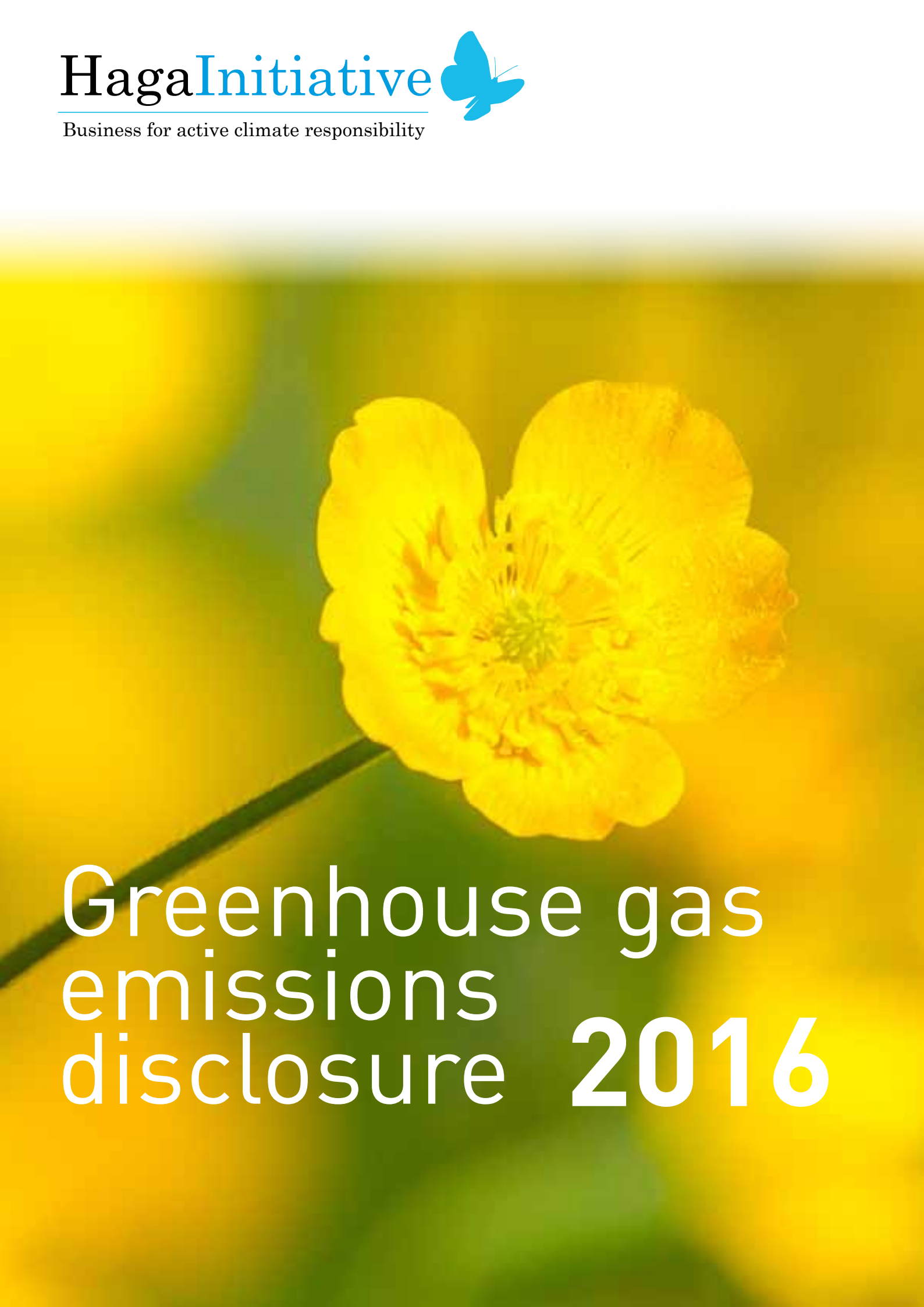
HagaInitiative

Business for active climate responsibility



Greenhouse gas emissions disclosure 2016

CONTENT

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FOREWORD

Two years ago, the nations of the world agreed on a climate treaty in Paris, which states that the increase in global average temperature should be kept below two degrees and efforts must be made to limit the increase to 1.5 degrees.

For countries to succeed in reducing emissions; nations, research and industry need to collaborate with each other. Companies can help stimulate innovations and contribute to a quick change if the right policies provide the conditions for it. We, the CEOs in the member companies of the Haga Initiative, have over the years suggested how political instruments can accelerate global low-carbon transition. We, in our companies, are ready to help Sweden succeed in achieving its climate goals or even surpassing them.

When we started the Haga Initiative 7 years ago, we set the goal to reduce emissions by at least 40 percent until 2020. The target has already been achieved by most companies. This year, we decided to set a new target for 2030 – we want to become fossil-free in our own operations (or contribute to emission reductions in scope 3 equivalent to emissions in scope 1). See the Haga Initiative's new goals here. With support from us and other companies', we believe that Sweden can take a leading position. With its green energy mix and infrastructure, the Nordic countries have unique opportunities that make us able to be fossil-free by 2040. In order to succeed, politics need to support such a development.

This is the Haga Initiative's seventh greenhouse gas disclosure. In the first one, we wrote that we wanted to demonstrate that it is profitable to take climate responsibility and that we wanted to reduce our own climate impact and inspire other companies to do the same. This still applies and we see that more and more companies are reporting their climate impacts. Three years ago, 1 out of 4 companies on the large-cap list of the Stockholm stock exchange reported their greenhouse gas emissions disclosure and last autumn this figure had increased to 3 out of 4 companies. The companies are doing this voluntarily.

Sweden has shown that it is possible to reduce emissions (-25 percent) while increasing GDP (+69 percent). As companies, we show that we reduce emissions while strengthening our competitiveness. For us, it is about business development, competitiveness and the survival of our companies. These are three very good reasons why everyone should set ambitious climate goals and follow them through.

Lars Andersson,
Nordic director, AkzoNobel

Anders Egelrud
CEO, Fortum Värme

Per Olof Nyman
CEO and Group President, Lantmännen

Ulf Troedsson
CEO, Siemens

Klas Balkov
President and CEO, Axfood

Jan Kilström
CEO, Green Cargo

Lars Appelqvist
CEO, Löfbergs

Kristofer Sundsgård
CEO, Stena Recycling

Pierre Decroix
CEO, Coca-Cola European Partner Sweden

Göran Holm
CEO, HKScan Sverige

Thomas Kelly
CEO, McDonald's Sweden

Per-Olof Wedin
CEO, Sveaskog

Jens Henriksson
President and CEO, Folksam

Johan Skoglund
President and CEO, JM

Petter Holland
CEO, Preem

THE HAGA INITIATIVE'S GREENHOUSE GAS EMISSIONS DISCLOSURE

The Haga Initiative's vision is a profitable business sector with no climate impact. The companies realise that it pays off to take responsibility for climate change and want to inspire other companies to do the same.

The Haga Initiative wants to show opportunities to reduce climate impact and at the same time work actively on creating the right conditions for the business sector to contribute to this in the best way possible. Business has a central role to play when it comes to acting against climate change, they are well positioned to drive development in the right direction. Companies can be innovative and bring about rapid changes.

An initial step in the right direction is knowing where the company currently stands by calculating its greenhouse gas emissions. The Haga Initiative sees this as providing an obvious basis from which to move on and produce a climate change strategy which aims to reduce climate impact over time. In addition to calculating and continuously reporting on how the emissions relate to the climate target, each company also report its most important actions taken in 2016 which resulted in reduced climate impact. To give a yearly update to the outside world on the company's climate impact is an important act to create a customer demand towards climate-smart products and goods as well as to show other companies that climate issues are an important part of corporate responsibility.

The member companies of the Haga Initiative can see that it is profitable to take responsibility for their climate impact, and it is partly this message that we are hoping will inspire other companies to raise their ambitions on climate change. Every measure counts – however large or small!

The companies included in the network have set their own climate targets of at least a 40 percent reduction by 2020 compared with a post-1990 base year of their choice. The member companies' climate targets must cover the Haga scope as a minimum. The Haga scope is defined as emissions in scope 1 and scope 2 plus business travel in scope 3. Many of the companies have set broader system boundaries and/or more ambitious climate targets than this.[1]

When the Haga Initiative was founded in late 2010 and climate targets were set for 2020, the full scope 3 standard (Corporate Value Chain Accounting and Reporting Standard) did not exist. Today, there is an increasing focus on greenhouse gas emissions throughout the supply chain: both upstream and downstream. This is natural, as often more than 70 percent of total corporate emissions for an average company are in scope 3, according to GHG Protocol. For the companies in the Haga Initiative as well as for other companies, continuously accounting for and reporting on the significant emissions in scope 3 is a major challenge. Companies in the Haga Initiative recognise the importance of more comprehensive reporting and thus greater transparency for ensuring a fair description of the companies' total environmental impact.

Many of the companies have reached, or are on track to reach, the target of reducing greenhouse gas emissions by at least 40 percent by 2020. When the target was set, it was ambitious but the progression to reduce emissions has been much faster than many had thought. The Haga Initiative now takes the ambition one step further and sets the target at zero net emissions by 2030. In this greenhouse gas emissions disclosure, the targets are reported by 2020.

ABOUT THE HAGA INITIATIVE

The Haga Initiative consists of fifteen well-known companies: AkzoNobel, Axfood, Coca-Cola European Partners Sverige, Folksam, Fortum Värme, Green Cargo, Lantmännen, Löfbergs, JM, McDonald's, HKScan Sweden, Preem, Siemens, Stena Recycling och Sveaskog.

The member companies of the Haga Initiative make the following commitments:

- A climate-committed CEO/ management that takes active responsibility for the climate.
- A broad-based, ambitious climate strategy.
- Regular measurement and accounting of the company's climate impact according to the GHG Protocol.
- A clearly diminishing emissions trend.
- A defined emissions target in the company to reduce CO_2e by at least 40 percent by 2020 or an equivalent level of ambition.
- Fossil free operations by 2030.

1. A company may be associated with emissions outside the Haga scope; in order to be transparent and credible, we have therefore chosen to also report significant emissions in scope 3 not covered by the current climate target. This is reported under the heading "Most significant emissions in scope 3" for each company.

THE HAGA INITIATIVE AND GHG

The Haga Initiative currently follows the GHG protocol, allowing members to choose whether to set absolute or relative targets. The first alternative reflects the company's absolute emissions in tonnes CO_2e.

However, the companies in the network all operate in growing markets, which in many cases makes relative objectives the more appropriate option. In some cases, greater absolute emission figures for a company can even mean that total emissions for its products are lower i.e. because of increased materials recycling or a switch to rail transportation and district heating. In the emissions disclosures, the companies present their targets, outline the measures they have taken and plan to take to achieve their targets, and the progress they have made so far towards meeting these targets. The members can choose absolute or relative targets to achieve at least 40 percent reduction until 2020.

GREENHOUSE GAS PROTOCOL

The GHG Protocol is the international accounting standard that is most frequently used by nations and companies as a calculation tool for understanding, quantifying and managing emissions of greenhouse gases. For more than ten years, the GHG Protocol has been working in partnership with the World Resources Institute (WRI) and the World Business Council for Sustainable Development (WBCSD), and with companies, nations and environmental groups around the world to build a new generation of credible and effective programs for managing climate change.

THE HAGA INITIATIVE'S CALCULATION METHOD AND THE GHG PROTOCOL

All calculations and reporting under the Haga Initiative conform to the guidelines set out in the GHG protocol. The GHG protocol (Greenhouse Gas Protocol) is an international calculation standard guided by the following principles:

Relevance – the reporting shall reflect the emissions of the company or organisation in a relevant manner, so that it can be used as a basis for decisions both internally and externally.

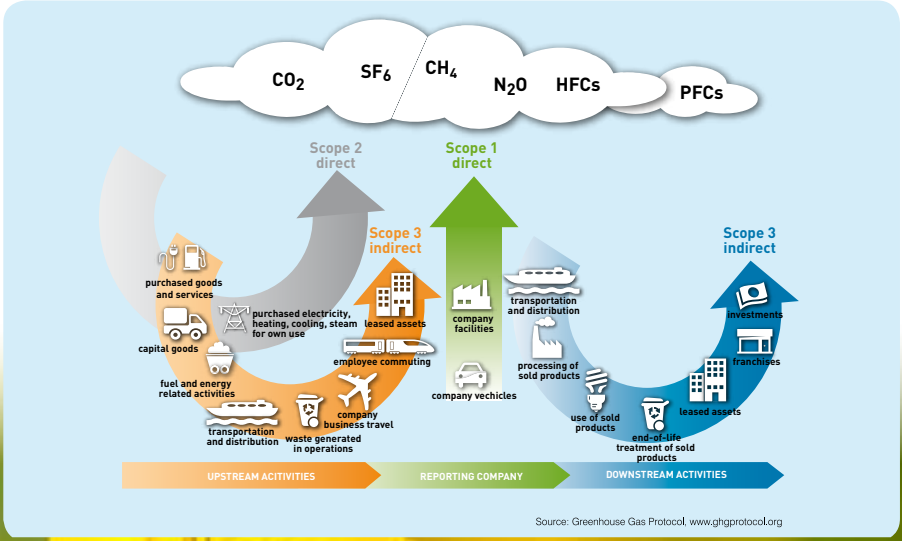
Completeness – the reporting shall cover all emissions within the stated system boundaries. Any exceptions shall be described and explained.

Consistency – the calculation methodology shall be consistent to allow comparisons to be made over time. Changes in data, system boundaries, methods or similar shall be documented.

Transparency – all background data, methods, sources and assumptions shall be documented.

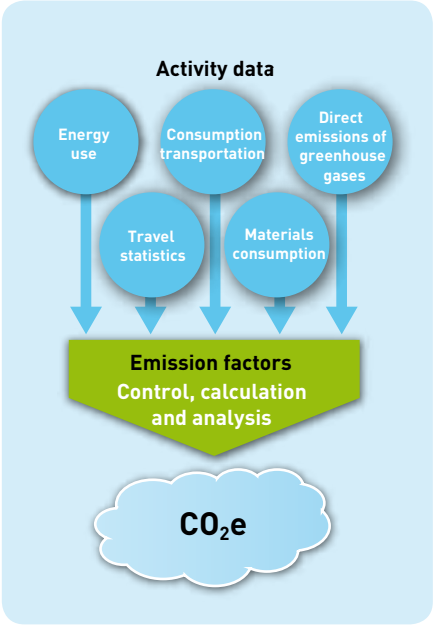
Accuracy – the calculated emissions shall be as close to actual emissions as possible.

The Haga Initiative's calculation method describes the methodology used by the Haga Initiative for the emission sources that are relevant to the calculation of climate impact. The scope or scopes in the GHG Protocol to which the emissions belong are detailed in each description. Emissions are classified as either scope 1 (direct emissions), scope 2 (indirect emissions from purchased energy) or scope 3 (other indirect emissions.



HAGASCOPE

The Haga scope is defined as emissions under scope 1, 2 and business travel under scope 3. The member companies have climate targets that encompass or exceed the Haga scope.



COMPANY REPORTS ACCORDING TO THE GHG PROTOCOL

In the greenhouse gas emissions disclosure, each company reports the emissions generated during the year, in previous years, and in its chosen base year. The companies also report the climate targets they have set and what they intend to do to achieve these targets. The Haga Initiative has two target years; 2020 and 2030. In this greenhouse gas emissions disclosure, the targets are reported until 2020. The scope of the target is described as "Haga scope", see box.

Each year the Haga Initiative aims to become more transparent and more consistent in its reporting. As part of this, emissions in each company's disclosure table have been broken down into the three scopes set out in the GHG Protocol. Emissions in scope 3, which are generated upstream and downstream in the value chain, have also been linked to the categories in the broadened scope 3 standard (Corporate Value Chain Accounting and Reporting Standard).

EXTERNAL FACTORS AFFECTING EMISSIONS

The calculation of emissions is based on activity data such as energy use and fuel consumption. These figures are then converted into emissions of greenhouse gases (CO_2) using emission factors for each emissions source.

Sometimes a company's emissions may increase even though it has made its operations more efficient.

Companies can do a lot to influence their consumption of resources, but sometimes there are external factors that cause emissions to rise despite the company's efficiencies. For example, a cold winter may force district heating companies to use fossil fuels for peak production, or changes in social functions may result in different logistics flows.

Changes in the emission factors cannot be influenced by the companies. The emission factors for electricity and district heating vary from year to year because of changes in production. In fuel, different combinations of renewables are resulting in decreasing emission levels.

Nordic residual mix 2003–2016, emissions from production

Companies can use different types of electricity: origin-labelled or unspecified electricity. For origin-labelled electricity, an emission factor for the chosen energy source is used. In the case of unspecified electricity, an emission factor for what is known as the Nordic residual mix is used, see chart below. Since 2014, emissions from purchased energy should be reported where no distinction is made between origin-labelled and unspecified electricity, see Appendix 2.

RESULTS: THE HAGA INITIATIVE'S GREENHOUSE GAS DISCLOSURE 2016

The Haga Initiative's total emission reductions in 2016 are presented below in absolute terms compared with the selected base years. The companies in the Haga Initiative are diverse. Some have their major emissions in scope 1 and others in scope 2 and 3. This means that their ability to affect emissions differ. Emissions in scope 1 (Direct GHG) are emissions from sources that companies own or control. Emissions in scope 2 (Energy indirect GHG) are emissions that occur when a company purchases electricity or district heating. Emissions in scope 3 (Other indirect GHG) are divided into 15 categories and are those that arise upstream and downstream in the value chain. Whether it is easy or difficult to affect emissions differ greatly.

Many of the companies in the Haga Initiative are in growing markets, which makes it appropriate for some companies to set relative instead of absolute emission targets. It can therefore be difficult to compare the companies with each other. Many of the companies have set both relative and absolute targets for emission reductions. More information about the companies' own goals can be found on the respective company page.

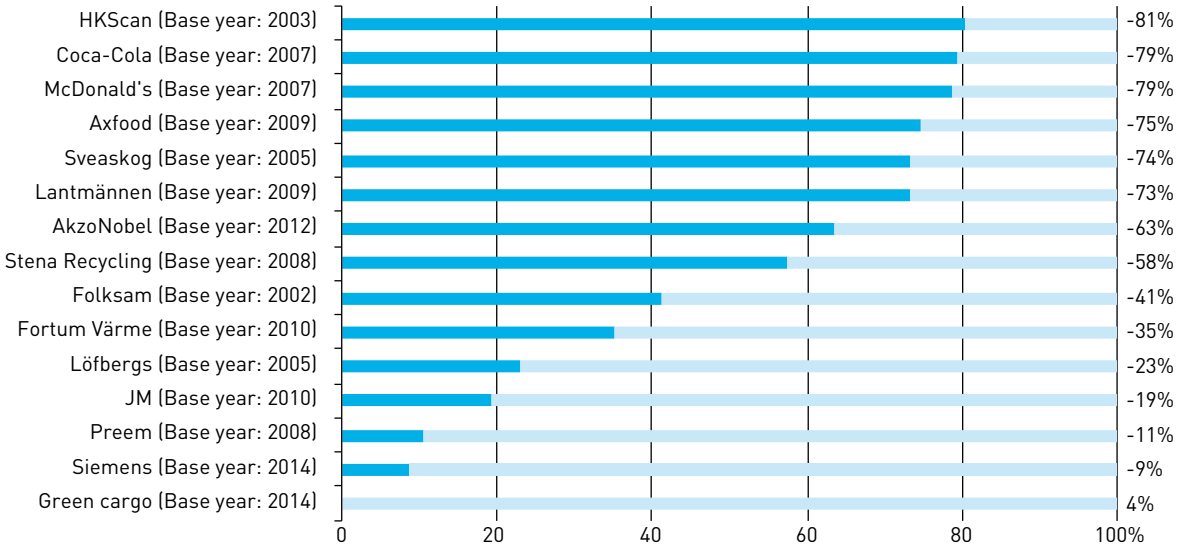
SIGNIFICANT SCOPE 3

A company may be associated with emissions outside the Haga scope; to be transparent and credible, we have therefore chosen to also report significant emissions in scope 3 not covered by the current climate target (Haga scope). This is reported under the heading "Most significant emissions in scope 3" for each company. Companies have different capacities to influence scope 3 emissions, and can thus address these emissions in different ways. Some strategies to influence are through, for example, marketing, requirements in procurement, substitution, or product improvement, thereby reducing climate impact in scope 3.

Emissions reduction Haga scope

The Haga scope covers emissions in scope 1, 2 and business travel in scope 3. 14 out of 15 companies have reduced their emissions and 9 out of 15 companies have already reached the target of reducing emissions by 40 percent by 2020 compared to their base year. In the case of Green Cargo, which has not reduced its emissions in the Haga scope, their increased emissions can reduce emissions for other companies when goods are transported via railways. There are three companies that contribute to the largest emission reductions, in tonnes of carbon dioxide equivalents; Fortum Värme, Preem and AkzoNobel.

Change of emissions in Haga scope– 2016 in comparison with base year



↑ Ihe graph shows the change of companies' emissions in the Haga scope in 2016 compared to the selected base year. Changes in emissions are reported in absolute figures.

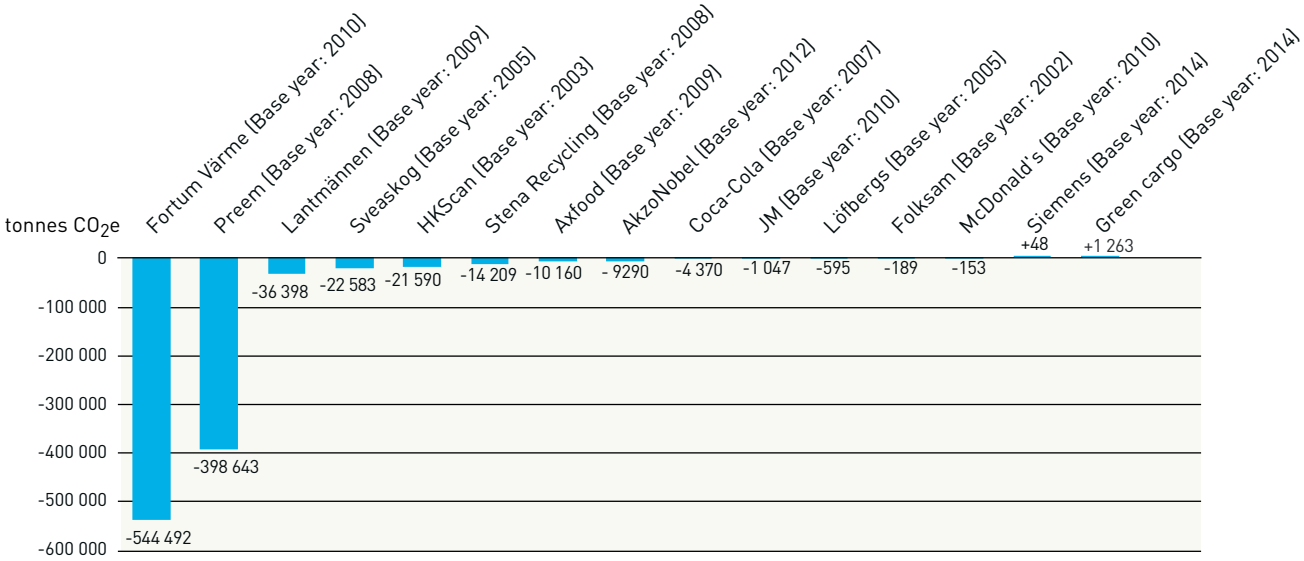
Emissions reduction in Scope 1

The companies contributing to the largest emission reductions, in tonnes (CO_2e) in scope 1, are Fortum Värme and Preem. They have a profound impact on the overall emission reduction for companies in the Haga Initiative (both in percent and ton) and together account for nearly 90 percent of total emissions. When comparing their emission reduction in Scope 1 with Sweden's national emissions in 2016, the reduction corresponds to 1.8 percent.

All the companies in the Haga Initative have contributed with emission reductions in their own operations (i.e. direct emissions in scope 1) equivalent to 2 percent of national emissions in 2016. If the companies had not made these reductions, Sweden's emissions would 2 percent higher or 1,1 million tonnes bigger.

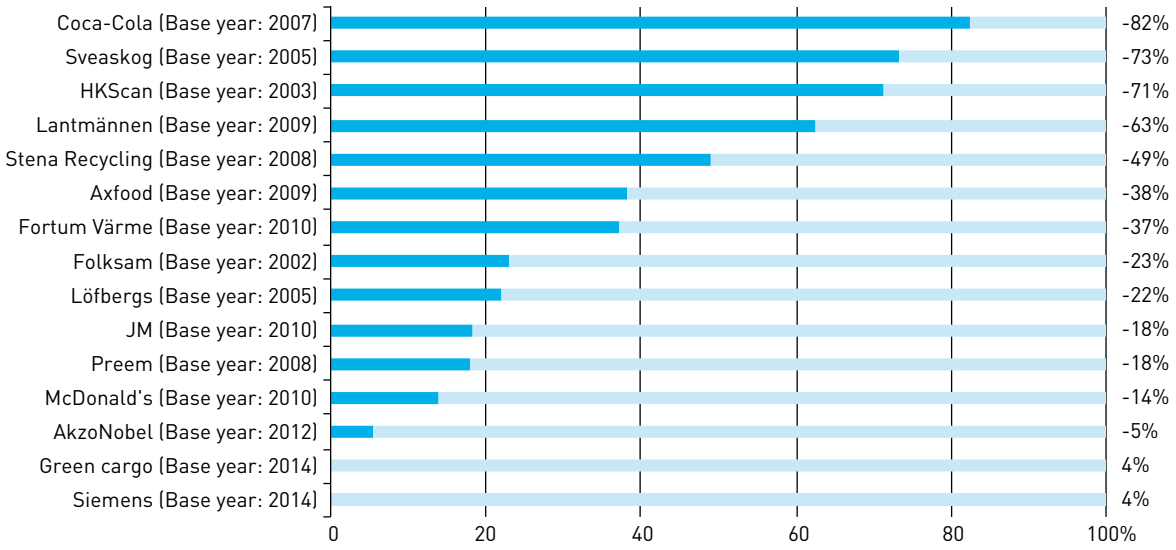
1. Swedish Environmental Protection Agency preliminary national emissions of greenhouse gases by 2016: http://www.naturvardsverket.se/Sa-mar-miljon/Klimat-och-luft/Klimat/Tre-satt-att-berakna-klimat¬paverkande-utslapp/Snabbstatistik-nationella-utslapp-av-vaxthus-gaser-ar-2016/

Change of emissions in scope 1 – 2016 in comparison with base year



↑ The graph shows the change of companies' emissions in the Haga scope in 2016 compared to the selected base year. Changes in emissions are reported in absolute figures.

Change of emissions in scope 1 – 2016 in comparison with base year



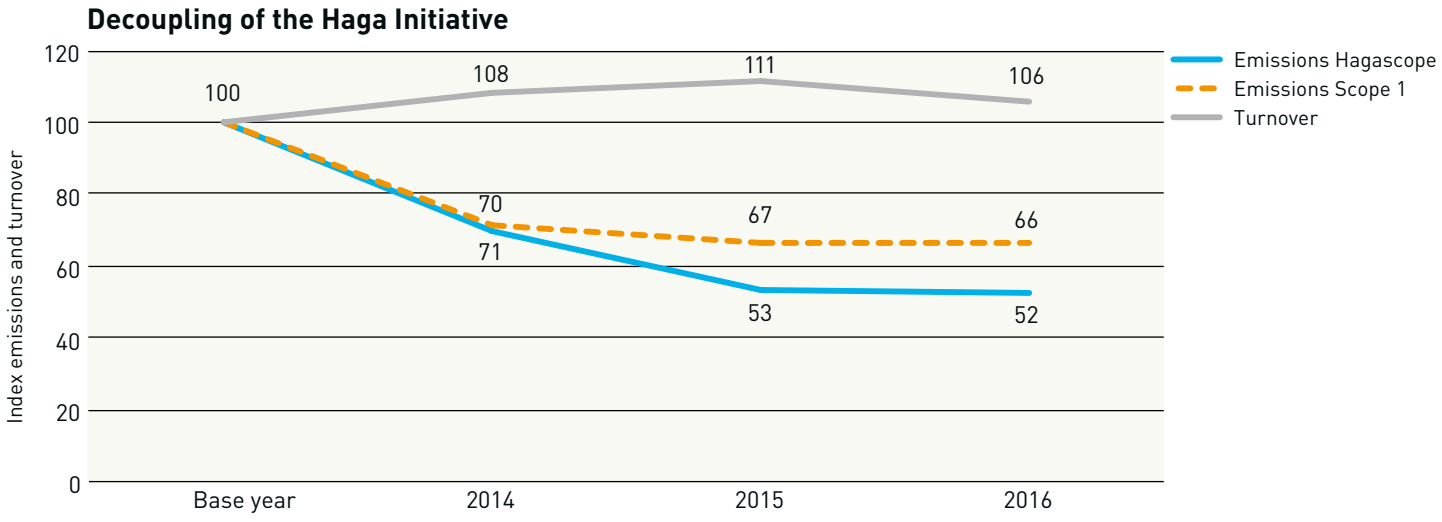
↑ The graph shows the change of companies' emissions in scope 1 in 2016 compared to the selected base year. Changes in emissions are reported in absolute figures and percentage.

DECOUPLING OF THE HAGA INITIATIVE

Sweden has managed to decouple GDP growth from greenhouse gas emissions. Since 1990, emissions in Sweden have reduced by 25 percent, while GDP has increased by 69 percent. Similarly, the companies in the Haga Initiative have managed to reduce emissions while maintaining or increasing turnover.

The summary in the chart shows that companies increased their turnover by an average of six percent since their respective base years, while emissions fell by an average of 48 percent (Haga scope) or 34 percent (in scope 1). The companies' aggregate emission reduction is 26 percent in scope 1, or 29 percent in the Haga scope. Behind the figures, there are obviously major individual differences - some companies have made significant reductions in emissions and increased turnover considerably while others experienced subdued turnover or lower emission reductions.

Turnover do not tell the whole story of business economic development. In some cases, the change is due to new acquisitions or spin-offs (which, of course, affect both sales and greenhouse gas emissions). In other cases, there are other global factors influencing company performance. For example, the fall in electricity prices in general and the oil price in particular, affects the turnover of those companies selling these goods, but does not necessarily reflect their development in general. Although turnover is stable, one should be aware that it says little about companies' profits and market development. What we can note is that in relation to base years, emissions have declined and sales increased.



↑ The Haga initative's reduced emissions and increased turnover. The numbers presented in the figure are the average of each company's indexed emissions and turnover (for Folksam's share, premium income has been used instead of turnover). The indexation has been made so that companies with high emissions and high turnover should not have a higher influence over the numbers than those with lower emissions / turnover.

AkzoNobel was established in Sweden in 1646, originally under the name Bofors. Today AkzoNobel is a global company, a world leader in the paint and chemicals industry. In Sweden, AkzoNobel generates sales of around SEK 14.5 billion and employs some 2,700 people across twelve locations. Its brands include Nordsjö Färg, International, Eka, Cuprinol and JOZO salt.

Read more about AkzoNobel's sustainability work www.akzonobel.com/se/hallbar_utv/ or its annual report at www.akzonobel.com.

AKZONOBEL

Climate targets

AkzoNobel's climate target is to reduce carbon emissions per tonnes of sold product by 25 percent by 2020 compared to the base year of 2012. The target covers the entire value chain, i.e. scope 1, 2 and 3. The Haga scope is defined as emissions under scope 1, 2 and business travel under scope 3. AkzoNobel's carbon emissions in Scope 1 and 2 represent 15 percent of the entire value chain's emissions. This means that AkzoNobel's climate target across the value chain results in a greater decrease overall than if AkzoNobel reduced emissions in the Haga scope by 40 percent.

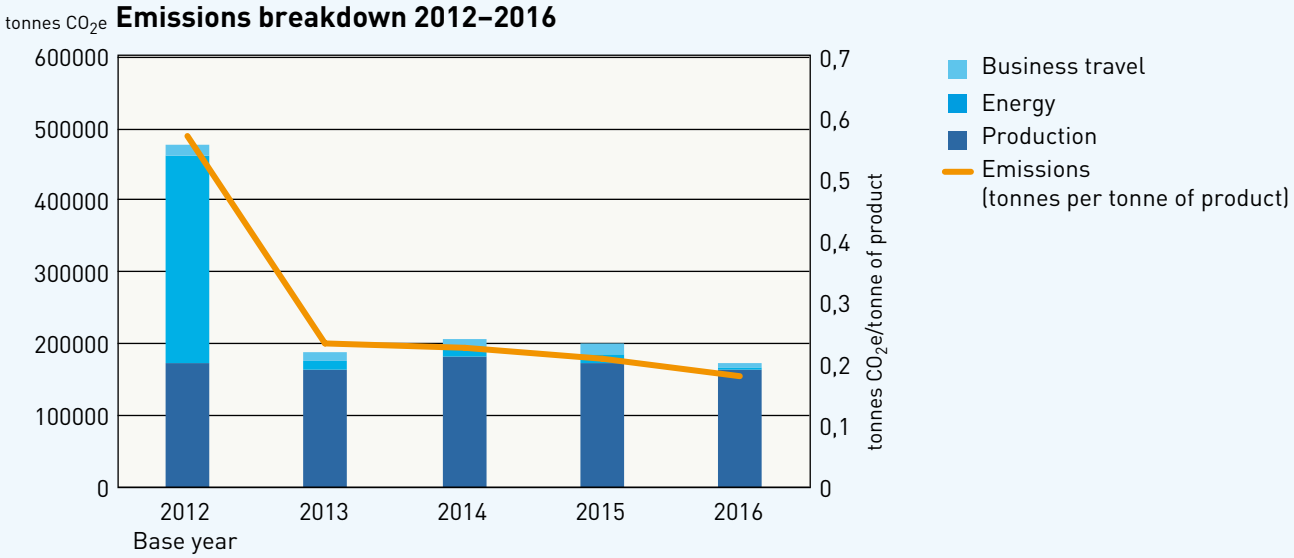
Actions taken in 2016

- Replacement of three oil-fired boilers with two electric power boilers at the Specialty Chemicals site in Alby, Sweden. This, in addition to the use of excess hydrogen in the production, saved nearly 5,000 tons of direct CO_2.
- Improvements at the company's Swedish facilities have contributed to reduced emissions from Swedish plants by 10,000 tonnes last year.
- In 2016, the focus for AkzoNobel's climate actions has been on operation outside Sweden. For example, at LeMoyne in the US, the Specialty Chemicals business optimized the furnaces, resulting in savings of more than 2,200 tons of direct CO_2 per year. At Delfzijl, the Netherlands steam is now purchased generated from reclaimed wood, reducing AkzoNobel's CO_2 emissions by more than 100,000 tons a year.

Emissions (tonnes CO_2e)	Base year 2012	2015	2016	Share of total 2016	Change 2009-2016
Scope 1					
Production	173 000	174 000	164 000	95 %	*-5%*
Scope 2					
Energy[1]	290 000	347 000	348 000	1 %	*-99%*
Scope 3					
Business travel	7200	6800	6100	4 %	-15%
TOTAL excl. reduction through energy with Guarantee of Origin	**471 000**	**528 000**	**518 000**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	0	-335 000	-346 000		
TOTAL Haga scope	**471 000**	**193 000**	**172 000**	**100%**	**-63%**
Produced amount of products in Sweden	**832 000**	**949 000**	**942 000**		13%

Key indicators	Base year 2012	2015	2016	Change 2009-2016	Unit
Emissions per produced product	0,57	0,20	0,18	-68 %	tonnes CO_2/tonne product

1. Emissions from production of purchased electricity, district heating or district cooling, assuming that all is unspecified (residual mix). In "Share of total 2016" and "Change 2012-2016" is Guarantee of Origin included.



Analysis and comments

In the Haga scope, emissions have decreased by 63 percent since the base year (2012) and 11 percent since last year. Emissions per produced product have also decreased by 68 percent since base year and by 10 percent since last year. Of the categories included in the Haga scope, emissions in Scope 1 represent the largest impact (95 percent). The scope 1 emissions have decreased by 5 percent since 2012 and 6 percent compared to last year. This reduction is, among other things, due to the optimized furnaces, use of excess hydrogen in the production and switch from oil-fired to electric power boilers.

AkzoNobel reports its climate impact from its global operations across the whole value chain, i.e. also for the whole of scope 3. The Swedish emissions represent approximately 5 percent of AkzoNobel's total emissions in scope 1 and 2. Today this is done on a cradle-to-grave product level and is therefore difficult to report by region, such as Sweden. The ambition however, is to report parts of Scope 3 specifically for Sweden.

Emission from purchased electricity in scope 2 have decreased by 99 percent since the base year 2012. In 2016 these emissions represent 1 percent of the total estimated emissions. This is almost entirely due to a shift towards origin-labelled electricity.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Emission in scope 3 account for the majority of AkzoNobel's climate impact (84 percent), of which 40 percent arise in the production of purchased raw materials and 44 percent derive from the use of costumers and the final management of AkzoNobel's products.

To manage the climate impact in scope 3, AkzoNobel aim to increase the share of renewable raw materials, work towards climate goals in the product development process, and develop partnerships with customers and suppliers on reducing climate impact through new technology and energy efficiency.

Axfood work towards developing and driving successful grocery formats in the Swedish market. Since 2017 the Axfood Group includes Willys, Hemköp, Mat.se and Eurocash in addition to Axfood Snabbgross cash and carry chain. Axfood Närlivs collaborates with the Tempo, Handlar'n and Direkten formats. In addition, Axfood Närlivs serves convenience retailers. In 2016 Axfood reported net sales of SEK 43.355 billion, 9,211 employees and collaborates with 1083 stores, of which 263 are group-owned. www.axfood.se

AXFOOD

Climate targets

Axfood's target is to be climate-neutral by 2020 and to reduce its greenhouse gas emissions from its own operations by 75 percent (base year 2009). From 2009 through 2015 Axfood decreased its effect on climate change by 73 percent. Axfood has additional climate targets, read more about Axfood's sustainability work at www.axfood.se.

Actions taken in 2016

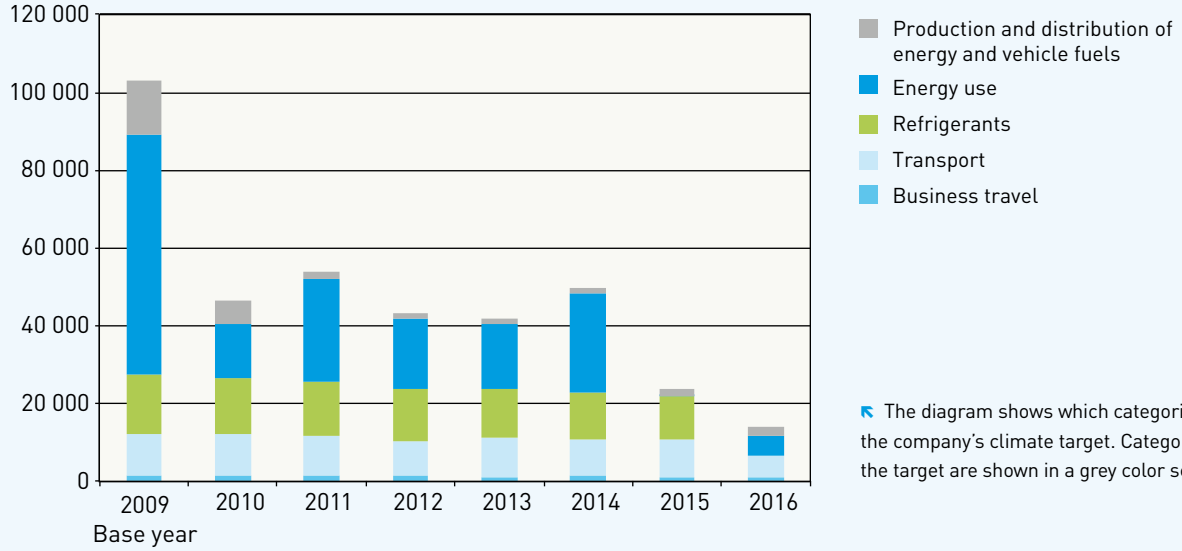
- Axfood nearly halved CO_2 emissions from its own fleet in 2016 due to a transition into using HVO fuel.
- Through partnerships with charity organizations, Axfood donates some 250 tonnes of food every year to good use instead of being wasted.
- Axfood resumed its capex plans for solar panel systems after the government reversed its position on the solar panel tax.

Emissions (tonnes CO_2e)	Base year 2009	2015	2016	Share of total 2016	Change 2009-2016
Scope 1					
Business travel[2]	851	474	395	2%	*-54 %*
Own transportation	10 531	9 433	5 309	21%	*-50 %*
Refrigerants[3]	15 212	11 185	10 730	43%	*-29 %*
Scope 2					
Purchased energy [4,5]	61 647	89 765	95 466	21%	*-91 %*
Scope 3					
Business travel[6]	770	670	710	3%	-8 %
TOTAL excl. reduction through energy with Guarantee of Origin	**89 011**	**116 191**	**112 610**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[7]	0	-89 572	-90 141		-
TOTAL Haga scope	**89 011**	**26 619**	**22 470**	**91 %**	**-75 %**
Production and distribution of energy and vehicle fuels[8]	14 008	1 783	2 315	9%	-83 %
TOTAL (excl. Carbon offset)	**103 019**	**28 402**	**24 785**	**100 %**	**-76 %**
Carbon offset[9]	0	-655	-678		-
TOTAL (incl Carbon offset)	**103 019**	**27 747**	**24 107**		**-77 %**

Key indicators	Base year 2009	2015	2016	Change 2009-2016	Unit
Emissions per revenue (MSEK) exlcluding carbon offset	3,326	0,684	0,601	-81 %	tonnes CO_2e/MSEK
Emissions per employee exlcluding carbon offset	15,799	3,207	2,815	-81 %	tonnes CO_2e/employee
Emissions per revenue (MSEK) including carbon offset	3,326	0,669	0,584	-82 %	tonnes CO_2e/MSEK
Emissions per employee including carbon offset	15,799	3,133	2,738	-82 %	tonnes CO_2e/employee
Emissions per tonne of transported goods[10]	24,3	16,9	9,5	-61 %	kg CO_2/tonne goods
Energy use per sqm (total) [11]	624	285	300	-52 %	kWh/m^2

1. With effect from 2014, company-owned cars are also included.
2. All previous years are updated since a new monitoring system have been introduced. The development between 2009 and 2015 is assumed to be linear.
3. Emissions from production of purchased electricity, district heating or district cooling, assuming that all is unspecified (residual mix). Refers to energy use in retail stores and premises owned by Axfood. "Share of total" and "Change 2009-2016"includes contracts for renewableenergy with Guarantee of Origin.
4. Refers to business air travel, train and taxi journeys. Scope 3 category 6.
5. With effect from 2016, purchased district heating in rented premises is included. The values for 2009 and 2015 have been updated accordingly (from 61 578 and 89 696, respectively)
6. Reduction of emissions for "Purchased energy" in scope 2.
7. Refers to fuels consumed in scope 1 and scope 2. Scope 3 category 3.
8. Refers to carbon offset of business air travel.
9. Refers to transportation of own transportation
10. Only facilities with at least 12 months' results are included."

tonnes CO_2e **Emissions breakdown 2009–2016**



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Axfood's emissions within the Haga scope have reduced by 75 percent since the base year of 2009, and by 77 percent in total. 94 percent of the company's electricity is purchased as origin-labelled, which together with energy efficiency actions have reduced emissions from purchased energy by 91 percent since the base year.

Own transportation in scope 1 accounts for about one fifth and emissions from refrigerants account for 43 percent of the total emissions. Emissions from own transports have decreased by 44 percent compared with the previous year, largely due to a fuel shift to more renewable fuels (RME and HVO).

This year, emissions from district heating have also been included for facilities where district heating is included in the rent. A similar upward adjustment has been made for 2015 and for the 2009 base year. Axfood carries out carbon offsetting to compensate for its air travel, equivalent to approximately 3 percent of its total emissions.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

In the daily consumer goods sector, the biggest climate footprint occurs in the early stage of the supply chain in the agriculture systems with the farmers. From rice fields to dairy farms. A company like Axfood sells thousands of different products produced on more than one farm. The complexity of the supply chain makes it impossible to calculate the climate impact of all the emissions that occur on all farms. However, you can still work actively with the climate impact from food. Focusing on reducing food waste, improving customer offering of vegetarian products, highlighting climate-smart alternative and sustainability-certified goods. Development of e-commerce means both opportunities and risks in terms of climate impact. Here, if you succeed in logistics, emissions from customer transport (scope 3) can decrease more than the company's emissions increase (scope 1). However, there is also a risk that emissions will increase more in scope 1 than they decrease in scope 3.

COCA-COLA EUROPEAN PARTNERS SVERIGE

Coca-Cola European Partners Sverige AB (CCEPS) produces, distributes and sells non-alcoholic beverages on the Swedish market. Its brands include Coca-Cola, Fanta, Sprite, MER, Bonaqua Silver, Powerade, Minute Maid and Chaqwa. CCEPS employs around 750 people, around 600 of whom are based in Jordbro outside Stockholm. About one million liters of beverages are produced in Jordbro every day. In Sweden, Coca-Cola was launched in 1953. For more information please visit www.ccep.com

Climate targets

By 2020, CCEPS aims to reduce carbon emissions from beverages by one third and absolute carbon emission from the core business by 50 percent. Since 2007, carbon dioxide emissions from beverages have decreased by 24 percent and emissions from the core business have decreased by 40 percent. The targets have been approved as Scienced Based Objectives.

Actions taken in 2016

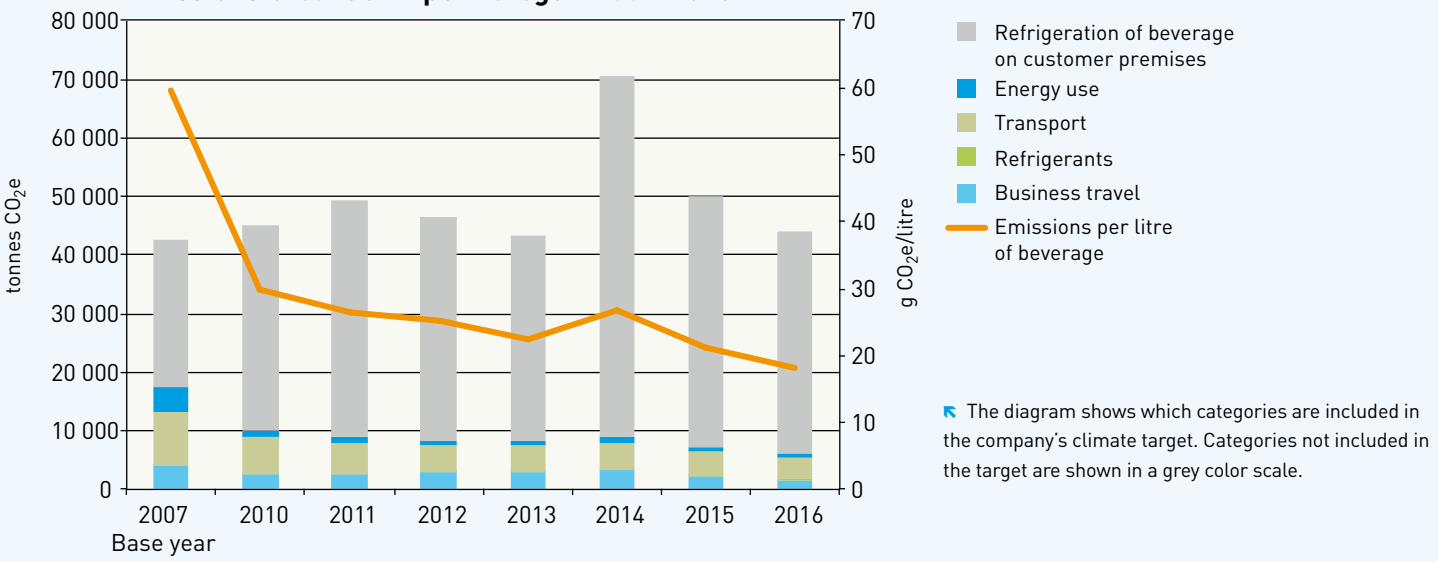
- For several years, CCEPS have used renewable fuels for its own distribution and purchased transportations. In 2016, steps were taken toward HVO (Hydrogenated vegetable oil). Within its own distribution, the total share of renewables has increased from 76 percent to 90 percent.
- A large installation of LED lighting resulted in 506 saved MWh, which corresponds to an annual electricity consumption of 34 Swedish villas.
- CCEPS, together with their refrigerator supplier, have developed and purchased new energy-efficient refrigerator models. The new Icool model is up to 70 percent more energy efficient compared to a "retro refrigerator".

Emissions (tonnes CO_2e)	Base year 2007	2015	2016	Share of total 2016	Change 2007-2016
Scope 1					
Business travel[2]	2 533	937	543	9%	-79%
Refrigerants	157	85	164	3%	5%
Own transportation	2 618	383	231	4%	-91%
Scope 2					
Purchased energy[2]	6 107	7 806	6 937	4%	-92%
Scope 3					
Business travel[3]	1 118	738	821	13%	-27%
TOTAL excl. reduction through energy with Guarantee of Origin	**12 533**	**9 949**	**8 696**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	-2 792	-7 540	-6 677	0%	139%
TOTAL Haga scope	**9 741**	**3 815**	**2 019**	**33%**	**-79%**
Outsourced goods transportation[5]	*5 993*	*3 541*	*3 274*	*53%*	-45%
Production and distribution of energy and vehicle fuels[6]	1 738	1 113	829	14%	-52%
TOTAL (climate target)	**17 472**	**7 063**	**6 122**	**100%**	**-65%**
Refrigeration of beverages on customer premises[7]	25 131	42 876	37 746		50%
TOTAL	**42 603**	**51 345**	**43 868**		**3%**

Key indicators	Base year 2007	2015	2016	Change 2007-2016	Unit
Emissions per unit of revenue[8]	6,400	2,243	1,775	-72 %	ton CO_2e/MSEK
Emissions per litre of beverage[8]	59,631	21,061	18,153	-70 %	g CO_2e/litre

1. Leasing- and rental cars.
2. Emissions from production of purchased electricity, district heating or district cooling, assuming that all is unspecified (residual mix)."Share of total" and (Change 2007-2016" includes contracts for renewable energy with Guarantee of Origin.
3. Refers to business air travel, train and taxi journeys. Scope 3 category 6.
4. Reduction of emissions for "Purchased energy" in scope 2.
5. Cargo transport purchased from external forwarding agent. Scope 3 category 4 and 9.
6. Refers to fuels consumed in scope 1 and scope 2. Scope 3 category 3.
7. The electricity consumption by refrigerators is calculated by using conservative estimates (all electricity is assumed to be residual mix). Scope 3 category 8.
8. Operations within the company. Does not include refrigerators in stores.

Emissions breakdown per kategori 2007-2016



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

CCEPS emissions within the Haga scope have decreased by 79 percent since the base year 2007. The company has set its own climate target, which go beyond the Haga scope categories, that includes more categories in scope 3 (purchased transports as well as production and distribution of vehicle fuel).

Of the categories included in CCEPS emissions target, goods transportation accounts for 60 percent, business travel for 28 percent, energy for 9 percent and refrigerants 3 percent. The categories include emissions in scope 1, 2 and 3, but not emissions resulting from the refrigeration of beverages in stores.

Emissions from freight and purchased energy have decreased by 60 and 86 percent, respectively, compared to the base year. The decrease in freight between 2015 and 2016 is largely due to the transition to the renewable fuels RME and HVO.

Emissions from business travel have decreased by 54 percent since the base year (scope 1 and 3 in total) and by 19 percent since the previous year. CCEPS has chosen to include emissions caused by Coca Cola fridges in stores. These emissions accounting for around 84 percent of all emissions in 2016 and have increased by 50 percent since the base year of 2007.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

The most significant emissions in CCEP scope 3 occurs in the production of the beverages ingredients and its packaging, which are not included in CCEP Sweden's disclosure for the Haga Initiative. However, the company has the possibility to influence these emissions and works centrally on an overall sustainability strategy. The sustainability strategy encompasses targets for reducing emissions in scope 3, examples of actions include increased share of recycled materials in packaging and sustainable production of ingredients and raw materials.

Folksam is a mutual company that has four brands, two groups and ten insurance companies. The parent companies are Folksam Sak and Folksam Liv which are majority shareholders in KPA Pension. Folksam offers insurance products and pension schemes. It insures almost one in two people in Sweden and looks after the pensions of more than two million people. Folksam has 3,540 full-time positions and managed over SEK 400 billion in 2016.

www.folksam.se

FOLKSAM

Climate targets

Folksam's goal is to reduce the greenhouse gas emissions produced by travel and its offices by 40 percent in 2020, compared to the base year of 2002. It aims to reduce travel, relative to the number of employees, by 20 percent in 2020.

Actions taken in 2016

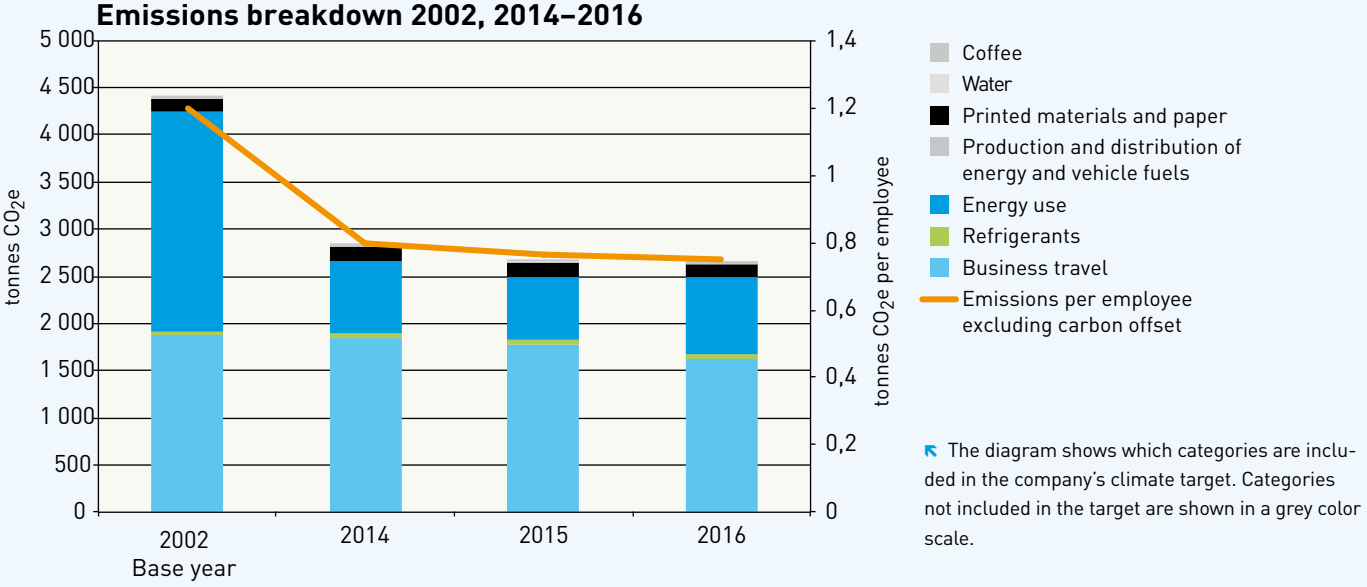
- In 2016, the focus was on creating a digital workplace where it would be possible to hold large meetings and one-to-one conversations via video and computer screen.
- In 2014, a digital system for inspecting damage to buildings was introduced. In 2015-2016, this made planning for customers and loss adjustment visits easier, which contributed to a small but steady reduction of the miles clocked up by the loss adjusters. Electricity and heat consumption have been further reduced at head office, sales and field offices around the country, thanks to a program of efficiency measures.
- The Folksam Group decided to support the goal of net zero greenhouse gas emissions by 2030.

Emissions (tonnes CO_2e)	Base year 2002	2015	2016	Share of total 2016	Change Base year-2016
Scope 1					
Business travel [1]	773	611	579	22%	*-25 %*
Own transportation	-	-	-		
Refrigerants [2]	43	43	48	2%	*12 %*
Scope 2					
Purchased energy [3]	2 324	3 350	3 482	31%	*-65 %*
Scope 3					
Business travel[4]	1 105	1 169	1 050	40%	-5 %
TOTAL excl. reduction through energy with Guarantee of Origin	**4 245**	**5 173**	**5 159**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin	0	-2 687	-2 670		
TOTAL Haga scope	**4 245**	**2 485**	**2 488**	**94 %**	**-41 %**
Production and distribution of energy and vehicle fuels[5]	0	9	9	*0,3%*	
Printed materials and paper	141	159	129	5%	-8 %
Water	2	3	**3**	0%	37 %
Coffe	21	26	25	1%	20 %
TOTAL (excl Carbon offset)	**4 409**	**2 682**	**2 655**	**100 %**	**-40 %**
Kilmatkompensation	0	-2 682	-2 655		
TOTAL (incl Carbon offset)	**4 409**	**0**	**0**	**0 %**	

Key indicators	Base year 2002	2014	2015	Change 2002–2015	Unit
Emissions per employee exlcluding carbon offset	1,20	0,763	0,750	-38 %	tonnes CO_2e/employee
Emissions per employee including carbon offset	1,20	0,00	0,00	- 100 %	tonnes CO_2e/employee

1. Leasing- and employee cars.
2.Relates only to head quarter. Leakage for 2015 has been calculated as the average between 2011 and 2014.
3. Measured value for the head quarter, estimated values for other offices. "Share of total" includes contracts for renewableenergy with Guarantee of Origin.
4. Flights and train travels.
5. Only upstream emissions from wind power.

Emissions breakdown 2002, 2014–2016



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Folksam became a member of the Haga Intiative 2014, thus, this is the third year that Folksam participates in the Haga Initiative's greenhouse gas emissions disclosure. Folksam's emissions within the Haga scope have decreased by 41 percent 2016, since the base year of 2002, and the total climate footprint has dropped by 40 percent between 2002 and 2016.

The main source of Folksam's emissions is business travel (61 percent), which include leasing cars, the employee's car journeys, and air and rail travel. Purchased energy (scope 2) represent 31 percent of the total emissions. All electricity purchased to Tullgården, the sales and field offices as well as Förenade Liv is original-labelled with a Bra Miljöval-label. Folksam offset its carbon footprint, thus achieving net-zero carbon emissions. Since 2013, electricity consumption has decreased by nearly 8 percent while heat consumption decreased by about 14 percent over the same period. Total energy consumption decreased by 11 percent between 2013 and 2016.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Emissions from the businesses that Folksam invests in is the company's most significant emission in scope 3. These emissions are not included in the report to the Haga Initiative. Folksam is a large institutional owner and an active asset manager who influence companies in which they have equity shares through ethical investment criteria and corporate governance. For example, in 2016 Folksam decided to divest from companies with more than 30 percent revenues from coal.

AB Fortum Värme jointly owned by Fortum and the City of Stockholm, produces district heating, district cooling, and electricity. Fortum Värme has contributed to Stockholm being counted as one of the world's most sustainable capitals, in 2010 EU named Stockholm as the world's first environmental capital – Green Capital.

Between 2010 and 2016, Fortum Värme invested SEK 6,5 billion in combined heat and power production in the Stockholm region. The aim is that by 2030 at the latest, 100% of its district heating in Stockholm will be produced from renewable or recovered energy. Fortum Värme reports annual sales of approximately SEK 7 billion and employs 660 people. The company has 9,500 district heating and district cooling customers.

www.fortum.se

FORTUM VÄRME

Climate targets

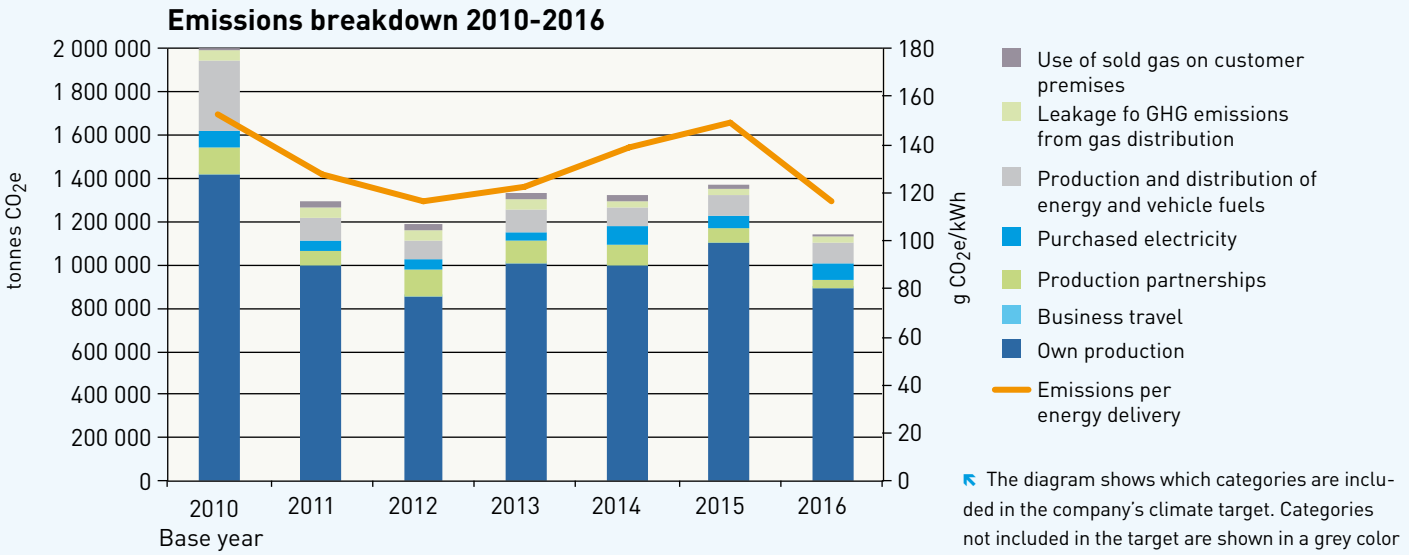
Fortum Värme's target is to reduce emissions by 40% by 2020 (compared to 2010) through switching to renewable energy, energy recovering/recycling, efficiency measures, and, as a last resort, carbon offsetting. By 2030 at the latest, 100% of production should be based on renewable or recovered energy and by 2020 at the latest, the use of coal should be terminated.

Measures taken in recent years

- The start-up of the biofuels plant in Värtan is expected to give an annual emission reduction of 170,000 tonnes CO_2e.
- Signing of an agreement for the disposal of 100 GWh surplus heat per year from data centres, which result in an annual emission reduction of approximately 6,000 tonnes CO_2e
- Connecting customers to district heating and district cooling equivalent to 120 GWh/year, resulting in a benefit to the climate of 5,300 tonnes of CO_2/year

Emissions (tonnes CO_2e)[1]	Base year 2010	2015	2016	Share of total 2016	Change 2010-2016
Scope 1	1 460 848	1 132 823	916 356	80%	-37%
Production[1]	1 418 156	1 098 495	888 075	78%	-37%
- CO_2 from burning of coal	624 340	566 891	341 656	30%	-45%
- CO_2 from burning of oil	420 232	57 507	109 321	10%	-74%
- CO_2 from burning of fossil fuel fraction of municipal waste	210 756	385 322	366 787	32%	74%
- Other GHG related emissions	162 828	88 775	70 310	6%	-57%
Leakage of GHG emissions from gas distribution	42 341	34 044	27 887	2%	-34%
Business travel[2]	351	284	394	0%	12%
Scope 2	77 982	56 761	82 719	7%	6%
Purchased electricity[3]	442 002	387 341	383 614		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	-364 020	-330 579	-300 895		
Scope 3	489 335	182 351	144 851	13%	-70%
Business travel[5]	176	213	121	0%	-31%
TOTAL Haga scope	**1 539 006**	**1 189 798**	**999 195**	**87%**	**-35%**
Produced by another district heating producer[6]	124 850	72 029	37 135	3%	-70%
Production and distribution of energy and vehicle fuels[7]	323 963	90 485	95 056	8%	-71%
Use of sold gas on customer premises[8]	40 345	19 624	12 539	1%	-69%
TOTAL (excl. Carbon offset)	**2 028 165**	**1 371 936**	**1 143 925**	**100%**	**-44%**
Carbon offset	-7 797	-386 521	-297 888		
TOTAL (incl Carbon offset)	**2 020 368**	**985 415**	**846 037**		**-58%**

Key indicators	Base year 2010	2015	2016	Change 2010-2016	Unit
Emissions from production[9]	162	146	115	-29 %	g CO_2e/kWh
Emissions per energy delivery[10]	153	149	116	-24 %	g CO_2e/kWh
Emissions per energy delivery[11]	152	107	86	-44 %	g CO_2e/kWh



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

During last year, the new combined heat and power plant (CHP) on biofuels in Värtaverket was put into operation, which decreased, and will further decrease, greenhouse gas emissions.

The plant did not come into operation until a few months into 2016, why the effect of the new plant should be even greater in 2017. On the other hand, this was weighed out of inaccessibility of the coal-fired CHP in 2016, with emissions totalling at about the level expected in 2017.Emissions in production decreased by almost 20 percent compared to last year, mainly due to the fact that coal consumption was about 40 percent lower.

During the year, gas operations were divested, so emissions from gas operations only concern the period January to October. Emissions from other energy companies that supply heat to Fortum Värme's district heating network decreased by almost 50 percent compared to the previous year, mainly because Söderenergi abandoned peat as a fuel early in the year. In the Haga scope, Fortum Värme has reduced its emissions by 35 percent since the base year 2010, which means that Fortum Värme is close to meeting the 40 percent target for 2020. Including emissions from production cooperation with other energy companies, total emissions have fallen by 44 percent.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Fortum Värme has for many years reported all significant greenhouse gas emissions. Emissions from extraction, processing and transportation of the fuels to the plants account for around 8% of emissions, these are included in the disclosure in scope 3. Emissions from the extraction of fuels are relatively low, as a large proportion of the fuels used are residues from the forest, industry and society.

1. Emissions of CO_2, methane, refrigerants and N_2O from Fortum Värme's own production
2. Business car journeys
3. Emissions from production of purchased electricity, district heating or district cooling assuming that all are unspecified (residual mix). "Share of total" and "Change 2010-2016" includes contracts for renewable energy with Guarantee of Origin."
4. Reduction of emissions for "Purchased energy" in scope 2. Fortum Värme buys renewable electricity for its district heating and district cooling production."
5. Refers to business air travel. Emissions in 2010 are assumed to be same as in 2014. Category 6 in Scope 3.
6. Emissions by players other than Fortum Värme in the case of production partnerships for district heating. The emissions include both emissions from plants and from the extraction and distribution of the fuels for these plants."
7. Production refers to extraction and processing of the fuels. In addition to distribution of the fuels, also transportation of additives and ash."
8. Category 11 in Scope 3.
9. Total emissions from production of electricity, heating and cooling. Fortum Värme does not have any production of gas.
10. Total emissions from scope 1, 2 and 3 as above for the total supply of district heating, electricity and district cooling before carbon offsetting."
11. Total emissions from scope 1, 2 and 3 as above for the total supply of district heating, electricity and district cooling before carbon offsetting."

Green Cargo offers rail freight transportation, intermodal transport solutions, rail logistics, transportation analysis, whole loads, block trains or single wagon loads, with containers, trailers and swap bodies. Environmentally certified door-to-door transportation in a rail-based network that covers the whole of Sweden and continental Europe. Green Cargo has almost 2,000 employees and reports annual revenue of SEK 4.2 billion (2016).

www.greencargo.com

GREEN CARGO

Climate targets

Over 90% of Green Cargo's transportation services are carried out using electric trains, but diesel consumption is still the biggest environmental aspect. Green Cargo's goal is to reduce diesel consumption in relation to its transport operations. As a member of the Haga Initiative, Green Cargo also has the target of becoming fossil free in its operations by 2030.

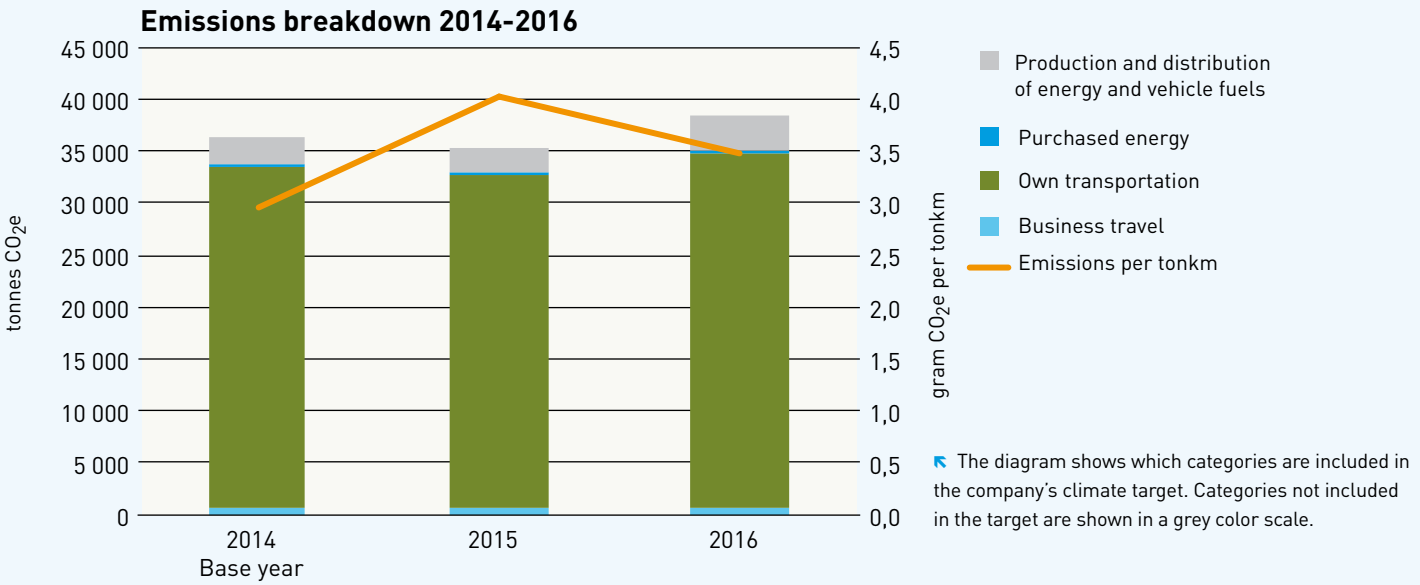
Actions taken in 2016

- One major action taken during the year was to install a stop-start system in 62 of Green Cargo's diesel locomotives. The system has been developed and tested in collaboration with distributors. The system senses engine temperature, battery charge etc. and ensures that the locomotive will restart after it has been switched off. The stop-start system avoids engine idling and thus reduce the environmental impact by saving diesel. Furthermore, the function contributes to noise reduction in the operating environment, wear and tear and prevent unnecessary noise pollution in the surroundings.

Emissions (tonnes CO_2e)	Base year 2014	2015	2016	Share of total 2016	Change 2014-2016
Scope 1					
Business travel [1]	286	259	272	1%	-5%
Own transportation	32 786	32 062	34 064	88%	4%
Scope 2					
Purchased energy [2]	199 881	134 821	142 378	1%	-19%
Scope 3					
Business travel[3]	443	374	454	1%	2%
TOTAL excl. reduction through energy with Guarantee of Origin	**233 397**	**167 516**	**177 167**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	-199 606	-134 535	-142 155		
TOTAL Haga scope	**33 791**	**32 981**	**35 013**	**91%**	**4%**
Production and distribution of energy and vehicle fuels[5]	2 450	2 312	3 619	9%	31%
TOTAL (excl. Carbon offset)	**36 240**	**35 293**	**38 631**	**100 %**	

Key indicators	Base year 2014	2015	2016	Change 2014-2016	Unit
Emissions per amount transported (tonkm)	2,951	4,019	3,469	+18%	g CO_2e/tonkm

1. Refers to private/-leasing and rental cars.
2. Emissions from production of purchased electricity, district heating or district cooling, assuming that all is unspecified (residual mix). Refers to energy use in retail stores and premises owned by Axfood. "Share of total" and "Change 2005-2016"includes contracts for renewableenergy with Guarantee of Origin.
3. Refers to emissions from train, air travel, taxi, and hotel.
4. Reduction of emissions for "Purchased energy" in scope 2.
5. Includes district heating, hydropower, and vehicle fuels.



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Unlike other companies within the Haga Initiative, Green Cargo does not have a target to reduce emissions by 40% by 2020. This is because a switch to rail transportation is required in order for Sweden and individual companies to be able to reduce their impact on the climate. At the same time, Green Cargo needs to continue introducing energy efficiency measures to reduce its emissions per tonne kilometre.

Green Cargo's emissions have increased with 4 percent since the base year. The largest emissions source is goods transportation within scope 1, accounting for 88% of total emissions. The majority of this relates to the diesel consumption in the company's own diesel locomotives, with outsourced road freight transportation accounting for a smaller proportion. Business travel in scope 1, purchased energy, and business travel in scope 3 represent 1 percent of total emissions, while 7 percent occur in production and distribution of energy and vehicle fuels in scope 3. The distribution has not changed since 2015.

The emissions per tonne-kilometres (tkm) decreased by 14 percent in 2016 compared to 2015. A major reason for this is that tkm has increased with 21 percent, while emissions have not increased in the same extent. However, in comparison with the base year (2014), emissions have increased by 18 percent.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Green Cargo has emissions from the business travel in scope 3, such as "shift-journeys" - when staff must travel to where their shift starts. This part of the business has not been the focus previously, but has been reported for several years in the Haga Initiative's greenhouse gas disclosure. Green Cargo's sustainable freight transportation offering contribute to major emissions reductions in other actors' value chains (scope 3) and freight traffic by train forms an important part of the conversion of the Swedish transport system.

HKScan Sweden was founded in Halmstad in 1899 and is now part of the HKScan Group, one of northern Europe's biggest food companies. HKScan has net sales of SEK 7 billion and approximately 2,100 employees. HKScan produces, markets and sells high-quality, responsibly produced pork, beef, poultry and lamb products, processed meats and convenience foods under brand names such as Scan and Pärsons. Customers include the retail, food service, industrial and export sectors.

www.sweden.hkscan.com

HK SCAN

Climate targets

In 2016, HKScan Sweden adopted a new climate target to reduce climate emissions by 95 percent by 2030 compared to 2003.The target has been set in absolute figures to reflect the company's total emissions. The target includes scope 1 and scope 2 as well as business travel, outsourced incoming transportation and the production and distribution of energy and vehicle fuels in scope 3. Primary production is part of the goal as HKScan will develop guidelines and formulate strategies for how and what the company can do.

Actions taken in 2016

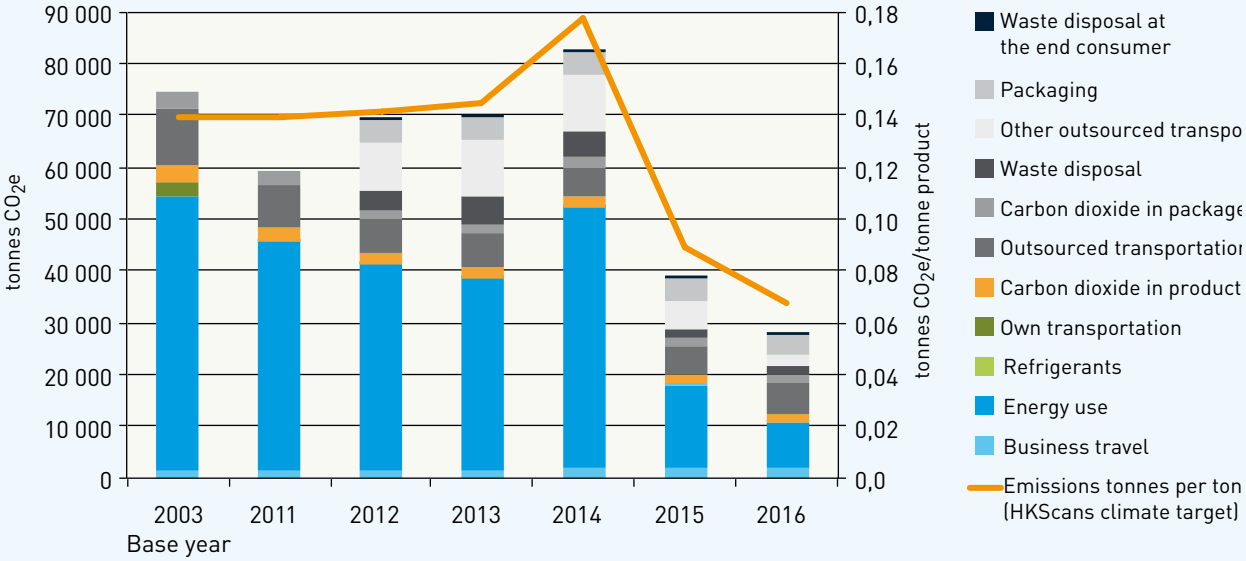
- All production sites conducted energy surveys during the year.
- Action plans to increase energy efficiency and reduce climate emissions have been established.
- The plant in Skara achieved ISO 50001 certification.
- In Halmstad, a pilot study on flue gas purification has been conducted. It shows that activated charcoal treatment is the most effective cleaning method and can reduce the annual consumption of natural gas by 87 percent and 638 tonnes of carbon dioxide. Active carbon will be installed in 2017.

Emissions (tonnes CO_2e)	Base year 2003	2015	2016	Share of total 2016	Change 2003-2016
Scope 1					
Business travel[1]	1 596	1 060	1 146	4%	-28%
Heating	22 334	12 735	6 084	22%	-73%
Refrigerants	0	168	39	0%	-
Own transportation	2 965	0	0	0%	-100%
CO_2 in production[2]	3 347	1 927	1 383	5%	-59%
Scope 2					
Purchased energy[3]	24 619	27 005	25 753	6%	-93%
Scope 3					
Business travel[4]	0	502	398	1%	-
TOTAL excl. reduction through energy with Guarantee of Origin	**54 861**	**43 397**	**34 803**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[5]	0	-25 788	-24 142		
TOTAL Haga scope	**54 861**	**17 609**	**10 660**	**38%**	**-81%**
Production and distribution of energy and vehicle fuels[6]	5 747	2 460	1 448	5%	-75%
Outsourced inward transportation[7]	10 516	5 367	6 373	23%	-39%
TOTAL HKScans climate target	**71 123**	**25 436**	**18 481**	**66%**	**-74%**
CO_2 in packaging[8]	3 347	1 927	1 383	5%	-59%
Other outsourced transportation[8]	-	5 579	2 196	8%	-
Waste disposal[9]	-	1 503	1 690	6%	-
Packaging[10]	-	4 186	4 046	14%	-
End consumer's disposal of packaging waste[11]	-	216	199	1%	-
TOTAL (excl. Carbon offset)	**74 470**	**38 847**	**27 995**	**100%**	**-62%**

Key indicators	Base year 2003	2015	2016	Change 2003-2016	Unit
Emissions per tonnes of weight produced (HKScans climate target)	0,139	0,089	0,068	-51%	tonnes CO_2e/tonne product

1. Refers only to cars.
2. The carbon dioxide is a residual product from the industry. Approximately half is emitted during production (scope 1) and half when the end consumer opens the carbon dioxide filled packaging (scope 3).
3. Emissions from production of purchased electricity,district heating or district cooling, assuming that all is unspecified (residual mix).
4. Refers to business air travel, rail travel and hotels.
5. Reduction of emissions for "Purchased energy" in scope 2.
6. Refers to fuels consumed in scope 1 and scope 2. Also includes purchased electricity for processes outside HKScan's operations.
7. Category 4 in Scope 3
8. Category in scope 3.
9. Refers to waste disposal (to landfill, materials recycling and production of biogas). Calculated from 2012 onwards.
10. Emissions from the production of packaging materials. Calculated from 2012 onwards.
11. Refers to emissions caused by the consumer in waste disposal. Calculated from 2012 onwards.

Emissions breakdown 2003, 2011-2016



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

HKScan's emissions within the Haga scope have reduced by 81 percent since the base year of 2003. In addition to the Haga scope, HKScan's climate target includes emissions from the production and distribution of fuel, and outsourced incoming transportation. In 2016, emissions within HKScan's 'climate target scope' accounted for 66 percent of the total emissions reported and have reduced by 51 percent since the base year (2003).

This is due to lower emissions within all categories. Approximately half of the reduction has been achieved by HKScan buying origin-labelled hydroelectricity for all its electricity needs from 2015. Emissions per unit of weight produced have decreased by 51 percent since the base year of 2003.

30 percent of the emissions fall under scope 1 and consist mainly of heating. Emissions in scope 1 have decreased by 71 percent since 2003, primarily as a result of reduced consumption of fossil fuels for heating.

Apart from emissions of carbon dioxide when customers open the packaging, the other categories in scope 3 were new in 2012 and are therefore not comparable with the base year. The extended remit of scope 3 has meant disclosure of an additional 6,765 tonnes in 2016 compared to 2003.

The reporting of outsourced transportation has been expanded since 2012 to include a category of 'other outsourced transportation' and has not been included in the emissions target for the sake of comparability with the base year. In addition, a further three scope 3 categories were included in the calculations in 2012 that had not previously been included: waste disposal in own operations, production of packaging materials and waste disposal by end consumers. These three categories together account for around 21 percent of HKScan's total emissions.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Emissions from primary production of meat are not included in HKScan's disclosure and represent the most significant source of emission in scope 3. Rearing cattle in particular causes significant emissions of greenhouse gases, especially methane. This is difficult to tackle, however HKScan work together with their suppliers to reduce greenhouse gas emissions. One example is that the soya in animal feed is replaces by field beans and by-products from the food industry, and the remaining soya consumed does not come from plantations that have contributed to deforestation of rainforests.

JM is one of the leading developers of housing and residential areas in the Nordic region. Operations focus on the construction of new homes in attractive locations, with an emphasis on the expanding metropolitan areas and university towns of Sweden, Norway, Denmark, Finland and Belgium. The company is also involved in project development of commercial premises and contract work. JM prioritises quality and environmental issues in every aspect of its work. The company employs 2,300 people and generates sales of approximately SEK 14 billion.

www.jm.se

JM

Climate targets

JM has set the target of zero net emission by 2030. The target is broken down into six sub-goals, which include own emissions from passenger transport and energy use (at least 85 percent lower than base year 2010) and indirect emissions from machines, freight transports, construction materials, energy performance of buildings and residents carbon footprint.

Energy use in buildings on exploitation properties is not included in the target, as energy measures are implemented as soon as possible for the exploitation of the properties. Due to the climate impact that arises in the production of building materials and in the operational phase of the buildings, the zero vision is linked to JM's ability to influence emissions.

Actions taken in 2016

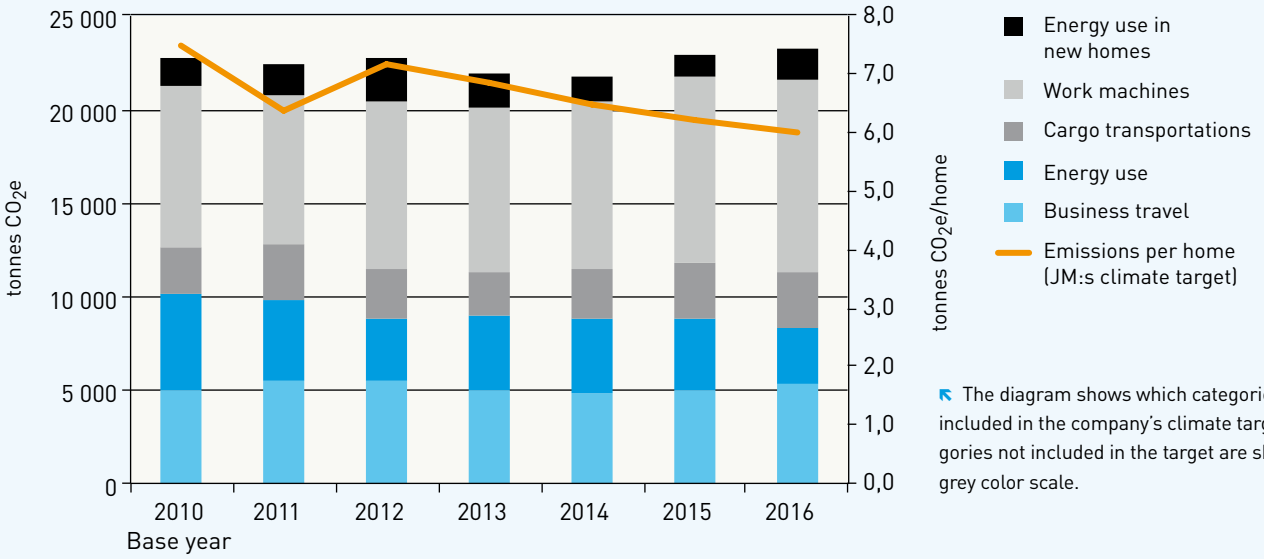
JM works to reduce the company's climate impact in several different areas. During the year, a dialogue was initiated with suppliers to reduce the carbon dioxide emissions of concrete. To increase material efficiency and thus further reduce climate impact from material use, a project has been started to radically reduce the construction waste of the business. At the same time, the possibility of phasing out fossil fuels on the building sites is being investigated. By 2016, JM's low-energy housing concept has been further improved, for instance by improving the energy performance of appliances.

Emissions (tonnes CO_2e)	2010	2015	2016	Share of total 2016	Change 2010-2016
Scope 1					
Business travel[1]	3 970	3 642	3 917	17%	-1%
Heating	1 785	1 062	790	3%	-56%
Scope 2					
Purchased energy[2]	9 608	13 592	12 014	8%	-31%
Scope 3					
Business travel[3]	357	474	525	2%	47%
TOTAL excl. reduction through energy with Guarantee of Origin	**15 720**	**18 770**	**17 247**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	-7 065	-11 339	-10 260		
TOTAL Haga scope	**8 656**	**7 431**	**6 987**	**30%**	**-19%**
Outsourced transportation	2 487	2 881	2 971	13%	19%
Leased machinery	8 663	9 954	10 265	44%	18%
Production and distribution of energy and vehicle fuels[5]	1 485	1 414	1 353	6%	-9%
- of which fuels for business travel	692	816	837	4%	21 %
- of which fuels for production of energy	793	598	516	2%	-35 %
Energy use in new homes (first 2 years of use)	**1 437**	**1 272**	**1 587**	**7%**	**10%**
TOTAL (excl. Carbon offset)	22 728	22 953	23 163	100%	2%
Carbon offset	**-359**	**-371**	**-422**		
TOTAL (incl Carbon offset)	**22 369**	**22 582**	**22 741**	**98%**	**2%**

Key indicators	2010	2015	2016	Change 2010-2016	Unit
Emissions per home[6]	7,5	6,2	6,0	-20%	tonnes CO_2e/home

1. Car journeys in vehicles controlled by JM.
2. Refers to electricity used in production, electricity used in properties owned by JM, district heating used in production and district heating in properties owned by JM. Emissions from production of purchased electricity, district heating or district "cooling assuming that all are unspecified (residual mix). "Share of total" and ""Change 2010-2016""includes contracts for originlabelled electricity."
3. Refers to air, taxi, bus and train travel and hotels used for business purposes.
4. Reduction of emissions for "Purchased energy" in scope 2.
5. Refers to fuels consumed in scope 1 and scope 2. These correspond to upstream emissions from the fuel (production of the fuel) and energy use in newly built properties in their first two years.
6. Excluding energy use in homes in the first two years.

Emissions breakdown 2010–2016



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

JMs emissions within the Haga scope have reduced by 19 percent since 2010. The Haga scope accounts for 30 percent of all emissions. Both emissions from business travel and heating within the Haga scope have reduced since 2010. Emissions from purchased energy have reduced by 31 percent compared to the base year.

In addition to the emissions included in the Haga scope, JM also includes outsourced transportation and machinery as well as the electricity and heat consumed in newly built properties during their first two years in its scope 3 emissions. While total emissions for new homes have increased by 10 percent, emissions per home have decreased by around 20 percent since 2010. This shows that the buildings are more energy-efficient, even though volume of production has increased. JM's greatest climate impact is from leased machinery which accounts for 44 percent of total emissions. JM has chosen to carbon-offset emissions from air travel.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Emissions from the manufacture of building materials are not included in JM's disclosure and account for a major part of scope 3 emissions. JM has some possibility to influence this and as a major material user JM identifies the product types in production that have a major climate impact and are continuously working towards climate-efficient solutions. JM operates several initiatives internally to reduce climate impact from materials by streamlining material use, reducing the build-up of building waste and creating more circular material flows. Tests are being conducted to see if the use of carbon dioxide-reduced concrete can be used in the housing production. Houses are continuously evolving towards better energy performance - reducing energy demand and climate impact during the building operation and maintenance.

Lantmännen is an agricultural cooperative and northern Europe's leader in agriculture, machinery, bioenergy and food products. It is owned by 27,000 Swedish farmers and has 9,880 employees, operations in around 20 countries and an annual turnover of SEK 37 billion. With grain as its basis, the group creates added value from the fruits of the fields as part of a thriving farming industry. Some of Lantmännen's best known food brands are AXA, Kungsörnen, GoGreen, Schulstad, Gooh, Finn Crisp and Bonjour. The company is founded on knowledge and values built up through generations of owners. Having research, development and operations throughout the value chain means that the company can share responsibility – from field to fork. For more information please visit

www.lantmannen.com

LANTMÄNNEN

Climate targets

Lantmännen's climate target is to reduce its own carbon emissions by 40% between 2009 and 2020. The target relates to the company's own added value and is restricted to transportation and energy use in its own production.

In 2017, the climate target is to reduce emissions in own production facilities by 40 percent between 2015 and 2020, per revenue and value added. Production will be fossil-free in Sweden and Norway by 2025, in the rest of the Nordic countries 2030 and the rest of Europe 2040. The goal also includes energy efficiency of 3 percent per year and volume produced by 2020.

Actions taken in 2016

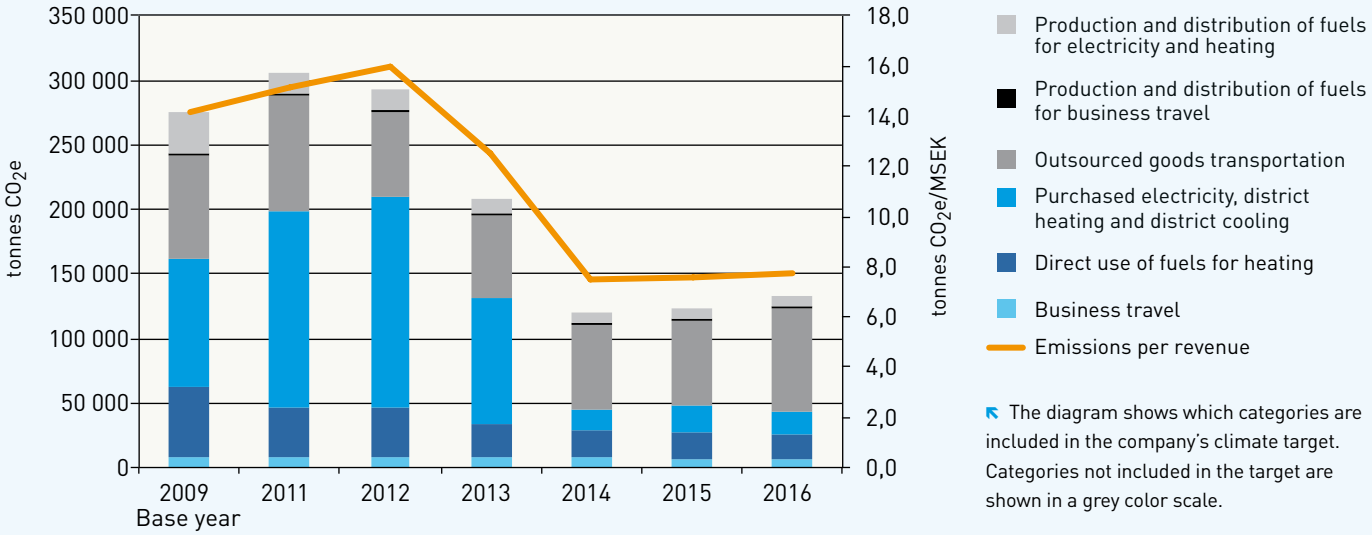
- Lantmännen and Scania start Etha, a collaboration with ethanol-based fuel for diesel engines. The purpose is to create a system solution that includes the entire chain from fuel to actual transport.
- More than half of Lantmännen Agroetanol's production was exported to Germany, where climate protection instruments provide a demand for Lantmännen's ethanol with 90 percent greenhouse gas reduction compared to gasoline.
- All wheat flour in Kungsörnen's *Vänligare vete* (Friendlier wheat) range is produced according to Lantmännen's new Climate & Nature cultivation concept that reduces the carbon footprint by 20%. In 2016 *Vänligare Råg* (Friendlier rye) was also launched in store.

Emissions (tonnes CO_2e)	Base year 2009	2015	2016	Share of total 2016	Change 2009-2016
Scope 1					
Business travel [1]	4 508	3 520	3 467	3 procent	-23 %
Heating	53 637	20 039	18 281	14 %	-66 %
Scope 2					
Purchased energy [2]	100 138	154 976	148 702	14 %	-82 %
Scope 3					
Business travel [3]	2 893	2 764	2 955	2 %	2 %
TOTAL excl. reduction through energy with Guarantee of Origin	**161 177**	**181 298**	**173 404**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin [4]	0	-134 751	-130 443		
TOTAL Haga scope	**161 177**	**46 547**	**42 961**	**33 %**	**-73 %**
Outsourced goods transportation [5]	79 867	66 982	76 747	60 %	-4 %
Production and distribution of energy and vehicle fuels[6]	32 993	8 460	8 948	7 %	-73 %
- of which fuels for business travel	953	844	809	1 %	-15 %
- of which fuels for production of energy	32 040	7 616	8 139	6 %	-75 %
TOTAL (excl Carbon offset)	**274 037**	**121 989**	**131 655**	**100 %**	**-52 %**

Key indicators	2009	2015	2016	Change 2009–2014	Unit
Emissions per unit of revenue	14,2	7,6	7,5	-47 %	tonnes CO_2e/MSEK

1. Assuming that fuel consumption for company cars was the same in 2014 as in 2013.
2. Emissions from production of purchased electricity, district heating or district cooling assuming that all are unspecified (residual mix). The emission factor for residual mix increased by around 150% between 2009 and 2014.
3. Refers to business air travel and rail journeys.
4. Reduction of emissions for "Purchased energy" in scope 2.
5. Refers to goods transportation provided by external contractors.
6. Refers to fuels consumed in scope 1 and scope 2.

Emissions breakdown 2009, 2011-2016



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Lantmännen's total climate impact has reduced by 52 percent and with 73 percent within the Haga scope. In the Haga scope, all emissions have decreased since the base year 2009 and since the previous year, except for business travel. The increase in business travel is mainly due to an increase in air travel.

Lantmännen's climate impact is greatest in scope 3, where emissions from outsourced freight transportation account for 60 percent of total emissions. These emissions have increased by 19 percent compared to 2015, but is constant compared with base year 2009. The increase is due to increased emissions from truck transports.

Emissions per turnover have not changed significantly since 2014, but have fallen with 47 percent since the base year 2009.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Emissions from growing grain and other ingredients are not included in Lantmännen's disclosure. These emissions account for around 80% of the emissions in the chain from field to fork and is the most significant source of emission in scope 3. Lantmännen is therefore developing new concepts for growing that focus on reduced climate impact in partnership with farmers and customers.

Emissions in the cultivation are mainly related to the use of fossil fuels and the production of mineral fertilizers and the use of fuels for the machines used in agriculture. The nitrogen-related emissions are reduced by technology solutions in production, which are already used to a significant extent today.

It is difficult to address the emissions of environmentally harmful nitrous oxide from the biological activity in the arable land. Lantmännen is implementing available technical solutions, such as eco-driving, precision technology for propagation of plant nutrition and low-carbon mineral fertilizers in the cultivation of cereals to Kungsörn's milk products marketed under "A Friendlier Wheat" and "A Friendlier Rye".

LÖFBERGS

Löfbergs was founded in 1906 and is one of the largest family-owned coffee roasters in the Nordic region. Production corresponds to just over 10 million cups of good coffee a day. In Sweden, the company has 175 employees and a turnover of about SEK 1 billion. The group has 339 employees and a turnover of SEK 1.7 billion. Headquartered in Karlstad, the company has its own roasting facilities in Sweden, Norway, Denmark and Latvia.

www.lofbergs.se

Climate targets

Löfberg's climate target is to reduce greenhouse gas emissions in relation to production volume of coffee by 40 percent by 2020 from the base year of 2005. The climate target includes emissions in 1 and 2 and business travel in scope 3.

Actions taken in 2016

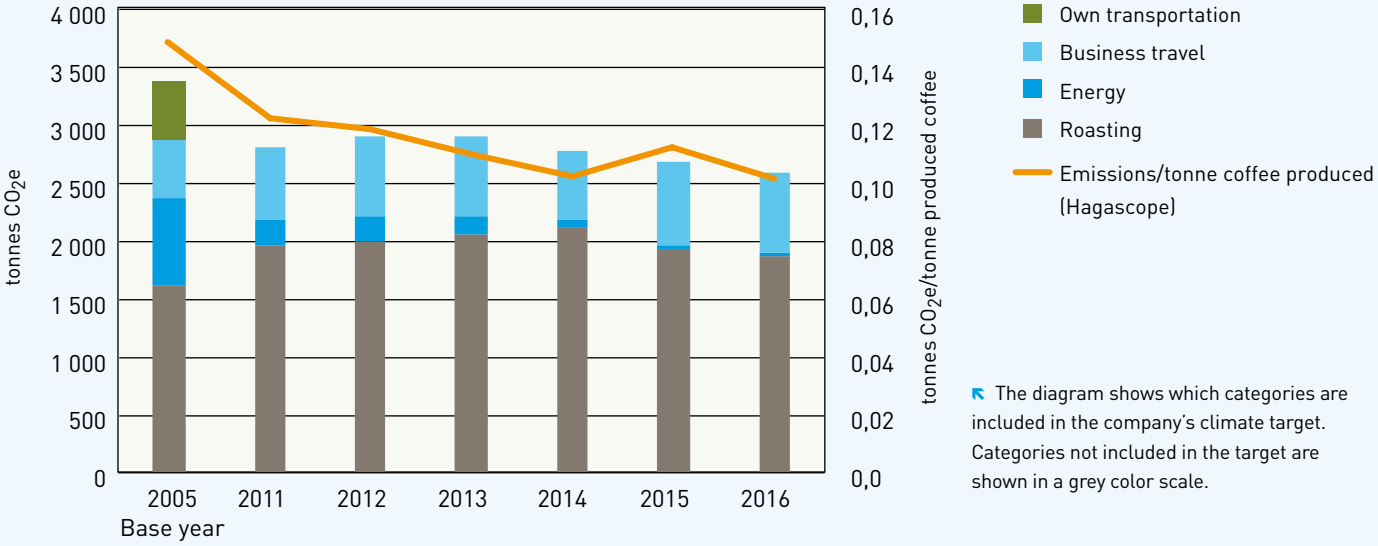
- Launch of a new, fully plant-based coffee capsule with 15 times lower climate impact than aluminium capsules.
- Support the Fly Green Fund, 75 percent devoted to purchase of bio-fuel and 25 percent to development of the fossil-free aviation fuels.
- At the construction of Löfbergs new high-bay storage in Karlstad environmental-concrete was used, reducing the climate impact with 230 tonnes of carbon dioxide. The warehouse is one of the first in Sweden that has been certified according to Miljöbyggnad Silver.

Emissions (tonnes CO_2e)[1]	2005 Base year	2015	2016	Share of total 2016	Change 2005-2016
Scope 1					
Rostning	1 623	1 924	1 865	1,4 %	15 %
Energi[2]	295	0	0	0,0 %	-100 %
Business travel[3]	265	242	234	0,2 %	-12 %
Own transportation[4]	511	0	0	0,0 %	-100 %
Scope 2					
Purchased energy[5]	459	1 739	1 713	0 %	-93 %
Scope 3					
Business travel[6]	236	498	473	0,3 %	100 %
TOTAL excl. reduction through energy with Guarantee of Origin	**3 390**	**4 402**	**4 285**	**3 %**	**26 %**
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[7]	0	-1 704	-1 679		
TOTAL Haga scope	**3 390**	**2 699**	**2 606**	**2 %**	**-23 %**
Production and distribution of energy and vehicle fuels[8]	310	273	254	0,2 %	-18 %
Outsourced goods transportation[9]	6 825	8 133	9 043	6,6 %	33 %
Packaging[10]	2 836	2 263	2 625	1,9 %	-7 %
Coffe growing[11]	122 873	112 157	123 397	89,5 %	0 %
TOTAL (excl. Carbon offset)	**136 234**	**125 525**	**137 925**	**100 %**	**1 %**
Air travel [12]	0	-85	-242		
"Sustainable business" - carbon offset coffe[12]	0	-670	-862		
TOTAL (incl Carbon offset)	**136 234**	**124 770**	**136 821**		**0 %**

Key indicators	2005	2015	2016	Change 2005-2016	Unit
Emissions per tonne coffe produced (Haga scope)	0,149	0,113	0,102	-32%	tonnes CO_2e/tonne coffe produced
Emissions per tonne coffe produced (total)	5,994	5,225	5,340	-11%	tonnes CO_2e/tonne coffe produced

1. Löfbergs' disclosure covers its Swedish operations as well as its production site in Viborg, Denmark. All parts of the disclosure include Viborg except for business travel. The years 2011–2014 relate to a split reporting year, i.e. 2014 relates to autumn 2013–spring 2014.
2. Emissions from fossil fuels from own burners.
3. Refers to leased vehicles.
4. Transportation by own vehicles.
5. Emissions from production of purchased energy, assuming that all is unspecified (residual mix). "Share of total" and "Change 2005-2016"includes contracts for renewable energy with Guarantee of Origin.
6. Refers to air, rail and taxi travel and hotels.
7. Reduction of emissions for "Purchased energy" in scope 2.
8. Refers to fuels consumed in scope 1 and scope 2.
9. Refers to transportation of green coffee beans from grower to factory, transportation of packaging materials and distribution. The calculation method for transportation of packaging has changed.
10. Extraction of raw material and production of packaging. The increased emissions in 2013 and 2014 are mainly due to the change in calculation method with effect from 2012 and the inclusion of the plant in Viborg.
11. Coffee growing, including associated processes. Refers to category 1 in the GHG Protocol's standard for scope 3.
12. All carbon offset takes place through CDM Gold standard projects.

Emissions breakdown 2005, 2011-2016



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Löfbergs has applied a broad definition of its scope 3 emissions by also including the climate impact of the growing of the coffee that it buys. Calculated emissions have not been adjusted for the carbon sinks provided by the coffee plantations and their shade plants, and are therefore relatively high: around 90% of Löfberg's reported climate impact. Outsourced transportation in scope 3 accounts for 7 percent of total emissions. Then comes the roasting of coffee, the largest source of emissions in scope 1, accounting for 1.5% of total emissions. Within the framework of the Haga scope, the roasting of coffee represents the greatest source of emissions. In 2014 the company switched from natural gas to biogas for the roasting of coffee in Viborg, and only biogas was used in 2015/2016. Emissions were 88 tonnes lower in 2015 than they would have been had natural gas been used. The impact on the climate of coffee cultivation is largely unchanged compared to the base year of 2005, even though production has risen by 13 percent. The reason is that a large proportion of the coffee grown is certified coffee with lower emissions during cultivation. Emissions from the roasting process have risen by 15 percent due to the increased production. In relative terms, emissions per tonne of coffee produced have fallen by 11 percent since 2005.

Emissions from electricity and heating have reduced substantially, thanks partly to the use of district heating rather than oil-fired systems, and partly to the fact that electricity consumption is purchased as origin-labelled wind power. As a result, Löfbergs has succeeded in reducing its climate impact per unit of premises by around 80%. During 2013, the production plant in Viborg also began to purchase origin-labelled wind power. Löfbergs is continuously working to reduce climate impact on packaging materials, for example, in the beginning of the 1990s a package of plastic laminates without aluminum was launched.

Emissions from business travel have risen by 41 percent since 2005 due to increased air travel.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Löfbergs reports its most significant emissions in scope 3; coffee cultivation, packaging and transports. Löfberg's does not have its own plantations, but nonetheless is working in various ways to reduce the climate impact of the plantations – for example by knowledge sharing. In addition, Löfberg's goal is that all coffee should be certified to reduce emissions in the agricultural phase.

McDonald's is Sweden's largest restaurant chain, with 220 restaurants and 435,000 customers daily. McDonald's employs approximately 12,000 people and is Sweden's largest private employer of young people. Just over 90% of the restaurants are run locally by owner-operators. For more information, please visit www.mcdonalds.se

MC DONALD'S

Climate targets

McDonald's in Sweden has a target of a 40% reduction in carbon emissions by 2020 – relative to the number of customers – from its base year of 2010. The emissions included in this target are scope 1, scope 2 and business travel in scope 3. A further goal is to achieve 95 percent renewable fuel for deliveries of ingredients to restaurants by 2020. In line with other member companies in the Haga Initiative, McDonald's has adopted a target of fossil free operations by 2030, and that McDonald's operations have emissions close to zero by 2030.

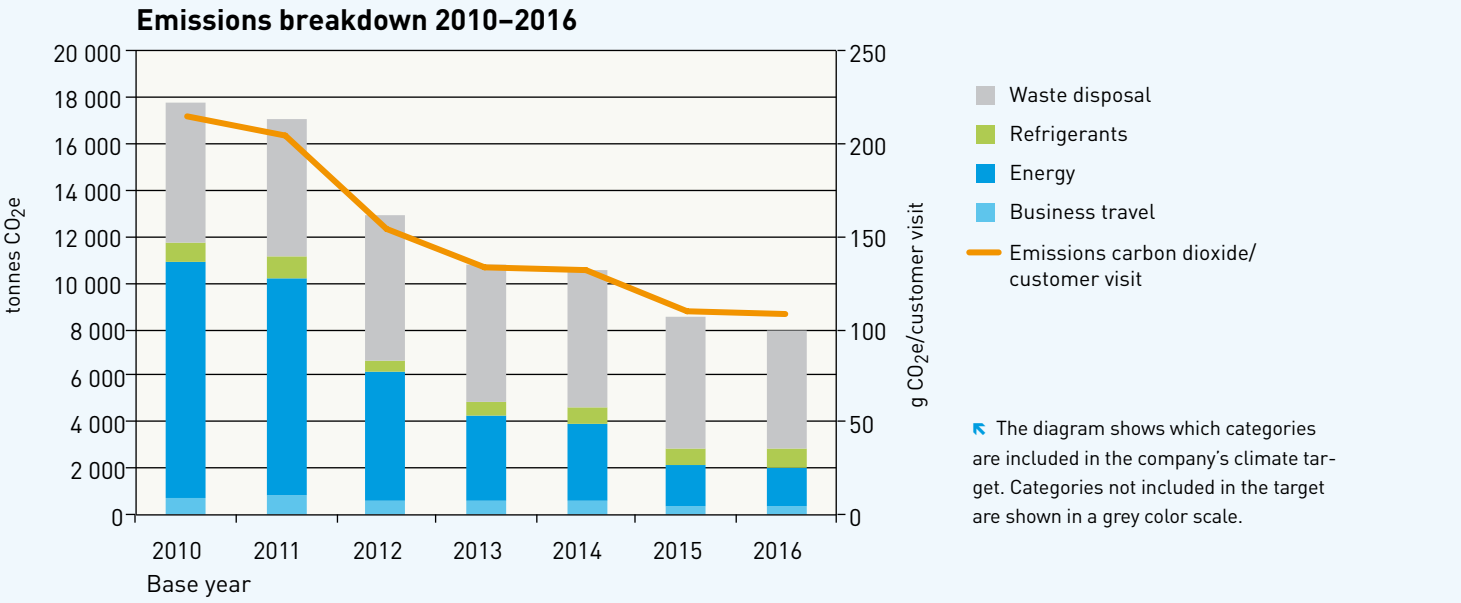
Actions taken in 2016

- McDonald's has increased the number of rapid chargers for electric cars at their restaurants. In 2016, electricity was charged to drive over 325,000 kilometres.
- 90 percent of deliveries to the restaurants were transported using renewable fuels (RME & HVO), an increase of 15 percent since 2015.
- McDonald's has continued to develop its efforts to utilize the returning transportations from the restaurants, taking waste to the distribution centres where material can be recycled.

Emissions (tonnes CO_2e)	Base year 2010	2015	2016	Share of total 2016	Change 2010-2016
Scope 1					
Business travel[1]	251	155	159	2 %	-37 %
Refrigerants	861	707	800	10 %	-7 %
Scope 2					
Purchased energy[2]	33 834	35 938	34 331	8 %	-91 %
Scope 3					
Business travel[3]	427	271	236	3 %	-45 %
TOTAL excl. reduction through energy with Guarantee of Origin	**35 373**	**37 071**	**35 525**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[4]	-26 695	-34 968	-33 684		
TOTAL Haga scope	**8 678**	**2 102**	**1 842**	**23%**	**-79%**
Waste disposal	6 078	5 679	5 189	65 %	-15 %
Production and distribution of energy and vehicle fuels[5]	3 061	727	960	12 %	-69 %
- of which fuels for business travel	23	14	15		-37 %
- of which fuels for energy prodcution	3 038	713	945		-69 %
TOTAL McDonald's Sveriges climate target	**17 817**	**8 508**	**7 991**	**100%**	**-55%**
Logistics	3 144	2 561	1 107		-65 %

Key indicators	Base year 2010	2015	2016	Change 2010-2016	Unit
Emissions per customer visit (climate target)	215,4	109,4	107,8	-50 %	g CO_2e/customer
Emissions per month of operation (climate target)	6,5	3,3	3,1	-52 %	tonnes CO_2e/month
Energy use per customer visit	1,6	1,5	1,5	-9 %	kWh/customer

1. Refers only to company cars.
2. Emissions from production of purchased electricity, district heating or district cooling assuming that all are unspecified (residual mix). "Share of total" and "Change 2010-2016" includes contracts
for renewable energy with Guarantee of Origin. Purchased district heating is assumed to be the same as in 2015 when it was thourougly surveyed.
3. Refers to business air travel, train and taxi journeys.
4. Reduction of emissions for "Purchased energy" in scope 2.
5. Refers to fuels consumed in scope 1 and scope 2.



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

McDonald's Sweden has reduced its emissions in the Haga scope by 79 percent since the base year 2010. The Haga scope includes about 23 percent of the total calculated emissions. The company has also set its own climate target where waste management and production and distribution of energy and vehicle fuels are included. Within its emission target, the company has roughly halved its emissions compared to the base year (2010) and by 6 percent since last year.

Emission are reducing in all categories but the greatest reduction is within energy, compared with the base year. Energy use in kWh has decreased by about 4 percent compared to 2014, but emissions in scope 2 for energy use have declined by a full 91 percent. The decrease is largely due to the fact that McDonald's significantly reduced the amount of unlabelled electricity it purchases and instead purchases electricity labelled with "Bra Miljöval" and origin-labelled renewable electricity.

Of the emissions included in the climate target, waste management stands for 65 percent in 2016. Emissions related to waste have reduced by 15 percent since the base year and 8 percent since 2015.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

McDonald's most significant emission in scope 3 is purchased beef. McDonald's was one of the initiators of the Global Round Table of Sustainable Beef, an organization that promotes sustainability in beef production around the world. In Sweden, McDonald's restaurant industry is the largest purchaser of Swedish beef and has cooperated with LRF for many years to increase the Swedish self-sufficiency of beef, currently about 45 percent. McDonald's Sweden is also working to constantly develop its menu with different protein options, today more than 30 percent are chicken, vegetarian and fish protein.

Preem is the largest fuel company in Sweden with the vision to lead the transformation towards a sustainable society. Preem refine and sell gasoline, diesel, heating oil and renewable fuels to companies and consumers in Sweden and abroad. The two refineries in Gothenburg and Lysekil are among the most modern and environmentally adapted in Europe with a refining capacity of more than 18 million cubic meter of crude oil per year. Preem has over 1,400 employees, of which 950 work at the two refineries in Gothenburg and Lysekil, Sweden. Preem had a turnover of sek 56 billion in 2016

www.preem.se

PREEM

Climate targets

Preem's goal is gradually to replace fossil raw materials with renewable raw materials in their own production, thereby increasing sales of renewable fuels. By 2030, Preem will manufacture at least 2,500,000 m3 of renewable fuels, which is the same as Preem's sales volume in the Swedish market.

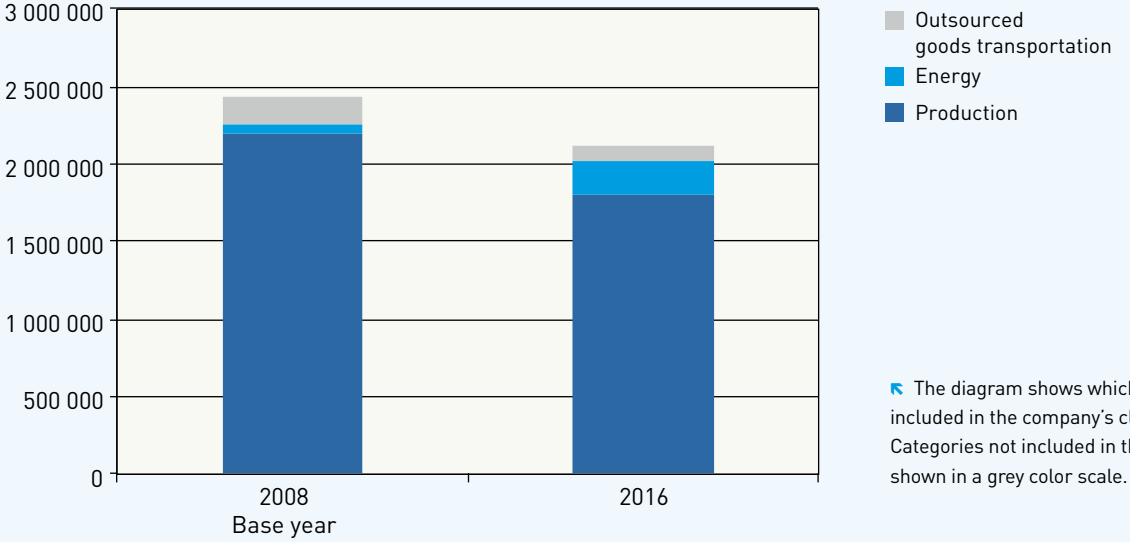
Actions taken in 2016

- Preem's production of renewable diesel increased from 140 700 m³ 2015 to 156 800 m³ in 2016. The share of renewable volumes of Preem's total fuel sales in Sweden increased from 14.4 percent in 2015 to 19.4 percent in 2016.
- In 2016, Preem Evolution Diesel + was launched and became the first eco-labeled liquid fuel in the world. The fuel meets the ecolabel Svanen's hard requirements for fuel.
- A comprehensive energy survey of the whole of Preem and a detailed energy survey of Preem's refinery in Gothenburg, which accounts for about 25 percent of Preem's significant energy use, was carried out in 2016. The survey found possible savings of energy equivalent to 39,000 MWh / year.

Emissions (tonnes CO_2e)	Base year 2008	2016	Share of total 2016	Change 2008-2016
Scope 1				
Production[1]	2 201 725	1 803 082	85%	-18 %
Scope 2				
Purchased energy [2]	62 618	218 990	10%	250 %
TOTAL Haga scope[3]	**2 264 343**	**2 022 072**	**96 %**	**-11 %**
Outsourced goods transportation[4]	172 118	87 305	4%	-49 %
Production and distribution of energy and vehicle fuels[5]	0	3 318	0%	
TOTAL (excl. Carbon offset)	**2 436 461**	**2 112 695**		**-13 %**

1. Combustion in PREEM's refineries.
2. Emissions from production of purchased electricity, district heating or district cooling, assuming that all is unspecified (residual mix). Refers to energy use in retail stores and premises owned by Axfood. "Share of total" and "Change 2007-2016" includes contracts for renewableenergy with Guarantee of Origin.
3. Refers to outsourced goods transportation by truck and freighter.
4. Refers to fuels consumed in scope 1 and 2.

tonnes CO_2e **Emissions breakdown 2008 och 2016**



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Preem is included in the Haga Initiative's greenhouse gas disclosure for the first time this year, as the company became a member in 2016. Since the base year 2008, Preem has reduced its emission in the Haga scope by 11 percent and by 13 percent for total calculated emissions. The reduction has mainly occurred in production (scope 1), among which the use of fuel oil has decreased significantly.

Emissions from purchased energy, on the other hand, have increased by 250 percent, mainly due to the increase in emissions from the Nordic residual mix 2016 by 87 percent compared with 2008 (see graph in the introductory chapter).

Emissions from purchased transports outside the Haga scope have decreased by 49 percent since the base year. Especially due to reduced emissions from ship transport.

The company does not report its emissions for mission trips in scope 3 this year, as these are of marginal importance in comparison with production and purchased energy.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Preem's most significant source of emissions in scope 3 is when customers use the company's fuels. With Preem's commitment to renewable fuels, emissions will decrease, which is of great importance in reducing Swedish emissions from transport. Preem intends to report the reduced emissions from fuel consumption as a result of Preem replacing fossil fuels with renewable in production and sales in next year's disclosure.

SIEMENS

Siemens is a global powerhouse focusing on the areas of electrification, automation and digitalization. Siemens has innovative solutions for intelligent infrastructure, sustainable energy technology, efficient production and medical diagnosis. During the fiscal year 2016, the company had a worldwide turnover of around 76 billion euros and 348,000 employees in more than 200 countries.

In Sweden, Siemens AB has been established since 1893 and has approximately 1400 employees in about 40 locations with headquarters in Upplands Väsby. In 2016, turnover for Siemens AB amounted to approximately SEK 4.9 billion. In Sweden the company employs about 4900 people including Siemens AB, during fiscal year 2016 the turnover was around SEK 15 billion.

Read more at www.siemens.se

SIEMENS

Climate targets

Siemens has set targets to reduce greenhouse gas emissions by 50 percent until 2020 compared with base year 2014 and to reach carbon neutral operations by 2030 in scope 1 and 2.

Actions taken in 2016

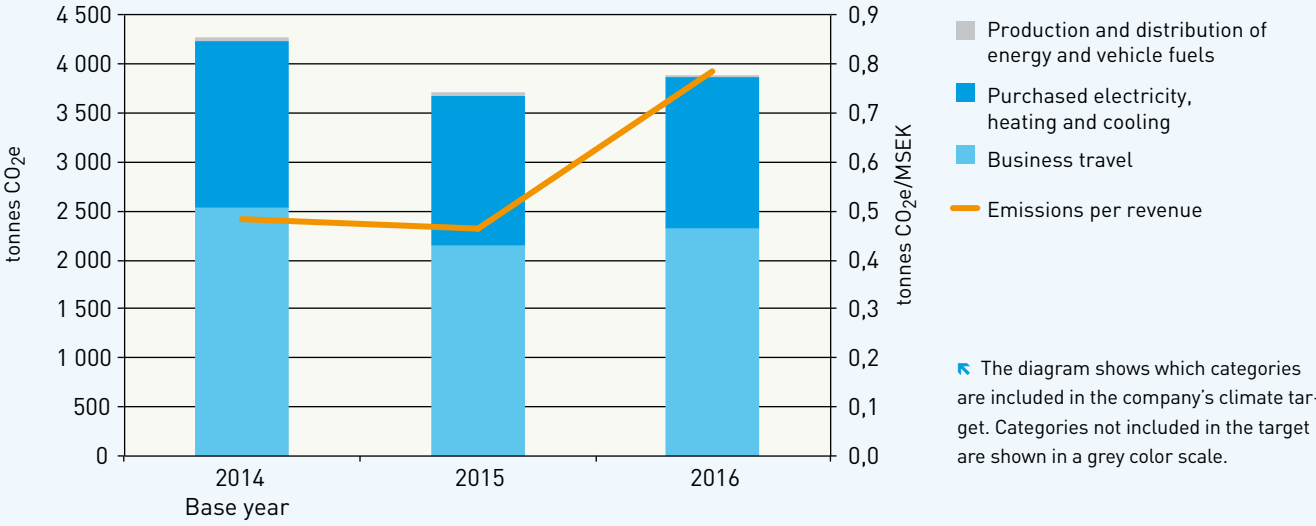
- Reduced carbon dioxide emissions from vehicles fleet, investments in low-emission vehicles and increased charging infrastructure for the company's fleet. By 2016, 44% of newly purchased vehicles were plug-in hybrids.
- In-depth analysis of air travel and revised action plan to address emissions from air travel in connection with relocation of headquarters. Examples of activity are upgrade of solutions for digital meetings.
- Siemens divisions have different goals to demonstrate how they impact customers' environmental footprint, such as reduced energy use. Read more at www.siemens.se

Emissions (tonnes CO_2e)	2014	2015	2016	Share of total 2016	Change 2014-2016
Scope 1					
Business travel[2]	1 084	1 162	1 132	29 %	4 %
Scope 2					
Purchased energy[3]	1 690	1 529	1 529	39 %	-10 %
Scope 3					
Business travel	1 458	986	1 199	31 %	-18 %
TOTAL Haga scope	**4 232**	**3 677**	**3 860**	**99 %**	**-9 %**
Production and distribution of energy and vehicle fuels[4]	36	34	35	1 %	-4 %
TOTAL (excl. Carbon offset)	**4 268**	**3 711**	**3 895**	**100 %**	**-9 %**

Key indicators	2014	2015	2016	Change 2014-2016	Unit
Emissions per unit of revenue	0,49	0,46	0,79	62 %	tonnes CO_2e/MSEK

1. Only emissions from Siemens own offices are included in this report.
2. Private-/leasing and company owned vehicles.
3. Emissions from production of purchased energy, assuming that all is unspecified (residual mix).
4. Refers to fuels consumed in scope 1 and 2.

Emissions breakdown 2014–2016



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Siemens is included in the Haga Initiative's greenhouse gas disclosure for the first time this year, as the company became a member in 2016. Emissions, since the base year 2014, have dropped by 9 percent in both the Haga scope and for total calculated emissions. Most of the total emissions within the Haga scope are emissions from business travel, which include leasing cars, the staff's own cars, as well as air and rail travel. In 2016, focus has been on measures for investments in low-emission vehicles and increased charging infrastructure for the company's fleet. Emissions from business travel have decreased compared with base year 2014. On the other hand, emissions for business travel increased between 2015 and 2016. The increase is mainly due to increased air travel and driving kilometres in the service.

Purchased energy is a significant part of total emissions and is relatively stable between 2014 and 2016. In conjunction with the relocation of headquarters in 2017, the forecast is a substantial decrease in emissions the next year as the headquarters move to a more energy-efficient building.

As part of a global restructuring of the Healthcare division, Siemens AB divested the Swedish Healthcare business to Siemens Healthcare AB. This results in an increase in emissions relative to sales in 2016 for Siemens AB. Several of Siemens products help reduce emissions at the time of use, namely scope 3. These products are collected in Siemens environmental portfolio and compiled by Siemens at a global level. At present, no breakdown is made by region or product level, consequently a specific figure for Siemens Sweden can not be obtained.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Siemens significant release in scope 3 comes from purchased products as well as the costumer use of Siemens products and services. Siemens monitors energy consumption and carbon dioxide emissions from a large part of the product portfolio. Siemens globally will be carbon neutral by 2030 and has also begun an in-depth work on evaluating key suppliers' climate impact and carbon dioxide emissions. The result of the evaluation will be used in the next step, in joint effort with key suppliers to work towards reduced carbon dioxide emissions from purchased goods. Siemens globally is a large company with complex value chains and many suppliers. This poses a challenge in switching to carbon dioxide neutral production, while Siemens has a great potential to influence its suppliers. Siemens AB is a sales and marketing company for Siemens global operations.

Stena Recycling, is part of the Stena Metall Group that collects, processes and recycles metals, paper, plastics, electronic waste and hazardous waste. The Swedish business employs just over 1,000 people and has annual sales of SEK 6,700 million. The company has 80 facilities located in different parts of Sweden.

www.stenarecycling.se

STENA RECYCLING

Climate targets

Stena Recycling has an overall target of a 40 percent reduction in climate impact by 2020 compared to 2008. This is a relative goal and is based on the quantity of material collected which is then passed on for recycling.

Actions taken in 2016

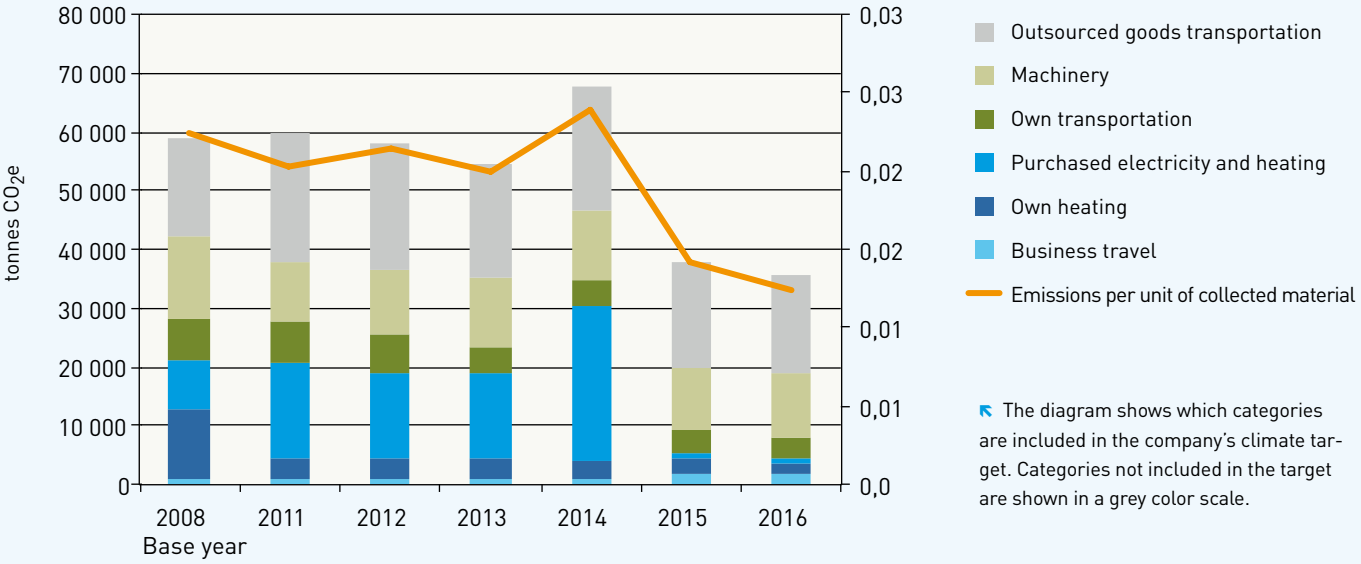
- The ambition in 2016 was to start converting to fossil-free branches by replacing the fossil diesel in the machines with fossil-free HVO. The conversion was terminated when it was revealed that the HVO suppliers could not ensure that the fuel did not contain palm oil or the residual product PFAD.
- In anticipation of the fossil-free conversion, Stena Recycling has continued to monitor fuel consumption per processed ton of material. The awareness of the staff has increased and led to less idle driving, more efficient use of machines and improved layouts at the facilities. The average consumption is 1.73 litres / ton. The next step is to set goals for a lower consumption.

Emissions (tonnes CO_2e)	Base year 2008	2015	2016	Share of total 2016	Change 2008-2016
Scope 1					
Business travel	668	1 488	1 122	3%	68%
Own heating[1]	10 681	2 657	1 905	5%	-82%
Own transportation[2]	5 639	2 858	2 706	8%	-52%
Machinery	12 030	8 750	9 077	25%	-25%
Scope 2					
Purchased energy[3]	7 107	18 016	18 302	1%	-94%
Scope 3					
Business travel[4]	251	224	172	0%	-32%
TOTAL excl. reduction through energy with Guarantee of Origin	**36 377**	**33 993**	**33 284**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin[5]	0	-17 739	-17 847		
TOTAL Haga scope	**36 377**	**16 254**	**15 437**	**43%**	**-58%**
Outsourced goods transportation[6]	16 561	18 172	16 735	47%	1%
Production and distribution of energy and vehicle fuels[7]	5 759	3 439	3 592	10%	-38%
- of which fuels for business travel	213	317	336	1%	58%
- of which fuels for own transportation	998	817	729	2%	-27%
- of which fuels for own machinery	2 157	1 752	1 835	5%	-15%
- of which fuels for energy production	2 405	554	691	2%	-71%
TOTAL (excl Carbon offset)	**58 697**	**37 865**	**35 764**	**100%**	**-94%**

Key indicators	Base year 2008	2015	2016	Change 2008-2016	Unit
Emissions per unit of collected material	0,022	0,014	0,012	-45 %	tonnes CO_2e/ tonne collected material

1. Including LPG consumption for flame cutting.
2. Own trucks and own train.
3. Emissions from production of purchased electricity, district heating or district cooling assuming that all are unspecified (residual mix). "Share of total" and "Change 2008-2016" includes contracts for renewable energy with Guarantee of Origin. Purchased energy for 2015 i corrected from 18 015 tonnes.
4. Air and rail travel.
5. Reduction of emissions for "Purchased energy" in scope 2.
6. Transportation purchased centrally accounts for around 92% of outsourced outward and intermediate transportation. Measurable transportation on which the table is based is in the range 37–54% of total outward and intermediate transportation.
7. Refers to fuels consumed in scope 1 and scope 2.

Emissions breakdown 2008, 2011–2016



↖ The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

Stena Recycling's emissions in the Haga scope have decreased by 58 percent since the base year 2008. Of the emissions, 41 percent are in scope 1 where emissions have fallen by 49 percent between 2008 and 2016. This is due to reduced oil consumption, reduced diesel consumption for machines and a shift from own transport to purchased transport.

Emissions in scope 2 have fallen sharply since the base year. This is mainly due to Stena Recycling's decision to purchase origin-labelled electricity from hydropower. In 2014, the emission in scope 2 was at 38 percent, which was reduced to only 1 percent in 2015. Even in 2016 this figure has remained 1 percent.

Stena Recycling has centralized procurement of all logistics, as well as expanded the system support available to measure a larger proportion of the company's transports. The reported emissions for purchased transports are 47 percent of the emissions in 2016. Transport emissions in general, even with own cars included, account for 55 percent of emissions and have fallen by just over 12 percent since 2008.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Stena Recycling's facilities are not included in the disclosure. Stena Recycling is aware of these emissions and is working to reduce them by setting environmental requirements when outsourcing, such as requirements of vehicle performance and transport optimisation.

Sveaskogs core business is forestry and sales of sawlogs, pulpwood and biofuel for use in the production of wood products, paper, packaging and energy. Sveaskog also works with land transactions and develops the forest as a venue for hunting, fishing and other nature-based experiences, as well as other business related to ecosystem services. Sveaskog is Sweden's largest forest owner with customers all over the country and annual sales of over SEK 6 billion. Sveaskog takes long-term responsibility for the forests as a complex ecosystem supporting man, animals and plants.

www.sveaskog.se

SVEASKOG

Climate targets

Sveaskog's target is at least a 30 percent reduction in carbon dioxide emissions between 2010 and 2020 relative to the volume of wood raw material supplied. Taking 2005 as a base year, the target is to achieve a 40 percent reduction in total carbon dioxide emissions by 2020.

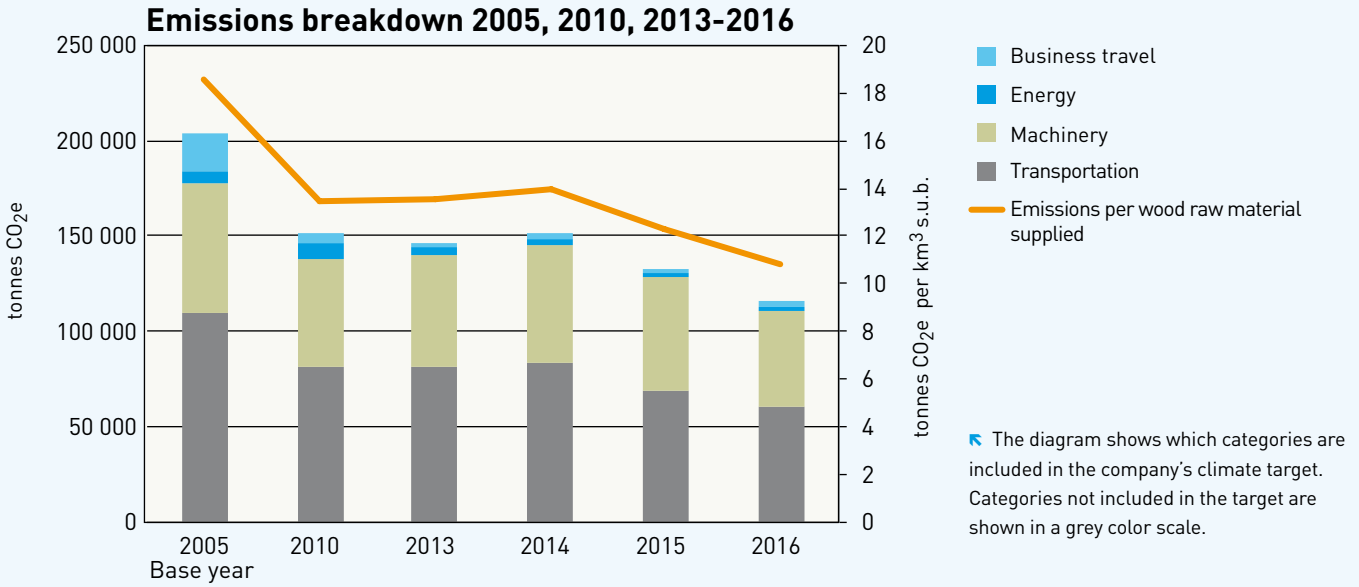
Actions taken in 2016

- Svenska Skogsplantor, a division of Sveaskog, has constructed two oil boilers to enable the use of renewable biofuels instead of fossil fuel oil.
- An intense project has been in progress for the forthcoming implementation of 74 tonne-vehicles with increased loading capacity.
- Through active cooperation with the fuel supplier, we have helped to create an infrastructure that enables the use of 100% renewable HVO for Sveaskog's own machines all the way up to Västerbotten.

Emissions (tonnes CO_2e)	Base year 2005	2015	2016	Share of total 2016	Change 2005-2016
Scope 1					
Business travel[1]	13 380	1 290	1 822	2%	-86%
Energy[2]	5 084	1 791	2 133	2%	-58%
Machinery	12 303	5 900	4 229	4%	-66%
Scope 2					
Purchased energy [3]	776	4 934	5 002	0%	-87%
Scope 3					
Business travel [4]	643	279	257	0%	-60%
TOTAL excl. reduction through energy with Guarantee of Origin	**32 185**	**14 194**	**13 443**		
Reduction through purchase of renewable electricity or district heating with Guarantee of Origin [5]	0	-4 829	-4 900		
TOTAL Haga scope	**32 185**	**9 365**	**8 543**	**7%**	-73%
Outsourced goods transportation	109 631	69 178	60 804	53%	-45%
Outsourced machinery	53 576	51 496	44 256	38%	-17%
Production and distribution of energy and vehicle fuels [6]	8 542	2 489	1 970	2%	-77%
- of which fuels for business travel	5 575	724	358	0%	-94%
- of which fuels for energy production	751	299	328	0%	-56%
- of which fuels for own transportation and machinery	2 216	1 467	1 284	1%	-42%
TOTAL (excl. Carbon offset)	**203 934**	**132 528**	**114 952**	**100%**	**-43%**

Key indicators	Base year 2005	2015	2016	Change 2005-2016	Unit
Emissions per unit of wood raw material supplied (total)	18,532	12,331	10,817	-42 %	ton $CO_2e/km^3s.u.b.$

1. Company cars, cars used for company business and leased cars.
2. Heating using own boilers.
3. Emissions from production of purchased electricity, district heating or district cooling assuming that allare unspecified (residual mix). "Share of total" and "Change 2005-2016" includes contracts for renewable energy with Guarantee of Origin.
4. Air and rail travel.
5. Reduction of emissions for "Purchased energy" in scope 2.
6. Refers to fuels consumed in scope 1 and scope 2.



The diagram shows which categories are included in the company's climate target. Categories not included in the target are shown in a grey color scale.

Analysis and comments

A large part of Sveaskog's calculated emissions is found in scope 3, as 53 percent of total emissions come from purchased transports and 38 percent from rented machinery. Since the base year 2005, these emissions have dropped by 45 and 17 percent, respectively. In total, emissions have decreased by 43 percent since the base year.

Emissions from transport have decreased, partly due to a higher concentration of renewable raw materials in diesel and increased use of pure biofuels, mainly HVO100. Since 2015, emissions from transport have decreased by 12 percent. This is also the trend for work machines that increasingly use high and low-blended biofuels in vehicle and machine fuels. Since 2015, emissions from work machines have decreased by 15 percent. Emissions per delivered forest raw material (tonnes CO_2e /km^3s.u.b.) have decreased by 12 percent since 2015 and by 42 percent since base year 2005.

The Haga scope only covers 7 per ent of total calculated emissions, with own machines being the largest source of emissions with 4 percent of total emissions. Emissions in the Haga scope have decreased by 73 percent since the base year.

MOST SIGNIFICANT EMISSIONS IN SCOPE 3

Sveaskog's most significant emission in scope 3 derives from timber transportation by road and from forestry machinery. These fall within scope 3 and are reported in the disclosure under outsourced transports and under own or leased machinery, and are included in the climate target. Sveaskog encourages the use of renewable fuels for rented machinery and purchased transports.

APPENDIX 1: BIOGENIC EMISSIONS

Biogenic carbon dioxide emissions arise when biofuel is used for heating, production and transportation. Combustion in air of fuel containing carbon results in the formation of carbon dioxide, regardless of whether the fuel is fossil or renewable. In the medium to long term, however, only carbon dioxide emissions from fossil fuels contribute to the greenhouse effect, because biofuels absorb just as much carbon dioxide during their growth as is released on combustion. Carbon dioxide emissions from combustion of biofuels are known as biogenic carbon dioxide emissions. Under the GHG Protocol and in national climate reporting, biogenic carbon dioxide emissions must be reported separately from emissions from fossil fuels.

In the table below, the companies' biogenic carbon dioxide emissions are shown parallel to their fossil fuel emissions in scope 1. Note that only carbon dioxide emissions are reported, which is why the fossil CO_2 emissions in the table are not the same as the greenhouse gas emissions expressed in CO_2e (carbon dioxide equivalents) in each company's disclosure.

Share of total of biogenic and fossil CO_2-emissions scope 1	Biogenic CO_2 emissions in scope 1 (ton)	Fossil CO_2 emissions in scope 1 (ton)
Akzo Nobel	0	164 000
Axfood	3 601	6 131
Coca-Cola European Partners Sverige AB	561	771
Folksam	44	627
Fortum Värme	1 723 421	916 356
Green Cargo	633	34 304
HKScan	1 061	7 158
JM	230	4 651
Lantmännen	72 576	20 031
Löfbergs	122	2 099
McDonald's Sverige	0	159
Preem	0	1 801 255
Siemens	85	1 132
Stena Recycling	1 285	14 116
Sveaskog	7 464	7 934

APPENDIX 2: : SCOPE 2 EMISSIONS ACCORDING TO DIFFERENT CALCULATION METHODS

Under the GHG Protocol, scope 2 emissions can be calculated using one of the following methods:

- Market-based method, which distinguishes between with Guarantee of Origin purchased electricity, heating or cooling and unspecified supplies. A specific emission factor is used for with Guarantee of Origin products, while an emission factor for a residual mix is used for unspecified supplies.
- Location-based method, which uses one emission factor for everything supplied through the power, heating or cooling grid.

Under new guidelines in the GHG Protocol, the method chosen is to be declared and the emissions according to the method not chosen are to be reported separately. The Haga Initiative's greenhouse gas emissions disclosure uses the market-based method, which is also the method prescribed by Energimarknadsinspektionen (the Swedish Energy Markets Inspectorate). Scope 2 emissions according to each method are reported below.

Emissions scope 2 using different calculation methods	"Location-based method" ton CO_2e	"Market-based method" ton CO_2e
Akzo Nobel	80 915	1641
Axfood	22 593	5 341
Coca-Cola European Partners Sverige AB	1 912	339
Folksam	1 349	812
Fortum Värme	88 316	62 394
Green Cargo	33 635	250
HKScan	7 511	1 841
JM	4 375	1 965
Lantmännen	40 520	19 473
Löfbergs	428	34
McDonald's Sverige	8 629	717
Preem	51 429	218 736
Siemens	616	1563
Stena Recycling	4 692	501
Sveaskog	674	93

HAGAINITIATIVETS
vision är ett lönsamt näringsliv
utan klimatpåverkan.

AkzoNobel

axfood

Coca-Cola EUROPEAN PARTNERS

Folksam

Fortum

green cargo

HKSCAN

JM

Lantmännen

LÖFBERGS

i'm lovin' it

preem

SIEMENS

STENA RECYCLING

SVEASKOG