



RKD

SUSTAINABILITY CHARTER



Introduction

RKD’s Better Buildings for The Future initiative is a programme developed to ensure that our practice and projects create places for people to thrive, now and in the future, through sustainable design and delivery. It focuses on optimizing building performance to pro-actively address the global climate and biodiversity emergency, failures in responsible resource management, and ensure quality design to protect human health and wellbeing.


RKD is already a leader in the design and delivery of sustainable buildings. Over the past 10 years we have delivered more than 200,000 sq m of commercial office, industrial facilities, 3rd level faculty buildings and data centres with sustainable building certification. We are now committed to continuing this leadership by scaling up and ensuring all our projects are designed, delivered and evaluated to ensure their performance meet the challenges ahead of us.

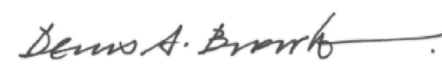
In alignment with intergovernmental policies such as the UN Sustainable Development Goals, the EU Green Deal, EU Taxonomy and EU associated performance framework for buildings Level(s), RKD has developed Better Buildings For The Future to ensure our contribution to the continuing and growing wellbeing of society, without compromising the natural environment we rely upon to survive.


This charter outlines RKD’s commitment, as part of this programme, to combine leadership in sustainability with high quality architecture and urban design to create long-term values for our clients, for us, for society and for the planet.


The commitment formulates our ESG Policy and the necessary changes we see for our practice operations and our projects to achieve key principles of what we believe will contribute to ‘Better Buildings For The Future’.

This charter was adopted in January 2022 and will be reviewed and published every year for full transparency of our progress.


David Browne


Denis Brereton


David Petherbridge


Ronan Smith

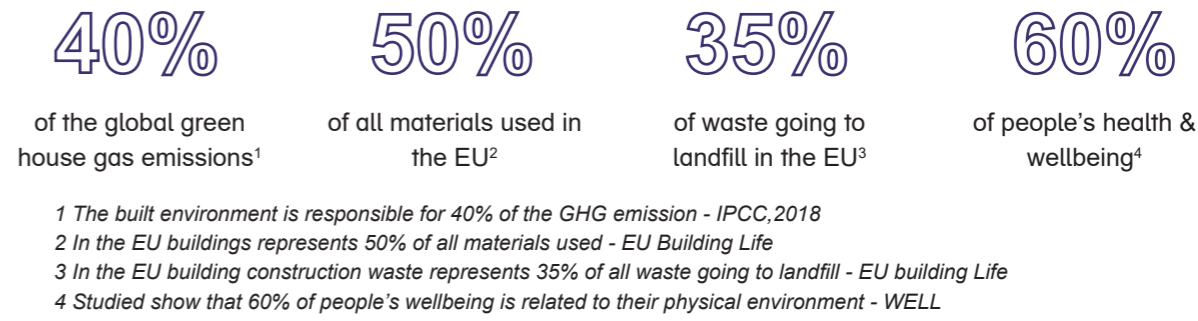

Ger Dunne


Derek Heavey


Vicky Landy


Harry Browne

The built environment is currently responsible for:



Acknowledging our scale of impact, using carbon footprint as example:



Key Principles for Better Buildings

CIRCULAR & EFFICIENT RESOURCES

Design for a circular economy with efficient and responsible use of resources including existing buildings, materials, water and land.

Indicators: Land use, space efficiency, re-used/re-purposed content, renewable materials, recycled content, future re-usability, potable water use, waste elimination, productive landscapes.

Targets: RIAI 2030 Challenge and LEED/BREEAM/HPI as guidance.

PEOPLE & PLACES

Ensure practice and places for people that are supportive, inclusive and attractive to enhance individual and social wellbeing, and community identity.

Indicators: Community/user engagement and satisfaction of attractiveness, inclusiveness and safety, universal design, contribution to place, access to amenities.

Targets: BREEAM/LEED/WELL/HPI Community. Use best practice Universal Design and RIBA Social Value Toolkit as guidance.

HEALTH & WELLBEING

Create environments that contributes to physical and psychological wellbeing for everyone, now and in the future.

Indicators: Daylight factor, views, thermal comfort, indoor air quality, biophilia, activation, noise, hygiene measures

Targets: RIAI 2030 Challenge and BREEAM/LEED/WELL/HPI for guidance.

WHOLE-LIFE CARBON

Apply strategies to eliminate greenhouse gas emissions in a building's life-cycle, addressing both operational and embodied carbon.

Indicators: Energy use, operational and embodied carbon.

Targets: Passivhaus, RIAI 2030 Challenge use Level(s), LETI and RICS as guidance.

ENHANCED ECOSYSTEMS

Apply landscape and ecological design with the aim to reduce energy consumption and pollution, improve wellbeing, promote biodiversity and provide crucial habitat for wildlife.

Indicators: Conservation, additions, permeable surfaces and green area ratio.

Targets: Use BREEAM/LEED/HPI as guidance.

PERFORMANCE & DELIVERY

Ensure proactive measures to optimise building performance including a formal iterative design process, whole-life analysis, in-use performance and future resilience/adaptability.

Indicators: Level of performance analysis, iterative design process, LCA, LCC, hand-over strategy, post-occupancy evaluation.

Targets: RIAI 2030 Challenge and Level(s) as guidance.





People & Places



The Connelly Quarter's urban form allows for a range of pedestrian connections into and through the site

How?

- Include strategy for community/end-user engagement to influence design and establish long-term goals of the development.
- Include strategy for placemaking that support wellbeing, local cultures, identity and pride.
- Include strategy for accessibility, affordability, proximity to local amenities and transport.
- Include strategy to support local economy
- Include strategy for mixed-use principles and flexibility for future needs
- Include strategy to apply principles of 'the human scale' and necessary infrastructure for universal design and different user groups with different needs
- Set targets for community/end-user workshops, % amenity space, % satisfied end-users



Health & Wellbeing



AIB Virtual Campus has CO2 monitoring in meeting rooms and incorporates biophilia into it's design

How?

- Include strategy for healthy design - strategic programme, shallow floor plans, access to views and daylight, healthy materials passport
- Determine targets for daylight factor, indoor air quality (CO2, NOx, VOC etc), thermal comfort range, % of views, biophilic design, acoustics, active design and hygiene.
- Include strategy for iterative design and performance analysis of daylight, ventilation and thermal comfort from start of project
- Include strategy for project resilience to existing and future hazards including impact of climate change over the buildings life-cycle
- Include strategy for appropriate construction and in-use behaviour to prevent future health hazards
- Include strategy for user control and in-use smart technology of targets



Whole-Life Carbon



Shelbourne Road was designed to reduce energy with 40% compared to baseline.

How?

- Include strategy for passive design - form factor, orientation, glazing ratio, shading, floor plans, strategic programme, thermal envelope.
- Include strategy for low-embodied carbon construction incl. re-use of building and materials
- Determine targets for energy use, operational carbon, embodied carbon, renewable energy and LCA based on LETI/RIAI 2030 Challenge.
- Include strategy for iterative design and performance analysis of energy use, operational carbon and embodied carbon.
- Include strategy to avoid thermal bridges, as design and in construction
- Include strategy for hand-over to avoid performance gap in-use
- Include strategy for smart technology to adjust operational energy use



Circular & Efficient Resources



UCD Sciences have been extended multiple times making optimal use of the existing structure.

How?

- Include strategy for circular design - prioritise re-use of existing land/building/elements/materials and future re-use potential, closed water loop and opportunity for integrated circular system of food, energy and water.
- Include strategy for efficient land-use - density, mixed-use and sustainable transport options
- Include strategy to design out waste - design in layers, modular/prefabricated construction, materials passport
- Set targets for % re-used materials, % recycled materials/content, % future re-usability/recycling, % recycled water, % local production.
- Include strategy for responsible sourcing of materials that prevent resource depletion, are local, suitable for life-span and ethically sourced.



Enhanced Ecosystems



UCD Centre for Future Learning includes an extensive green roof and stormwater retention strategies.

How?

- Include strategy to improve local ecosystem - appropriate site selection, nature conservation, landscaping, native species and wildlife habitat
- Include strategy to design with nature - vegetation as acoustic buffer, shading to improve energy performance, reduce urban heat island effect, prevent flooding, increase wellbeing and promote active design
- Set targets for green area ratio, inclusion of wildlife habitats, % permeable surfaces, % storm water diversion, % productive landscapes
- Include strategy to connect blue and green corridors in local context
- Include strategy for future resilience to climate change



Performance & Delivery



Dublin Central utilised OneClick LCA to drive the design from an early stage

How?

- Host workshop with client and project team to discuss benefits of BBFF
- Utilise Better Buildings Work Stage Checklist to set targets for actions to ensure an integrated design process
- Include strategy for all performance analysis to be conducted throughout the project
- Include strategy for Life-Cycle Costing from beginning of design
- Include strategy for soft-landings hand-over strategy
- Include strategy for Post-Occupancy Evaluation
- Include strategy for reporting of performance outcomes as designed, as constructed and in-use - compare to RIAI 2030 and best practice

Better Buildings For The Future

Our Company:

For our company, the programme provides a roadmap to stay ahead of forthcoming trends and regulations regarding building design and performance, so that we can continue to offer the best service to our clients. Our key principles are aligned to best practice green building certification schemes (including GRESB) and the EU framework Level(s), which was created to harmonize sustainability building performance indicators across Europe as part of the EU Green Deal and EU Taxonomy. Our commitment also includes ensuring that the buildings we inhabit live up to our project ambitions, providing our employees with healthy and sustainable places to work.

Our Clients:

For our clients, RKD's Better Buildings for The Future programme will result in greater value for money. Integration and tracking of key principles from the outset of projects will increase potential for higher performing buildings with short return of investments. Higher performing buildings will result in increased asset value and reduced operational costs. It will also assist clients to achieve their ESG targets and attract investment focused on measurable and sustainable, performance of projects and portfolios across their entire life-cycle.

Our Communities

Our commitment to the Better Buildings for The Future programme will ensure evidence-based decisions are made to; 1) protect the health and wellbeing of individuals and society now and in the future, 2) that our projects are ethical, contributes to local economies and allow communities to thrive, 3) increase focus on the physical and psychological wellbeing of our own practice and project end-users to contribute to a healthy and productive society.

Our Planet

The goals of Better Buildings for The Future are aligned to ensure we play our role in preventing devastating climate change, resource depletion and biodiversity loss. This involves; 1) a step-up change to deliver carbon neutral buildings that are part of a circular economy 2) working towards restoring nature with our projects and 3) increase our focus on appropriate materials use and construction to prevent resource depletion and pollution.

Our Commitment for 2025

Practice

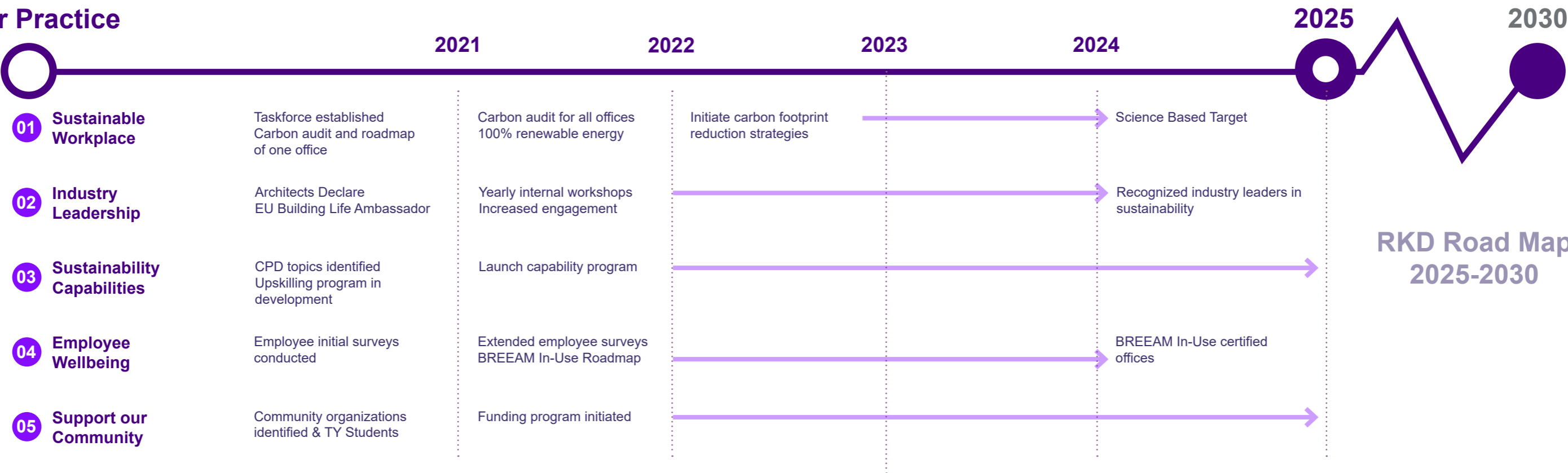
- 01 Achieve **Sustainable Workplace's** for all our offices and certify with Science Based Target
- 02 Show **Industry Leadership** - manage our ESG policies, contribute to cross-industry research, initiatives and lobbying in the field of sustainability.
- 03 **Enhance Sustainability Capabilities** - by supporting our staff to upskill in best practice sustainable design and delivery.
- 04 **Ensure employee wellbeing** - by conducting yearly workplace surveys, upgrade our practice and operations, and ensuring fair opportunities are given to new and existing staff.
- 05 **Support our community** - by contributing and raising funds for community initiatives and provide local work-opportunities.

Projects

- 01 **Drive ambition** of clients and project teams with workshops, client briefings and by setting sustainability targets above min. requirements for all projects
- 02 **Use tools to ensure optimised performance** - all projects to follow RKD sustainability work stage checklist and produce performance optimisation report at end of RKD Stage 2.
- 03 Provide **life-cycle design services** - all projects to conduct LCA, include proposals for end-of life use and consider future climate in 2030 and 2050.
- 04 Conduct **Post-Occupancy Evaluation** - min. 50% of projects to have a post-occupancy evaluation report based on Level(s) indicators and user-experience.
- 05 **Track and benchmark project performance** - align project portfolio average from 2020 to RIAI 2030 challenge.

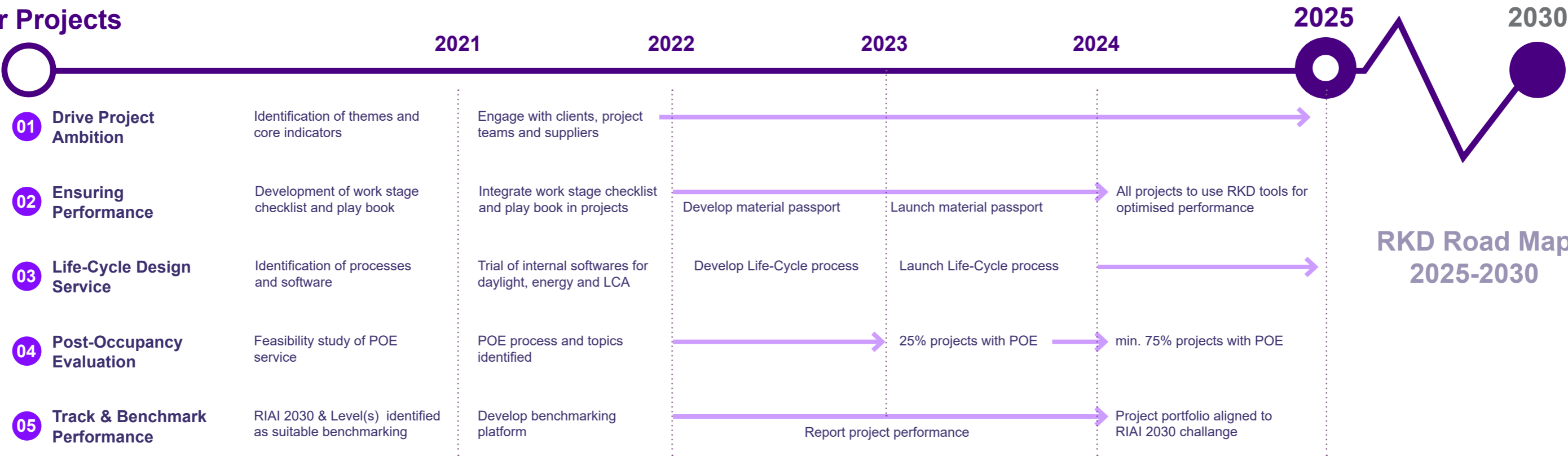
RKD Road Map 2021-2025

Our Practice



RKD Road Map 2025-2030

Our Projects



RKD Road Map 2025-2030

Commitment Indicators:

The following is a detailed list of RKD’s commitments for 2025 and indicators which we will use to track our progress. These tables will be reviewed on a yearly basis and made public to ensure full transparency. 2019 has been used as a baseline year due to the unusual circumstances of 2020 and 2021.

ESG Criteria	Practice Commitments	KPI	2019 Baseline	Target			
				2022	2023	2024	2025
Sustainable Workplace							
E	Become a certified Science Based Target practice for the 1.5°C goal of the Paris Agreement	Achievement	Not attempted	Initiate roadmap	Develop roadmap	Start application	Achieved
E	Reduce office heating and cooling related GHG emissions	% reduction from baseline	644,3kg Co2e/ staff	15%	50%	50%	50%
E	Procurement of renewable energy for all RKD offices	% of office energy supply	30%	100%	100%	100%	100%
E	Reduce GHG emissions from business commute	% reduction	817,85 kg Co2e/ staff	10%	20%	30%	40%
E	Reduce GHG emissions from business travel	% reduction	668 kg Co2e/staff	20%	20%	20%	20%
E	Procurement of energy efficient office equipment (when replacement is required)	% of new equipment with A-rating	-	100%	100%	100%	100%
E	Office water efficiency	l/day/person	-	8l/day/ person	6l/day/ person	6l/day/ person	6l/day/ person
E	Paper waste reduction	% reduction	-	50%	75%	100%	100%
E	Office waste reduction	% reduction	-	50%	50%	50%	50%
E	Promote office biodiversity	Actions taken	-	1	2	3	4
E	Offset workplace related GHG emissions with verified local scheme	% of office emissions offset	-	100%	100%	100%	100%
Sustainability Capabilities							
G & E	Sustainability Charter / ESG Policy induction to new staff	% of new staff receiving induction	0%	100%	100%	100%	100%
E, S & G	Sustainability upskilling programme part of employee CPD hours (LCA, LCC, circular construction, passivhaus, Sefaira & OneClick	% of staff receiving upskilling	0%	25%	50%	75%	100%
S & G	Mentorship programme for employees wishing to upskill in green building certification programmes or further education in sustainable design and delivery	% of interested staff with mentor	100%	100%	100%	100%	100%

Commitment Indicators:

ESG Criteria	Practice Commitments	KPI	2019 Baseline	Target			
				2022	2023	2024	2025
Industry Leadership							
G	Contribution to cross-industry initiatives and lobbying in the field of sustainability (Building Life, Architects Declare etc)	Number of initiatives contributed to	2	3	4	5	6
G	Research on sustainability innovations for our different sectors	Number of research reports produced/year	1	2	4	4	4
G	Industry recognition of contribution to field of sustainable architecture	Number of awards won	0	1	2	3	4
G	Yearly internal workshop on sustainability and review of targets in Sustainability Charter / ESG Policy document	Achieved	No	Yes	Yes	Yes	Yes
G	Yearly review and recertification of ISO9001 - Quality Management System	Achieved	Yes	Yes	Yes	Yes	Yes
G	Yearly review and recertification of ISO14001 / ISO5001 - Environmental Management Systems	Achieved	No	Yes	Yes	Yes	Yes
G	Yearly review and recertification of ISO18001 - Healthy & Safety Management System	Achieved	No	Yes	Yes	Yes	Yes
G&S	Yearly review of RKD Anti-Slavery Policy	Achieved	No	Yes	Yes	Yes	Yes
Employee Wellbeing							
S	Yearly survey on employee satisfaction with workplace	% satisfaction rate	-	75%	80%	100%	100%
S & E	BREEAM In-Use Excellent Certification of offices	nr of offices certified	0	0	1	3	4
S	All employees to receive fair pay benchmarked against industry	% of employees	100%	100%	100%	100%	100%
S	Community Immunisation Programme	% of employees offered	100%	100%	100%	100%	100%
S & G	Yearly review of RKD Employment Equality Policy	Achieved	No	Yes	Yes	Yes	Yes
S & G	Yearly review of RKD Bullying and Harassment Prevention Policy	Achieved	No	Yes	Yes	Yes	Yes
Support Our Community							
S & G	Encourage employees to get involved in community projects (such as Shoebox Appeal, IAF Open House, Architects in Schools, Peter McVerry Trust etc)	% of employees participating	-	50%	60%	80%	100%
S	Raise funds for community projects (Chester House, Hospice, Christmas donations)	Donations given	€93K	min. €25K	min. €25K	min. €25K	min. €25K
S	Continue to offer TY Programme to support youth engagement in the profession	Number of students	30	35	40	45	50

Commitment Indicators:

Project Commitments	KPI	Target		
		2019	2023	2025
Drive Ambition				
All clients to be introduced to RKD's sustainability charter	% of clients	-	75%	100%
All projects to host internal sustainability workshop in beginning of RKD Stage 1	% of projects	-	50%	100%
All projects to host project team sustainability workshop by end of RKD Stage 1	% of projects	-	50%	100%
All projects to have targets for each RKD Better Buildings themes by end of RKD Stage 1	% of projects	-	50%	100%
Ensure optimal performance				
All project to use RKD Sustainability Work Stage Toolkit	% of projects	-	50%	100%
All projects to report design options with analysis of energy, embodied carbon and daylight by end of RKD Stage 1	% of projects	-	50%	100%
All projects to use RKD material passport	% of projects	-	25%	75%
All projects to produce sustainable performance optimisation report at end of RKD Stage 2	% of projects	-	50%	100%
All projects to have a hand-over strategy including workshop with end-users	% of projects	-	50%	100%
Life-Cycle Design				
All projects to analyse/report on benefit of retrofit/re-use of existing buildings if the site allows	% of projects	-	75%	100%
All projects to have a proposal for end-of life use as part of performance optimisation report at end of RKD Stage 2	% of projects	-	50%	100%
All projects to have a Life-Cycle Assessment	% of projects	-	50%	100%
All projects to analyse future impact of climate change and technological advances (2050) as part of performance optimisation report at end of RKD Stage 2	% of projects	-	50%	100%

Commitment Indicators:

Project Commitments	KPI	Target		
		2019	2023	2025
Post-Occupancy Evaluation				
All projects to have POE covering Level(s) indicators	% of projects	-	25%	50%
All projects to have POE covering end-user experience	% of projects	-	25%	50%
All projects to have POE covering project team experience	% of projects	-	25%	50%
Track & Benchmark Performance				
All projects POE outcomes to be logged on RKD benchmarking platform	% of projects	-	25%	50%
All projects to be aligned to RIAI 2030 targets	% of projects	-	25%	50%
All projects to report 'lessons learnt' on sustainable performance	% of projects	-	50%	100%

List of Acronyms & References

Building Research Establishment Environmental Assessment Method (BREEAM)

The first established method of assessing, rating, and certifying the sustainability of buildings. Focuses on a sustainable value across a range of categories - energy, land use and ecology, water, health & wellbeing, pollution, transport, materials, waste and management. Applicable to new buildings, interiors, renovations, in-use monitoring and masterplan developments. Credits are awarded for early consideration of performance

EU Green Deal

Policy package set up by the European Commission, adhering to the Paris Agreement, to make the European Union a circular economy and carbon neutral by 2050. Intermediate goal to reduce net green house gas emissions by at least 55% from 1990's levels by 2030. Adopted in December 2019, a strong focus on achieving the targets is aimed at the construction sector.

EU Taxonomy

A sustainable finance taxonomy part of EU Green Deal to set performance thresholds for economic activities which make a substantive contribution to one of six environmental objectives: Climate change mitigation, climate change adaptation, sustainable and protection of water and marine resources, transition to a circular economy, pollution prevention and control, protection and restoration of biodiversity and ecosystems. All european investment to disclose the impact of their economic activity. Outlines criteria for investment in the build environment.

GRESB Real Estate Benchmark

Assessment framework for global benchmarks on Environmental, Social, Governance (ESG) providing standardised and validated data to the capital markets. Updated every year to respond to industry requirements (such as the adopted EU Sustainable Finance Disclosure Policy, March 2021). Covers company management, asset performance and development improvements in a broad range of sustainability indicators aligned to UN SDG's and other common standards.

Leadership in energy & Environmental Design (LEED)

Developed by the US Green Building Council (USGBC). It comprises of a set of rating systems for the design, construction, operation, and maintenance of buildings. Topics covered are location and transportation, sustainable sites, water efficiency, energy and atmosphere, materials and resources, indoor environmental quality, innovation, and regional priority.

Level(s)

European framework for sustainable building performance. Outlines a common approach to be used throughout the European Union to assess and report on the sustainability of a building. The Level(s) framework covers 6 macro-objectives:

- Greenhouse gas emissions along a building's life cycle
- Resource efficient and circular material life cycles
- Efficient use of water resources
- Healthy & comfortable spaces
- Adaptation and resilience to climate change
- Optimised life cycle cost and value

Life-Cycle Assessment (LCA)

A life cycle assessment is a cradle-to-grave or cradle-to-cradle analysis technique to assess environmental impacts associated with all the stages of a product's life, which is from raw material extraction through materials processing, manufacture, distribution, use and end-of life.

London Energy Transformation Initiative (LETI)

Organization based in London working towards making the city and the rest of the UK carbon neutral by 2030. In early 2020 they published a Climate Emergency Design Guide and Embodied Carbon Primer for built environment professionals. The documents provide tangible goals for project teams to achieve carbon neutral projects and methodologies to conduct standardised calculations of whole-life carbon.

RIAI 2030 Challenge

A set of tangible metrics for operational energy, embodied carbon, water use and health indicators with industry benchmarks for 2020, 2025 and 2030 with the aim to achieve carbon neutral and healthy environments.

Science Based Target

The SBTi is a partnership between Carbon Disclosure Project, the United Nations Global Compact, World Resources Institute (WRI) and the World Wide Fund for Nature (WWF). It provides a scientific approach for companies to set net-zero targets for their operations.

UN Sustainable Development Goals

The UN sustainability development goals (SDG's) are 17 interlinked goals, developed by the United Nations in 2015 and adopted by all 193 member states. The goals cover social, economic and environmental factors and each have a set of targets with specific indicators. In total there are 232 indicators measuring compliance to achieving a sustainable future for all people by the year 2030. The Paris Agreement is one of the goals of the UN SDG's.

WELL Building Standard

World's first building certification that only focus on human health and wellbeing. Standards rooted in 7 years of research by global experts on how the built environment can improve human wellbeing. Encapsulate physical environment and company policies in the areas of; air, water, nourishment, light, movement, thermal comfort, sound, materials, mind and community. Applies to new and existing interiors, buildings and masterplans

World Green Building Council

A non-profit organisation with national councils in over 70 countries across the world. Its main goal is to ensure that the construction industry and the built environment plays its part in reaching the Paris Agreement and contributes to healthy places for people. Develops yearly reports with useful frameworks for the industry to focus on – 2020 saw the report of 'whole-life carbon' and bringing embodied carbon upfront to address the climate emergency.



This charter was adopted in January 2022 and will be reviewed and updated yearly to ensure relevance of targets and tracking of Key Performance Indicators

The commitments will be evaluated based on:

1. Targets achieved
2. Targets on schedule

RKD