



# Greencode Ventures

## Annual Impact Report 2023

# Agenda

- 1. Introduction**
2. About us
3. Impact approach
4. Impact & ESG overview
5. Portfolio overview
6. Operational & Ecosystem impact
7. Outlook 2024

Appendix: PAI Indicators summary



# Leveraging green digital technologies for impact

## **Welcome!**

This is our first annual impact report. We would like to invite you to explore our thinking on impact and ESG within the green transition. Here you can dive deeper into our approach and witness the progress we have made since we set out to found Greencode Ventures in 2023. As this is our first report we are driven to grow over time and appreciate feedback on how to improve.

## **About our approach**

Greencode Ventures drives to make green the growth engine of our economy and society. Therefore we consequently engrain sustainability into our own business actions and into those of our portfolio companies.

The Green Transition is complex and urgent action is needed to transform our societies and economy. We recognize this by

- 1) looking for interconnections between impact challenges and solutions,
- 2) targeting industries with large impacts, and
- 3) focusing on solutions that can drive change fast.



# Agenda

1. Introduction
- 2. About us**
3. Impact approach
4. Impact & ESG overview
5. Portfolio overview
6. Operational & Ecosystem impact
7. Outlook 2024

Appendix PAI Indicators summary



# Venture capital for the most impactful European early-stage green transition startups

The green transition is a multi-trillion and growing investment opportunity.

Greencode Ventures addresses this opportunity with a fast scaling capital light approach.

Our sector-specific investment track, operational experience in green transition, and digital know-how are how we identify startups to pick and facilitate their growth.

Strong track record of investing in and founding the leading green transition technology startups for over 20 years.



Fund size  
€ 60-100m

Venture Capital  
Seed to series A+

Europe

Article 9  
SFDR

5/20-25 of fund's  
portfolio  
investments done

## Introduction Team

The Greencode team comprises of a mix of diverse and complementary backgrounds ranging from VC, industry and founder experience. We are female-led, are diverse in age distribution and cover 3 nationalities. The team grew to a size of 8 over the past year, split between Helsinki, Stockholm, Essen and Munich.

Ines is responsible for our impact and ESG strategy and execution, however, all team members are actively involved in all processes along the investment process.



**Terhi Vapola**  
Founder & Managing  
Partner



**Ines Bergmann-Nolting**  
Managing Partner



**Kaisa Hietala**  
Founder & Chair



**Karin Henriksson**  
Venture Partner



**Manuel Heckmann**  
Venture Partner



**Petra Koivuvaara**  
Investment Manager



**Patrik Fjällberg**  
Analyst

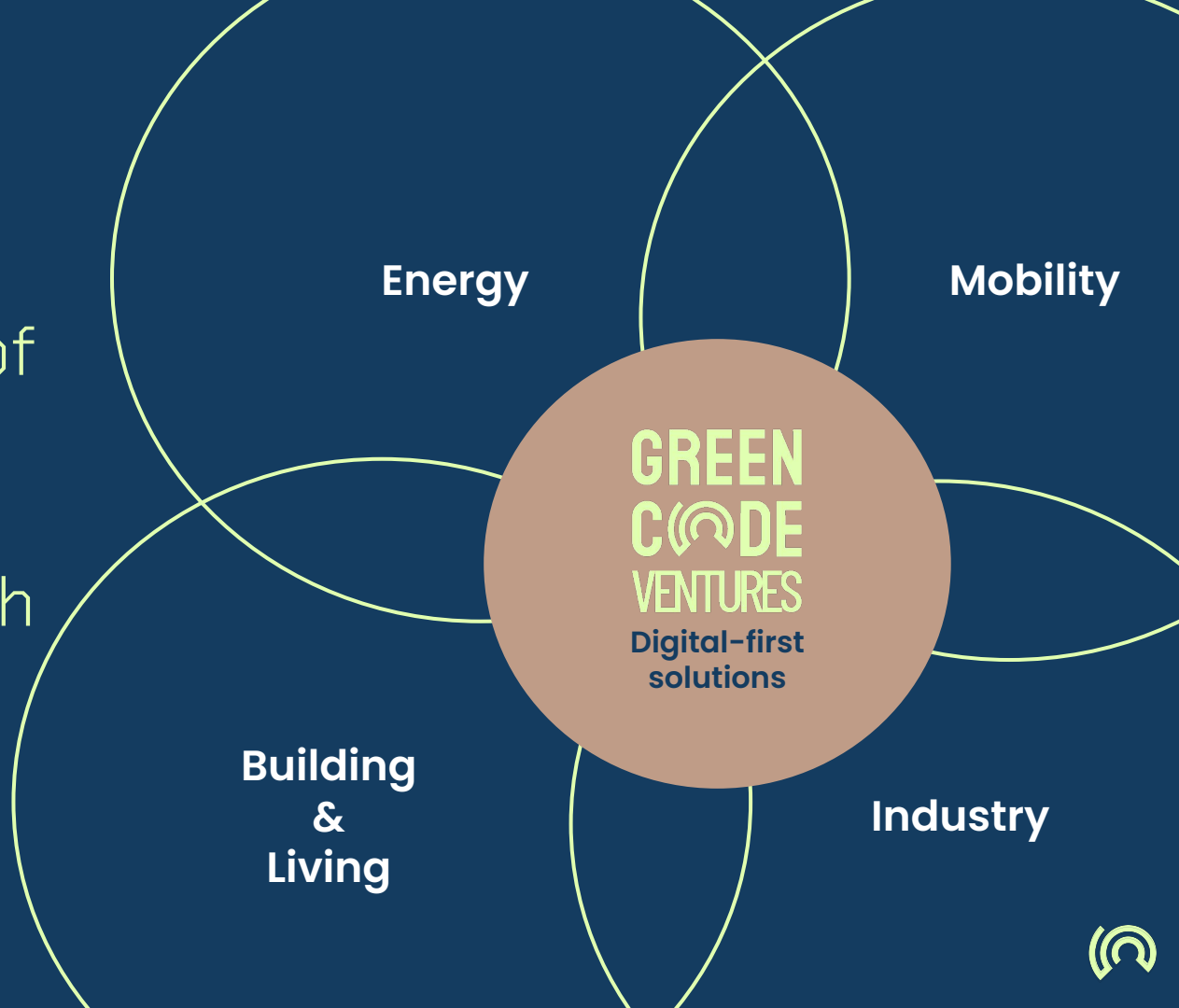


**Aleksi Päckilä**  
Analyst



Investing in  
the four themes of  
green transition  
with strongest  
impact and growth

*Digital twin, AI, ML,  
big data, cloud,  
IoT, no-code..*



# Agenda

1. Introduction
2. About us
- 3. Impact approach**
4. Impact & ESG overview
5. Portfolio overview
6. Operational & Ecosystem impact
7. Outlook 2024

Appendix: PAI Indicators summary





Greencode Ventures focuses on accelerating the green transition of our economy and society within a decade



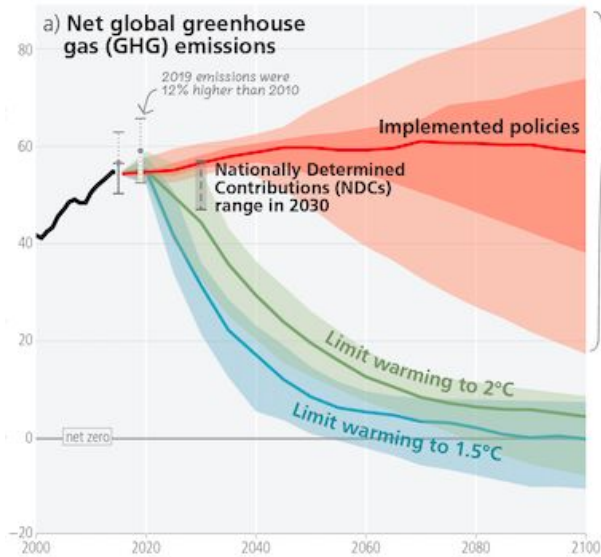
# We urgently need to allocate capital to the green transition

## We are off-track to halt global warming to 1.5 °C degrees.

Observed surface temperatures have risen to >1.1 °C warmer than in the industrial times and global annual anthropogenic GHG emissions are at 60 GtCO<sub>2</sub>e. Global warming has caused extreme climate and weather events negatively affecting nature and people, especially the most vulnerable communities.

Current policies and financing are insufficient to meet the goal of the Paris Climate Agreement and to prevent more severe impacts.

Urgent action is needed to steer the course to safer waters.



# Greencode Ventures' vision and mission

## **Vision**

Greencode Ventures envisions a future in which green will be the growth engine of our societies and all businesses will be green

## **Mission**

Greencode Ventures contributes to accelerating the green transition of our economy and society within a decade by investing in early stage digital-first (capital light and fast to scale) start-ups



# Our multi-lens impact approach recognizes the complexity and urgency of the green transition

1

## **We target the most emitting sectors.**

We focus on industries that currently have a vast environmental footprint. We believe that by transforming these systems, we unlock both large scale positive impacts and financial gains.

3

## **We embrace systems thinking.**

We recognize that environmental crises such as climate change and biodiversity loss are connected and intertwined with social challenges such as health issues caused by pollution and damage to property caused by extreme weather phenomena. We look beyond CO2e emissions when defining impact indicators and evaluating companies' ability to provide positive system-level impacts.

2

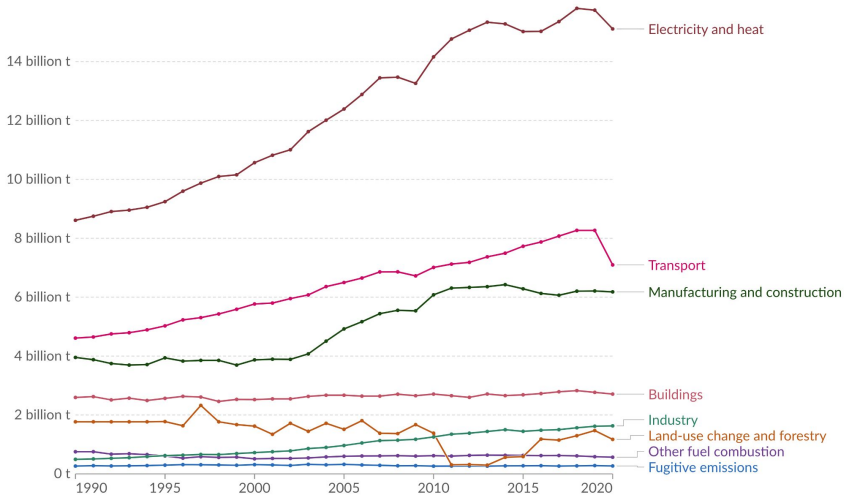
## **We focus on urgency.**

We are off-track to achieve the 2030 Agenda. As both positive and negative effects cumulate, contributions to achieving sustainability goals in the now weigh more than those in the future. We believe that scalable technologies and companies have the potential to achieve impact fast and to circle the profits to further impacts. We target companies that can materialize impacts within the next decade.



# We are focusing on green and digital transformation of the largest emitting sectors

CO<sub>2</sub> emissions by sector, World



## Energy

Energy markets  
Energy efficiency  
Energy storage

Solar & wind  
Low carbon solutions  
Smart grids

## Mobility

EV ecosystem  
Marine  
Aviation

Supply chain logistics  
Smart mobility mgmt  
Finance & insurance

## Buildings

Construction  
Smart buildings

End of life  
BEMS / HEMS

## Industry

Industry 4.0/5.0  
Circular economy

Carbon mgmt systems



# Greencode Ventures is an impact fund by nature and design

## Focusing on the net impact portfolio

- Impact through multi-lens approach (net impact ratio is positive)
- Classified as Article 9 (SFDR), UN SDG and EU Taxonomy aligned, implying ...
- ... Do No Significant Harm (DNSH) - principle applied in all investments
- ... Principal Adverse Impact indicators (PAIs) monitored in all investments

## Spearheading the ESG management

- Integration of ESG practices across the investment cycle
  - ESG screening in deal flow
  - ESG due diligence
  - ESG term sheet and agreements
  - ESG development monitored by the portfolio boards
  - ESG assessment at exit
- Annual ESG reporting



# Greencode's impact objectives

Greencode Ventures believes that it is of utmost importance to ACT NOW, achieve realistic objectives in the next few years instead of painting wishful scenarios of 25-75 years ahead. The final impact will be larger if we concentrate on and organize for the NEXT DECADE.

Fund level

**Net positive**  
within a decade

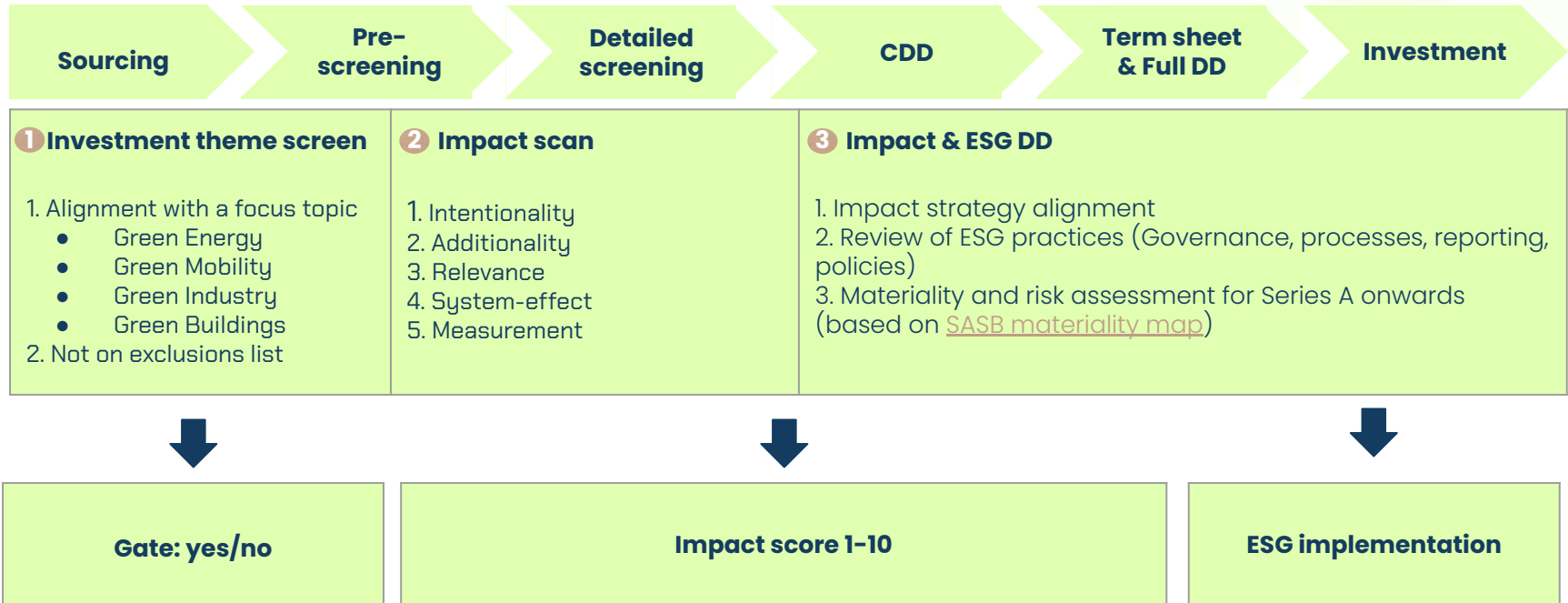
Portfolio company level

**1-3 indicators**  
unit & company  
positive  
within a decade

Recap: Instead of choosing one sustainable investment objective we have opted for a blend of environmental & societal objectives with a variety of impact indicators. This approach recognizes the complexity and urgency of the Green Transition best.

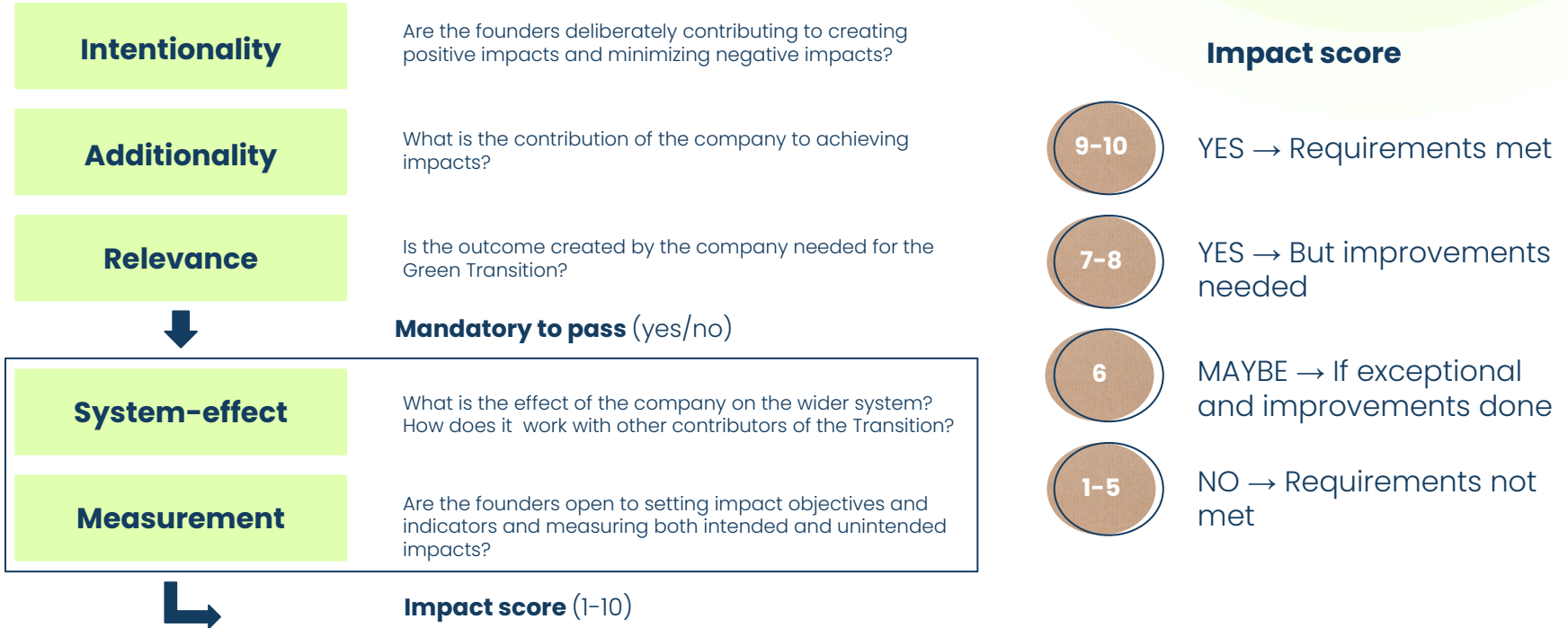


# We follow a three step impact assessment approach in our investment process

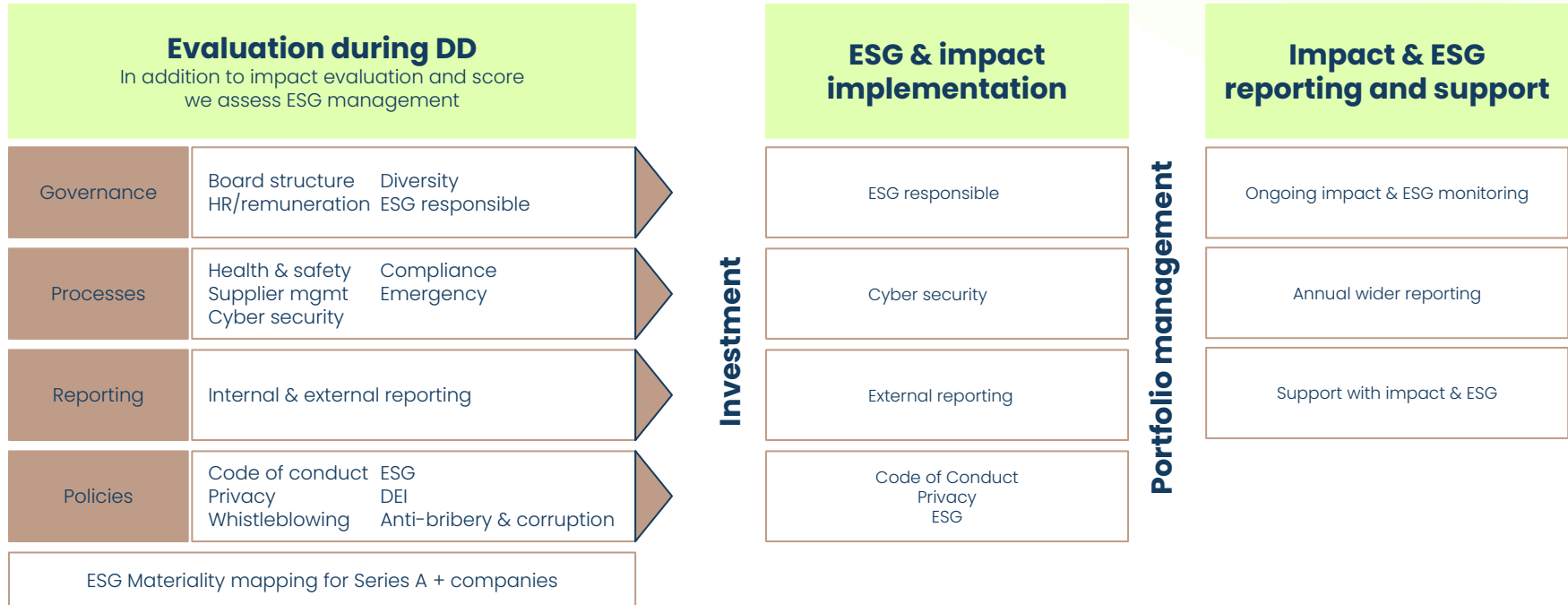




# We draw our impact score based on the system-effect and measurement of impact



# We focus on the impact management at the time of investment & portfolio management



# Our alignment with global frameworks and standards



## SFDR & Taxonomy

The EU taxonomy (2020/852) classifies economic activities according to their level of sustainability. The Sustainable Finance Disclosure Regulation (2019/2088) mandates financial market participants to disclose sustainability related information. We are classified as an Article 9 in SFDR meaning that our investments:

- Contribute to environmental and social objectives (30% of investments to be aligned with the taxonomy)
- Do no significant harm (measured by PAI indicators)
- Follow good governance practices



## UN SDGs

UN Sustainable Development goals are a blueprint for achieving peace and prosperity for people and the planet. We map the alignment of our portfolio and individual companies to the SDG goals using The Upright Project's tool.

Currently our portfolio supports:

- SDG 6: Clean water and sanitation
- SDG 7: Affordable and clean energy
- SDG 8: Decent work and economic growth
- SDG 9: Industry, innovation & infrastructure
- SDG 11: Sustainable cities and communities
- SDG 13: Climate action



## UN PRI

Principles for Responsible Investment is an independent, UN supported organization that aims to understand investments' effects on ESG factors and support investors in implementing ESG factors into their decision-making. We are a UN PRI signatory, meaning that we:

- Incorporate ESG issues into investment analysis and decision-making processes
- Are active owners and incorporate ESG issues into our ownership policies and practices.
- Seek appropriate disclosure on ESG issues by the entities in which we invest.
- Promote acceptance and implementation of the Principles within the investment industry.
- Work together to enhance our effectiveness in implementing the Principles.
- Report on our activities and progress towards implementing the Principles.



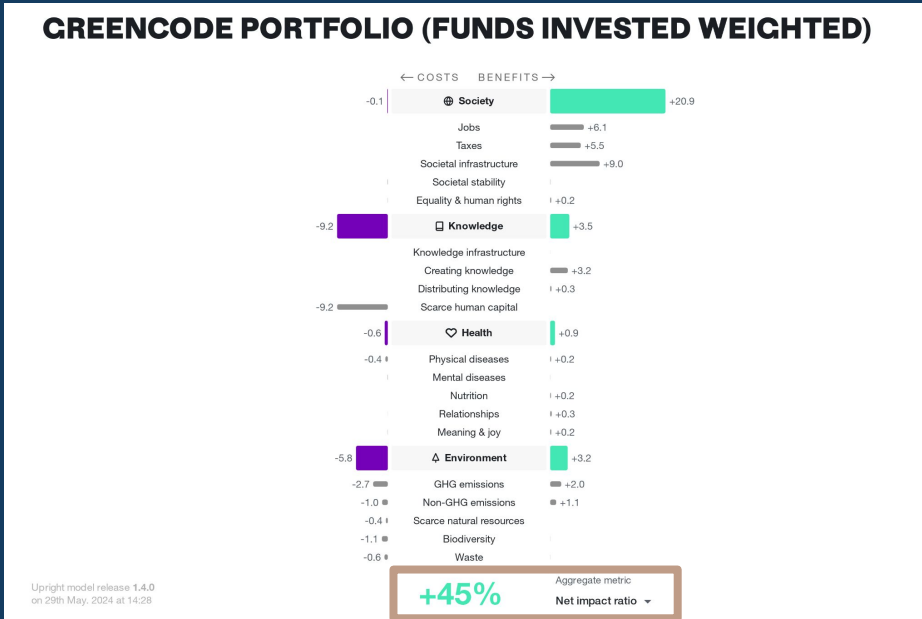
# Agenda

1. Introduction
2. About us
3. Impact approach
- 4. Impact & ESG overview**
5. Portfolio overview
6. Operational & Ecosystem impact
7. Outlook 2024

Appendix: PAI Indicators summary



# Overview of portfolio's net impact



## Net positive portfolio 2023

Net impact is the sum of a company's positive and negative impacts. Looking at net impact is important because it shows the bigger picture of the effects companies have on its stakeholders and the surrounding world instead of solely focusing on the environmental and social benefits or the costs.

Greencode defines the net impact of potential investee companies and monitors that of portfolio companies using three main data sources: portfolio company data, desktop research, and the Upright Project data.

The Upright Project divides impact into 4 categories (Society, Knowledge, Health, Environment) and 19 sub-categories, quantifying both negative and positive contributions. Upright's impact model looks at a company's impacts in relative terms, modeling them as a company's share of global impacts.

The graph illustrates the impacts our portfolio has across the categories. **For our portfolio investments made in 2023, the net impact is +45%.**

Notice: This report contains impact-related and sustainability-related indicators that are based on data produced by Upright Oy (Upright). Due to the limited availability of underlying information and the nature of the indicators, the produced information intrinsically includes some inaccuracy. Upright continuously seeks to improve the accuracy of its indicators by using the best available information and the best available statistical methods for integrating information from different sources. Upright does not warrant the accuracy of the information, and shall not be liable for any direct or indirect damages related to the information it provides. The information in this report is reproduced by permission from Upright, and may not be redistributed without permission from Upright.

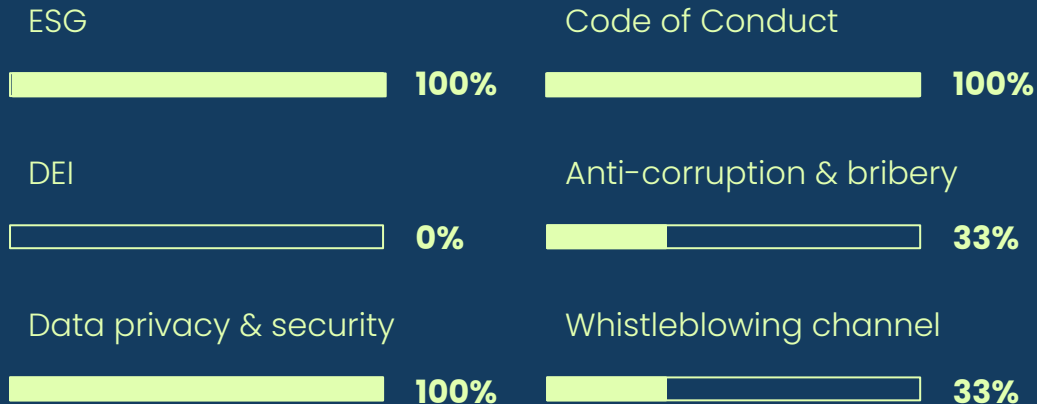


# Overview of ESG in portfolio

**100%**

**OF COMPANIES HAVE  
ESG RESPONSIBLE PERSON**

## Policies in portfolio\*



\* Data is collected directly from companies and not verified separately



# Overview of ESG in portfolio

## Portfolio carbon footprint\*

57,22 tCO<sub>2</sub>e



Scope 1 & 2:  
0.224 tCO<sub>2</sub>e

Scope 3:  
57 tCO<sub>2</sub>e

## Gender diversity in portfolio

1/3

Teams have at least one female founder

17%

Management team members are women

1/3

of Boards with women represented

23%

Employees are women

\* Data is collected from companies and where possible benchmarked using the Upright Project tool



# Agenda

1. Introduction
2. About us
3. Impact approach
4. Impact & ESG overview
- 5. Portfolio overview**
6. Operational & Ecosystem impact
7. Outlook 2024




Appendix: PAI Indicators summary





# Greencode conducted 3 investments in 2023



These companies provide digital solutions and technologies to tackle our most pressing green transition challenges.

<u>Company</u>	<u>Description</u>	<u>Segment</u>	<u>Geo- graphy</u>	<u>Date</u>
 <b>Supercritical</b>	Marketplace for carbon removal (not offsetting) pushing for technical (e.g. direct air capture) options.	<b>Sustainability: Carbon removal</b>	UK	July 23
 <b>LiveEC</b>	The leading solution provider for AI-powered satellite-based monitoring of large infrastructure networks through assessing vegetation vitality and other environmental changes. The company addresses EUDR (biodiversity loss) as next vertical.	<b>Sustainability /Energy: Infrastructure, EUDR</b>	Germany	Nov 23
 <b>FLEXECHARGE</b>	Dynamic load and energy management system for electric vehicle charging points. Provides CPOs and charging solutions providers with an open, vendor-agnostic platform to intelligently control charging loads.	<b>Mobility: EV</b>	Denmark	Dec 23



# Greencode conducted ytd. 2 investments in 2024

These companies provide digital solutions and technologies to tackle our most pressing green transition challenges.

<u>Company</u>	<u>Description</u>	<u>Segment</u>	<u>Geo- graphy</u>	<u>Date</u>
	The company is building an intuitive SaaS platform for holistic green hydrogen project assessment and management - aiming to become the digital layer of green hydrogen.	<b>Energy: Green hydrogen</b>	Sweden	Mar 24
	The company is building an EV-centric fleet management solution for commercial operators and managers of electric fleets. It is offered as B2B SaaS enterprise solution.	<b>Mobility: EV</b>	Ireland	April 24





## Carbon removal marketplace

### Company facts

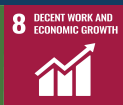
Founded 2021  
London, UK  
Invested July 2023



### Company description

Marketplace for carbon removal (not offsetting) pushing for technical (e.g. biochar, direct air capture) options. Supercritical's mission is to scale carbon removal, and be the leader in the space.

### SDGs



### EU taxonomy

Eligible but not aligned

### Impact KPIs

- Removal impact: Tonnes of CO2 removal sold

48,408



### Problem

To reach net zero and stay below 1.5°C global warming, emissions need to be reduced by 90% and 10 billion tonnes of CO2 need to be removed annually by 2050. Conventional offsets focus on not emitting new emissions, but to reach net zero, carbon needs to be removed from the atmosphere. However, currently less than 5% of offsets are carbon removal.

Carbon removal can be done by natural or technological means. Nature-based solutions – such as afforestation/reforestation, soil carbon sequestration and biochar – have a bigger risk of reversal and higher rates of decay than technological solutions.

### Solution

Supercritical is a marketplace, which allows customers to purchase multiple carbon removal methods in a single transaction. Customers provides information about their budget, number of tonnes, constraints and preferences, and SC creates a shortlist of suitable projects.

The company offers to purchase carbon removal credits, directly contributing to atmospheric carbon removal.

Carbon removal offsets are by definition less susceptible to additionality issues than traditional emissions avoidance offsets, whose quantification relies on a hypothetical 'counterfactual scenario'.





## Enterprise-ready earth observation solution for assets

### Company facts

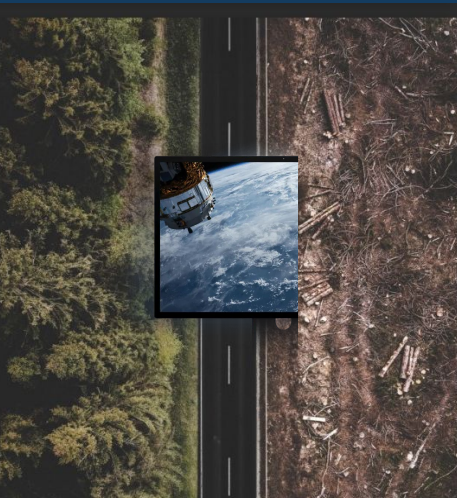
Founded 2018  
Berlin, Germany  
Invested Oct 2023



### Company description

The leading solution provider for AI-powered satellite-based monitoring of large infrastructure networks through assessing vegetation vitality and other environmental changes. The company addresses EUDR (biodiversity loss) as next vertical.

### SDGs



### EU taxonomy

Eligible but not aligned

### Impact KPIs

- System average interruption duration index
- Hectares of forest/ land monitored
- # of clients using product for ecosystem management purpose

57.2

5000000

30

### Problem

Businesses dealing in infrastructure have an impact as they

- are responsible for almost 80% of greenhouse gas emissions (UNEP) - this includes everything power, water, waste, transport, buildings
- disrupt local communities and habitats
- can be a bottleneck for transitioning to climate friendly solutions (due to investment horizons, capex intensity, etc.)

Asset management challenge is faced by TSO/DSOs, gas network and railway operators all around the world, plus their insurance companies.

Businesses dealing in forest-risk commodities have a massive impact on the planet: Deforestation alone accounts for 11% of greenhouse gas emissions (IPCC). Every year, the world continues to lose 10 million hectares of forest (FAO). Agricultural expansion is responsible for almost 90% of deforestation (FAO).

EUDR is a regulatory requirement and applies to all companies in its covered industries, needing a solution short-term. Both of these distinct solutions can be provided with a very similar product, providing efficiencies and scalability for the company.

### Solution

The Company acquires in an automated process satellite observation data for the selected geographical area, its analytics platform analyses automatically very large data sets and identifies important findings. Customer receives actionable insights as a result. In asset management cases, LiveEO generate also automatically prioritised work orders at customer organization to execute, for example, tree cutting in the field. In EUDR case, the company can provide proof that commodities are derived from not deforested lands.



## Smart charging for commercial EV infrastructure

### Company facts

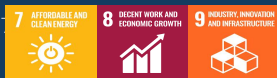
Founded 2019  
 Copenhagen, Denmark  
 Invested Dec 2023



### Company description

Providing simplified energy management and deployment as well as operation of commercial charging. The focus is on simplicity, openness and a holistic process view. Integrated with the Charger Software or using an IoT device on-site to deliver the service.

### SDGs



### EU taxonomy

Eligible and aligned

### Impact KPIs

- # of charging points under control
- % of kWh charged via FLEXeCHARGE renewable

700

42

### Problem

The mobility and transportation sector is one of the most emitting sectors. In the EU transport is responsible for about a quarter of the the total EU's greenhouse gas (GHG emissions), and causes air pollution, noise pollution and habitat fragmentation. (EEA)

The decarbonizing transport and EV-rollout requires adequate charging infrastructure. For example will the rise of EV put substantiation burdon on power grids.

### Solution

The company is providing energy and grid management services for EV charging infrastructure operators and site owners. With these services, the company is enabling a greater and wider installation and adoption of EV charging infrastructure. Load and energy management is one of the enabling blocks for decarbonization of the mobility and transportation sector. In more detail, the company can measure the renewable energy in comparison to other forms charged and is about rolling out a feature that tracks the CO2 footprint for each kWh charged by their customers.



### Company facts

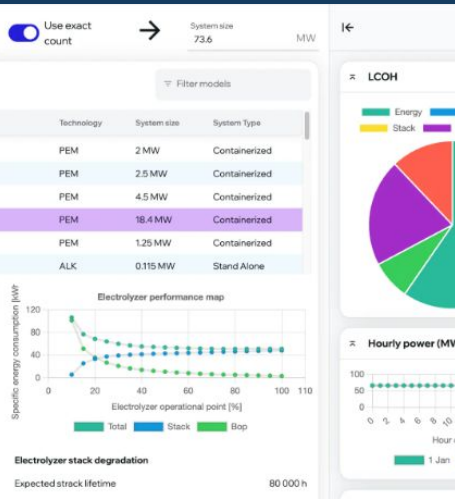
Founded 2022  
Stockholm, Sweden  
Invested April 2024



### Company description

In order to transition into the usage of green hydrogen at scale, the feasibility and profitability of new hydrogen projects needs to be assessed. The company is building an intuitive SaaS platform for holistic hydrogen project assessment and management.

### SDGs



### EU taxonomy

Not aligned

### Impact KPIs

- # green hydrogen projects assessed by Southern Lights
- size of project / amount hydrogen produced in MW

15

695

### Problem

Heavy industry makes products that are central to our modern way of life but are also responsible for nearly 40% of global carbon dioxide (CO<sub>2</sub>) emissions. Steel, cement, and chemicals are the top three emitting industries and are among the most difficult to decarbonize, owing to technical factors like the need for very high heat and process emissions of carbon dioxide, and economic factors including low-profit margins, capital intensity, long asset life, and trade exposure.

Electrification of these industries is difficult or impossible, that's where green hydrogen becomes the viable solution. The corporations of heavy industries are right now taking actions towards decarbonizing their operations, where the first step is securing a future large-scale supply of electricity and green hydrogen. (Green) hydrogen projects are complex, costly, time-consuming, and heavily regulated endeavors. The journey from initial concept to final approval for construction is a time-consuming and costly marathon.

### Solution

Southern Lights offers a B2B SaaS platform designed to transform the way energy companies approach green hydrogen. The current version of their platform helps getting green hydrogen projects planned and running. This way the company accelerates the adoption of green hydrogen. Precisely, they enable energy development companies to increase their precision and reduce their time of development for green hydrogen production projects. They democratizes the access to the required know-how to plan and conduct these projects. Consequently, this increases both the number of companies that are able to properly develop these projects and the number of projects that will be deployed.



# Agenda

1. Introduction
2. About us
3. Impact approach
4. Impact & ESG overview
5. Portfolio overview
- 6. Operational & Ecosystem impact**
7. Outlook 2024

Appendix: PAI Indicators summary



# Our operations and ecosystem engagement

## Carbon footprint

CO2e emissions:

0 tons	Scope 1
1.2 tons	Scope 2
184.0 tons	Scope 3
<b>185.2 tons</b>	Total

We measure our carbon footprint using **Plan A**. The majority of our emissions (97% are caused by business travel. We aim to continuously minimize our footprint throughout our operations and offset what we can't. We offset with our portfolio company **Supercritical** our 2023 carbon footprint.

## Diversity

% of women in:

<b>100 %</b>	Partners
<b>63 %</b>	Team
<b>100 %</b>	Board

Diversity of perspectives brings richness to our understanding and decision-making. Our female-led team of eight persons represents three nationalities and different ages and is distributed between Finland, Sweden and Germany.

## Policies

**ESG Policy**

**DEI Policy**

**Code of Conduct**

While our biggest impact comes from what kind of companies we invest in and how we support and steer the companies in our portfolio, we think it is important to lead by example. Through policies we map our status and align internally and communicate externally how we steer ourselves.

## Communities and initiatives we support

We are a UN PRI signatory and a member of the European Women in VC. In 2024 we aim to increase our interaction and contribution to the ecosystem.

Signatory of:





# Agenda

1. Introduction
2. About us
3. Impact approach
4. Impact & ESG overview
5. Portfolio overview
6. Operational & Ecosystem impact
7. **Outlook 2024**

Appendix: PAI Indicators summary



# 2024 will be about putting our impact framework to practise, improving and communicating actively

**Conduct  
reality check  
of impact &  
ESG  
framework.**

- Update, refine and add parts to impact and ESG framework which were not used, proved unrealistic or not sufficiently examined e.g. add stakeholder impact map

**Become a more  
active and vocal  
impact  
ecosystem  
participant.**

- Join 1-3 new impact / ESG oriented initiatives in Nordics and DACH market
- Publish 1-3 articles and participate in 1-3 panels on the topic

**Deep-dive on  
digital climate  
adaption tech  
helping  
mitigation.**

- Decarbonization goals are out of reach without adaptation
- Adaptation drives decarbonization so scrutinize interplay further with sector specific analysis



# GREEN CODE VENTURES

Contact us at [hello@greencode.vc](mailto:hello@greencode.vc)

## Appendix – Summary PAI Indicators 2023 (1/2)

Indicator	Metric	Impact this year	Answers collected
GHG emissions	Scope 1 GHG emissions	0 tCO <sub>2</sub> e	100%
GHG emissions	Scope 2 GHG emissions	0.00267 tCO <sub>2</sub> e	100%
GHG emissions	Scope 3 GHG emissions	3,69 tCO <sub>2</sub> e	100%
GHG emissions	Total GHG emissions	3,7 tCO <sub>2</sub> e	100%
GHG intensity of investee companies	GHG intensity of investee companies	59,01 tCO <sub>2</sub> e/€M	100%
Exposure to companies active in the fossil fuel sector	Share of investments in companies active in the fossil fuel sector	0 %	100%
Share of non-renewable energy consumption and production	Share of non-renewable energy consumption of investee companies from non-renewable energy sources compared to renewable energy sources, expressed as a percentage of total energy sources	8,79 %	100%
Energy consumption intensity per high impact climate sector	Energy consumption intensity in GWh per million EUR of revenue of investee companies, per high impact climate sector	0.000917 GWh/€M	100%
Carbon footprint	Carbon footprint	5,2 tCO <sub>2</sub> e/EURM	100%
Emissions to water	Tonnes of emissions to water generated by investee companies per million EUR invested, expressed as a weighted average	0.281 t/EURM	100%



## Appendix – Summary PAI Indicators 2023 (2/2)

Indicator	Metric	Impact this year	Answers collected
Activities negatively affecting biodiversity-sensitive areas	Share of investments in investee companies with sites/operations located in or near to biodiversity-sensitive areas where activities of those investee companies negatively affect those areas	0 %	100%
Hazardous waste and radioactive waste ratio	Tonnes of hazardous waste & radioactive waste generated by investee companies per million EUR invested, expressed as a weighted average	0 t/EURM	100%
Board gender diversity	Average ratio of female board members in investee companies, expressed as a percentage of all board members	6,89 %	100%
Unadjusted gender pay gap	Average unadjusted gender pay gap of investee companies	7,69 %	100%
Exposure to controversial weapons	Share of investments in investee companies involved in the manufacture or selling of controversial weapons	0 %	100%
Violations of UN Global Compact principles and Organisation for Economic Cooperation and Development (OECD) Guidelines for Multinational	Share of investments in investee companies that have been involved in violations of the UNGC principles or OECD Guidelines for Multinational Enterprises	0 %	100%
Lack of processes and compliance mechanisms to monitor compliance with UN Global Compact principles and OECD Guidelines for Multinationals	Share of investments in investee companies without policies to monitor compliance with the UNGC principles or OECD Guidelines for Multinational Enterprises	29,68 %	100%
Water usage and recycling	Average amount of water consumed by the investee companies (in cubic meters) per million EUR of revenue of investee companies	59,2 m3/€M	100%

