

CLIMATE ACTION TRAINING FOR THE FASHION INDUSTRY

Module 1: Why climate action matters



Implemented by







Introduction

Welcome to the online training: Climate Action for the Fashion Industry

In this module, you will learn about:

- 1. Climate change What is it and how does it impact people and the planet?
- 2. The connection How are climate change and the fashion industry connected?
- 3. The reasons Why does the fashion industry need to take climate action?
- 4. The network How are your business partners and customers affected?
- 5. The solutions How can we tackle the climate challenge together?

(Fashion industry refers to textile, apparel and footwear industries as a whole)

This module will last approximately one hour.

Before we start, take a minute to reflect:

What do you expect to learn from this module?

Think about this before you continue. If you like, note down your expectations so that you can revisit them at the end of the module.

Climate change - What is it and how does it impact people and the planet?

Extreme weather events, sea-level rise, and shifts in ecosystems and natural resources are already being seen in various parts of the world. Scientist have observed long-term changes in temperature, precipitation, and other climate variables that occur on a global scale. This is known as climate change. Increasing greenhouse gas (GHG) emissions is mainly responsible for climate change. The severity and frequency of such events are likely to increase unless significant action is taken to reduce GHG emissions and mitigate the impacts of climate change.

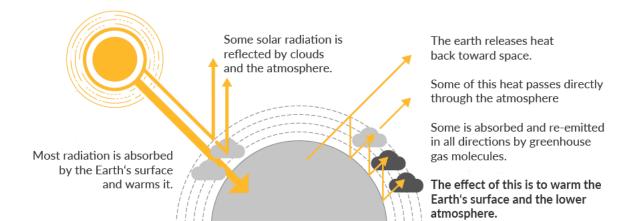
Therefore, nowadays, everywhere we look it seems that people are talking about climate change and the need to reduce our greenhouse gas (GHG) emissions. So what is climate change? And how did this problem happen?

Watch the video to learn more about what GHGs are and how they contribute to climate change.

Video: Causes and Effects of Climate Change | National Geographic [3:04 min]

Greenhouse gases (GHG) in the atmosphere hold back radiation from the sun, which creates a "greenhouse effect" which in turn amplifies climate change.

The Greenhouse Effect



Do you know what these terms mean?

To be able to understand how GHG emissions can be reduced, it is important to know the following terms:

• Carbon dioxide (CO₂)

Of the different GHG emissions, the one that is emitted the most is carbon dioxide (CO_2). Human activities, like burning of fossil fuels, are a significant source of CO_2 in the atmosphere.

• Carbon footprint

A carbon footprint is the total amount of GHG emissions caused by an individual, an organization, a service, or a product. The higher these emissions are, the bigger the carbon footprint. To mitigate climate change, the carbon footprint should be as small as possible.

• Net Zero emissions

Net Zero is an important pathway that companies can embark on to take climate action. When working towards Net Zero, GHG emissions must be reduced, avoided and removed to balance the carbon footprint of an organisation. This can be done by reducing energy use, switching to renewable energy and removing CO₂ from the atmosphere.

Want to learn more about Net Zero?

The Word Resources Institute (WRI) has published a paper on how the apparel industry can achieve Net Zero, <u>Roadmap to Net Zero: Delivering Science-Based Targets in the Apparel Sector</u> [PDF, 40 pages]

And the Science-Based Targets initiative (SBTi) has developed the first global science-based Net Zero standard for companies, <u>SBTi Corporate Net-Zero Standard</u> [PDF, 65 pages]

The more the earth warms, the more severe the impacts will be. For example, it makes a huge difference if global warming increases by 1.5° or by 2°. Watch the video to understand what difference it could actually make.

Video: Climate change: How half a degree could change the world forever | BBC Ideas [4:02 min]

Now we have learned the basics about climate change. In the next section, we will see how climate change affects the fashion industry, and also how the fashion industry contributes to climate change.

The connection - How are climate change and the fashion industry connected?

The fashion industry is affected by climate change. How does climate change affect you as a supplier?

Take a minute to note down your own ideas before continuing.

As a supplier, climate change can affect you in many ways. Some impacts may include, for example:

- Rising electricity costs and disruption of the access to electricity.
- Rising raw material costs and reduced access to raw materials.
- Water scarcity.
- Brands demanding sustainability requirements from you.
- An increase of employee absenteeism or employee turnover.
- Increasing environmental awareness among end consumers leading to increasing demand for eco-friendly products.

Let's examine some basic facts, summarized in two statements.

In this module, we will explore each of these statements in more detail. For now, let's start with a short overview.

1) Climate change is a business risk for the fashion industry.

GHG emissions also create risks for businesses. The more GHG emissions we emit into the atmosphere, the more severe these risks will be.

The fashion industry, with its global supply chain, faces the risk of business disruptions and increasing costs due to climate change.

The better prepared a business is, the less it will suffer. Investing early in climate action can even be a benefit for you, as it makes it more attractive for brands to work with you.

2) Your customers and business partners care about climate action.

Low carbon production is becoming more and more important in end customers' purchase-decisions. The climate action that suppliers take is of crucial importance for big brands, and vice versa: big brands are looking for supply chain partners who want to work together to address climate change. How can you ensure staying on the list of preferred partners?

Let's dive deeper into each of these statements!

The fashion industry generates GHG emissions.

The fashion industry contributes significantly to climate change. Apparel and footwear production is responsible for approximately 4 billion metric tons of GHG emissions, equivalent to 8.1% of the world's greenhouse gas emission in 2016. This is almost as much as the entire European Union emits! Particularly concerning is that the climate change impact is set to increase 49% by 2030 if this trend continues.

Source: Quantis (2018)

All of us actors along the fashion value chain contribute to these emissions, from the raw material producer to the final retailer.

Being such a huge contributor, it is absolutely crucial that we all play our part in reducing GHG emissions across our industry.

The climate impact of the global fashion industry is substantial. Greenhouse gas emissions (GHG) occur throughout the creation and life of a product, ranging from the production of raw materials to product end use.

Significantly, the fashion industry uses synthetic textiles, e.g., polyester and nylon, in a large portion of apparel and footwear products. Synthetic fibers made up 64% of the global fiber market in 2021 (<u>Textile</u> <u>Exchange</u>, 2023). This is evident from the considerable growth in the global production of synthetic fibers, from 31 million metric tons in 2000 to 88 million metric tons in 2021 (<u>Statista</u>, 2023).

The production of natural fibres and textiles, such as cotton, wool, and leather, also emits greenhouse gases. For example, cotton agriculture requires intensive fertilizer application, and that nitrogen fertilizer is transformed by microbes in the soil into N_2O emissions. N_2O is a powerful greenhouse gas that has a warming potential nearly 300 times stronger than CO_2 .

These synthetic and natural materials emit GHGs throughout their life cycle. The textile production stage is highly energy intensive and accounts for the majority of the climate impact due to the use of fossil fuels, such as coal, to generate heat energy. Following the production phase (for both synthetic and natural fibres and textiles), the product use phase is the next highest contributor to climate change, resulting from the amount of electricity used in the washing/drying of garments.

What are the main sources of CO_2 in the fashion industry, particularly in material production and finished production assembly?

The fashion industry has complex value chains. For example, let's look at the textile value chain. It comprises activities such as fibre, yarn, fabric and textile production, product use, and end-of-life disposal. Energy is used in all stages of the value chain, including in transportation.



Figure 1: Linear representation of activities along the textile value chain

Source: UNEP, Sustainability, and circularity in the textile value chain global stocktaking (2020)

To make it easier to understand where emissions are coming from, we can identify three main activities along the value chain that lead to greenhouse gas emissions.

>> Transport

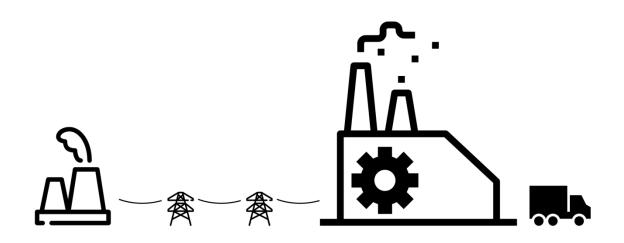
Fuel burned during transportation (e.g. truck, ocean, air, rail).

>> Operations

Fuel burned onsite, for example by a boiler or an electric power plant.

>> Purchased energy

GHG emissions from the generation of electricity, heat and steam purchased by a company.



The main GHG emitted from the fashion industry is CO_2 , which comes from burning fossil fuels. But how big is the fashion industry's climate impact? Let's take a look at some numbers.

Where do you think the fashion industry ranks when it comes to GHG emissions?

[Exercise 1]

What percentage of global GHG emissions come from the apparel and footwear industry?

2%

4%

6 %

8 % (correct)

Quantis estimated that the global apparel and footwear industries account for 8% of the global GHG emissions (Quantis, 2018).

This is greater than all international airline flights and maritime shipping trips combined.

Some data sources

Quantis' report, 2018

The data for the exercise is derived from the following document by Quantis (2018)

Measuring Fashion, Environmental Impact of the Global Apparel and Footwear Industries Study

[PDF, 65 pages]

Apart from the Quantis' report, there are also other organisations that have calculated the industry's impact. The values can vary from one to another.

McKinsey and Global Fashion Agenda (GFA), 2020

The McKinsey and GFA report estimates the GHG emission share from global apparel and footwear industries at 4%.

Fashion on Climate

[PDF, 57 pages]

Ellen MacArthur Foundation, 2017

The Foundation estimates the GHG emission share from global apparel and footwear industries at 2% in 2015 and will keep growing.

A New Textiles Economy: Redesigning Fashion's Future

[PDF, 150 pages]

Why are there differences?

In reality, the actual value of GHG emissions from the industry is difficult to measure due to the complexity of its supply chains, making it challenging to account for all of the emissions coming from the production of apparel and footwear products. We will get back to that in Module 3 of this course.

Take a look at the following two figures which show the average GHG emissions, sorted by activity

Apparel

15%	28%	12%	36%	7% 1%
Fiber Production	Yarn Preparation	Fabric Production	Dyeing & Finishing	Assembly Distribution
Footwear				
20%	28%	43%	20%	2%
Raw Materials Extraction	Raw Materials Processing	Manufacturing	Assembly	Transport

Source: Quantis, Measuring Fashion, Environmental Impact of the Global Apparel and Footwear Industries Study (2018)

According to this data, which share of CO_2 emissions results from tier 1 and tier 2 activities, i.e. from the area you work in?

Tier 1 is "Finished Production Assembly" which includes cutting, sewing, stitching, embroidery and packaging.

Tier 2 is "Material Production" which includes knitting, weaving, finishing, dyeing, bleaching and washing.

[Exercise 2]		
Match the percentage and the sector.		
Apparel >>> 55%		
Footwear >>> 63%		
According to this study, more than half of the emissions result from tier 1 and tier 2 activities.		
In the apparel sector, this includes fabric production (12%), dyeing & finishing (36%) and assembly		
(7%).		
In the footwear sector, this includes at least manufacturing (43%) and assembly (20%).		

This is the state as of today.

[Exercise 3]

How do you think this will develop in the future?

Tick the answer you think is correct.

- As the fashion industry has reached its peak in terms of growth, emissions will eventually reduce.
- The fashion industry is expected to grow by 20% by 2030 and emissions will increase even along with it.
- The fashion industry is expected to grow by 80% by 2030, emissions will continue to rise significantly, unless we take action. (correct)

FeedbackIn recent years, the fashion industry has grown tremendously - and is expected to grow further.

Since the year 2000, clothing production has roughly doubled. More than 50% of fast fashion produced is disposed of in under a year. While on average, people bought 36% more garments in 2015 than in 2000.

Source: <u>A new textiles economy</u>

Until 2030, the fashion industry is expected to grow by 81%, almost doubling its size.

Source: Pulse of the fashion industry, 2019

This is bad for the climate and GHG emission will also grow if we don't take action.

So the contribution of the fashion industry is significant, and is likely to increase in the future.

Accordingly, the fashion industry can make a significant change. And it has to! But why should it change? Why should you change?

To effectively mitigate global warming, everyone must act. We all have a role to play!

However, there is more to climate change than rising temperatures and disasters. It is also about **business risks and opportunities.** More on this in the following pages.

The reasons - Why does the fashion industry need to take climate action?

Climate change is a business risk for the fashion industry.

Climate change also has economic consequences and imposes a risk for the fashion industry. Let's take a look at some examples:

Floods - Textile production can be disrupted due to flooding

"Flooding in Thailand in 2011 harmed more than 160 companies in the textile industry and stopped about a quarter of the country's garment production."

Climate change will make such weather events more severe and frequent. The disaster can no longer be viewed as a local economic problem as it affects other downstream and upstream players of the global supply chain. Those include washing, dyeing or finishing factories that are dependent on the supplies of textile products from Thailand.

Source: Oxfam

Rising temperatures - Workers' performance and health may suffer due to increasing temperatures at factories

In garment factories, the humidity, combined with the heat and fabric dust emitted by the sewing machines, makes breathing difficult. These conditions exhaust workers' energy and focus, affecting their efficiency and productivity, affecting the performance of the garment sector.

More extreme temperatures and weather patterns are coming and will have a significant impact on worker's health and productivity. For example, in 2017, 18 factories in Dhaka were shut due to hundreds of garment workers falling ill in a heatwave.

Source: greenbiz.com

Raw Material Prices - The availability and cost of raw materials may fluctuate due to extreme weather events

"VF Corporation noted that the 2010 once-in-a-century floods in Pakistan and Australia, coupled with wet weather and freezes, ravaged cotton crops which affected the material's availability worldwide".

Brands and suppliers that are relying on raw material production are vulnerable to such changes. Beyond fluctuating prices of raw materials, natural resources are strained as a consequence of climate change. Companies in the textile industry, including suppliers, will have to adapt by finding new sources of raw materials.

Source: Oxfam

Textile factories are threatened by water scarcity - A case study from Tamil Nadu, India Wet processing, bleaching, printing and dyeing manufacturers heavily depend on access to goodquality raw water. The Tamil Nadu area is the centre of textile mills in India and is often hit with droughts. On top of that, the discharge from manufacturers often goes into the water bodies which further puts pressure on the water availability in the area.

This situation is not new. Suppliers that are operating in a water stressed environment, such as China, India, USA, Pakistan and Turkey, will remain exposed to some level of risk, affecting the long-term productivity and profitability of their businesses.

Source: thewire.in

The examples show how climate change can negatively impact fashion supply chains. But the most important question is: How does this affect you?

Take your time to really think it through.

How much do you spend on the items below at the moment? How much will you spend when the temperature rises?

Air conditioning

With rising temperatures, not only will you have to pay more for energy, but there will also be interruptions in electricity delivery.

Think of the increasing strain on electrical grids, which will lead to more brownouts (unstable power supply and drops in voltage).

More brownouts mean a loss of production time, which comes with additional costs to compensate for it.

Supplies/raw materials

Take cotton, for example.

If it rains less and temperatures rise, cotton farmers will harvest less cotton. This will make cotton more expensive.

Some farmers might even go bankrupt. You will then face a lack of supplies. Even if you find new suppliers quickly, they may charge you more.

How many of your suppliers will survive a 1,5°C temperature rise? How many will survive a 2°C rise?

Transport

Climate change will lead to more extreme weather events. Floods and storms will become more frequent and can damage infrastructure.

What will it cost you if some transport routes are not passable anymore? What will it cost you if you have to send material to another port, because "your" port is flooded?

Employee health and absenteeism

Sick employees are always a cost, as their performance is reduced or they cannot come to work at all. Global warming will increase sick leave, as changing climatic conditions have both a direct effect, e.g. through higher temperatures or humidity, and an indirect effect, e.g. through a temperature-induced spread of diseases.

Production stops

Production stops are really expensive for several reasons.

With rising temperatures, production stops will increase, be that due to brownouts on extremely hot days, local disruptive events like floods or storms, or supply chain disruptions.

And this does not only concern you, but your suppliers and customers, too.

Loss of customers

Global warming will also affect your customers, the purchasers of your goods.

Are your customers prepared for the changes to come? Will they be able to face all these challenges and maintain their business?

What will you do if they don't? What does it mean to you if they have to stop their business?

Due Diligence and Climate Change

The OECD defines due diligence as the process that enterprises should undertake to identify, prevent, and mitigate potential negative impacts arising from their operations, supply chain and business relationships. Due diligence is an essential part of responsible business conduct, enterprise decision-making and risk management. The fashion industry contributes to climate change, whether through their own operations, supply chain or product use. Therefore, all companies have a responsibility to include GHG emission reductions in their due diligence process.

As climate change is still a relatively new and evolving topic, there will often be gaps in data and uncertainty. The OECD Due Diligence approach can support businesses in making decisions in uncertain situations. For example, a risk-based approach to addressing GHG emissions would first focus on tackling the largest sources of GHG emissions.

Source: OECD

Climate change will affect your business - directly or indirectly.

And it will cost you money. So, what to do?

Basically, there are two strategies to tackle climate change: mitigation and adaptation.

- **Mitigation** means trying to prevent climate change as much as possible by reducing our impact on the planet in order to keep the climate impacts as small as possible.
- Adaptation means trying to prepare to live with the consequences resulting from climate change.

Both mitigation and adaptation reduce our vulnerability to the consequences of climate change. These measures are summarized under the term **climate action**.

[Exercise 4]

Which of the following are mitigation, and which are adaptation measures? Please drag the measures to the correct stack!

"Mitigation" stack:

- Replacement of coal energy sources with renewable energy sources in the factory.
- Reduction of energy consumption through insulation.
- Transitioning to alternative fibers with a lower CO₂ footprint.

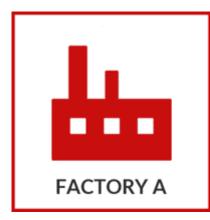
"Adaptation" stack:

- Adjusting equipment of the production facility to withstand extreme weather.
- Buy better insurance cover against flood and storm damage.
- Select suppliers who are prepared to adapt to climate change.

How can climate change become a risk, and how can it become an opportunity?

To answer this question, let's assume there are two companies: Factory A and Factory B located in China.

Let's follow them on their journey, starting in the year 2020.





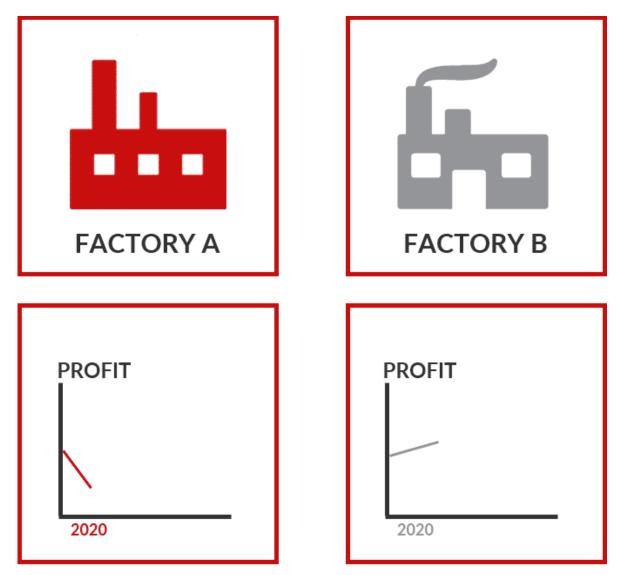
Step 1

In 2020, Factory A decides to invest in climate action. Factory A is working to achieve emission reduction targets through efficiency and renewable energy and starts by understanding its carbon footprint.

The factory then invests in a few measures:

- An energy management system to improve boiler efficiency.
- Solar panels on the roof to become more independent from external energy providers.
- Recycle 70% of wastewater to reduce water consumption in manufacturing processes.

2020 is therefore a very costly year for Factory A and it has a decrease in profits, while Factory B (which operates as usual and makes no changes) has no loss in profits.



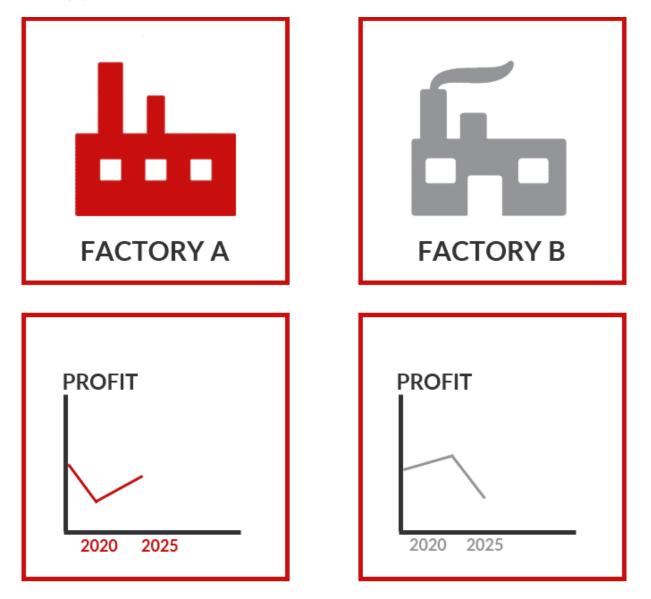
Step 2

A couple of years later, the effects of climate change have become more severe. Heavy storms and floods are more frequent, with occasional droughts happening in the area where both factories are located.

In addition, the Government of China has decided to transition away from coal and boost green energy.

Brands and investors are increasingly putting pressure on Factory B, but the factory remains inactive, conducting business as usual. Therefore, Factory B's sales start going down.

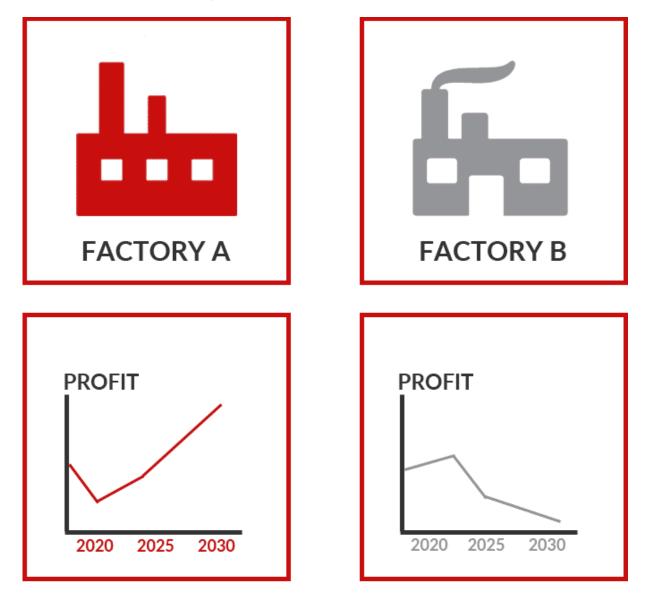
Overall, Factory B has to face increasing costs, whereas the investments Factory A did a few years ago start to pay off.



Step 3

After 10 years, the situation has become challenging for Factory B. Constant water shortages and droughts often delay the production time. In addition, an increasing push from the government to use renewable sources requires Factory B to rethink their strategy. Factory B has spent more on their electricity bills without an energy efficiency strategy, which further strains the factory. On top of that, the lack of knowledge and action on climate solutions makes Factory B unattractive to brands and investors.

On the contrary, through understanding its emissions footprint, Factory A is able to reduce its emissions efficiently and spend less on electricity bills due to the solar panels. Thanks to its early climate action, more brands are interested in working with Factory A. Factory A presents an additional market advantage for its clients with its low carbon production.



You may say: "Well, this scenario is quite black and white!"

However, what we want to point out is that early climate action over time will become a huge competitive advantage, while resistance to change has the potential to have serious consequences.

Suppliers that are willing to reduce emissions contribute to fighting climate change systematically, along with their industry peers (i.e. fellow supply chain suppliers, brands and retailers).

We will see later in this module how brands have set up emission reduction targets and how that also requires suppliers' action.

On the other hand, you may also say: **"We don't have the means to do all these huge investments."** And this is most likely true, too.

Still there are some good news:

- Climate action is increasingly supported by government programs and international organisations and you might apply for funding.
- Many of these investments have pay-back periods of less than 2 years.
- It is increasingly attractive for banks to lend for these kinds of projects.

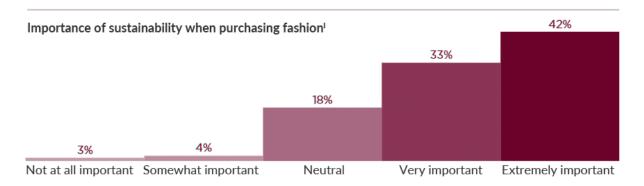
You have seen that mitigating and adapting to climate change can be crucial for your business. Another aspect of this is changing consumer awareness. Let's take a closer look at that.

The network - How are your business partners and customers affected?

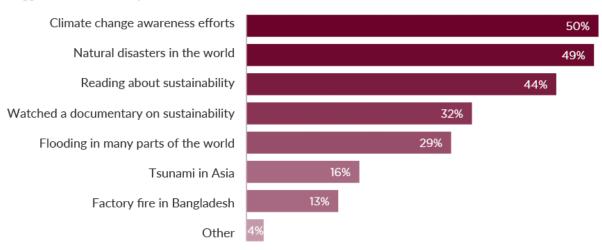
Your customers and business partners care about climate action.

The graph below shows the results of a survey asking participants about sustainability when purchasing fashion products.

What does the graph tell you about consumer awareness?



Triggers of sustainability"



I. Question: How important is sustainability to you when purchasing fashion products, on a scale of 1 to 5? II. Question: Which of the following, if any, triggered you to become conscious of sustainability as an issue? Source: BCG Sustainability survey March 2019, N = 703 (US); 703(UK); 529(FR); 514(CN); 523(BR)

Source: Pulse of the Fashion Industry, 2019

[Exercise 5]

Tick all correct statements based on the graph above!

- Consumers don't seem to care about sustainability when purchasing fashion products.
- For about 75% of consumers being asked, sustainability is a major concern when purchasing fashion products. (correct)
- Most consumers became conscious of sustainability through climate change awareness efforts. (correct)

Feedback

Sustainability is considered to be a very important (33%) or extremely important (42%) decision factor for consumers, when buying fashion products. Consumers are becoming increasingly engaged with sustainability topics, including climate change. The survey showed their willingness to rethink how, when and what they buy.

As the shopping culture is likely to change, consumers are expected to consume less with consumers shifting towards investment in low-carbon footprint garments. Right now, the majority of younger generations are concerned about sustainability and transparency in the industry. More environmentally friendly fashion brands and startups are taking the lead, driven especially by Gen Z.

The people that were asked in the survey are not your direct customers.

However, they are your customers' customer - and this demand will be reflected in the strategies of the fashion brands. Aside from assessing and making changes to their own energy consumption and direct operations, brands that commit to reducing GHG emissions will also need to take into consideration the emissions coming from purchased goods and services they consume upstream and downstream along the value chain, which are referred to as Scope 3 emissions (more detail on Scope 1, 2, and 3 will appear later).

In other words, the emission reduction targets that brands make will soon be translated to their suppliers as well. For example, when a brand sets targets to reduce their own emissions, they also set targets for their Scope 3 emissions. As a supplier, you are part of the brand's Scope 3 emissions. If the supplier does not reduce their emissions, then the brand cannot meet their own targets.

This will be a risk to the brand's reputation with their customers and also a risk for suppliers to lose business. However, this can also be a business opportunity. Suppliers can take action now to reduce their emissions and position themselves as a proactive business partner that brands can work with.

As more and more brands commit to emission reductions, they will choose suppliers that have set emission reduction targets as well. Suppliers can make emission reduction plans now and future-proof their business.

Let's summarize:

1. Global warming caused by the emission of greenhouse gases, namely CO_2 , will affect the entire planet – people, ecosystems and wildlife. The more intense global warming becomes, the more severe the impacts will be.

2. The fashion industry emits significant amounts of CO₂, with more than half of the emissions resulting from tier 1 and tier 2 activities. Risks such as availability of raw materials and production stops, or even employee health are significantly affecting the business. To reduce climate change, it is crucial that mitigation and adaptation measures are taken to reduce GHG emissions as much as possible.

3. Consumers, investors and brands are asking for change. Suppliers that are not willing to take action, will find it difficult to find customers in the long term. The earlier you start taking action, the better for you, your business and the planet.

The solutions - How can we tackle the climate challenge together?

Reducing GHG emissions and stopping global warming is not a small task. It can only be successful with all of us taking action together. Therefore, a lot of (joint) effort is happening on a corporate and global level, such as The HIGG Index which is a suite of tools for the apparel sector to track their sustainability performance.

[Exercise 6]

What is the most famous international agreement on climate change? Tick your choice!

- The Berlin Agreement
- The Delhi Agreement
- The Paris Agreement (correct)
- The Shanghai Agreement
- The Washington Agreement

Feedback:

The best-known agreement on climate change is the Paris Agreement. But there are more, especially for the fashion industry. Let's learn more about them on the next page.

The Paris Agreement

The Paris Agreement is the most widely recognized historic deal where 196 Nations have agreed to limit global average temperature to well below 2 degrees Celsius, preferably to 1.5 degrees Celsius, compared to pre-industrial levels. It was adopted in 2015.

Watch the video to learn more. Here you will find more information on the Paris Agreement.

Video: Ever wondered: What is the 'Paris Agreement', and how does it work? [1:39 min]

The Paris Agreement

On the <u>website of the United Nations</u>, you will find more information about the Paris Agreement. You might also like to <u>read the original text from the Paris Agreement</u> [PDF, 27 pages]

Global Initiative 1: The Fashion Industry Charter

The Fashion Industry Charter for Climate Action, launched in 2018 is a coordinated effort by the fashion industry to accelerate climate action and achieve net-zero emissions by 2050.

The three main objectives of the Fashion Industry Charter are:

- Drive the fashion industry to reach net-zero GHG emissions by 2050.
- 50% GHG emission reductions by 2030.
- Set climate targets/strategies in line with the Paris Agreement.

Watch the video to learn more.

Video: Launch of the Fashion Industry Charter for Climate Action at COP24 [1:00 min]

[Exercise 7]

How many signatories did the Fashion Industry Charter have in the end of 2022? Make your guess!

- 34
- 57
- 109 (correct)

Feedback:

In the end of 2022, the Charter had 109signatories, including many global brands.

This represents a significant part of the industry.

The Fashion Industry Charter for Climate Action is more than just a declaration.

It has the potential to mobilize the entire fashion industry around climate change. It is underpinned by commitments that can go beyond anything that any industry has collectively done.

ThiBy joining the initiative, signatories become part of the climate change solution.



The Fashion Industry Charter

On their website, you can find more information about the Fashion Industry Charter.

Here, you can read the <u>full charter</u> [PDF, 4 pages].

Among companies who are signatories of the UNFCCC Fashion Charter, over 80% are committed to the Science-based Target initiative (SBTi) and have approved targets. 96% of SBTi committed companies also have set targets to cover scope 3 emissions. This information is valid as of June 2022.

Source: Science Based Targets Initiative Annual Progress Report, June 2022 Update

The UNFCCC Climate Action Playbook

Climate action under the Paris Agreement requires commitments from all stakeholders, not just policymakers. Therefore, fashion brands and suppliers across global value chains have an important role to play in reducing GHG emissions.

One of the objectives of the Fashion Industry Charter is to reduce **50% of GHG emissions by 2030**. That means, we have less than 10 years to meet this target.

To meet this target, the Fashion Charter has developed a Climate Action Playbook to help companies meet the goals of the Paris Agreement.

The UNFCCC Climate Action Playbook

To facilitate fashion companies to meet the goals of the Paris Agreement and the Fashion Industry Charter, the United Nations Framework Convention on Climate Change (UNFCCC) has developed a Climate Action Playbook. The Playbook helps you assess and reduce your carbon footprint. Download the "Climate Action Playbook" [PDF, 72 pages]

Fashion Industry Charter for Climate Action: Information Pack 2022

In 2022, the UNFCCC Fashion Industry Charter for Climate Action published the Information Pack. This brief guide describes what the Fashion Industry Charter is, how professional entities can join, the benefits of joining, and the steps that should be taken to join and after joining.

You can learn more information about the Fashion Industry Charter for Climate Action and how to join by downloading the Information Pack 2022 [PDF, 14 pages].

Global Initiative 2: The Fashion Pact

In August 2019, French President Emmanuel Macron and Kering Chairman and CEO launched a global coalition of companies for the fashion and textile industry, called "The Fashion Pact". As of February 8th 2023, 71 companies have signed the Fashion Pact aiming to transform the industry with key environmental goals in three areas:

- 1. Stopping global warming
- 2. Restoring biodiversity and
- 3. Protecting the oceans.

The Fashion Pact

If you want to learn more about the Fashion Pact, <u>visit the website</u>. Here you can download <u>the original</u> <u>agreement [PDF, 57 pages]</u>.

In a climate emergency, collaboration is more important than competition.

On the following slide, you will learn about the climate goals of some major fashion brands. All of these brands are signatories of the Fashion Industry Charter and have developed targets to reduce their GHG emissions.

To understand their targets, it is important to distinguish between three different categories of GHG emissions.

- Scope 1: Direct GHG emissions that are emitted from sources owned and controlled by a company.
- Scope 2: GHG emissions from the generation of electricity, heat and steam purchased by a company.
- Scope 3: "Indirect" emissions from a company's value chain activities, e.g. emissions from the factory you work at.

Source: UNFCCC Climate Action Playbook

In Module 2, we will look at these categories in more detail. For now, we mention them for you to understand the brands' targets.

BURBERRY

LONDON ENGLAND

The goal is to reach net zero by 2040. Burberry has two climate goals:

 To reduce absolute Scope 1 & 2 GHG emissions by 95% by 2023 (from 2017 baseline).
 To reduce absolute Scope 3 emissions from their suppliers by 46.2% by 2030 and 90% by 2040 (from 2019 baseline).

GAP is committed to have 100% of their
electricity from renewable energy sources by
2030, and has set the following goals:
1) To reduce absolute Scope 1 & 2 GHG emissions
by 90% by 2030 (from 2017 baseline).
2) To reduce absolute Scope 3 emissions
from their suppliers by 30% by 2030 (from
2017 baseline).

adidas is committed to reducing their scope 1, 2 and 3 emissions by 30% by 2030 (2017 baseline). Their long-term goal is to achieve carbon neutrality by 2050.

TAL Apparel is committed to reduce emissions to



AMERICAN EAGLE

OUTFITTERS

adidas

net-zero by 2050. They are a member of the Business Ambition for 1.5 °C campaign. American Eagle aims to achieve net-zero emissions no later than 2050 and has developed

> the following targets: 1) They commit to reduce their absolute Scope 1 & 2 GHG emissions 80% by 2030 (from 2018 baseline).

> 2) They commit to reduce absolute Scope 3 GHG emissions from their suppliers 40% by 2030 and 60% by 2040 (all from 2018 baseline).



晶苑國際集團有限公司 CRYSTAL INTERNATIONAL GROUP LIMITED Crystal has reduced its product carbon footprint by over 40% since 2007. In particular, the group has:

1) Accomplished the 1st and 2nd 5-year Environmental Targets, and is now working towards the 3rd cycle (2018-2022) to reduce

product carbon footprint by 10%.

2) Committed to reducing 30% GHG emissions by2030 (from 2019 baseline).

3) Committed to net-zero target, a member of the Business Ambition for 1.5°C campaign.

Decathlon's goals are:

 To reduce their absolute Scope 1 & 2 GHG emissions 90% by 2026 (from 2016 baseline).
 To increase annual sourcing of renewable electricity (100% by 2026).

3) To have 90% of its suppliers set ambitious GHG emission targets by 2026.

PUMA commits:

 To reduce their own absolute GHG emissions
 35% by 2030 (from 2017 baseline).
 To reduce suppliers' GHG emissions from purchased goods and services by 60% by 2030 (from 2017 baseline).

VF Corporation commits:

 To reduce their absolute Scope 1 & 2 GHG emissions 55% by 2030 (from 2017 baseline).
 To reduce their Scope 3 GHG ' emissions from purchased goods and services and upstream transportation 30% by 2030 (from 2017 baseline).

DEC4THLON

PUMÀ.



1/2/

Hugo Boss commits:

 To reduce their absolute Scope 1 & 2 GHG emissions 51% by 2030 (from 2018 baseline).
 To reduce their absolute Scope 3 GHG emissions from purchased goods and services and upstream and downstream transportation 30% by 2030 (from 2018 baseline).

H&M commits:

To become climate positive by 2040
 throughout H&M Group's entire value chain.
 To become climate neutral throughout their supply chain (own operation and Tier 1 and 2 suppliers) by 2030.

*Disclaimer: These targets are accurate as of January, 2023. Please note that these targets may also change and this list is not exhaustive.

Many fashion brands and manufacturers have already started to make a change. That is not yet enough! Join the collaborative climate action!

In this module, you have learned that the fashion industry contributes to the increase of GHG emissions, but can also contribute to the solution.

While brands are setting ambitious goals to reduce the industry's global emissions, they need support from their supply chain partners. As Tier 1 and 2 suppliers, your contribution can make a change as you will see in the following modules.

Preview on the next modules

On this page, you will get a preview on the next modules of this course.

These modules will be tutor-guided, i.e. there will be exercises where you can implement your knowledge through case studies and assignments, with feedback from an experienced expert.

Module 2: GHG emissions

Module 2 looks into GHG emissions, key terminologies, concepts and the importance of a carbon inventory for suppliers.

Module 3: GHG Accounting

In the third module, we will take a closer look at GHG accounting and you will explore the relevant tools for accounting and reporting.

Module 4: Target setting

The fourth module explores target setting and Science-Based Targets (SBTs).

Module 5: Solutions

The last module of this course looks into opportunities for solutions.

5.1. Energy efficiency

You will learn some options to improve energy efficiency at the factory level and its reduction potential.

5.2 Renewable energy

You will learn about renewable energy options such as solar and biomass. As well as how to assess if renewable energy is an option for the factory.

Did you do the little self-evaluation in the beginning of the module?

If so: Were your expectations met?

Compare your personal take-aways with the notes you might have made when starting this module.

How competent do you feel on the topic of climate change and the impact of the fashion industry now?

Resources

Asia Garment Hub, <u>"Climate Action in Fashion" with a special focus on Climate Action Training (CAT) —</u> <u>Asia Garment Hub</u>, Asian Dialogues on Sustainability in the Textile and Garment Sector, (2022). [Video, 1h 30 min]

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Global Fashion Agenda (GFA), Boston Consulting Group, Inc. and Sustainable Apparel Coalition, <u>Pulse of</u> <u>the fashion industry: 2019 update</u>, (2019). [PDF, 29 pages]

McKinsey and Global Fashion Agenda (GFA), <u>Fashion on Climate: How the fashion industry can urgently</u> <u>act to reduce its greenhouse gas emissions</u>, (2020). [PDF, 57 pages]

OECD, <u>OECD Due Diligence Guidance for Responsible Supply Chains in the Garment and Footwear Sector</u>, (2018). [PDF, 192 pages]

Quantis, <u>Measuring Fashion: Environmental impact of the global apparel and footwear industries study</u> -<u>Full report and methodological considerations</u>, (2018). [PDF, 65 pages]

Science-Based Targets, SBTi Corporate Net-Zero Standard, (2021). [PDF, 65 pages]

Science based targets, *Driving ambitious corporate climate action*, (2022). [PDF, 43 pages]

United Nations Climate Change, *Fashion Industry Charter For Climate Action - Climate Action Playbook*, (2019). [PDF, 72 pages]

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United Nations Environment Programme (UNEP), <u>Sustainability and circularity in the textile value chain</u> <u>global stocktaking</u>, (2020). [PDF, 95 pages]

World Resources Institute (WRI), <u>Roadmap to Net Zero: Delivering Science-Based Targets in the Apparel</u> <u>Sector</u>, (2021). [PDF, 40 pages]