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WE AIM FOR  
CLIMATE  
NEUTRALITY

21

**BAUX** IS FOUNDED ON THE BELIEF  
THAT BUILDING MATERIALS  
SHOULD BE SUSTAINABLE,  
SURPRISINGLY FUNCTIONAL AND  
REMARKABLY BEAUTIFUL.  
LET'S BUILD!

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A man with short dark hair and a goatee, wearing a dark blue button-down shirt, stands with his hands on his hips and a confident smile. The background is a solid light gray.

“After launching our first climate report last year,  
I am confident our stakeholders can see the effort we’re  
making to put sustainability on top of our agenda”

Fredrik Franzon  
CEO and Co-Founder, BAUX



# A message from our CEO Fredrik Franzon

We have made a clear decision to show the design industry how much effort, resources and innovation it takes to be fully sustainable. Earlier this year, we opened our doors to the BAUX Lab - a place where product development begins through careful testing and evaluation of materials and designs.

When I started the company with **BAUX** co-founders **Johan Ronnestam, Jonas Pettersson, John Löfgren and Petrus Palmér** back in 2014, we knew that without putting sustainability on top of our agenda, there would be no BAUX.

We all love spending time in the nature, so creating products that contribute to a better planet for generations to come was essential. I am proud to say that the first climate report we launched in 2021 was both successful and helpful for our customers. That is exactly what we aimed to achieve.

By being transparent, we hope to both inspire and challenge our friends and colleagues in the design sector to do the same. As an industry, we can no longer afford to ignore the part we play.

**Fredrik Franzon**, Stockholm, September 2022



# The previous year in brief

## Business growth

Our international Sales team managed to grow our business during 2021. This was despite a tough year globally, with costs of raw materials and transportation spiking after the Covid-19 pandemic.

## Expanding network

BAUX is a global market leader in designed wood wool acoustic solutions. Through local representation and partnerships, we supply, install and maintain sustainable acoustic solutions worldwide.

Please visit [this link](#) for more information about who to contact in your local market.

## Future expectations

In 2022-2023, we aim to grow our business by expanding our global sales network, recruiting talents to our Stockholm HQ, investing in sales technology for sales networks, and diversifying our portfolio of products.

## Projects & clients

In 2021, we enjoyed working with new projects and clients from almost every continent around the world (except Africa and Antarctica). We are proud to have products that people love.

## Product launches

During the spring of 2022, we launched a brand new sustainable material called Acoustic Felt - Recycled PET. The material is made from GRS certified recycled PET bottles sourced from recycling entities across Europe. Simple. Smart. Fun. Circular.

Please visit [this link](#) for more information about Acoustic Felt - recycled PET.

Furthermore, we have expanded our globally renowned wood wool collection by introducing BAUX Acoustic Ceilings. We are proud to say that from now on, we've got your ceilings covered. Optimised for flexible installation, with three patterns and endless colour options. Easy to cut, crop and adapt.

Please visit [this link](#) for more information about BAUX Acoustic Ceilings.

## BAUX Lab

We aim to become the natural choice and provider for architects, designers and engineers looking to specify acoustic treatments in projects. Because of this, we conduct sustainable focused natural product development in our BAUX Lab in Stockholm, Sweden.



**IT'S TIME TO ACCELERATE  
THE INDUSTRY TOWARDS  
A FOSSIL-FREE FUTURE.**



**Over the past century**, fossil based materials have become the norm and standard for acoustic products in the interior design and building industries. The degradation of our natural environment is a global topic of increasing urgency. We can no longer afford to turn our backs or cut corners.

**We believe in a future** where companies are founded upon strong values that direct industries towards a sustainable future. Where businesses guide customers in the right direction and brands you can trust create products and services that work with nature, **not against it.**



**WE ARE COMMITTED  
TO DOING OUR PART.**

**We are committed to** reducing our ecological footprint and making sustainability an integral part of everything we do and create. For us, this means preventing pollution, reducing waste, conserving resources and designing for longevity. It also means asking the right questions and learning from our mistakes, as we continuously strive to do things better.

You are currently reading the second edition of the BAUX sustainability report. These yearly reports will be our promise to the world that we are doing everything we can to accelerate change towards a fossil-free future.



# Materials

We design, produce and market functional construction materials that meet the contemporary expectations of architects, engineers and builders, without compromising tomorrow's safety and environmental standards. Today, we are proud to offer a range of materials that embody our vision: they are sustainable, surprisingly functional and remarkably beautiful.



## Wood Wool

Made from sustainably harvested Swedish wood, cement and water.



## Acoustic Pulp

Made from 100% bio-based, recyclable and biodegradable ingredients.



## Acoustic Felt - Recycled PET

Made from GRS certified recycled PET bottles sourced from recycling units across Europe.



# ACOUSTIC WOOD WOOL



# BAUX Wood Wool.

## Made from sustainably harvested Swedish wood, cement and water.

### A functional natural material

BAUX Acoustic Wood Wool is an environmentally friendly, recyclable material made from wood wool, cement and water. Together, these natural components, provide many functional characteristics.

### Moisture regulation

Moisture resistant wood wool materials even out air humidity by absorbing, and emitting moisture into your ambient indoor environment. This contributes to a pleasant indoor climate which is good for both comfort and health. The high pH value discourages mould and the material is not affected by rot.

### Heat-accumulating

BAUX Acoustic Wood Wool products store ambient heat, which is emitted when the indoor temperature falls. This contributes to lower energy costs, a reduced environmental impact and a stable and comfortable indoor climate.

### Fireproof

BAUX Acoustic Wood Wool is fire resistant and is type approved as protective cladding with a class 1 coating.

### Low emissions

Measurements show that emissions from BAUX Acoustic Wood Wool products are extremely low. The strong surface can cope with vacuum cleaning, and the use of the wood wool products in restaurants and other sensitive environments show that the material does not emit dust or particles.

### Sound-absorbent

The open material structure reduces sound reflections and makes BAUX Acoustic Wood Wool a good sound absorber. The material dampens noise and contributes to restful acoustics in residential buildings, industrial premises and public spaces.



## An environmentally friendly, recyclable material containing two of the world's oldest building materials. The combination is simple and ingenious.

BAUX wood fibres are **FSC® and PEFC™ certified** — guaranteeing that they can be traced back to responsible forestry operations. The wood is harvested from forest near our factory in Sweden to minimise negative CO2 emissions caused by transportation. The small amount of wood waste that is generated as a result of production is taken care of - the majority of waste is used as energy to heat the factory, and the remaining part is used as a byproduct for other organisations and purposes.

BAUX has carefully selected the world leading sustainable supplier of cement. An advanced system for carbon capturing has been put in

place to ensure that CO2 emissions from the limestone heating process are absorbed and recaptured in porous stone materials.

Once installed, BAUX Acoustic Wood Wool panels also capture CO2 from the surrounding air in a reactive process called carbonation. The limestone in the cement reverts back to its original state when CO2 is collected. Independent tests show that, thanks to its open material structure, BAUX Acoustic Wood Wool is able to carbonate as much as **70%** of the CO2 that is emitted during the manufacturing process.



**BAUX**

# ACOUSTIC PULP



**100% bio-based**

**100% recyclable**

**100% biodegradable**

**0% pollution or waste**

**Biomimicry engineered**

**Lightweight**

**Durable**

**Fire retardant**

**Water repellent**

**Colour from wheat**

**Laser enhanced sound absorption**



## BAUX Acoustic Pulp. Made from 100% bio-based, recyclable and biodegradable ingredients.



### Cellulose

Cellulose from sustainably harvested Swedish and FSC controlled fir and pine trees.

### Wheat Bran

Non GMO wheat bran. Adding paint would have compromised our vision of creating a 100% bio-based product. Instead, colour is achieved using 5% wheat bran.

### Potato Starch

For strength, we utilised a naturally catalytic combination of starch extracted from potatoes. The cells of the root tubers of the potato plant contain leucoplasts making it ideal for strength.

### Plant Wax

Plant derived wax is used to further increase fire protection in the product.

### Citrus fruit peel

For strength, we utilised a naturally catalytic combination of potato starch, plant based wax and citrus fruit acids from lemons, limes, and oranges to provoke the cellulosic molecules into creating a powerful matrix of intermolecular fusions.

## BAUX Acoustic Pulp drastically pushes the boundaries of cellulosic properties to a completely new level.

Our **100% bio-based** BAUX Acoustic Pulp panel is the first in the world to uncompromisingly combine the performance properties of sound absorption, safety and durability with sustainability and modern aesthetics.

The result is a restful and sustainable acoustical environment for residential buildings, industrial premises and public spaces that evokes the harmonising pulse of nature. Harmless for us, harmless for the environment. It's nothing short of an acoustic revolution.

The manufacturing process is both **sustainable and highly technological**. The cellulose mix is formed inside a 3D mould with a powerful vacuum method and dried under high pressure. The surface is nano perforated using an advanced laser technique. All material waste is recycled back into the production process and reused. All water used is built into a closed circular system and recycled. The only emission from production is a tiny amount of pure and clean water vapour that is released as the material dries.



# ACOUSTIC FELT RECYCLED PET



## BAUX Acoustic Felt - Recycled PET. Made from GRS certified recycled PET bottles.



### Made from GRS certified recycled PET bottles

Collected bottles are washed and chipped into recycled PET flakes, then melted down and spun into the recycled fibres that we use to make Acoustic Felt panels. Instead of creating more plastic that could wind up in nature or the landfill, we made our felt out of recycled PET bottles.

### Produced as a single standardised sheet

To avoid generating any excess materials, we carefully press—not glue—the textiles into a single standardised sheet and precisely cut it.

### Minimal number of hardware pieces

To minimise unnecessary production and streamline assembly, just four standardised hardware pieces are used—made of **100% recyclable metal and 100% recyclable plastic**.

### Palette of 6 colours

Despite the material's recycled origins, the process of chipping bottles into sortable recycled PET flakes makes it easier to produce a precise palette of colours. The BAUX Acoustic Felt palette ranges from a thoughtful trio in greyscale to the more saturated hues of Coral, Khaki and Jade.



## **A next generation textile, made from GRS certified recycled PET bottles recovered from recycling sources across Europe.**

You can be sure you're helping to keep unwanted plastics out of the landfill. BAUX Recycled PET is made from GRS certified, used and recycled PET accredited by IOAS. Collected bottles are washed and chipped into recycled PET flakes, then melted down and spun into the recycled fibres that we use to make Acoustic Felt panels. Instead of creating more plastic that could wind up in our nature or landfills, we made Acoustic Felt out of recycled PET bottles. The GRS certified and IOAS accredited bottles are collected from recycling sources across Europe.

After being washed and chipped into PET flakes, they are melted down and spun into the fibres we use to make Acoustic Felt. The BAUX Recycled PET colour palette comes with six versatile colours primed for your acoustic designs. Despite the material's recycled origins, the process of chipping bottles into sortable recycled PET flakes makes it easier to produce a precise palette of colours. The BAUX Recycled PET palette ranges from a greyscale trio to the more saturated hues of Khaki, Coral Red and Jade Green.



BAUX

WHENEVER WE'RE  
LOOKING FOR NEW  
DESIGNS, PRODUCTS OR  
MATERIALS, NATURE IS  
ALWAYS OUR FIRST  
SOURCE OF INSPIRATION.



# The BAUX approach to product development

We strive to create acoustic solutions that not only check boxes for functionality and design, but also contribute to creating a better future for our planet. Nature is a constant source of inspiration for colours, patterns and shapes. When we explore beneath the surface, it holds the key to removing unsustainable materials from the equation entirely.

## Our criteria for materials

When searching for new materials, we critically evaluate every aspect using the following criteria:

- It should be possible to trace the material back to its source of origin
- There should be zero risk of recycled materials emitting or containing dangerous substances
- Materials should have a low amount of volatile organic compounds (VOC)
- It should be possible to recycle and/or reuse the material



# The BAUX Lab

## Sustainable innovators

Earlier this year, we opened our doors to the innovative BAUX Lab. Based inside our Stockholm Headquarters, BAUX Lab is the place where product development begins through careful testing and evaluation of materials and designs.

We collaborated with celebrated filmmaker Carl Engberg from Stavfel Production to produce a new film about the Lab. The film invites you to experience our inner workings and sustainable mindset, with a first hand look at innovative nature based product development processes.

See the full film [here](#)





## A meaningful project within the BAUX Lab



Photo credit to Mounid

### Algae could be the solution to textile dyeing!

We are proud to be part of a project that aims to develop a sustainable alternative to conventional textile dyestuff.

Today, the textile industry is responsible for **4-8 percent of the total climate impact** in the world and of that, nearly 80 percent occurs during production. Conventional textile dyeing makes up a quarter of those emissions and the process is also extremely water and chemical intense.

New techniques decreases water and energy consumption by up to 90 percent and reduce carbon dioxide emissions by the same figure, compared with conventional dyeing methods. Additionally, algae is superior to land based plant dyes when it comes to generating biomass and storing carbon dioxide, which in turn helps counteract the greenhouse effect.

We love being part of sustainable innovations like these.

Read more (in Swedish) [here](#)



# CLIMATE NEUTRAL NOW



## **BAUX second year following the UNFCCC and the Climate Neutral Now Initiative.**

In order to achieve a better and more sustainable future, the United Nations and global leaders have agreed upon a number of Sustainable Development Goals. The Paris Agreement was adopted by 196 Parties on December 12th, 2015, with the goal of limiting climate change.

We have decided to put effort, investment, engagement, and decisiveness into fulfilling one of the United Nations goals, goal 13, which involves aiming for climate neutrality. To achieve this, we joined the Climate Neutral Now initiative in 2020, launched by the United Nations Framework Convention on Climate Change (UNFCCC) secretariat.

### **Back in 2020, we signed the Climate Neutral Now Pledge.**

The Climate Neutral Now Initiative is one of several initiatives launched by the UNFCCC secretariat to increase climate action by engaging non-party stakeholders. Launched in 2015, the initiative is based on a mandate to promote the voluntary use of carbon market mechanisms recognised by the convention. The process of joining Climate Neutral Now started in 2020 when BAUX signed the Climate Neutral Now Pledge. Being part of this initiative means that we follow the steps (Measure, Reduce, Contribute) outlined by the initiative, and report on our actions and achievements annually.



# Four steps we have taken

1

Measure the entire company's greenhouse gas emissions, including production, transportation and all other business operations.

2

Commit to reducing emissions as much as possible.

3

Annually offset/compensate for the emissions that can't be avoided by using UN certified emission reductions.

4

Commit to an annual report of our estimated Co2 emissions, reduction activities, targets, and offsetting projects.

Any business can contribute to limiting temperature rise and take climate action by following these steps. Learn more how we managed to do this at BAUX on the coming pages.



# Climate terminology explained

GHG Emissions

Greenhouse gases, or GHGs, are compound gases that trap heat or longwave radiation in the earth’s atmosphere. Their presence in the atmosphere makes the earth’s surface warmer. Sunlight or shortwave radiation easily passes through these gases in the earth’s atmosphere. This radiation is absorbed by the surface of the earth and released as heat or longwave radiation. The molecular structure of GHGs allows them to absorb heat released and trap longwave radiation in the earth’s atmosphere, which is returned back towards the earth. This heat trap phenomenon is known as the greenhouse effect.

Carbon Footprint

A form of carbon calculation that measures the amount of carbon dioxide equivalent that a country, business, industry or an individual produces or is responsible for creating. The footprint calculates the direct and indirect levels of CO2e emissions. Direct emissions include the burning of fossil fuels for energy and transportation and indirect emissions from the whole lifecycle of products, sourcing raw materials, production and waste management.

Carbon Credit

A generic term to assign value to the reduction or offset of GHG emissions. One carbon credit is the equivalent of one metric ton of carbon dioxide equivalent (CO2e). Carbon credits can be used by businesses or individuals looking to reduce their carbon footprint by investing in an activity that reduces or sequesters GHGs.

Climate Neutrality

To achieve ‘climate neutrality’ means reducing GHG emissions as much as possible, whilst compensating for any remaining emissions. In this way, a net-zero emissions balance can be achieved, which means the amount of greenhouse gases released into the atmosphere is neutralised. This can be done by carbon sequestration, i.e. by removing carbon from the atmosphere, or through offsetting measures, which typically involve supporting climate oriented projects (for more information look for the definitions of ‘offsetting’, ‘carbon credits’, ‘Clean Development Mechanism (CDM)’, and ‘Certified Emissions Reductions (CERs)’

Co2 Equivalent (Co2e)

A carbon dioxide equivalent or CO2 equivalent, (CO2e) is a metric measure used to compare the emissions from various GHGs on the basis of their global warming potential (GWP) by converting amounts of other gases to the equivalent amount of carbon dioxide with the same global warming potential.



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**OUR JOURNEY  
TO FULL CLIMATE  
TRANSPARENCY**

21



**Sustainability and transparency** has been at the core of everything we do and create at BAUX since launching the company in 2013. When we learned about the UNFCCC secretariat's Climate Neutral Now initiative back in 2020 and realised we could take our sustainability commitment to the next level by becoming climate neutral, the decision was easy.





# 01

## Step 1: Measure

The Greenhouse Gas Protocol (GHG Protocol) is the most widely used international accounting tool for understanding, quantifying and managing greenhouse gas emissions as we work towards the United Nation's Sustainable Development Goals.

On the following pages, we will present our Co2 emissions findings.



# Emissions

Page 33  
Wood Wool emissions

Including raw materials, production, transport and installation/end of life.

Page 35  
Pulp emissions

Including raw materials, production and transport.

Page 37  
Other BAUX emissions

Including employees, business travel and office emissions.

Page 38  
Additional information and comments

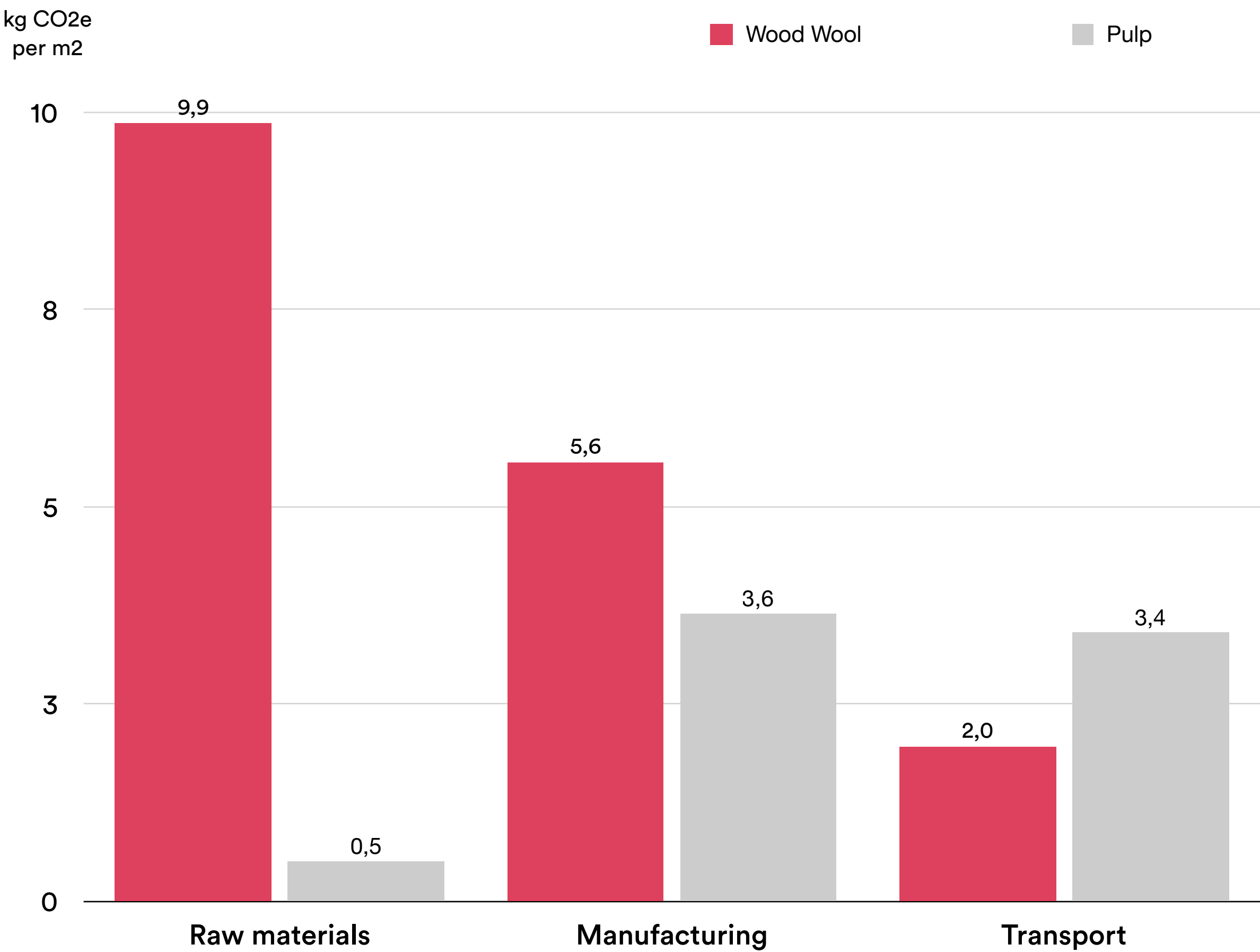
Total emissions, and comments on raw materials, manufacturing and more.

Acoustic Felt - Recycled PET  
To be included in next years report. The product wasn't fully developed during the year of audit.



# Wood Wool

BAUX wood fibres are FSC® and PEFCTM certified. This guarantees they can be traced back to responsible forestry operations. The wood is harvested from forest nearby our factory in order to minimise negative CO2 emissions caused by transportation. Of the small amount of wood waste that is generated as a result of production, 80% is used to heat the factory and drying plant. No waste is produced from the timber logs.





Wood Wool

\* This is a weighted average value taking all deliveries during 2021 into consideration.

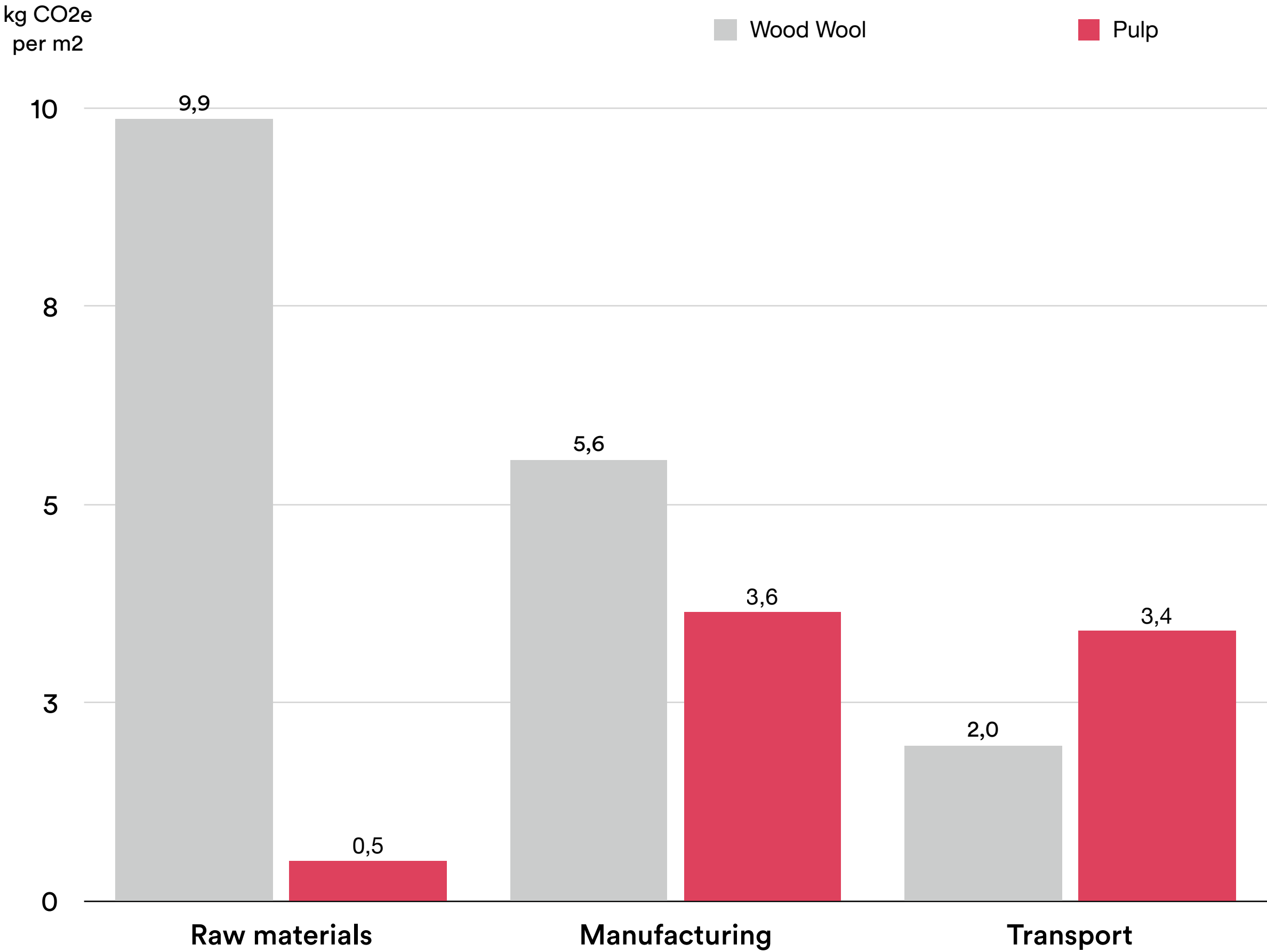
Raw Materials	Manufacturing	Transport	Installation & End of life
<ul style="list-style-type: none"><li>• Wood cement and water.</li><li>• We use locally harvested FSC certified pine and spruce from Swedish forests.</li><li>• We use 100% natural materials with no additives.</li><li>• Our cement provider, Cementa, has been recognised as the world’s most sustainable cement supplier. Read more about this under ‘Installation &amp; End of life.’</li></ul>	<ul style="list-style-type: none"><li>• Sweden, USA and AUS.</li><li>• The raw materials we use are produced in Sweden, in our factory that runs on 100% renewable energy.</li><li>• We use low waste production methods.</li><li>• We have production plants in the USA and Australia to ensure the final parts of the manufacturing process takes place closer to our end customers.</li></ul>	<ul style="list-style-type: none"><li>• From factories to the end client, this includes samples and the final product.*</li><li>• We aim to produce as few emissions as possible during the transportation of products.</li><li>• We transport products to clients on the ground by truck and rarely use air transportation.</li><li>• We have an efficient raw materials logistics solution that provides materials to USA and Australia.</li></ul>	<ul style="list-style-type: none"><li>• Installed wood wool products lead to reduced energy consumption due to their heat accumulating performance.</li><li>• All wood wool products have a long life and fifty year warranty.</li><li>• Wood Wool captures a significant amount of CO2 from the atmosphere, leading to reduced Co2 emissions.</li></ul>
<p>kg CO2e per m2</p> <p>Wood: 0,05</p> <p>Cement production: 9,81</p> <p>Cement carbon capture: -6,87</p> <p>Raw materials total emissions: 2,99</p>	<p>kg CO2e per m2</p> <p>Sweden: 1,74 (Green energy: Yes)</p> <p>Australia: 0,10 (Green energy: Yes)</p> <p>USA: 22,63 (Green energy: No)</p>	<p>kg CO2e per m2</p> <p>From factory to end clients: 1,96</p>	<p>%</p> <p>% of carbon capture: -70%</p> <p>This means that we have a 70% reduction from the total CO2 created from wood wool cement production.</p>



# Pulp

The Raw materials that Acoustic Pulp is made from are very low in kg CO2e per m2, when compared to corresponding materials on the market (Cellulose, Wheat Bran, Potato Starch and Plant Wax). We take pride in our materials, and Acoustic Pulp is definitely not an exception!

The Acoustic Pulp manufacturing process is highly sustainable and technological. However, during 2021 we faced production difficulties in the Acoustic Pulp factory, leading to a kg Co2e per m2 increase in comparison to usually CO2 emissions in 2020. We have now solved the production difficulties and will be back to lower emissions for products sold during 2022.





Pulp

Raw Materials	Manufacturing	Transport	Installation & End of life
<ul style="list-style-type: none"><li>Cellulose, potato starch, wheat bran and plant wax.</li><li>We use organic and locally harvested cellulose and the wheat bran is a rest product.</li><li>The wood we derive our cellulose from is FSC</li></ul>	<ul style="list-style-type: none"><li>The factory is run on hydropower.</li><li>100% renewable energy sources are used for production.</li><li>There is zero waste produced during production.</li></ul>	<ul style="list-style-type: none"><li>From factories to the end client, including samples and the final product.</li><li>We aim to produce as few emissions as possible during the transportation of products.</li><li>We transport products to clients on the ground by truck, and rarely use air transportation.</li></ul>	<ul style="list-style-type: none"><li>Acoustic Pulp is the world’s first biodegradable acoustic panel.</li><li>The panels are 100% circular and used panels may be moulded and used for reproduction</li></ul>
<p>kg CO2e per m2</p> <p>Wood/pulp: 0,44</p> <p>OC-BioBinder™: 0,04</p> <p>Raw materials total emissions: 0,5</p>	<p>kg CO2e per m2</p> <p>Sweden: 3,64 (Renewable energy: Yes)</p>	<p>kg CO2e per m2</p> <p>From factory to end clients: 3,40</p>	



Other

Employees & business travel	Our office	Fairs and fair stands
<ul style="list-style-type: none"><li>• All employees are offered the option to purchase a discounted bike for their office commute.</li><li>• We offer flexible work hours and all employees receive generous health benefits to spend on either a gym card or massages</li><li>• We walk, bike and take the tube to meetings.</li></ul>	<ul style="list-style-type: none"><li>• We have a central office location in Stockholm, giving all our employees the possibility to easily walk, cycle or commute to the office.</li><li>• Our office runs on 100% renewable energy and we try to use the space as effectively as possible.</li></ul>	<ul style="list-style-type: none"><li>• When showcasing the BAUX brand and products at fairs and events, we aim to reuse materials whenever possible.</li><li>• We borrow or rent furniture and products from our friends and colleagues in the industry to reduce both CO2 and money spent.</li></ul>
Total CO2 per employee: 0,41 tonne per employee	Our office per employee: 0,80 tonne	Fairs total CO2: 0,0 tonne



# Additional information

Page 39  
BAUX total emissions

Page 39  
Raw materials emissions

Page 43  
Manufacturing and production

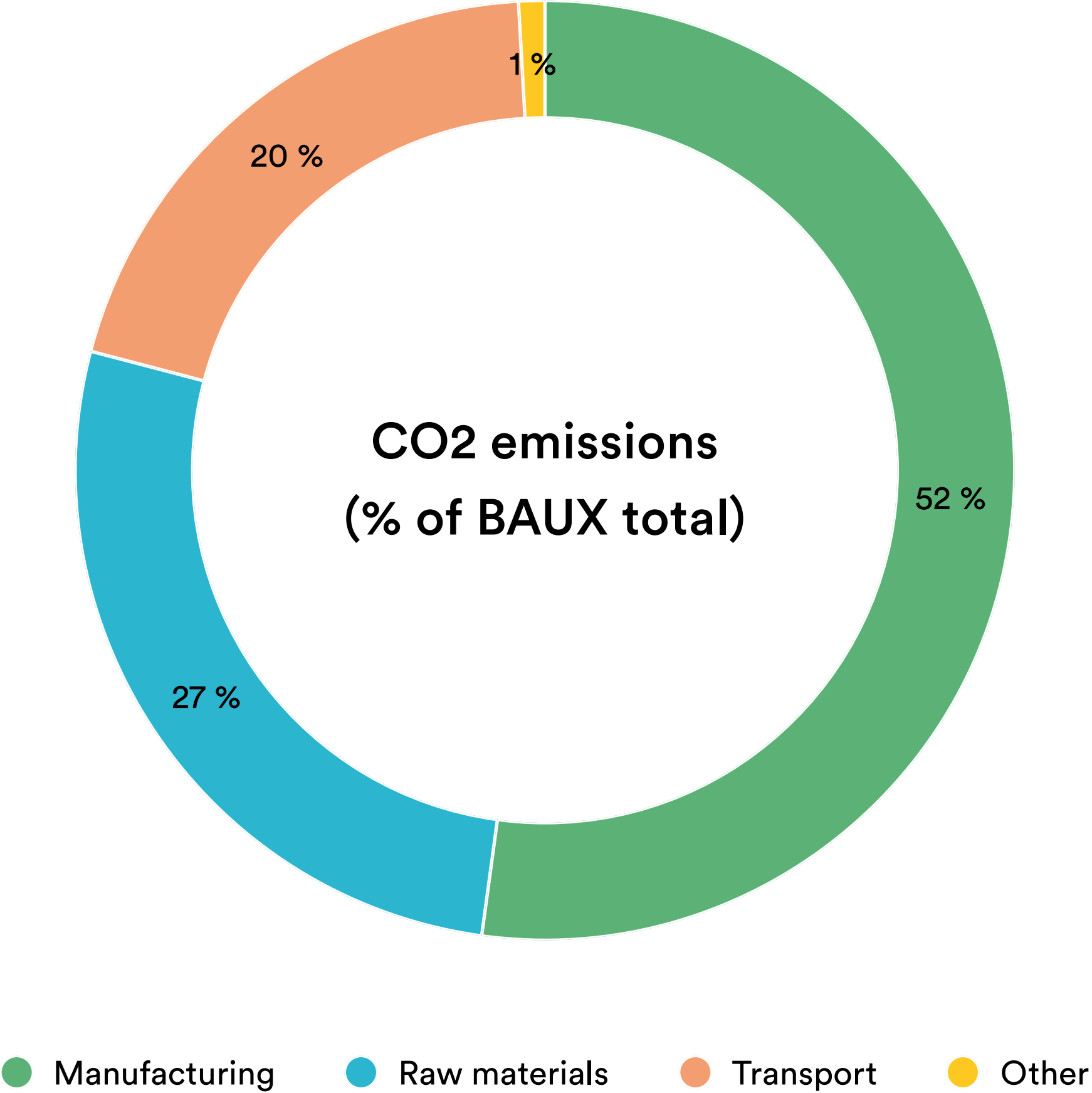
Page 47  
Transportation to customers

Page 49  
End of life

Page 51  
Other



# Emissions per scope



**Manufacturing** constitutes the largest share of BAUX’s CO2 emissions (**52%**). BAUX has manufacturing plants located in Sweden, USA and Australia. Renewable energy is used in three out of four of our factories.

**Raw Materials** makes up **27%** of our emissions.

**Transportation** stands for **20%** of our total CO2 emissions. This number is higher than last year as more clients wanted to send their good via air freight under 2021. BAUX is climate compensating (offsetting) all these emissions. We do our best to select the best and most efficient transportation providers. Furthermore, we have an effective logistic set up where manufacturing takes place as close to the end client as possible.

**Other emissions** from our office and employee travel add up to only **1%** of BAUX’s total emissions.





## Pioneering sustainable acoustic materials.

Whenever we're looking for new designs, products or materials, nature is always our first source of inspiration. We strive to create acoustic solutions that not only check the boxes of functionality and design, but also contribute to creating a better future for our planet. Nature is a constant source of ideas and inspiration for colours, patterns and shapes. When you explore beneath the surface, it holds the key to removing unsustainable materials from the equation entirely.

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### Our criteria for materials:

- It should be possible to trace the material back to its source of origin
- There should be zero risk of recycled materials containing dangerous substances
- Materials should have a low amount of volatile organic compounds (VOC)
- It should be possible to recycle and/or reuse the material



# Cement is the largest source of raw material emissions...

...and that is why BAUX have carefully selected the world’s leading sustainable cement supplier. An advanced system for carbon dioxide capture has been put in place to ensure that CO2 emissions from the limestone heating process are absorbed and recaptured in porous stone materials.

2,9 kg

2,9 kg CO2 per m2 is the NET CO2 emission from cement.

9,8

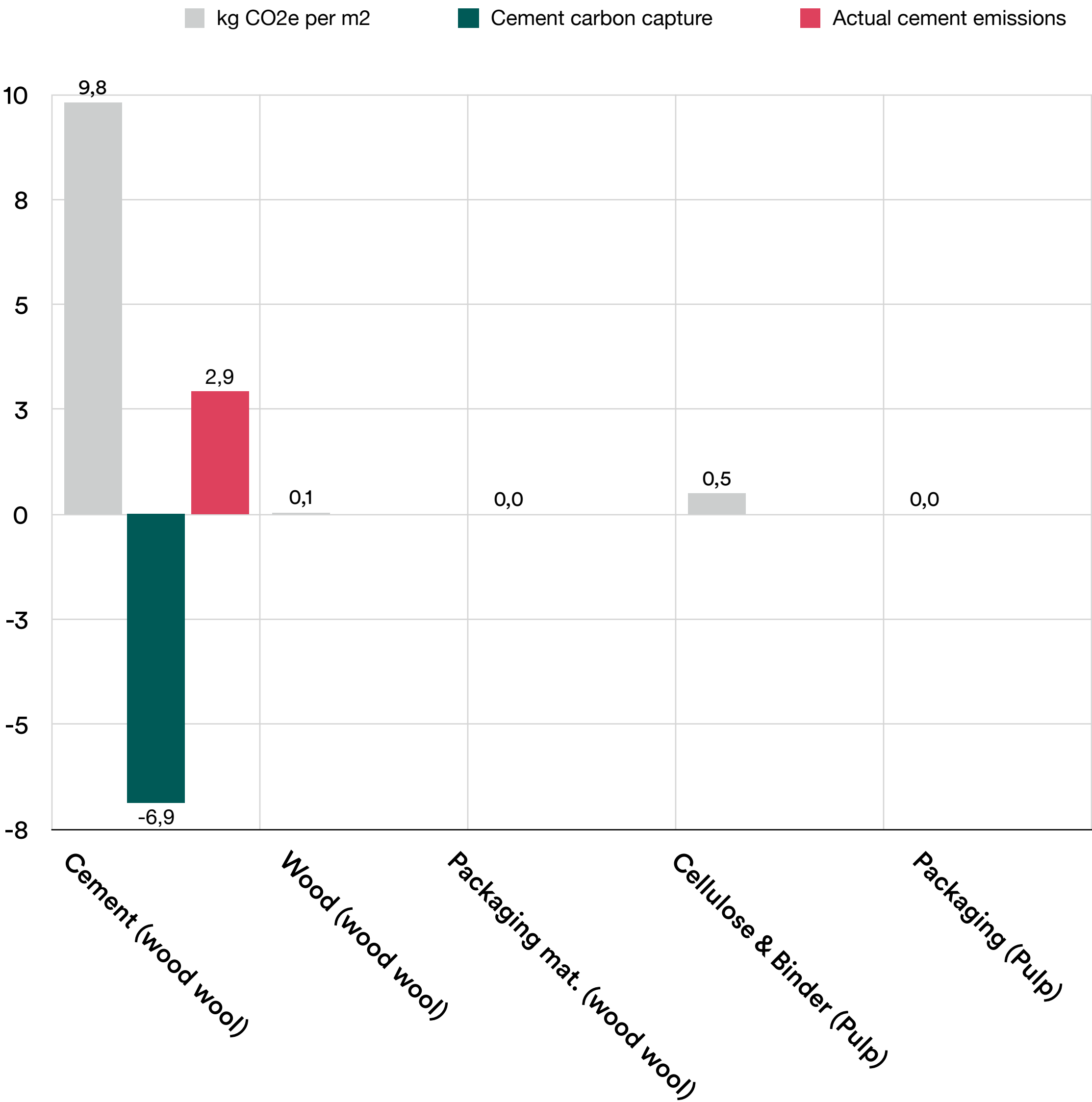
The advanced system for Carbon Dioxide Capturing that is in place ensures that inly 9,8 kg CO2 per m2 produced wood wool panel is emitted when producing the cement.

6,9 kg

6,9 of the 9,81kg is absorbed from the surrounding air in a reactive process called carbonation.

70%

Wood Wool is able to carbonate as much as 70% of the CO2 that was emitted during the manufacturing process.





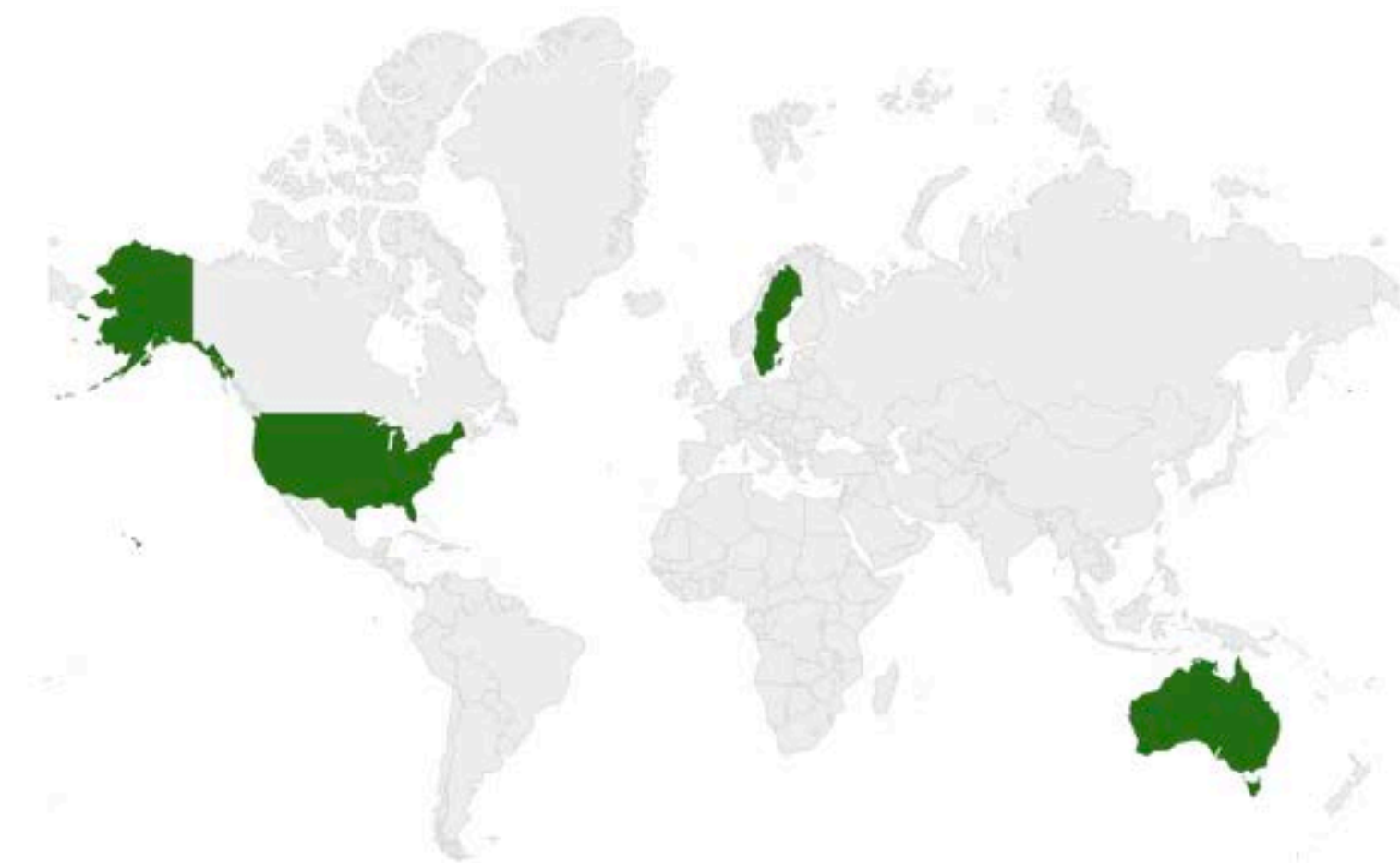


## Our manufacturing is based in Sweden.

BAUX products are produced and manufactured in Sweden. However, we have established local factories in the USA and Australia to shorten lead times and reduce transportation emissions. As a product based company, manufacturing will always play a big role in our total CO2 emissions. Today, **75%** of our factories run on renewable energy. We aim to increase this number to **100%** in the next five years.



## BAUX has manufacturing plants located in Sweden, the USA and Australia.



Having local factories reduces our total CO2 emissions and leads to less emissions incurred from transportation of products to our customers.



The factory in the USA is run on natural gas, and emissions amount to 22,63kg CO2 per m2. Our ambition is to move away from the usage of natural gas as soon as an alternative is practical.



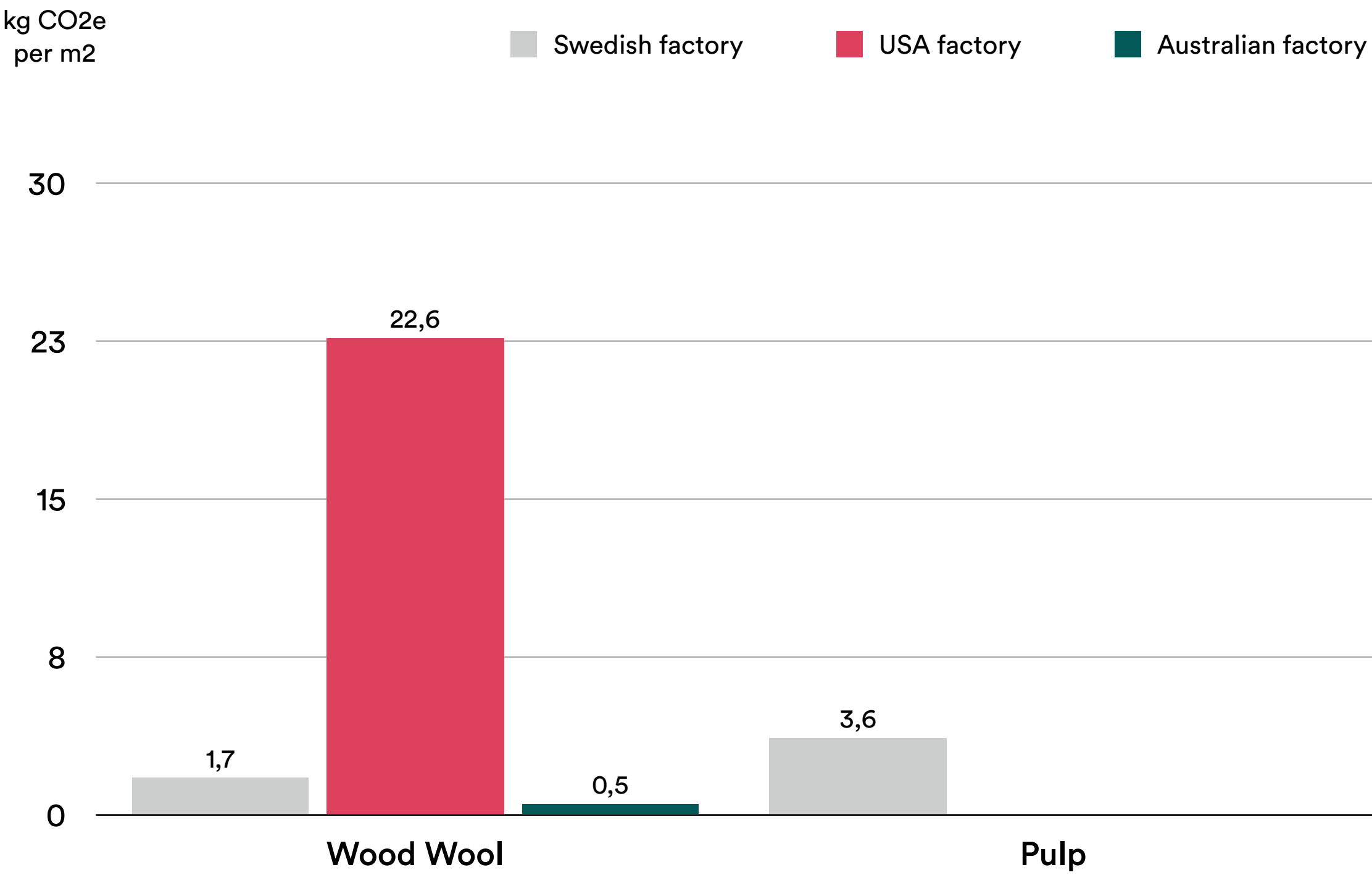
All factories, **besides our factory in the USA**, run on 100% renewable energy.



The Australian factory is already compensating for their emissions, which is the reason behind their low CO2 value.



# Emissions per product and factory

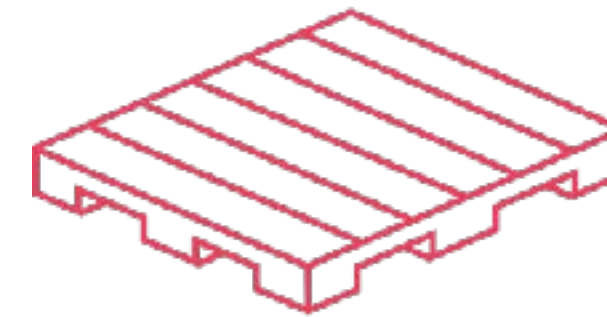


**Our factory in the USA** has higher kg CO2e per m2 (22,6 kg CO2e per m2) than the remaining factories due to their natural gas heating system.

BAUX encourages green development and will work with our partners long term to phase out the usage of fossil fules.



# Other manufacturing

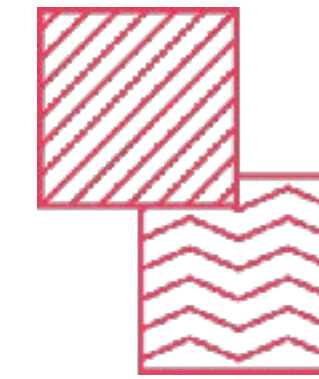


Pallets for shipping

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**0.01 kg**

When we ship our products around the world we use pallets. For one square meter of produced product, we have to take a pallet into consideration. The pallet adds a total of 0.01 kg of CO<sub>2</sub> per m<sup>2</sup> of product, which is a relatively small emission.



Product samples

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**0.01 %**

Sending out samples stands for 0,01 % of our total emissions. We do not want to send fewer samples since they are important for our customers. Instead, we ensure that all samples are long lasting, reusable and sustainable.





## Reducing transportation emissions as much as possible

Transportation stands for 20% of our total emissions. It's important for us to do what we can to reduce emissions when we delivery products to our clients, no matter where they are in the world.

However, as a consumer, the key should be to choose a sustainable provider, rather than looking at the location of manufacturing. Why? Manufacturing and Raw Materials emits far more Co2 than international transportation. Shopping local is therefore not always the single best solution.



“Our data show that transportation of wood wool stands for 11 % of wood wool’s total Co2\*, whereas the main part (89%) comes from manufacturing and raw materials. Choosing sustainable materials should therefore not be overlooked by the need to shop local goods.”

\*Excluding cement carbonization that collects CO2 after installation

Rebecca Johansson  
Supply Chain Lead, BAUX



The majority of our biggest markets have the lowest CO2 emissions

Our biggest markets (marked in pink) where the majority of our customers are located, also have some of the lowest CO2 emission values per m2.



The CO2 emissions generated during transportation are, in general, fairly low. This is mainly due to smart logistics structures and the fact that we manufacture products as close to the customer as possible.

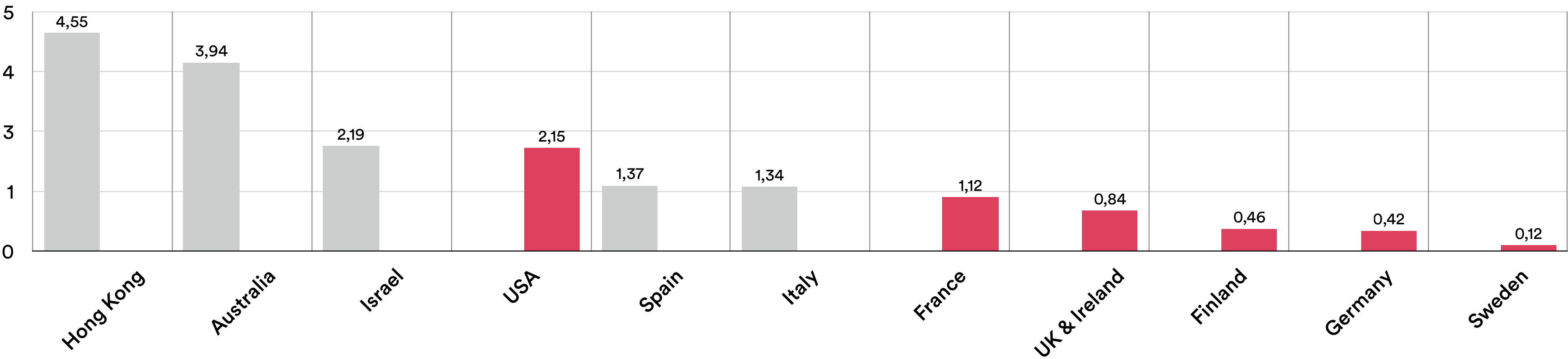


**Sweden**, our home market, has the best result with only 0,12 kg CO2e per m2 produced per panel during transportation.

This can be compared to the USA: 2,15 kg CO2e per m2 because their natural gas heating system.

kg CO2e  
per m2

Markets Our biggest markets







## The cement in Wood Wool captures CO2 from the atmosphere

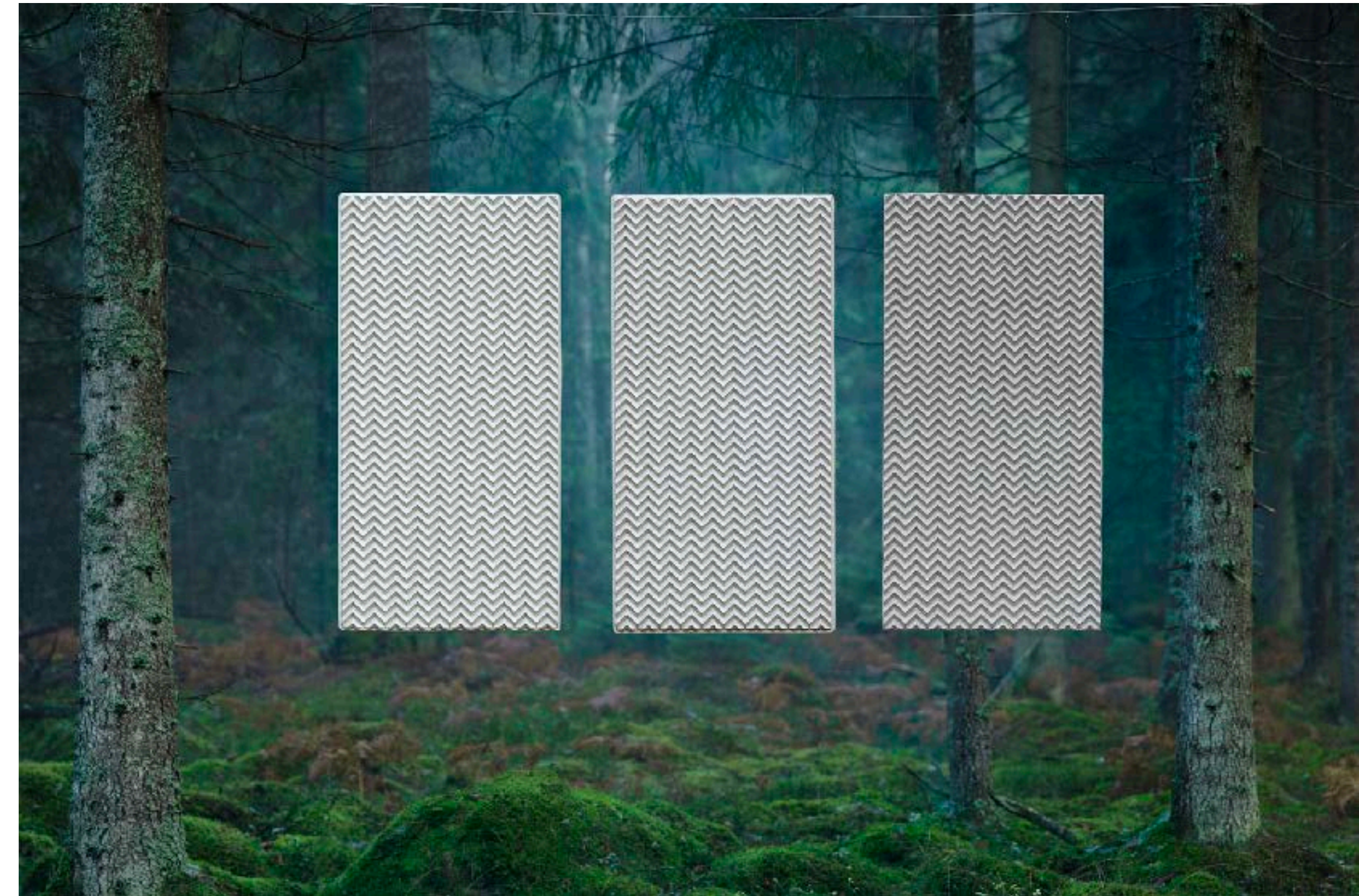
To produce wood wool, BAUX has carefully selected the world's leading sustainable cement supplier. An advanced system for Carbon Dioxide Capturing is in place, ensuring that CO2 emissions from the manufacturing processes involved in heating limestone are absorbed and recaptured in porous stone materials. Once installed, BAUX Acoustic Wood Wool products also capture CO2 from the surrounding air in a reactive process called carbonation. The limestone in the cement reverts back to its original state when CO2 is collected. Independent tests show that, thanks to its open material structure, BAUX Acoustic Wood Wool is able to carbonate as much as 70% of the CO2 that is emitted during the manufacturing process.



## Recycling Acoustic Pulp

All material waste generated from manufacturing Acoustic Pulp is recycled back into the production process and reused again. All water used is built into a closed circular system and recycled. The only emission from production is a tiny amount of pure and clean water vapour that is emitted as the material dries.

On top this, we can take the Pulp panels back, grind them down and produce new panels again - a 100% circular loop.







## Upcycling Acoustic Felt - Recycled PET

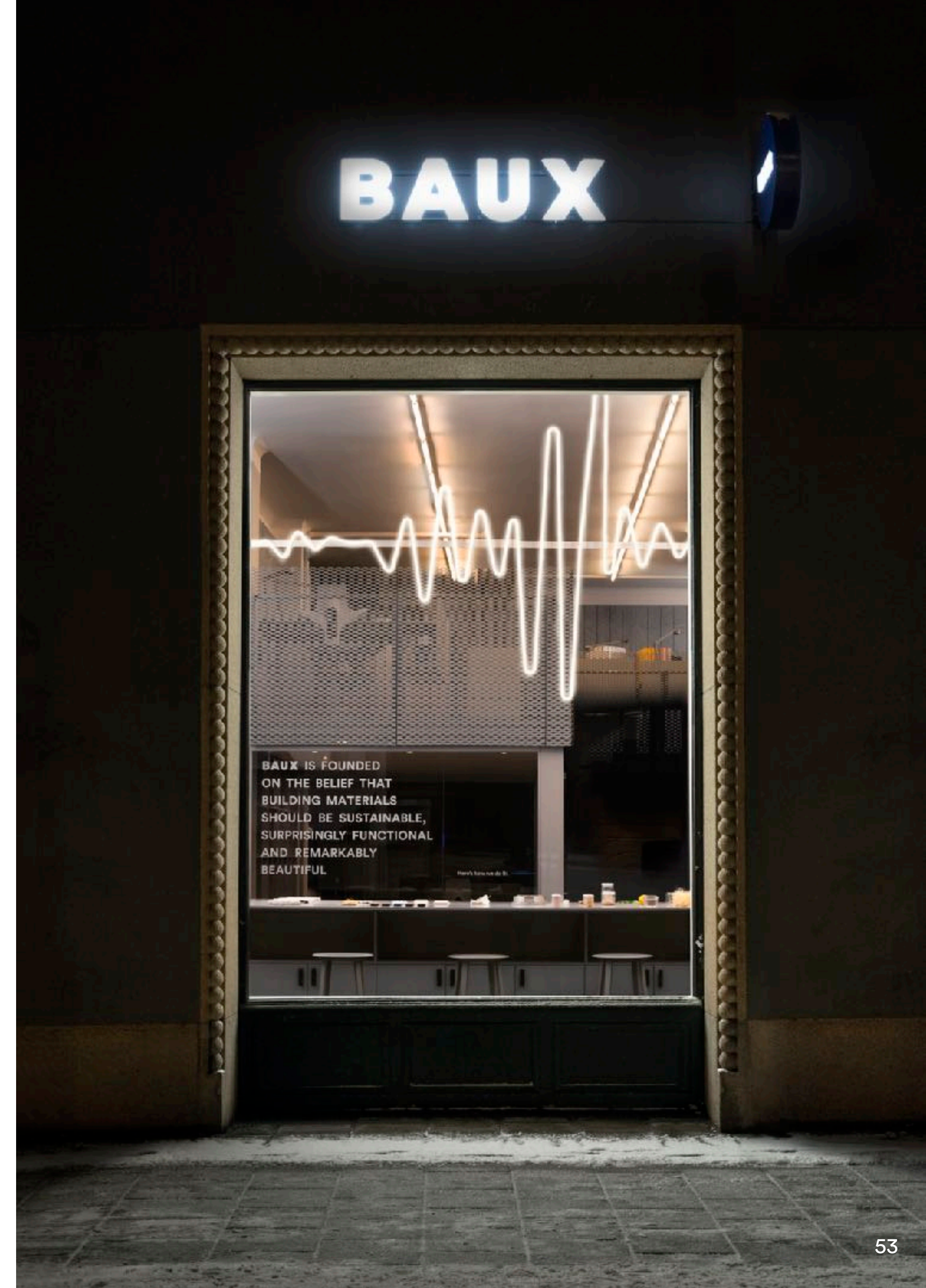
You can be sure you're helping keep unwanted plastics out of the landfill. Acoustic Felt is made from GRS certified, used and recycled PET accredited by IOAS.



## Our office and showroom run on renewable energy.

We constantly strive to be more climate conscious when it comes to our employees and workplace. All employees have the possibility to cycle to work and are offered the chance to purchase a bicycle at a discount. Having our office located in central Stockholm minimises travel emissions and provides opportunities for sustainable commuting via public transport.

Our office and showrooms run on renewable energy and we aim to not have a bigger office than is needed.





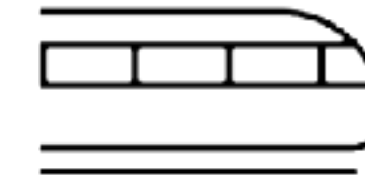
## A few of our initiatives



Central office location run on renewable energy.



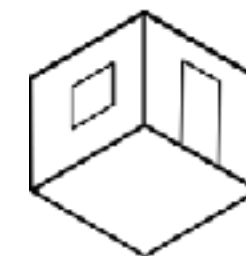
Possibility to cycle to work.



All employees can either walk or commute via public transport (tube/bus).



Policy to walk to meetings when possible. When not possible: we take public transport rather than a taxi.



Our office is not bigger than we need—we use all the space!



International travel only when necessary.



# 02

## Step 2: Reduce

The second step we took was reducing our greenhouse emissions wherever possible. As an organisation, we need to reduce our climate footprint as much as we can to ensure the credibility of any associated climate actions.

Once we measured our greenhouse gas emissions and identified significant source activities, we identified actions we could implement to reduce the emissions generated from those activities.

On the following page, we will present how we have (and will continue to) reduce emissions in the coming years.



The second step is to reduce our emissions wherever possible.

During 2021, we reduced our emissions through:



Reduced amount of cement needed for our wood wool production.



Green energy at our Stockholm head quarters.



Green energy in our Swedish and Australian factories.



Bikes for employees commute.



Only necessary international travel.



# 03

## Step 3: Offset

Offsetting is a climate action that enables us to compensate for the emissions we cannot avoid by supporting worthy projects that reduce emissions somewhere else.

When we offset our emissions with Certified Emission Reduction units (CERs), we have chosen to take climate action through a process which is overseen by the United Nations. We have purchased CERs that are issued from trustworthy climate friendly projects called Clean Development Mechanism (CDM) projects. CDM projects take place in developing countries and contribute to their sustainable development. Each project goes through a strict and thorough vetting process.

We are aware that offsetting our CO2 emissions is not equal to being Climate Neutral. However, we believe that offsetting towards trustworthy CDM project, we can help initiatives that benefit our planet.

On the following pages, we will present our offsetting projects.



## Offset

We have decided to offset all of our emissions from the year 2021 by donating to renewable energy projects around the world. We have diversified our offsetting to cover three main continents; Africa, Latin America and Asia.



### Malawi, Africa

Cook stove project - Nkhata Bay District



### Chile, Latin America

La Confluencia - Hydroelectric Project



### India, Asia

Solar Power Project - Baba Group



### South Korea, Asia

Gangwon Wind Park Project



## Malawi - Africa

## Cook stove project - Nkhata Bay District

This cook stove project is run by RIPPLE Africa, a UK charity working in Malawi since 2003. It involves the distribution of the Changu Changu Moto, high efficiency biomass cook stoves, to approximately 22,000 households in Nkhata Bay District, Malawi.

Project benefits: approximately 200,000 people benefit by improving livelihood, preventing deforestation and reducing respiratory diseases, burns and greenhouse gas emissions.





## Chile - Latin America



## La Confluencia - Hydroelectric Project

This initiative involves building hydro projects that generate electricity from flowing water. They reduce the need to burn fossil fuels to generate power.

Project benefits: preserving natural resources, promoting renewable energy generation, reducing dependency on non-renewable resources, helping spread green technology worldwide and improving health.



## South Korea - Asia



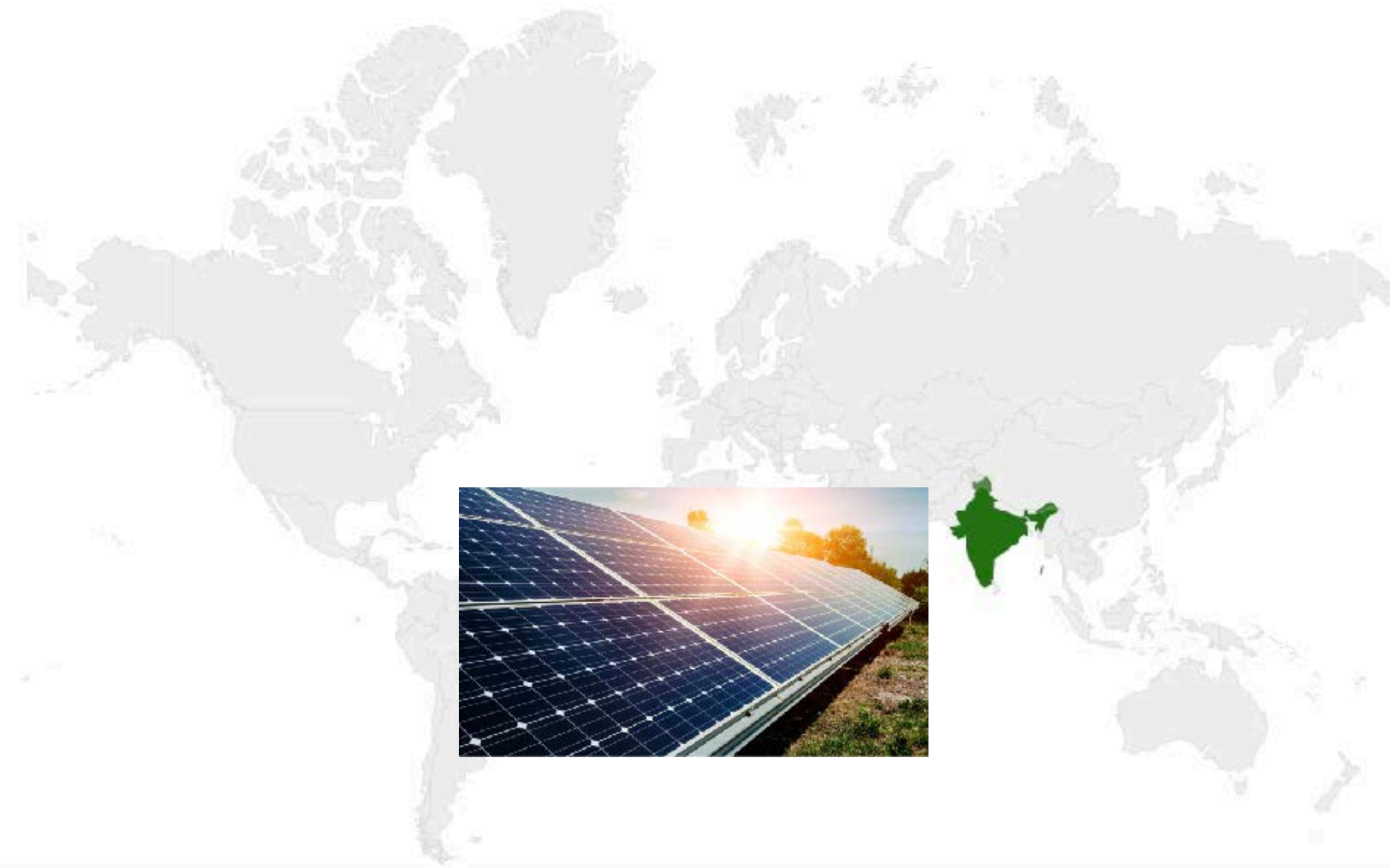
## Gangwon Wind Park Project

This project supports wind turbines that generate electricity wind power, reducing the amount of fossil fuels that are need to generate power, which reduces the amounts of greenhouse gases released into the atmosphere.

Project benefits: preserving natural resources, promoting renewable energy, reducing dependency on non-renewable resources and helping spread green technology worldwide.



## India - Asia



## Solar Power Project by Baba Group

The purpose of the project is to use renewable solar energy to generate electricity. Dharampal Premchand Ltd are the promoters of the project, which involves the installation of a 5 MWp Solar PV power project in the Gaon Talab, Tehsil Ichhawar, district Sehore, Madhya Pradesh, India.

The project contributes to a reduction in the demand/supply gap in the region and increases the share of renewable energy on the grid mix.




# GUIDING PRINCIPLES



# Acoustics for tomorrow. Sustainable design today.

- Sustainability is a fundamental part of our business model at BAUX.
- For us, designing sustainable acoustic building materials for the future, means producing environmentally friendly materials today.
- We aim to provide long lasting, functional solutions for our customers.
- By doing so, we help to build societies that can support fully sustainable lifestyles.





“This climate report is our testimony that we are transparent towards our stakeholders and that BAUX will always be in the forefront of innovation and sustainability”

Niki Gynnerstedt  
Head of Sustainability at BAUX





# Transparency

We understand the importance of climate action and being honest about the emissions present throughout our value chain. To **BE TRANSPARENT** is, and will continue to be, our main guiding principle, helping us to move in the right direction. We are also open and transparent in our understanding that our efforts do not stop here. While offsetting our emissions is a great start, it is not our final goal. As we move forward, we will work actively to change some of the ways we operate. Our promise to you, is that we will continue to be transparent while doing so.



# Inspire change. Uncover potential.

We are also guided by our drive to **UNCOVER POTENTIAL & INSPIRE CHANGE**. There is always potential waiting to be uncovered in everything we do and create. We aspire to change by identifying and acting upon this potential, creating sound absorbing materials that are sustainable, surprisingly functional, and remarkably beautiful.





## Actions

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01.

Keep choosing a sustainable supply chain for all our new products and materials, no matter what.

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02.

Keep developing innovative and sustainable materials and products. Sustainability is best for the planet and our customers' wellbeing.

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03.

Carry out a complete cradle-to-cradle life cycle analysis and seek out further sustainability certifications.

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04.

Aim to use renewable energy in all factories. Currently, our Australian and Swedish factories use only renewable energy. We will start working towards the same environmental focus for our US factory too.

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05.

Look at how we can incorporate more local factories where needed as we grow the business. This not only reduces lead times for our clients, but it also reduces the emissions generated from the transportation of products and samples.

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06.

Work towards zero waste production in all facilities.

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**These are the principles that will continue to guide us everyday as we develop and operate our business. It is our aim that, beyond meeting our own goals, our actions will also help to influence the progress of sustainable design and safe living in the industry at large.**

**Let's build!**



**BAUX**

[baux.com](https://baux.com)