (14%)	0	1	1	from 0 to 1
Estimate for slaughtered lambs (69%)	0	6	3	from 0 to 6
Estimate for slauhtered sheep (kg), aver.weight 25,9	0	30	15	from 0 to 20
Estimate for slaughtered lambs (kg) ever.weight 18,1	0	102	51	from 0 to 102
Estimate for mutton (57% of slaughter weight)	0	75	38	from 0 to 75
Boars and sows	0	0	0	0
Other pigs	0	0	0	0
Estimate for pork	0	0	0	0
Fowls and chickens	90	30	60	-67
Estimate for fowls (75% of all hens)	68	23	45	-67
Estimate for number of slaughtered chickens (925% of all fowls and chickens)	833	278	555	-67
Estimate for slaughetered chickens, kg (average slaughter weight 1,3 kg)	1 082	361	722	-67
Estimate for chicken meat (75% of the slaughter weight)	812	271	541	-67
Estimate for egg production (18,7 kg per hen a year)	1 262	421	842	-67

## Table 4-59. Animal Production in Simpevarp Coastal South, calculations (1995–1999).

Animal Prodution in Simpevarp Coastal South				
	1995	1999	Average 1995-1999	% change
Dairy cows	0	0	0	0
Breeding cows	0	0	0	0
Heifers, bulls and bullocks >1 year old	0	0	0	0
Calves	0	0	0	0
Estimate for beef	0	0	0	0
Estimate for milk	0	0	0	0
Sheep and lambs	34	0	17	-100
Estimate for number of sheep (45%)	15	0	8	from 15 to 0
Estimate for number of lambs (55%)	19	0	9	from 19 to 0
Estimate for slauhgered sheep (14%)	2	0	1	from 2 to 0
Estimate for slaughtered lambs (69%)	13	0	7	from 13 to 0
Estimate for slauhtered sheep (kg), aver.weight 25,9 kg	55	0	26	from 55 to 0
Estimate for slaughtered lambs (kg) aver.weight 18,1 kg	234	0	121	from 254 to 0
Estimate for mutton (57% of slaughter weight)	165	0	84	from 165 to 0
Boars and sows	0	0	0	0
Other pigs	0	0	0	0
Estimate for pork	0	0	0	0
Chicken and laying hens	0	0	0	0
Estimate for chicken meat	0	0	0	0
Estimate for egg production	0	0	0	0

## 4.2.4 Horticulture

According to /SCB, 2003a/ there were 128 holdings with at least 0.25 hectares outdoor cultivation in Kalmar län in 2002. The total area were 7.8 km<sup>2</sup>, which represent 6% of the total outdoor area in the county. The area has decreased with approximately 10% since 1999. Among the vegetables, the cultivation of cucumbers and onions was predominant and in all accounted for more than 80% of the total area for vegetables. Among fruit and berries, cultivation of strawberries was most common and in all accounted for 90% of the total area.

According to /Länsstyrelsen i Kalmar län et al. 2002/ the horticultural cultivation is most extensive in Öland. And according to /Gula Sidorna, 2003, internet/, there is no horticultural enterprise within Misterhult församling. It seems there is no horticulture within Misterhult församling and the Simpevarp area. This cannot be confirmed without further investigations.

## 4.2.5 Aquaculture

According to /SCB, 2003b/ shows that there are 29 enterprises in Kalmar län. Seven of these produce fish for consumption, while 19 are used to produce crayfish. The dominating species is rainbow trout (regnbågsöring), which is produced in six enterprises in Kalmar län. The production of rainbow trout amounted to 47 tonnes in 2002.

According to the key plan /Oskarshamns kommun, 2003a/ there are two enterprises in Oskarshamns kommun. One is in Vånevik, south of Oskarshamn, that produces fish for consumption. The other one produces crayfish and is north of Virkvarns airport in Misterhult församling, approximately 12 km north of Oskarshamn. According to Länsstyrelsen i Kalmar län /Kjellberg, 2003, Personal communication/, the crayfish enterprise is only for recreational crayfishing. There is one aquaculture with crayfish production for recreational fishing within the Misterhult församling. The amount of crayfish harvested is unknown.

## 4.2.6 Mineral extraction

Within Misterhult församling, only three leases for mineral extraction are active. All of these are leases for extraction of decorations stones (prydnadssten).

Within Oskarshamns kommun, 15 leases area active; four leases for extraction of decorations stones, nine leases for gravel (grus) extraction and three for bedrock extraction (bergtäkt).

## 4.2.7 Water supply

The survey on water use performed in 2000 does not have full coverage. However, the figures from 2000 show that water use in Oskarshamns kommun has decreased since 1995, from 4,205,000 m<sup>3</sup> to 3,658,000 m<sup>3</sup>, if we assume that the water use within agriculture is unchanged (see Table 4-60).

The water use in households has decreased, which most likely is a result of a declining population by about 3% between 1995 and 2000. The water use in the category "Others" has increased while the industry has decreased its water use markedly.

Geographic area	Year	Total with-		Wate	r use		Water w	ithdrawal	V	Vater withdra	wal
		drawal							Ground-	Surface	
			households	agriculture	industry <sup>1</sup>	others	public	private	water	water	Unknown <sup>2</sup>
Oskarshamn mun.	1990	3 855	1 685	266	1 103	801	2 670	1 185	710	3 145	
distribution			43.7%	6.9%	28.6%	20.8%	69.3%	30.7%	18.4%	81.6%	
Oskarshamn mun.	1995	4 205	1 619	203	1 171	1 212	2 894	1 311	838	3 140	227
distribution			38.5%	4.8%	27.8%	28.8%	68.8%	31.2%	19.9%	74.7%	5.4%
Oskarshamn mun.	2000		1 556	inga data	626	1 273	2 942	inga data	inga data	inga data	
distribution			42.5%	4.8%	17.1%	34.8%					
Kalmar County	1990	81 758	13 907	11 246	49 957	6 648	22 428	59 330	24 173	55 901	1 684
distribution			17.0%	13.8%	61.1%	8.1%	27.4%	72.6%	29.6%	68.4%	2.1%
Kalmar County	1995	60 360	15 473	9 960	27 452	7 475	22 456	37 905	22 061	38 082	217
distribution			25.6%	16.5%	45.5%	12.4%	37.2%	62.8%	36.5%	63.1%	0.4%
Kalmar County	2000	64 342	15 288	10 023	30 293	8 738	23 214	41 128	20 7 10	43 115	517
distribution			23.8%	15.6%	47.1%	13.6%	36.1%	63.9%	32.2%	67.0%	0.8%
The Country <sup>3</sup>	2000	3 241 000	618 000	135 000	2 166 000	321 000	942 000	2 299 000	542 000	2 539 000	160 000
distribution			19.1%	4.2%	66.8%	9.9%	29.1%	70.9%	16.7%	78.3%	4.9%

## Table 4-60. Water supply (thousands of cubic metres) in Oskarshamns kommun and larger areas.

<sup>1</sup> The figures do not include water use within nuclear power plants

<sup>2</sup> Some of the industries has not given a complete account or they use seawater which is not shown in this table.

<sup>3</sup> The figures are obtained from /SCB, 2003c/

Source: Statistics Sweden

The industrial water use accounted for 17% of the total water use in 2000, which is considerably below the average in the country. The number of work places has decreased between 1997 and 2000, but not in proportion to the decrease of industrial water use (there are no data from 1995 concerning the number of work places). In Kalmar län on the other hand the industry water has increased between 1995 and 2000.

By comparing the water use and water withdrawal in the municipality and the county in the year 1995, it can be seen that proportionately more water is used for households and "Others" in the municipality, but less for industry and agriculture. Proportionately more surface water is used in Oskarshamns kommun than in the county and more water comes from the public water supply in Oskarshamns kommun than in the county.

The water use within the Misterhult församling (and smaller areas) in 2000 has been roughly calculated based on the number of holiday houses in 2002 (there are no figures from 2000), the number of inhabitants in 2000 and the number of farms in 1999 (there are no figures from 2000) (see Table 4-61).

Some assumptions must be made in order to calculate the water use and the water withdrawal. These assumptions are described in chapter 2.

Oskarshamn nuclear power plant (OKG) used approximately 150,000 cubic metres of freshwater in 2002, according to Jörgen Eriksson /Eriksson, 2003, Personal communication/ with reference to the latest environmental impact assessment /OKG, 2004/. The water used within Oskarshamn nuclear power plant has to be added to the figure over water withdrawal from private water supply respectively surface water as the nuclear power plant use the lake Götemar as water supply. The water use within Oskarshamn nuclear power plant represents approximately 1/3 of the total water use within the parish and the main drainage area (72/73). In Simpevarp area it represents approximately 50% and in Simpevarp 9 it represents 100%.

## Table 4-61. Calculated water supply (thousand cubic meters) in Misterhult församling and smaller areas.

Geographic area	Year	Total with-			Water us	se			Wa withd	ater rawal	Wa withdu	ater
		drawal	house holds	holiday	agri- culture	industry	nuclear	others	public	private	ground water	surface water
Simpevarp 5	2000	27.7	18	0.2	0	3.2	0	6.5	19.1	8.6	5.5	20.7
percentage distribution			64.1%	0.7%	0.0%	11.6%	0.0%	23.6%				
Simpevarp 6	2000	3.3	0.8	0.1	0	0.8	0	1.6	2.3	1.0	0.7	2.5
percentage distribution			25.0%	1.6%	0.0%	24.2%	0.0%	49.2%				
Simpevarp 7	2000	2.8	0.4	0	0	0.8	0	1.6	2.0	0.9	0.6	2.1
percentage distribution			14.5%	0.0%	0.0%	28.2%	0.0%	57.3%				
Simpevarp 9	2000	5.3	1.2	0.1	0.0	1.3	0	2.7	3.6	1.6	1.1	3.9
percentage distribution			22.2%	1.0%	0.0%	25.3%	0.0%	51.5%				
Simpevarp 10	2000	38.8	11	0.5	9.6	5.9	0	12	26.8	12.0	7.7	29.0
percentage distribution			27.9%	1.3%	24.8%	15.2%	0.0%	30.8%				
Simpevarp 13	2000	0.0	0	0	0	0	0	0	0.0	0.0	0.0	0.0
percentage distribution												
Simpevarp 17	2000	15.2	3.1	0.4	4.4	2.4	0	4.9	10.5	4.7	3.0	11.3
percentage distribution			20.5%	2.5%	28.9%	15.9%	0.0%	32.3%				
Simpevarp 18	2000	49.1	30	0.4	2.6	5.4	0	11	33.9	15.2	9.8	36.7
percentage distribution			60.8%	0.8%	5.3%	10.9%	0.0%	22.2%				
OKG peninsula	2000	175.1	0	0.1	0	0	175	0	0.0	175.0	0.0	175.1
percentage distribution			0.0%	0.0%	0.0%	0.0%	100.0%	0.0%				
Hålö	2000	0.0	0	0	0	0	0	0				
Ävrö	2000	0.0	0	0	0	0	0	0				
Äspö	2000	0.0	0	0	0	0	0	0				
Archipelago	2000	24.8	9	2.3	0	5	0	9	17.1	7.7	4.9	18.5
percentage distribution			34.8%	9.5%	0.0%	18.4%	0.0%	37.4%				
Coastal_north	2000	15.0	2	0.4	4	3	0	6	10.4	4.7	3.0	11.2
percentage distribution			14.7%	2.8%	23.3%	19.6%	0.0%	39.8%				
Coastal_south	2000	4.1	1	0.4	0	1	0	2	2.8	1.3	0.8	3.0
percentage distribution			30.5%	9.7%	0.0%	19.7%	0.0%	40.1%				
Simpevarp area	2000	338.4	68	2.4	24	23	175	47	112.7	225.6	32.5	297.0
percentage distribution			20.0%	0.7%	7.0%	6.8%	51.7%	13.8%				
Main drainage area												
(72/73)	2000	521.1	154	8.7	42	47	175	95	238.8	282.3	68.9	433.6
percentage distribution			29.6%	1.7%	8.1%	8.9%	33.6%	18.2%				
Misterhult församling	2000	630.7	192	13	52	66	175	134	314.4	316.3	90.7	515.4
percentage distribution			30.4%	2.0%	8.2%	10.4%	27.7%	21.2%				

<sup>1</sup> 5,4 % of the water withdrawal is either seawater or unknown. This volume is not shown in this table.

Calculated: Water supply (thousands of cubic metres) based upon different assumptions shown in chapter 2 as well as the number of holiday houses in 2002, inhabitants in 2000, working sites in 2000 and farms in 1999, in the different areas.

## 4.2.8 Coastal fishing

Kalmar län is the fifth largest fishing county in Sweden and it accounts for more commercial fishing than the rest of the east coast altogether, according to /Länsstyrelsen et al. 2002/.

There are 177 commercial fishermen in Kalmar län according to /Länsstyrelsen et al. 2002/. According to /Fiskeriverket, 2003/ 54 of them are logbook- or journal keeping fishermen (see Table 4-62). The total number of fishermen in Oskarshamn kommun is estimated to ten.

#### Table 4-62. Commercial fishing in Misterhult församling and larger areas.

Geographic area	Year	No. of logbook- or journal-keeping fishermen	Total number of fishermen	Catch (kg)
Misterhult församling <sup>1</sup>	2002	1	3	5 649
mean value	96-02	2.3	7.5	18 507
standard deviation		1.4	4.5	12 548
min value		1	3	5 649
max value		4	13	40 361
Oskarshamns kommun	2002	3	10	16 947
mean value	96-02	6.3	20.6	50 270
standard deviation		3.0	10.0	28 721
min value		2	7	16 947
max value		10	33	90 813
Kalmar län	2002	54	177	4 560 784
mean value	96-02	108.0	354.0	5 248 238
standard deviation		43.9	143.8	1 006 304
min value		54	177	3 946 222
max value		163	534	6 638 496

<sup>1</sup> The smallest area obtained was the postcode zones within Oskarshamns kommun.

The parish belonging is uncertain for some postcode zones. The number of logbook- or journal keeping fishermen in Misterhult församling is therefore not as reliable as the data for Oskarshamns kommun and Kalmar län. The fisherman within postcode zone 57292 is assumed to live within the parish. *Source: Number of logbook- or journal-keeping fishermen and total* 

catch by fishermen living in Oskarshamns kommun and Kalmar län from the National board of fisheries Estimated: The number of logbook- or journal-keeping fishermen in Misterhult parish.

The total number of fishermen in all geographic areas.

Calculated: mean values with standard deviation, minimum- and maximum values

Fishermen living in Borgholm and Västervik kommun catch the main part of the county catch, according to the data from Fiskeriverket. In 2002, fishermen in Borgholm and Västervik kommun caught 84% of the county catch. In the same year, fishermen living in Oskarshamns kommun caught 0.4% of the county catch.

In the off-shore grid (EU-grid) off the coast of Kalmar, the catch is dominating in square 44G7, which begins approximately 10 km northeast of Simpevarp (see Figure 4-13). The average catch between 1995 and 2002 was 4,479 kg/km<sup>2</sup> (Table 4-63). Among the EU-squares along the coastline, the catch per unit area is largest in square 43G6 (both in 2002 and in average 95-02), in which the Simpevarp area is located.

The three dominating species in the off-shore grid in Figure 4-13 is baltic herring (strömming/sill), sprat (skarpsill) and cod (torsk). Cod dominates in the two southern squares 41G6 and 41G7, while baltic herring and sprat is the absolutely most dominating species in the other squares.

There are eight commercial receivers within Kalmar län that buy fish from small as well as large vessels fishing off the coast of Kalmar län. Fishermen living in Kalmar län caught 4,560 tonnes of fish in 2002, according to Fiskeriverket. The same year the commercial receivers in Kalmar län received 18,645 tonnes of fish. This indicates that the receivers obtain fish from vessels coming from other counties. Fiskeriverket /Lundgren, 2003, Personal communication/, considers the commercial fishing outside Kalmar län as relatively intense. Even vessels from the west coast operate in this region. 4% of the received catch is used for animal fodder (fish-meal) and the rest for human consumption.



*Figure 4-13.* The catch per unit area in 2002 (kg/km<sup>2</sup>) and the mean catch per unit area 95-02 (kg) visualised in each EU-square off the coast of Kalmar län, in order to demonstrate the proportions.

EU-square	Year	Baltic	Sprat	Cod	Total		Water area	Catch (kg
		Herring					(km <sup>2</sup> and 10 <sup>6</sup>	per km <sup>2</sup> and
							m <sup>3</sup> )	10 <sup>6</sup> m <sup>3</sup> )
41G6	2002	663 830	1 313 500	676 684	2 687 533		2987	899.8
Mean catch (SD)	95-02	368 899	488 835	1 279 003	2 178 909	(340081)	2987	729.5
As a precentage	95-02	16.9%	22.4%	58.7%	2 110 000	(010001)	2007	120.0
Min value	95-02	105 135	48 250	676 684	1 725 748			
Max value	95-02	777 945	1 313 500	2 091 156	2 687 533			
41G7	2002	10 000	30,000	254 614	296 362		3452	85.9
Mean catch (SD)	95-02	209 228	241 975	950 858	1 418 242	(638783)	3452	410.8
As a precentage	95-02	14.8%	17 1%	67.0%	1 4 10 242	(000700)	0402	410.0
Min value	95-02	10.000	8 000	254 614	296 362			
Max value	95-02	655 800	755 000	1 797 510	2 221 257			
1266	2002	21/ 832	644 000	218 012	1 124 767		1/1/	795 /
Moon cotch (SD)	95-02	217 032	515 213	262 846	1 157 870	(501222)	1414	919.9
	05.02	20 20/	11 50/	202 040	1 137 070	(301232)	1414	010.0
As a precentage	95-02	20.2%	44.5%	22.1 %	272 100			
Min value	95-02	1 000 000	1 0 4 9 1 0 0	109 009	272 109			
	30-02	1 000 200	1 040 100	400 000	2 203 223		2407	2121.6
42G7 Maan aatab (SD)	2002	2 222 000	4 346 300	402 333	7 462 2057	(2007460)	3407	2131.0
Mean catch (SD)	95-02	2 009 423	3 301 223	902 200	7 462 295	(3067460)	3407	2190.2
As a precentage	95-02	38.5%	47.7%	12.9%	4 707 504			
	95-02	208 200	300 000	482 333	1727 501			
Max value	95-02	5 142 519	5 833 602	1 628 901	12 310 533		4000	0445.7
43G6	2002	838 340	2 103 600	194 867	3 183 210	(1007004)	1302	2445.7
Mean catch (SD)	95-02	928 049	1 164 880	111 092	2 248 902	(1327394)	1302	1/2/.9
As a precentage	95-02	41.3%	51.8%	4.9%				
Min value	95-02	160 216	179 000	55 452	558 690			
Max value	95-02	1 788 353	2 255 200	194 867	3 690 825			
43G7	2002	1 457 250	3 327 600	107 422	4 911 099		3250	1510.9
Mean catch (SD)	95-02	4 424 794	4 136 643	262 438	8 860 267	(6037590)	3250	2725.8
As a precentage	95-02	49.9%	46.7%	3.0%				
Min value	95-02	1 092 010	2 492 250	76 762	4 059 381			
Max value	95-02	11 556 729	8 977 790	774 433	20 644 572			
44G6	2002	576 082	902 800	45 923	1 589 458		1108	1434.5
Mean catch (SD)	95-02	643 448	510 525	46 927	1 265 911	(502586)	1108	1142.5
As a precentage	95-02	50.8%	40.3%	3.7%				
Min value	95-02	61 974	11 000	18 397	238 510			
Max value	95-02	1 282 337	981 500	74 065	2 272 048			
44G7	2002	3 652 740	8 165 400	36 422	11 857 584		3314	3577.6
Mean catch (SD)	95-02	7 631 208	7 122 302	72 595	14 844 171	(8466292)	3314	4478.7
As a precentage	95-02	51.4%	48.0%	0.5%				
Min value	95-02	3 652 740	2 007 100	25 327	7 988 286			
Max value	95-02	19 334 990	11 801 750	256 127	31 210 497			
45G6	2002	2 219	0	4 507	26 630		620	42.9
Mean catch (SD)	95-02	116 402	113 419	2 124	265 424	(74330)	620	428.0
As a precentage	95-02	43.9%	42.7%	0.8%				
Min value	95-02	1 872	0	0	21 213			
Max value	95-02	765 777	781 350	10 549	1 616 797			
45G7	2002	3 143 352	4 816 515	2 180	7 966 859		3265	2440.3
Mean catch (SD)	95-02	5 678 870	4 178 396	23 819	9 890 857	(3207657)	3265	3029.6
As a precentage	95-02	57.4%	42.2%	0.2%				
Min value	95-02	3 143 352	2 251 600	0	6 855 248			
Max value	95-02	10 790 150	5 257 500	181 750	16 205 189			

## Table 4-63. Catch (kg) per EU-square off the coast of Kalmar län.

Input data: Total catch (kg) and catch of the tree most common species. Source: Fiskeriverket (the National Board of Fisheries) Calculated: Catch per squarekilometre based on a water area, that is calculated in Arc View.

A mean value with a standard deviation, min and max value and the mean catch by species expressed as a precentage.

## 4.2.9 Outdoor life

## In general

The average time spent on sports and outdoor life has increased since 1990/1991, according to a national survey conducted by /SCB, 2003e/ concerning human time use in 2000/2001. The study included a sample of the population between 20 and 84 years of age. Excluding the time spent on indoor sports, the time spent on outdoor sports and outdoor life is on average approximately 32 minutes per day for women and 35 minutes per day for men. The outdoor life includes country walks and other walks, hunting, fishing, excursions by car as well as other outdoor life. The group that spends most time outdoors is people at 65–84 years of age (living together). Single parents spend the smallest fraction of time on sports and outdoor life.

The total amount of outdoor hours per year in Misterhult församling can be calculated based on the assumption that the inhabitants in the parish spend 35 minutes per day on outdoor sports and outdoor life. Although children and youths are normally outdoors more than adults, a value of 35 minutes per day was used for all inhabitants when calculating. This may be a slight underestimate.

The number of inhabitants in 2002 is 2,709, which gives a total outdoor time of 576,791 hours per year. Part of this time will of course be spent outside the parish border, but in compensation some individuals from neighboring parishes and tourists will spend some of their time within Misterhult församling.

The size of the summer population is unknown. The holiday-houses in Misterhult församling represent 32% of the total number of properties, which is more than in Kalmar län. According to /SKB, 2000/ the number of guest nights in Oskarshamns kommun is only 7% of the total number in Kalmar län, while the population represent 11% of the total population in Kalmar län. It seems like the number of tourist are fewer in Misterhult församling than in other parts of Kalmar län.

## Wildlife hunting

## **Moose hunting**

Moose hunting is more intensive in Misterhult församling than in the municipality and county as a whole (0.35 moose per km<sup>2</sup> compared to 0.30 respectively 0.19 in 2003), according to the figures from /Länsstyrelsen i Kalmar län, 2003b/ (see Table 4-64). According to /Kindberg, 2002/ the estimated harvest of moose in Sweden in 2003 was 102,854. The total hunting area was 324,333 km<sup>2</sup>. That gives a harvest of 0.32 individuals per square kilometre. This indicates that the hunting is more extensive in Misterhult församling than in the country as a whole.

The number of harvested moose does not show a clear tendency in any direction. The number of harvested moose per square kilometre reached a peak in 2000 in Misterhult församling and Oskarshamns kommun (see Figure 4-14).

The number of harvested moose within the smaller areas has been calculated based on the harvested number per unit area in the parish. The live-, carcass- and utilized carcass weights have been calculated based on the mean distribution between bulls, cows and calves in the parish (see Table 4-65).

Geographic area	Year	Hunting-	Number	Area	Total	Harves-	Harves-	Harves-	Harves-	Total	Harvested	Live	Live	Carcass	Carcass	Utilized	Utilized
		zone	of zones	(km²)	permit	ted bulls	ted cows	ted bull calves	ted cow calves		moose per km <sup>2</sup> and	weight (kg)	weight (kg) per km <sup>2</sup>	weight (kg)	weight (kg) per km²	carcass weight (kg)	carcass weight (kg)
											10 <sup>6</sup> m <sup>3</sup>		and 10 <sup>6</sup> m <sup>3</sup>		and 10 <sup>6</sup> m <sup>3</sup>		per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>
Misterhult förs.	2003	Total	40	460	70	53	37	38	31	155	9 0.35	33 155	72	18 235	40	14 588	32
mean value	97-03	Total	58.3	450.1	127.3	66.3	63.6	47.6	41.1	1 218.(	3 0.49	46 365	102.8	25 501	56.5	20 400	45.2
Standard deviation										53.(	5 0.1	11 057	21.6	6 081	11.9	4 865	9.5
min value										15(	9 0.35	33 155	72	18 235	40	14 588	32
max value										28(	09.0	60 504	126	33 277	69	26 622	55
Oskarshamns k.	2003	Total	115	922	188	104	70	57	45	5 276	3 0.30	60 116	65	33 064	36	26 451	29
mean value	97-03	Total	164.9	957.8	350.1	128.0	123.1	89.0	74.1	41	1 0.43	88 594	92.5	48 727	50.9	38 981	40.7
Standard deviation										.96	1 0.1	19 796	20.7	10 888	11.4	8 710	9.1
min value										27(	3 0.30	60 116	65	33 064	36	26 451	29
max value										517	7 0.54	110 736	115	60 905	63	48 724	51
Kalmar län	2003	Total	1605	10428	2437	741	523	397	285	5 1946	3 0.19	429 071	41	235 989	23	188 791	18
mean value	97-03	Total	1834	10435	3687	964	892	608	535	300(	0.29	647 031	62.0	355 867	34.1	284 694	27.3
Standard deviation										565.9	9 0.1	117 500	11.3	64 625	6.2	51 700	5.0
min value										194(	3 0.19	429 071	41	235 989	23	188 791	18
max value										3567	7 0.34	762 255	73	419 240	40	335 392	32
Source: Number of h	arveste	d moose, t	hunting are	a and tot	tal permits	trom the	County A	dministra	tive Board	of Kalma							

Table 4-64. Harvest of moose in Misterhult församling and larger areas.

Calculated: live-, carcass- and utilized carcass weights have been calculated based on figures from Svensk Viitförvaltning AB and Jägareförbundet.

Mean values with standard deviation, minimum- and maximum values. The variables have also been calculated as a figure per unit area.



*Figure 4-14.* Harvest of moose per km<sup>2</sup> in Misterhult församling, Oskarshamn kommun and Kalmar län, during the time period 1997–2003.

Geographic area	Area	Total	Harvested	Live weight	Live weight	Carcass	Carcass	Utilized	Utilized
	(km²)		moose per	(kg)	(kg) per	weight	weight (kg)	carcass	carcass
			km <sup>2</sup> and 10 <sup>6</sup>		km <sup>2</sup> and 10 <sup>6</sup>	(kg)	per km <sup>2</sup> and	weight (kg)	weight (kg)
			m <sup>3</sup>		m <sup>3</sup>		10 <sup>6</sup> m <sup>3</sup>		per km <sup>2</sup> and
									10 <sup>6</sup> m <sup>3</sup>
Simpevarp 5	26.8	13.0	0.49	2 772	103.4	1 525	56.9	1220	45.5
Simpevarp 6	2.0	1.0	0.49	210	103.4	116	56.9	92	45.5
Simpevarp 7	2.1	1.0	0.49	213	103.4	117	56.9	94	45.5
Simpevarp 9	2.8	1.4	0.49	289	103.4	159	56.9	127	45.5
Simpevarp 10	41.1	20.0	0.49	4 249	103.4	2 337	56.9	1870	45.5
Simpevarp 13	1.1	0.5	0.49	113	103.4	62	56.9	50	45.5
Simpevarp 17	6.9	3.4	0.49	718	103.4	395	56.9	316	45.5
Simpevarp 18	9.1	4.4	0.49	942	103.4	518	56.9	415	45.5
OKG peninsula	2.2	1.1	0.49	232	103.4	127	56.9	102	45.5
Hålö	0.6	0.3	0.49	64	103.4	35	56.9	28	45.5
Ävrö	1.8	0.9	0.49	191	103.4	105	56.9	84	45.5
Äspö	0.9	0.4	0.49	95	103.4	52	56.9	42	45.5
Coastal area south	8.1	3.9	0.49	837	103.4	461	56.9	368	45.5
Coastal area north	21.4	10.4	0.49	2 213	103.4	1 217	56.9	974	45.5
Archipelago <sup>1</sup>									
Simpevarp area	127.0	61.7	0.49	13 131	103.4	7 222	56.9	5778	45.5
Main drainage area	227.5	110.5	0.49	23 522	103.4	12 937	56.9	10350	45.5

a = -0. Calculated halvest of mouse in the main dramage area and smaller are	Table 4-65.	-65. Calculated harves	t of moose in	the main drainage	e area and smaller	areas
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<sup>1</sup> Hunting on the islands in the archipelago is assumed to almost none occurring as the islands (apart from Ävrö) are excluded

in the polygon over Oskarshamns Norra jaktvårdskrets. Subarea Ävrö is included in the Archipelago.

The hunting in the Archipelago is therefore presumed to be equal to the hunting in subarea Ävrö.

Input data: The mean value (1997-2003) of harvested moose in Misterhult församling.

Calculated: The live-, carcass- and utilized carcass weights have been calculated based on the mean harvested value in

Misterhult församling (97-03) and the mean distribution of harvested bulls, cows and calves in Misterhult församling.

## Other wildlife

#### Roe deer

The hunting of roe deer is most intensive in the southern part of Sweden (Götaland) and most concentrated in Kalmar län, Hallands län and the northwest part of Skåne län according to Figure 4-15. The harvest was over 1.5 individuals per square kilometre in Kalmar län (season 1999/2000) and a considerable part of the county harvested more than two individuals per square kilometre.

The estimated figures in Table 4-66, concerning the harvest in the parish and smaller areas, are based on the figures for the hunting zone of Oskarshamns Norra jaktvårdskrets (Oskarshamns North hunting association) obtained from /Svenska Jägareförbundet, 2003e/. According to these figures the harvest has on average been 2.15 individuals per square kilometre in the parish during the time period 1997–2001.



*Figure 4-15. Roe deer hunting in Sweden (number shot per 1,000 ha).* Source: /Svenska Jägareförbundet, 2003d, internet/

Geographic area	Year	Report Cover	Harvest, individuals per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Harvest, number of individuals	Live weight (kg)	Live weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Carcass weight (kg)	Carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Utilized carcass weight (kg)	Utilized carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>
Simpevarp 5	2001	33%	1.30	35	741	27.7	408	15.2	326	12.2
mean value	97-01	32%	2.15	58	1 227	45.8	675	25.2	540	20.1
Simpevarp 6	2001	33%	1.30	3	55	27.7	30	15.2	24	12.2
mean value	97-01	32%	2.15	4	92	45.8	50	25.2	40	20.1
Simpevarp 7	2001	33%	1.30	3	58	27.7	32	15.2	26	12.2
mean value	97-01	32%	2.15	5	96	45.8	53	25.2	42	20.1
Simpevarp 9	2001	33%	1.30	4	77	27.7	43	15.2	34	12.2
mean value	97-01	32%	2.15	6	128	45.8	71	25.2	56	20.1
Simpevarp 10	2001	33%	1.30	53	1 137	27.7	625	15.2	500	12.2
mean value	97-01	32%	2.15	88	1 882	45.8	1 035	25.2	828	20.1
Simpevarp 13	2001	33%	1.30	1	30	27.7	17	15.2	13	12.2
mean value	97-01	32%	2.15	2	50	45.8	28	25.2	22	20.1
Simpevarp 17	2001	33%	1.30	9	191	27.7	105	15.2	84	12.2
mean value	97-01	32%	2.15	15	316	45.8	174	25.2	139	20.1
Simpevarp 18	2001	33%	1.30	12	252	27.7	138	15.2	111	12.2
mean value	97-01	32%	2.15	20	417	45.8	229	25.2	183	20.1
OKG peninsula	2001	33%	1.30	3	61	27.7	33	15.2	27	12.2
mean value	97-01	32%	2.15	5	101	45.8	55	25.2	44	20.1
Hålö	2001	33%	1.30	1	17	27.7	9	15.2	7	12.2
mean value	97-01	32%	2.15	1	27	45.8	15	25.2	12	20.1
Ävrö	2001	33%	1.30	2	50	27.7	27	15.2	22	12.2
mean value	97-01	32%	2.15	4	82	45.8	45	25.2	36	20.1
Äspö	2001	33%	1.30	1	25	27.7	14	15.2	11	12.2
mean value	97-01	32%	2.15	2	41	45.8	23	25.2	18	20.1
Coastal_north	2001	33%	1.30	28	592	27.7	325	15.2	260	12.2
mean value	97-01	32%	2.15	46	980	45.8	539	25.2	431	20.1
Coastal_south	2001	33%	1.30	11	224	27.7	123	15.2	99	12.2
mean value	97-01	32%	2.15	17	371	45.8	204	25.2	163	20.1
Archipelago 1			0.00							
mean value			0.00							
Simpevarp area	2001	33%	1.30	165	3 512	27.7	1 932	15.2	1 545	12.2
mean value	97-01	32%	2.15	273	5 816	45.8	3 199	25.2	2 559	20.1
Main drainage area 72/73)	2001	33%	1.30	295	6 291	27.7	3 460	15.2	2 768	12.2
mean value	97-01	32%	2.15	489	10 418	45.8	5 730	25.2	4 584	20.1
Misterhult förs.	2001	33%	1.30	529	11 280	27.7	6 204	15.2	4 963	12.2
mean value	97-01	32%	2.15	876	18 673	45.8	10 270	25.2	8 216	20.1
standard deviation	n		0.99	406	8 649	21.2	4 757	11.7	3 805	9.3
min value			1.21	492	10 500	25.7	5 775	14.2	4 620	11.3
max value			3.42	1 394	29 730	72.9	16 351	40.1	13 081	32.1

#### Table 4-66. Calculated harvest of roe deer in Misterhult församling and smaller areas.

<sup>1</sup> Hunting on the islands in the archipelago is assumed to almost none occurring as the islands (apart from Ävrö) are excluded

in the polygon over Oskarshamns Norra jaktvårdskrets. Subarea Ävrö is included in the Archipelago.

The hunting in the Archipelago is therefore presumed to be equal to the hunting in subarea Ävrö.

Source: Jägareförbundet, Report cover and number of harvested individuals per unit area for Oskarshamns Norra jaktvårdskrets The figures are applied to Misterhult församling and smaller areas.

Calculated: Number of harvested individuals, live weight, carcass weight and utilized carcass weight.

The weight figures have been calculated based on figures from Svensk Viltförvaltning AB and Jägareförbundet.

## Hare

0.1–0.6 common hare (European hare), per square kilometre was harvested in Kalmar län in 99/00 according to Figure 4-16. The harvest is most intensive in Halland and Skåne län as well as the southern part of Öland. According to the statistics from /Svenska Jägareförbundet, 2003e/, the harvest has in average been 0.29 individuals per square kilometre in the parish during the period 1997–2001 (see Table 4-67).

The alpine hare population (mountain hare) has declined in number during the last years. As a natural consequence the hunting has therefore diminished as well. 0–0.2 hares per square kilometre were harvested in Kalmar län in 99/00 according to Figure 4-17. The harvest is most concentrated in the eastern part of Norrbottens län. According to the statistics from Jägareförbundet, the harvest has in average been 0.1 individuals per square kilometre in the parish during the period 1997–2001 (see Table 4-68).



*Figure 4-16. Hunting of common hare in Sweden (number shot per 1,000 ha).* Source: /Svenska Jägareförbundet, 2003d, internet/



*Figure 4-17. Hunting of alpine hare in Sweden (number shot per 1,000 ha).* Source: /Svenska Jägareförbundet, 2003d, internet/

Geographic area	Year	Report Cover	Harvest, individuals per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Harvest, number of individuals	Live weight (kg)	Live weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Carcass weight (kg)	Carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Utilized carcass weight (kg)	Utilized carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>
Simpevarp 5	2001	33%	0.31	8.3	41.5	1.5	22.8	0.9	18.3	0.7
mean value	97-01	32%	0.29	7.7	38.7	1.4	21.3	0.8	17.0	0.6
Simpevarp 6	2001	33%	0.31	0.6	3.1	1.5	1.7	0.9	1.4	0.7
mean value	97-01	32%	0.29	0.6	2.9	1.4	1.6	0.8	1.3	0.6
Simpevarp 7	2001	33%	0.31	0.7	3.3	1.5	1.8	0.9	1.4	0.7
mean value	97-01	32%	0.29	0.6	3.0	1.4	1.7	0.8	1.3	0.6
Simpevarp 9	2001	33%	0.31	0.9	4.3	1.5	2.4	0.9	1.9	0.7
mean value	97-01	32%	0.29	0.8	4.0	1.4	2.2	0.8	1.8	0.6
Simpevarp 10	2001	33%	0.31	12.7	63.6	1.5	35.0	0.9	28.0	0.7
mean value	97-01	32%	0.29	11.9	59.4	1.4	32.7	0.8	26.1	0.6
Simpevarp 13	2001	33%	0.31	0.3	1.7	1.5	0.9	0.9	0.7	0.7
mean value	97-01	32%	0.29	0.3	1.6	1.4	0.9	0.8	0.7	0.6
Simpevarp 17	2001	33%	0.31	2.1	10.7	1.5	5.9	0.9	4.7	0.7
mean value	97-01	32%	0.29	2.0	10.0	1.4	5.5	0.8	4.4	0.6
Simpevarp 18	2001	33%	0.31	2.8	14.1	1.5	7.8	0.9	6.2	0.7
mean value	97-01	32%	0.29	2.6	13.1	1.4	7.2	0.8	5.8	0.6
OKG peninsula	2001	33%	0.31	0.7	3.4	1.5	1.9	0.9	1.5	0.7
mean value	97-01	32%	0.29	0.6	3.2	1.4	1.7	0.8	1.4	0.6
Hålö	2001	33%	0.31	0.2	0.9	1.5	0.5	0.9	0.4	0.7
mean value	97-01	32%	0.29	0.2	0.9	1.4	0.5	0.8	0.4	0.6
Ävrö	2001	33%	0.31	0.6	2.8	1.5	1.5	0.9	1.2	0.7
mean value	97-01	32%	0.29	0.5	2.6	1.4	1.4	0.8	1.1	0.6
Äspö	2001	33%	0.31	0.3	1.4	1.5	0.8	0.9	0.6	0.7
mean value	97-01	32%	0.29	0.3	1.3	1.4	0.7	0.8	0.6	0.6
Coastal_north	2001	33%	0.31	6.6	33.1	1.5	18.2	0.9	14.6	0.7
mean value	97-01	32%	0.29	6.2	30.9	1.4	17.0	0.8	13.6	0.6
Coastal_south	2001	33%	0.31	2.5	12.5	1.5	6.9	0.9	5.5	0.7
mean value	97-01	32%	0.29	2.3	11.7	1.4	6.4	0.8	5.1	0.6
Archipelago <sup>1</sup>										
mean value										
Simpevarp area	2001	33%	0.31	39	197	1.5	108	0.9	87	0.7
mean value	97-01	32%	0.29	37	184	1.4	101	0.8	81	0.6
Main drainage area 72/73)	2001	33%	0.31	70	352	1.5	194	0.9	155	0.7
mean value	97-01	32%	0.29	66	329	1.4	181	0.8	145	0.6
Misterhult förs.	2001	33%	0.31	126	632	1.5	347	0.9	278	0.7
mean value	97-01	32%	0.29	117	583	1.4	321	0.8	257	0.6
standard deviation			0.1	46	229	0.6	126	0.3	101	0.2
min value			0.17	70	348	0.9	192	0.5	153	0.4
max value			0.44	180	899	2.2	495	1.2	396	1.0

## Table 4-67. Calculated harvest of common hare in Misterhult församling and smaller areas.

<sup>1)</sup> Hunting on the islands in the archipelago is assumed to almost none occurring as the islands (apart from Ävrö) are excluded

in the polygon over Oskarshamns Norra jaktvårdskrets. Subarea Ävrö is included in the Archipelago.

The hunting in the Archipelago is therefore presumed to be equal to the hunting in subarea Ävrö.

Source: Jägareförbundet, Report cover and number of harvested individuals per unit area for Oskarshamns Norra jaktvårdskrets

The figures are applied to Misterhult församling and smaller areas

Calculated: Number of harvested individuals, live weight, carcass weight and utilized carcass weight.

The weight figures have been calculated based on figures from Svensk Viltförvaltning AB and Jägareförbundet.

Geographic area	Year	Report Cover	Harvest, individuals per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Harvest, number of individuals	Live weight (kg)	Live weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Carcass weight (kg)	Carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>	Utilized carcass weight (kg)	Utilized carcass weight (kg) per km <sup>2</sup> and 10 <sup>6</sup> m <sup>3</sup>
Simpevarp 5	2001	33%	0.04	1.0	3.8	0.14	2.1	0.08	1.7	0.06
mean value	97-01	32%	0.10	2.7	10.7	0.40	5.9	0.22	4.7	0.18
Simpevarp 6	2001	33%	0.04	0.1	0.3	0.14	0.2	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.2	0.8	0.40	0.4	0.22	0.4	0.18
Simpevarp 7	2001	33%	0.04	0.1	0.3	0.14	0.2	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.2	0.8	0.40	0.5	0.22	0.4	0.18
Simpevarp 9	2001	33%	0.04	0.1	0.4	0.14	0.2	0.08	0.2	0.06
mean value	97-01	32%	0.10	0.3	1.1	0.40	0.6	0.22	0.5	0.18
Simpevarp 10	2001	33%	0.04	1.5	5.9	0.14	3.2	0.08	2.6	0.06
mean value	97-01	32%	0.10	4.1	16.4	0.40	9.0	0.22	7.2	0.18
Simpevarp 13	2001	33%	0.04	0.0	0.2	0.14	0.1	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.1	0.4	0.40	0.2	0.22	0.2	0.18
Simpevarp 17	2001	33%	0.04	0.2	1.0	0.14	0.5	0.08	0.4	0.06
mean value	97-01	32%	0.10	0.7	2.8	0.40	1.5	0.22	1.2	0.18
Simpevarp 18	2001	33%	0.04	0.3	1.3	0.14	0.7	0.08	0.6	0.06
mean value	97-01	32%	0.10	0.9	3.6	0.40	2.0	0.22	1.6	0.18
OKG peninsula	2001	33%	0.04	0.1	0.3	0.14	0.2	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.2	0.9	0.40	0.5	0.22	0.4	0.18
Hålö	2001	33%	0.04	0.0	0.1	0.14	0.0	0.08	0.0	0.06
mean value	97-01	32%	0.10	0.1	0.2	0.40	0.1	0.22	0.1	0.18
Ävrö	2001	33%	0.04	0.1	0.3	0.14	0.1	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.2	0.7	0.40	0.4	0.22	0.3	0.18
Äspö	2001	33%	0.04	0.0	0.1	0.14	0.1	0.08	0.1	0.06
mean value	97-01	32%	0.10	0.1	0.4	0.40	0.2	0.22	0.2	0.18
Coastal_north	2001	33%	0.04	0.8	3.1	0.14	1.7	0.08	1.4	0.06
mean value	97-01	32%	0.10	2.1	8.6	0.40	4.7	0.22	3.8	0.18
Coastal_south	2001	33%	0.04	0.3	1.2	0.14	0.6	0.08	0.5	0.06
mean value	97-01	32%	0.10	0.8	3.2	0.40	1.8	0.22	1.4	0.18
Archipelago <sup>1</sup>										
mean value										
Simpevarp area	2001	33%	0.04	4.6	18.2	0.14	10.0	0.08	8.0	0.06
mean value	97-01	32%	0.10	12.7	50.8	0.40	27.9	0.22	22.4	0.18
Main drainage area 72/73)	2001	33%	0.04	8.2	32.7	0.14	18.0	0.08	14.4	0.06
mean value	97-01	32%	0.10	22.8	91.0	0.40	50.1	0.22	40.0	0.18
Misterhult parish	2001	33%	0.04	14.6	58.6	0.14	32.2	0.08	25.8	0.06
mean value	97-01	32%	0.10	41.5	165.8	0.41	91.2	0.22	73.0	0.18
standard deviation			0.07	29.8	119.1	0.29	65.5	0.16	52.4	0.13
min value			0.02	8.3	33.3	0.08	18.3	0.04	14.7	0.04
max value			0.18	72.0	287.9	0.71	158.3	0.39	126.7	0.31

## Table 4-68. Calculated harvest of alpine hare in Misterhult församling and smaller areas.

<sup>1</sup> Hunting on the islands in the archipelago is assumed to almost none occurring as the islands (apart from Ävrö) are excluded

in the polygon over Oskarshamns Norra jaktvårdskrets. Subarea Ävrö is included in the Archipelago.

The hunting in the Archipelago is therefore presumed to be equal to the hunting in subarea Ävrö.

Source: Jägareförbundet, Report cover and number of harvested individuals per unit area for Oskarshamns Norra jaktvårdskrets

The figures are applied to Misterhult församling and smaller areas

Calculated: Number of harvested individuals, live weight, carcass weight and utilized carcass weight.

The weight figures have been calculated based on figures from Svensk Viltförvaltning AB and Jägareförbundet.

#### Picking of wild-berries and mushrooms

According to /Berggren and Kyläkorpi, 2002/, 23.0 million litres of berries were picked for own-consumption in Sweden in 1997. The main part (83%) was lingonberries and blue berries. The total area of forest and mires in Sweden is 284,000 km<sup>2</sup> /SCB, 1998/, which gives an average amount of 81 litres/km<sup>2</sup> of wild berries in the forests and mires. The total amount of picked berries has been calculated for the Simpevarp area, Oskarshamns kommun and Kalmar län. There are no available data of the forest area in Misterhult församling is therefore excluded from Table 4-69.

Geographic area	Litres per km <sup>2</sup> land area of forest and mire (average in Sweden)	Forest area <sup>1</sup> (km <sup>2</sup> )	Picked berries (litres)	Land (km <sup>2</sup> )	area	Picked berries, litres/km <sup>2</sup> land area	
Simpevarp area	81	1 <sup>.</sup>	12 9	9072	125	-	73
Oskarshamns kommun	81	75	56 61	236	1047	Ę	58
Kalmar län	81	759	95 615	5195	11171	Ę	55

#### Table 4-69. Picking of wild berries.

<sup>1</sup> The forest area for Kalmar län includes mires

Source: Forest area for the municipality and county from /SCB, 1998/. The forest area and land area for Simpevarp area from /Boresjö-Bronge and Wester, 2003/. The forest and mire area for Sweden from /SCB, 1998/. Calculated: The total amount (litres) of berries picked in Simpevarp area, Oskarshamn kommun and Kalmar län, expressed as litres and litres/km<sup>2</sup> land area.

The average amount picked per km<sup>2</sup> forest and mire area has been obtained by dividing the estimated amount that is picked in Sweden yearly, with the forest- and mire area in Sweden

According to /Berggren and Kyläkorpi, 2002/, 15.3 million litres of mushrooms were picked for own-consumption in Sweden in 1997. The total area of forest and mires in Sweden is 284,000 km<sup>2</sup> /SCB, 1998/, which gives an average amount of 54 litres/km<sup>2</sup> of mushrooms in the forests and mires. The total amount of picked mushrooms has been calculated for the Simpevarp area, Oskarshamns kommun and Kalmar län. There are no available data of the forest area in Misterhult församling. Misterhult församling is therefore excluded from Table 4-70.

#### Table 4-70. Picking of mushrooms.

Geographic area	Litres per km <sup>2</sup> land area of forest and mire (average in Sweden)	Forest area <sup>1</sup> (km <sup>2</sup> )	Picked mushrooms (litres)	Land area (km <sup>2</sup> )	Picked mushrooms, litres/km <sup>2</sup> land area
Simpevarp area	54	112	6048	125	48
Oskarshamns kommun	54	756	40824	1047	39
Kalmar län	54	7595	410130	11171	37

<sup>1</sup> The forest area for Kalmar län includes mires

Source: Forest area for the municipality and county from /SCB, 1998/. The forest area and land area for Simpevarp area from /Boresjö-Bronge and Wester, 2003/. The forest and mire area for Sweden from /SCB, 1998/. Calculated: The total amount (litres) of mushrooms picked in Simpevarp area, Oskarshamn kommun and Kalmar län, expressed as litres and litres/km<sup>2</sup> land area.

The average amount picked per km<sup>2</sup> forest and mire area has been obtained by dividing the estimated amount that is picked in Sweden yearly, with the forest- and mire area in Sweden

## Fishing

## Catch by sport fishermen

According to the publication Fakta om Kalmar län /Länsstyrelsen i Kalmar län et al. 2002/ recreational fishing is a common activity both in lakes and coastal areas. The fishing tourism is well expanded and still growing.

A theoretical value over the yearly catch has been calculated based on the facts in the report Fiske 2000 /Fiskeriverket, 2000/, presuming that the recreational fishers (55% of the population between 16 and 64 years) are sport fishermen that catch 18 kg per year, see more about the processing in chapter 2. This seems like a very high value, so the calculations are definitely not underestimated. The catch per geographic area is fully dependant on the number of inhabitants and has no connection to the number of fishing waters and their area.

Geographic area	Year	Number of inhabitants (16- 64 y) in 2002	Catch (kg)	Catch (kg/km <sup>2</sup> )
Simpevarp 5	2002	126	1 247	46.5
Simpevarp 6	2002	7	69	34.7
Simpevarp 7	2002	3	30	14.1
Simpevarp 9	2002	10	99	35.4
Simpevarp 10	2002	93	921	22.4
Simpevarp 13	2002	3	30	27.0
Simpevarp 17	2002	35	347	50.2
Simpevarp 18	2002	233	2 307	253.5
OKG peninsula	2002	0	0	0.0
Hålö	2002	0	0	0.0
Ävrö	2002	0	0	0.0
Äspö	2002	0	0	0.0
Archipelago	2002	73	723	79.4
Coastal_north	2002	17	168	18.5
Coastal_south	2002	16	158	17.4
Simpevarp area	2002	553	5 475	56.1
Main drainage area (72/73)	2002	1 306	12 929	56.8
Misterhult församling	2002	1 633	16 167	39.6
Oskarshamn kommun	2002	16 208	160 459	153.3
Kalmar län	2002	146 656	1 451 894	130.0

## Table 4-71. Calculated catch by sport fishermen.

Calculated: catch (kg and kg/km<sup>2</sup>) based on the facts in /Fiskeriverket, 2000/ and

the number of inhabitants between 16 and 64 years in 2002

## Sport-fishing clubs

There is one sport fishing club in Oskarshamns kommun, called SFK Fisken, according to /Sveriges Sportfiske- och fiskevårdsförbund, 2003, internet/. The club has 75 members and one "put and take" lake, Isgölen, 15 km east of Oskarshamn. There is no sport fishing club within Misterhult församling. Some 400–500 kg of rainbow trout are put into Isgölen every year. The put and take is registered as well as the catch figures from eight competitions that take place every year according to /Göran Bäckman, 2003, personal communication/.

One of the sport-fishing clubs in Mönsterås kommun, Fliseryds sportfiskeklubb, leases the lakes Lilla and Stora Hällesjön in Oskarshamns kommun for put and take. 400–500 kg of rainbow trout are put into these two lakes every year. The catch figures are not registered. Fliseryds sportfiskeklubb is the largest sport-fishing club in Kalmar län with almost 300 members and an own fishing camp. The club arranges a number of competitions every year /Peder Johansson, 2003, personal communication/.

## Attractive fishing-waters

According to /Oskarshamns Turistbyrå, 2003, internet/ there are six fishing waters in Oskarshamns kommun, besides the Baltic sea. These are shown in Table 4-72.

Fishing water	Parish	Type of water	Other
Emån	Döderhult församling	The largest river in Småland.	According to Cinclus C Sportfiskeguide (www.cinclusc.com/spfguide/index.htm) there are six fishing licence zones in Emån, of which Fliseryd sportfiskeklubb leases one.
Stora Hällesjön	Döderhult församling	Lake (put and take water).	Boats can be rented.
Lilla Hällesjön	Döderhult församling	Lake (put and take water).	
Hummeln	Kristala församling	Lake with good water quality.	
Boarumegöl	Kristala församling	Lake.	
Marströmmen	Misterhult församling	River with running water and small lakes.	

## Table 4-72. Fishing waters in Oskarshamn kommun.

There are seven attractive fishing-waters within Oskarshamns kommun if the put and take lake Isgölen is included. There is only one attractive fishing-water within Misterhult församling and that is Marströmmen. According to Peder Johansson there is one fishery administration area in Marströmmen that sells fishing licenses.

## Golf

There are two golf courses within the Oskarshamns kommun according /Oskarshamns kommun, 2003b, internet/. There is one 18-hole golf course in Skorpetorp about 10 km southwest of Oskarshamn that belongs to Oskarshamns golfklubb. Oskarshamns golfklubb has approximately 1,100 members /Oskarshamns Golfklubb, 2003, internet/.

Figeholms Golf & Country Club has a nine-hole golf course by the sea, about one kilometre from the centre of Figeholm. The club also has a holiday village, a conference centre and a camping, managed by Figeholm Fritid & konferens AB. Figeholms Golf & Country Club has 1,600 members /Figeholms Golf & Country Club, 2003, internet/.
Figeholm Golf & Country Club is the only golf course within Misterhult församling and the main drainage area (72/73). According to the map in /Gula Sidorna, 2003, internet/ Figeholm Golf & Country Club is not located within the Simpevarp area.

In 2003 Svenska Golfförbundet, The Swedish Golf Association, had 593,873 Swedish members which represents 6.6% of the population /Svenska Golfförbundet, 2003, internet/. The association has seen its number of members increase with 3.5–7.5% per year over the last ten years. The number of members in the two golfclubs in Oskarshamn (26,161 in the year 2002) represent 10.3% of the local population. There may of course exist inhabitants in the municipality who are members in golfclubs outside the municipality, as well as there may exist members in Oskarshamn and Figeholm golfclubs who do not reside within the municipality. In all, it seems as if the number of golfplayers in the municipality of Oskarshamn is higher than the national average.

# Hiking and jogging

# Hiking trails

According to /Oskarshamns kommun, 2003c/ there are five different hiking trails in Oskarshamns kommun, of which two are completely within Misterhult församling. More than half of Ostkustleden is located within Misterhult församling. There is also a popular countryside, called Bråbygden, with hiking possibilities /Odén, 2004, personal communication/ (see Table 4-73).

Hiking trail	Parish	Description
Ostkustleden	partly within Misterhult församling	Ostkustleden is a 160 kilometre long hiking trail around the district of Oskarshamn. The trail is divided into eight different sections of approximately 20 km each. Overnight cottages are available at the end of each section.
The Äspö hiking trail	Misterhult församling	The Äspö hiking trail is an exciting trip in a geological time machine.
Simpevarvet	Misterhult församling	A nature trail through the forest and down to the sea. Along the trail there are tourist boards describing the archipelago and local history, and also providing information about the OKG nuclear power plant in Oskarshamn
Målsjön in Röstorp	Kristdala församling	Lake Målsjön has long been a popular centre for birdlife.
Krokshult	Kristdala församling	An area steeped in historical tradition and full of unique pastures and fields. The scenery is a mixture of forest, pastures and meadows, and there are also a number of traditional Swedish red wooden houses.
Bråbygden	Kristdala församling	A living countryside of 5,400 ha, with a rare flora and fauna. The cultural environment is genuine and rich. Farmland and villages untouched by recent development. There are a few different foot paths to chose between.

#### Table 4-73. Hiking trails in Oskarshamn kommun.

Nature reserves are often attractive areas for outdoor life. According to /Länsstyrelsen i Kalmar län, 2003a, internet/ there are 13 nature reserves within Oskarshamns kommun, of which four are within Misterhult församling:

Nature reserve	Description
Talldungen	Talldungen is a natural pine forest of 4.6 hectares near Misterhult village.
Misterhults archipelago	A large part of the north archipelago is protected trough Misterhults nature reserve, in total 8,500 hectares. There are a number of bird conservation areas within the reserve as well as a seal conservation area at Örö sankor. The area is also of national interest for nature conservation and out-door life.
Stenhagen at Figeholm	Stenhagen is a small reserve of 1.4 hectares dominated by oak-trees.
Virbo with Ekö	Virbo is a reserve in the archipelago of 675 hectares of which 200 hectares is land.

#### Table 4-74. Nature reserves within Misterhult församling.

Talldungen and Stenhagen are within the Main drainage area (72/73) and the Simpevarp area (Simpevarp 5 respectively Simpevarp 18). A smaller part of Virbo is located within the Main drainage area (72/73).

If we summarise the hiking trails and the nature reserves there are seven areas for country walks within Misterhult församling.

# **Jogging tracks**

There are four jogging tracks within Misterhult församling and the Main drainage area (72/73) according to /Oskarshamns kommun, 2003c/. These are in Fårbo, Figeholm, Misterhult and Simpevarp. In /Oskarshamns kommun, 2004/, Simpevarp is characterized as a hiking trail instead of a jogging track and we choose to do the same. Accordingly there are three jogging tracks within Misterhult församling. One of them, Misterhult jogging track, is within the Simpevarp area (located at Hålö). The jogging tracks in Fårbo and Figeholm are just outside the Simpevarp area.

# Bird watching

According to /Oskarshamnsbygdens fågelklubb, 2003, internet/ (ornithological association) there are two attractive ornithological spots within the parish; Simpevarp och Kråkelund. There are eight spots within the municipality.

Simpevarp ornithological spot is located within the main drainage area (72/73) and the Simpevarp area (OKG peninsula). Oskarshamnsbygdens fågelklubb has 148 members, of which 118 is living in Oskarshamns kommun according to /Hans Bohlin, 2003, personal communication/.

#### Canoeing

#### **Canoe routes**

According to /Kanotguiden, 2003, internet/ there are two canoe routes within Oskarshamns kommun. The first one, Oskarshamns archipelago (no 11), is 30 kilometres and goes between Påskallavik and Figeholm. The other one, Misterhults archipelago (no 32), is 45 kilometres and continues north, from Figeholm to Händelöp. According to /Oskarshamns kommun, 2003b, internet/ there are nice paddle opportunities in Emån river with both calm and wild rapids to paddle through and around the island of Gunnarsö, three kilometres from Oskarshamn. Emån does not run within Oskarshamns kommun apart from the last distance (approx seven kilometres) of Emån that follows the south municipality boarder.

#### **Canoe renters**

There is only one canoe route in Misterhults parish and that is no 32 between Figeholm and Händelöp. In Oskarshamns kommun canoes can be rented at Figeholm Fritid & konferens according to /Kanotguiden, 2003, internet/ and at Gunnarsö camping according to /Oskarshamns kommun, 2003b, internet/. Figeholm Fritid & konferens is located within the Misterhult församling. Ostkustens Aktivitetscentrum in Oskarshamn arranges canoe hikes and they have access to about 30 canoes which can be rented according to /Inge Svensson, 2003, personal communication/.

# Sun-bathing

There are 13 open-air baths along the coastline within the Oskarshamns kommun according to /Oskarshamns kommun, 2003c/. Two of them are within Misterhult församling (Laxemar and Figeholm). Furthermore, there are ten bathing places nearby lakes within the municipality, of which four are within the parish. These are Fårbo, Götemar, Krokstorp and Mörtfors. Laxemar, Figeholm and Götemar are situated within the Main drainage area. Laxemar is the only bathing place within the Simpevarp area (Hålö). According to /Odén, 2004, Personal communication/ the discharge of cooling water from OKG is an attractive bathing place within the Simpevarp area.

# Camping

There are four camping grounds within the municipality according to /Oskarhamns kommun, 2003b, internet/. These are shown in Table 4-75 below. Figeholm Fritid och Konferens is the only camping within Misterhult församling and the main drainage area (72/73). Figeholm Fritid och Konferens is not located within the Simpevarp area, according to the map in /Gula Sidorna, 2003, internet/

#### Table 4-75. Camping sites in Oskarshamn kommun.

Name	Camping sites	Cottages	Other	Other source
Figeholm Fritid och konferens AB, Figeholm	80 camping sites of which 13 are guest sites	117	Canoes to rent	/Figeholm Fritid och Konferens AB, 2003, internet/
Gunnarsö camping, Oskarshamn	150 camping sites		Bikes and canoes for rent	
Havslätts Café och Camping, Oskarshamn	95 camping sites and tent sites	4	Rowboats for rent	/Havslätts café och Camping, 2003, internet/
Nötö camping, Påskallavik	40			

# Boatlife

# **Guest harbours**

There are five guest harbours in Oskarshamns kommun according to /Oskarshamns kommun, 2003b, internet/ and /Oskarshamns kommun, 2003c/. Two of them are situated within Misterhult församling and the main drainage area (72/73), both are outside the Simpevarp area though.

Name	Parish	Guest sites	Other	Other source
Klintemåla	Misterhult	10–12		
Figeholm	Misterhult	30	Approx 1,000 guest boats from Sweden, Germany, Denmark and Holland visit the guest harbour each summer according to Figeholms båtklubb.	/Figeholms Båtklubb, 2003, internet/
Påskallavik	Döderhult	14		
Oskarshamn	Oskarshamn	80–100		
Ernemar	Oskarshamn	40		

 Table 4-76. Guest harbours in Oskarshamn kommun.

# Marinas

There are 19 marinas within Oskarshamns kommun according to /Oskarshamns kommun, 2003c/ of which five are within the Misterhult församling. These are:

- Lindnäs båtvarv (approx 3.5 mil north of Klintemåla),
- Klintemåla bryggförening,
- Kärrsviks båtklubb (approx 3.5 mil north of OKG),
- OKG's brygga,
- Löjvikens bryggförening at Figeholm.'

Furthermore, Figeholms båtklubb is a marina near the border to the Simpevarp area /Odén, 2004, personal communication/.

OKG's brygga is the only marina certainly within the Simpevarp area (OKG peninsula). Löjvikens and Kärrsviken are just outside the Simpevarp area. No more information concerning the number of berths at each marina has been found.

# **Boat renters**

There seems to be four boat renters in Oskarshamns kommun:

- Rowboats and motorboats can be rented at Figeholm Marin AB /Figeholm Marin AB, 2003, internet/.
- Rowboats and canoes can be rented at Gunnarsö cottage village /Oskarshamns Turistbyrå, 2003, internet/.
- Canoes can be rented at Figeholm Fritid och konferens /Figeholm Fritid och konferens AB, 2003, internet/
- Rowboats can be rented at Havslätts Café och Camping /Havslätts Café och Camping, 2003, internet/.

Figeholm Marin AB and Figeholm Fritid och konferens AB are within the Misterhult församling, but probably not within the Simpevarp area.

# 4.2.10 Self-sufficiency degree

In the table below, the degree of self-sufficiency for some food products in the Misterhult församling has been calculated. The average consumption per person and year (kg) has been obtained from /Jordbruksverket, 2003/ (see Table 4-77). The preliminary figures for 2001 have been used. Furthermore, the latest population figure (from 2002) has been used. The production figures are mean values of the data obtained.

Product	Consumption	Production	S-s degree (%)
	(kg)	(kg)	
Grain, flour and flour products	264,940	1,299,215	490.4
Potatoes	118,925	27,959	23.5
Veal	26,277	42,928	163.4
Lamb	2,,167	1,397	64.5
Pork	40364	35,994	89.2
Chicken	34,404	1,872	5.4
Game meat (moose, roe deer, hare)	5,418	28,950	534.3
Meat including delicatessen, total	194,235	111,141	57.2
Own-produced meat	813 <sup>2</sup>	111,141	13670
Fish <sup>1</sup>	50,387	34,674	68.8
Eggs	26,819	824	3.1
Milkproducts	525,817	8,320	1.6
Own-produced milk	3,522	8,320	236.2

#### Table 4-77. Degree of self-sufficiency in Misterhult församling.

<sup>1</sup> Consumption figure from 1990, production figure including catch by commercial fishermen living in Misterhult församling and catch by sport fishermen

<sup>2</sup> including bones

#### Table 4-78. Consumption per person and year (kg) in Sweden.

Food resources	1990	2001 prel,
Grain, flour and flour products	83.6	97.8
Potatoes	60.4	43.9
Vegetables, fresh	37.9	49.1
Beef and veal	7.1	9.7
Lamb	0.7	0.8
Pork	10.3	14.9
Chicken	5.4	12.7
Game meat	2.6	2.0
Meat and delicatessen	53.6	71.7
Eggs	11.7	9.9
Milk products, litres (cream, cheese and butter included)	215	194.1
Own-produced meat (with bones)	0.4	0.3
Own-produced milk, litres	2.8	1.3
Fish and shellfish	18.6	-
Source: Jordbruksverket, 2003		

# 4.2.11 Transports (flows) of organic resources

An attempt to map out the ingoing and outgoing flows of organic resources from Misterhult församling has been done. The information is sparse. The amounts are normally unknown. It is not possible to calculate the amount of locally produced products that are consumed by a small local population, without a deeper investigation. One conclusion is that almost all resources are distributed nationwide or at least regionally. The amount of food products, produced within Misterhult församling, that are also consumed within Misterhult församling is therefore probably very small. The locally consumed food products are mostly game meat, own produced meat and milk as well as some fish caught by commercial fishermen and fish caught by sport fishermen.

The information obtained is described below.

# Food products

# Meat (veal, lamb, pork)

Calves and lambs are transported to the butchery of Swedish Meats in Linköping, while pigs are transported to Swedish Meats in Kristianstad and sometimes (smaller quantities) to Skara (Swedish Meats) according to Swedish Meats /Clausson, 2004, Personal communication/. Calves, sheeps and pigs are also transported to KLS Livsmedel in Kalmar, according to KLS Livsmedel /Eriksson, 2004, Personal communication/.

Swedish Meats in Linköping produces meat details (veal and lamb) that are distributed regionally from Eksjö in the south to Gotland in the east, Karlskoga in the west to Södertälje in the north. Some details are distributed nationwide to large-scale and institutional households.

Cured (cooked) meats, provisions (delicatessen) are also produced, that are distributed nationwide.

Pigs are mostly used for production of cured (cooked) meats and provisions (delicatessen) that are distributed nationwide from Kristianstad and Skara.

From KLS Livsmedel, meat details are distributed nationwide.

# Poultry (chicken meat) and eggs

Neither chickens for production of chicken meat nor eggs are purchased from Misterhult församling for further sales, according to Svensk Fågel /Lindblad, 2004, Personal communication/ and Jordbruksverket /Adamsson, 2004, Personal communication/. Jordbruksverket register poultry farms with more than 350 hens and all KRAV-labelled farms.

According to the agricultural statistics obtained from Statistics Sweden /SCB, 2003g/ there were a few hens in the parish in 1999. It was not as many as 350, so that can explain why Svensk Fågel and Jordbruksverket do not have any information about the egg and chicken meat production in Misterhult församling. Moreover, the agricultural statistics are five years old. It is possible than there are no hens in the parish today.

# **Dairy products**

The milk that is produced within Misterhult församling is delivered to Arla's dairy in Kalmar, where it is used for making cheese, according to Arlafoods /Nilsson, 2004, Personal communication/. The cheese is distributed nationwide. Exceptionally, when Arla in Kalmar cannot receive more milk, the milk is transported to Kimstad, where it is first dehydrated and then used for production of powdered milk. The powdered milk is distributed nationwide. The facility in Kimstad will be closed in 2004–2005. A new dehydrating facility is under construction in Vimmerby, where production of powdered milk will take place in the future.

# Grain

No information was obtained from LRF.

# Fish

According to the authorized fish receivers in Kalmar län, fish is mainly delivered to the west coast (Göteborg, Malmö, Varberg) where the fish is processed (filleted) for further sales nationwide.

Some regional sales to Öland and Kalmar occur. The amount is unknown.

One receiver, Swe-Dan Seafood, exports all of its fish to Russia, Estonia and Lithuania.

# **Forest products**

In all, approximately 15,000 m<sup>3</sup> of forest products is extracted from Misterhult församling, according to Sveaskog /Ekström, 2004, Personal communication/.

# Pine timber

Approximately 45% (= 6,750 m<sup>3</sup>) is transported to Henningson såg in Vimmerby, Kalmar län.

# Spruce timber

Approximately 30% (= 4,500 m<sup>3</sup>) is transported to Vida Timber AB in Vislanda, southwest of Växjö in Kronobergs län.

# Wood for pulp

Approximately 25% (= 3,750 m<sup>3</sup>) is transported to Mönsterås pulp mill in Kalmar län.

# Humans

The ingoing and outgoing commuting to Misterhult församling is discussed in chapter 2 and demonstrated in chapter 4, Table 4-21.

# 5 Summary

The Simpevarp area is a sparsely populated area located in a relatively lightly populated county. In 2002 the population density was 7.4 inhabitants/km<sup>2</sup> while it was 21.0 in Kalmar län, in other words almost three times higher than in the Simpevarp area. The demography statistics show no upward trend, instead there is a slow downward trend in Simpevarp area as well as the larger areas. In 1993, the population density in the Simpevarp area was 8.1 persons per km<sup>2</sup>.

Among the subareas within the Simpevarp area, the most densely populated area is Simpevarp 18, with 45 inhabitants/km<sup>2</sup> in 2002, while the most sparsely populated area is Coastal area north with 1.3 inhabitants/km<sup>2</sup> the same year. Simpevarp 9, 10, 11 and 12 are uninhabited.

Electricity-, gas- and water supply, sewage and refuse disposal is the dominating sector within the Simpevarp area (as well as the main drainage area and the parish) and it holds 83.6% of the employed day-time population (working in the area). This dominance is due to Oskarshamn nuclear power plant (OKG) that has approximately 900 employees. Within the employed night-time population (living in the area) on the other hand, only 15.1% is working within the same sector. Consequently, there is a considerable ingoing commuting into the Simpevarp area and Simpevarp 9. The net commuting is positive in the Simpevarp area, the main drainage area (72/73), Misterhult församling and Oskarhamns kommun, meaning the ingoing commuting is larger than the outgoing. The net commuting is negative in all subareas, except Simpevarp 9, as well as in the county as a whole.

The second largest type of business among the day-time population within the Simpevarp area is health and social work (7.8%). Almost all of them work within Simpevarp 18, in which part of Fårbo and Figeholm is located. Among the people living in the Simpevarp area (night-time population) mining and manufacturing is the largest type of business (24.6%), followed by health and social work (16.5%). This corresponds to the situation in the main drainage area and larger areas.

When considering the number of work places within the Simpevarp area and larger areas, the sector Agriculture, forestry, hunting and fishing is dominant. The number of work places is slowly decreasing in the Simpevarp area, which corresponds to the development in Kalmar län and Oskarshamns kommun. In Misterhult församling on the other hand, the number of work places has increased slightly since 1997.

The total number of properties per square kilometre is lower in the Simpevarp area than in the parish, the municipality and the county. The number of farms and multi-dwellings per square kilometre are higher than in the parish though. The one- or two dwelling buildings represent 50% and the holiday houses 21% of the total number of properties, while the multi dwelling buildings account for 2.2% of the total number of properties. Compared to the parish, the Simpevarp area has proportionately more one-, two- and multi dwellings, but less holiday houses. This is in accordance with the fact that the Simpevarp area has a higher population density than the parish.

It is remarkable that the number of farms has increased from 117 to 129 between 1996 and 2002. This does not correspond to the development of work places within the sector Agriculture, forestry, fishing and hunting during the same time. Neither does it correspond to the Register of enterprises in Agriculture, according to which the number of farms in use (with a land area over 2 hectares) has decreased from 29 in 1990 to 27 in 1999.

Besides farms, the number of properties has been rather stable since 1996. 19 dwellings were completed in 1993, but no dwellings have been constructed since then. Some building permits have been granted since 1996, so construction of new buildings occurs even if the building statistics do not show that.

Simpevarp 7 and 6 contain merely a few farms. The holiday houses are most dominating in Simpevarp 7, which also has the highest density of holiday houses among the subareas. Simpevarp 9, in which OKG is situated, contains only four holiday houses and three other houses, which most likely belong to OKG. There are no inhabitants in Simpevarp 9, but most likely a minor holiday population. Multi dwelling houses are only found in Simpevarp 10 and 8 that are the most densely populated areas. There are no properties within Simpevarp 10–12.

The holiday houses are predominant in the archipelago and they account for 54% of the total number of properties. The density is five holiday houses per square kilometre, which is more than in Simpevarp 7.

In average some 5.2% of the land is classified as arable in the Simpevarp area according to the statistics from SCB. This is slightly more than elsewhere in Misterhult församling or Oskarshamn (3.7% respectively 4.1%) but considerable less than in Kalmar län in general (11.7%). Two of the subareas, Simpevarp 10 and Simpevarp 17 are exceptional in this respect, though, as 7.2% (subarea 10) and 19.5% (subarea 17) of the land area is classified as arable. The farm density (the number of farms per km<sup>2</sup>) confirms this trend. In general the amount of farm land is slightly decreasing on all levels as well as the number of farms.

The spectrum of cultivated crops in the Simpevarp area is wide; all the crops grown in the county can also be found in the Simpevarp area except for the sugar beets and oil seed crops. The productivity of the land is slightly below the average productivity in the county. This can be seen when the standard yields for barley and oats in the Simpevarp area are compared to the standard yield in Kalmar län which shows that the estimates are 90% and 94% of the standard yield estimates for the same crops in Kalmar län and only 79% respectively 85% of the average standard yield in Sweden. It is still somewhat surprising to see that the major part (80%) of the arable area in the Simpevarp area is not cultivated regardless of the relatively good fertility of the land.

The agricultural enterprises (farms) in the Simpevarp area are active in animal husbandry. As the statistics for the Simpevarp area cover only a short period in the 90's it is not possible to draw conclusions about trends but a significant number of cattle, sheep and chickens were kept in the area. No pigs are registered in the Simpevarp area, though, which is exceptional when compared to Misterhult församling and Oskarshamn.

The forest area is far more dominating in the Simpevarp area than in Kalmar län, 88.5% compared to 62.5%. The land use in Simpevarp area differs notably from the land use in Kalmar län, in more than one way. Only 4.4% of the area is arable land compared to 11.6% in Kalmar län and only 0.3% is of other type (wetlands, mountains, pites etc) compared to 15.6% in the county. Furthermore, there is less water, developed land and grazing land in Simpevarp area.

Kalmar län is the fifth largest fishing county in Sweden and it answers for more commercial fishing than the rest of the east coast altogether. Fishery is not a very common Employment in Oskarshamn kommun though. Fishermen in Borgholm and Västervik kommun catch the main part of the fish. In the off-shore grid (EU-grid) outside the coast of Kalmar, the catch is predominantly from square 44G7, which begins approximately 10 km northeast of Simpevarp. Among the EU-squares along the coastline, the catch per unit area is largest in square 43G6, in which Simpevarp area is located.

The Simpevarp area is most likely a frequently visited area for outdoor activities, such as hunting, fishing, hiking as well as picking of wild berries and mushrooms. The amount of available wild berries and mushrooms per unit area are probably larger than in the county and country, as the forest area is more dominating in the Simpevarp area. The hunting of moose is more extensive in Misterhult parish than in Oskarshamns kommun, Kalmar län and the country as a whole. Almost twice as many moose (1.7 times) have in average been harvested in the parish compared to the county since the season 1997/1998. The hunting of roe deers is most extensive in Götaland, especially in Kalmar län, Skåne län and Hallands län. The harvest in the Simpevarp area is in average 62 moose, 270 roe deers and 50 hares per year.

There are two hiking trails within the area; Äspö hiking trail and Simpevarvet. Furthermore, the Ostkustleden is passing trough Simpevarp area. There are two small nature reserves in the area, Talldungen and Stenhagen, and reserves are often attractive areas for outdoor life. The water around Oskarshamn nuclear power plant is an attractive spot for birdwatchers and the discharge of cooling water from OKG attracts bathing guest during the summer. The archipelago along Simpevarp area is used for outdoor life, mainly boatlife, sunbathing, camping, canoeing and fishing. Laxemar bathing place is located within Simpevarp area and there is a marina at OKG. Figeholms båtklubb, Kärrsviks båtklubb and Löjvikens bryggförening are located just outside Simpevarp area as well as Figeholm Golf and Country Club and Figeholm Fritid och Konferens with 80 camping sites.

# 6

# Comparison between Simpevarp and Forsmark

The characteristics for Misterhult församling and Forsmark församling have been compiled in Table 6-1 to Table 6-11, in order to be able to compare the two areas that are the subject of preliminary site characterisation. The parishes have been compared with each other, as there are more reliable data at this level of resolution than at Simpevarp area and Forsmark area. The aim with this report is not to make any comments on the differences and similarities or draw any conclusions from the differences between the two areas.

# 6.1 Humans

Variable	Results Misterhult församling		Forsmark f	örsamling
Population 2002	6.6 per km <sup>2</sup>		1.8 per km <sup>2</sup>	!
mean 93-02	7.1 per km <sup>2</sup>	7.1 per km <sup>2</sup>		
Age structure 2002	0–15 y 17.0% 16–24 y 8.1%		0–15 y	17.9%
			16–24 y	6.0%
	25–44 y	19.4%	25–44 y	23.8%
	45– 64 y	32.8%	45– 64 y	31.5%
	≥ 65 y	22.7%	≥ 65 y	20.8%

#### Table 6-1. Variable group – Demography.

#### Table 6-2. Variable group – Properties and buildings.

Variable	Results	
	Misterhult församling	Forsmark församling
Type of properties 2002 (per km <sup>2</sup> )		
farms	0.95	0.52
one-or two dwellings	2.48	0.55
holiday houses	1.73	0.69
multi dwellings	0.09	0.00
other	0.25	0.08
Building permits		
dwellings 2002	3	0
mean 96-02	4	0.9
business premises 2002	5	3
mean 96-02	7	0.4
Completed dwellings 2002	0	0
mean 93-02	4.9	0

Variable	Results Misterhul	t församling	Forsmai	rk församling
Employed night-time population (20–64 y)				
2001	2.98 per l	km²	0.75 per	<sup>-</sup> km <sup>2</sup>
mean 97-01	2.99 per l	km²	0.74 per	<sup>-</sup> km <sup>2</sup>
The employed night-time population by	1	4.3	1	5.6
types of business* (20–64 y) (%)	2	24.2	2	9.9
	3	11.7	3	19.7
	4	7.3	4	4.2
	5	12.8	5	7.0
	6	7.7	6	28.2
	7	5.6	7	7.0
	8	18.8	8	9.9
	9	4.2	9	5.6
	10	2.5	10	0.0
	11		11	
	0.9		0.0	
Employed day-time population (20–64 v)				
2001	3.66 per l	km²	9.9 per l	cm <sup>2</sup>
mean 97-01	3.78 per l	km²	10.2 per	 . km²
The employed day-time population by typ of business $(20-64 \text{ y})$ (%)	: 1	3.0	1	0.0
	2	12.7	2	0.0
	2	59.9	2	79.0
	4	1.0	4	10.0
	4	1.0	4 5	0.2
	5	3.0	5	0.5
	0	0.7	0	18.4
	/	4.6	/	0.0
	8	10.8	8	0.0
	9	2.5	9	1.2
	10		10	
	0.0		0.0	
	11	0.3	11	0.0
The number of work places				
2002	0.64 per l	km <sup>2</sup>	0.18 per	<sup>r</sup> km <sup>2</sup>
mean 97-02	0.62 per l	km²	0.12 per	<sup>•</sup> km <sup>2</sup>
Work places by types of business (%)	1	39.9	1	0.0
	2	5.3	2	0.0
	3	0.0	3	0.0
	4	4.6	4	17.6
	5	11.8	5	0.0
	6	9.1	6	52.9
	7	1.1	7	0.0
	8		8	
	6.1		0.0	
	9		9	
	6.1		17.6	
	10		10	
	0.0		0.0	
	11		11	
	15.6		0.0	

# Table 6-3. Variable group – Employment.

Commuting (20–64 y)		
Ingoing	538	32
Outgoing	1002	902
Net commuting	464	870
The non-employed population (20–64 y)		
2001	0.75 per km <sup>2</sup>	0.28 per km <sup>2</sup>
mean 97-01	0.80 per km <sup>2</sup>	0.27 per km <sup>2</sup>
% of total population 2001	11.0%	15.3%

# 6.2 Human activities

# Table 6-4. Variable group – Forestry.

Variable	Results Misterhult församling	Forsmark församling
Wood extraction	75 m <sup>3</sup> sk/yr/km <sup>2</sup>	176 m <sup>3</sup> sk/yr/km <sup>2</sup>

# Table 6-5. Variable group – Agriculture.

Variable	Misterhult församling Production kg/km² (1999)	Forsmark församling Production kg/km² (1999)
Winter wheat	138	0
Spring wheat	0	0
Rye	120	0
Barley	1,331	438
Oats	286	0
Triticale, mixed grain	209	0
Leguminous plants	140	0
Potatoes	48	47
Oilseed crops	3	0
Hay, silage, green fodder	6,611	6,252
Beef	97	95
Mutton	2	5
Pork	62	0
Chicken meat	5	11
Eggs	4	18
Milk	3,762	5,092

# Table 6-6. Variable group – Horticulture.

Variable	Results Misterhult församling	Forsmark församling
Number of horticultural holdings	0	0
Production of fruit and vegetables	0	0

# Table 6-7. Variable group – Aquaculture.

Variable	Results Misterhult församling	Forsmark församling
Number of enterprises	1	0

#### Table 6-8. Variable group – Mineral extraction.

Variable	Results Misterhult församling	Forsmark församling
Number of mineral extraction leases	3	0

#### Table 6-9. Variable group – Water supply.

Variable	Results Misterbult församling	Forsmark församling
		i orsmark forsaming
Water use (estimated m <sup>3</sup> )		
households	192,000	11,500
holiday houses	13,000	1,200
agriculture	52,000	4,300
industry	66,000	600
Nuclear (freshwater)	175,000	257,000
other	134,000	1,200
Water withdrawal m <sup>3</sup>		
public supply	314,000	6,800
private supply	316,000	269,000
Water withdrawal m <sup>3</sup>		
ground water	91,000	7,200
surface water	515,000	268,500
Sea water or unknown m <sup>3</sup>	25,000	

# Table 6-10. Variable group – Commercial fishing.

Variable	Results Misterhult församling	Forsmark församling
Number of fishermen (estimated)	3	0
Catch 2002/ mean 96-02	5,649 kg/ 18,507 kg	0

Table 6-11	. Variable	group -	Outdoor	life.
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Variable	Results Misterhult församling	Forsmark församling
Harvested moose 2003 (per km <sup>2</sup> )	0.35	0.53
mean value (per km <sup>2</sup> )	0.49 (97-03)	0.53 (99-03)
Harvested moose in utilized carcass weight		
2003 (kg/km²)	32	52
mean value (kg/km <sup>2</sup> )	45.2	51
Harvested roe deers 2001 (per km <sup>2</sup> )	1.3	1.0
mean 97-01 (per km <sup>2</sup> )	2.15	1.9
Harvested roe deers in utilized carcass weight 2001 (kg/km <sup>2</sup> )	12.2	9.0
mean 97-01 (kg/km <sup>2</sup> )	20.1	18
Picking of wild berries <sup>1</sup> (litres/km <sup>2</sup> )	73	73
Picking of mushrooms <sup>1</sup> (litres/km <sup>2</sup> )	48	49
Number of attractive fishing waters	1	2
Number of sport-fishing clubs	0	0
Catch by sport fishermen (kg/km <sup>2</sup> )	39.6	10.9
Number of golf courses	1	0
Number of jogging tracks	3	0
Number of areas for country walks	7	3
Number of attractive spots for bird watching	2	2
Number of canoe routes	1	0
Number of canoe renters	1	0
Number of openair baths	6	1
Number of campsites and holiday villages	1	2
Number of marinas	5	0
Number of guest harbours	2	0
Number of boat renters	2	3

<sup>1</sup> Values for Simpevarp area and Forsmark area.

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# 8 List of terms

English	Svenska
Alpine (mountaine) hare	Skogshare
Animal husbandry	Husdjurskötsel
Aquaculture	Vattenbruk
Arable land	Åkermark
Area for cultivation on open ground	Frilandsareal
Baltic herring	Sill/strömming
Bare fallow	Helträda
Barley	Korn
Bird watching club	Fågelklubb
Boar	Galt
Buck	Rådjursbock
Cattle	Nötkreatur
Cereals	Spannmål
Cod	Torsk
Common (european) hare	Fälthare
County	Län
Сгор	Gröda
Cured (cooked) meats, provisions (delicatessen)	Charkvaror
Dairy cow	Mjölkko
Dairy products	Mejeriprodukter
Delicatessen	Charkvaror
Dwelling	Lägenhet (bostad)
Employed population	Förvärvsarbetande befolkning
Energy forest	Energiskog
Ewe	Tacka
Fallow	Träda
Fawn	Rådjurskid
Fowls	Höns
Grain	Säd
Grass	Vallgräs
Grass land for seed production	Vall för fröskörd
Grass on arable land for hay and silage	Vall
Grass on arable land for hay or silage	Slåttervall
Green fodder	Grönfoder
Heifer	Kviga
Horticultural plants	Trädgårdsväxter
Horticulture	Trädgårdsodling
Lavaret species	Sik-fiskar
Leguminous plants	Baljväxter
Linseed	Oljelin

#### English

English	Svenska
Livestock	Kreatur, husdjur
Multi-dwelling/family building (s)	Flerbostadshus
Municipality	Kommun
Mutton	Fårkött
Nursery plants	Plantskolealster
Oil seed crops	Oljeväxter
One- or two-dwelling/family building (s)	Småhus
Parish	Församling
Pasture	Betesvall
Pine timber	Talltimmer
Pit ( <i>pl</i> pites)	Täkt, exempelvis sandtag (sandpit)
Plants for silage	Ensilageväxter
Potatoes for processing	Potatis för stärkelse
Processing peas	Konservärter
Ram	Bagge
Rape	Raps
Register of enterprises in agriculture and forestry	Lantbrukets företagsregister
Root crops	Rotfrukt
Rye	Råg
Seed lay	Frövall
Sow	Sugga
Sprat	Skarpsill
Spruce timber	Grantimmer
Steers, bullock	Stutar
Suckler cows	Amkor
Swedish board of agriculture	Jordbruksverket
Table potatoes	Matpotatis
Triticale	Rågvete
Turnip rape	Rybs
Untilled arable mark	Obrukad åker
Veal	Kalvkött
Vetches	Vicker
Vital events	Befolkningsförändringar
Winter rape	Hösttraps
Winter rye	Höstråg
Winter turnip rape	Höstrybs
Winter wheat	Höstvete
Wood for pulp	Massaved
Yield	Skörd
Yield per hectare	Hektarskörd