



# **VGP Environmental Management Systems**

[www.vgpparks.eu](http://www.vgpparks.eu)



# Introduction

Version 2.2 / 14 July 2022

**As a pan-European developer of new real estate as well as manager and owner of operating logistics and semi-industrial real estate our environmental strategy is based on two complementary Environmental Management Systems (EMS).**

EMS reduce the impact of our assets at every stage in their life cycle, from initial design through to daily operation. VGP's EMS (ISO 14001)<sup>1</sup> for sustainable design and construction is called the "Sustainable Design Framework", while our EMS for sustainable management of operations is known as the "Sustainable Management Framework". Best practices from the Sustainable Design Framework are leveraged to improve the Sustainable Management Framework and vice versa.

1. Not externally audited



These two complementary EMSs help the Group to:

- deliver sustainable and flexible projects with the high “BREEAM” or “DGNB” certification levels;
- secure licenses and permits to operate the Group’s development projects (new developments and adaptations);
- ensure that managed assets are operated efficiently from a sustainable development and economic point of view;
- develop environmental awareness and create a positive trend amongst employees involved in the design, development and management of the Group’s assets;
- ensure a high level of transparency and security to the Group’s shareholders and investors.

The Group has defined and monitors several indicators to manage the environmental performance of its standing assets and development projects, in line with the objectives of its **ESG strategy**. Some of these objectives are incorporated into the budget and year-end manager and employee performance review processes to ensure that they are managed efficiently.

VGP relies on external environmental certifications to validate the environmental performance of its assets. The Group deploys an active certification policy for both greenfield/brownfield projects and standing assets based on its two in-house environmental management systems. This serves as evidence to the Group’s stakeholders that the buildings as well as their responsible management processes respect unilaterally high environmental standards available.

## SUSTAINABLE DESIGN FRAMEWORK

The Sustainable Design Framework – an EMS for development projects – ensures that all development projects, whatever their size or user-type (e-commerce, cooling storage, logistics or light-industrial/manufacturing), are designed in the most sustainable way in the long-term in order to minimize their environmental impact. It also ensures that all building projects obtain an environmental certification (BREEAM or DGNB) in-line with the Group’s targets: at a minimum, the BREEAM “Very Good” or DGNB “Gold” certification for both greenfield as well as brownfield projects.

For each project, the Sustainable Design Framework covers all four stages in the development process and involves several departments (land acquisition/commercial, technical and project management department, legal and compliance, and, sustainable certification/audit:

- land acquisition due diligence: sustainability and risks related to climate change are analysed and evaluated during the Group’s due diligence process and if required for valuation purposes a full stand-alone climate risk analysis is conducted (for e.g. EU Taxonomy);
- project reviews: at the design stage, each project is assessed using the Group’s in-house guidelines, the “VGP Building Standard” to ensure the optimization of the building and to prepare for its environmental certification (BREEAM or DGNB). In addition, a Life Cycle Assessment is occasionally conducted on projects, right from the design phase, to identify levers for reducing their carbon footprint;
- construction: in many cases VGP acts as its own general contractor, in other cases the general contractor typically agrees to abide by the Group’s Code of Conduct and VGP’s Considerate Construction Charter;
- commissioning: a commissioning process is followed to ensure that building’s technical installations perform efficiently (settings and operating instructions), and that VGP Facility Management is properly equipped and trained if needed to take over the day-to-day management of the site





## **PROJECT DESIGN AND REVIEW STAGE**

The Group's "VGP Building Standard" is being applied to all greenfield/brownfield development projects. This Standard's alignment with the BREEAM/DGNB certification requirements ensures that the Group's projects, irrespective of the type of end-user, will be designed to ensure the highest attractiveness, flexibility and to be sustainable, with low energy intensity and reduced GHG emissions.

"VGP Building Standard" requirements for new developments include:

- close attention to structural elements that can affect energy requirements and the carbon footprint of a building (e.g. orientation, prevailing winds, shell composition);
- architectural design that maximizes natural lighting while minimizing solar heat;
- the use of natural ventilation and integrated systems to produce renewable energy when appropriate (e.g. geothermal energy to cool and heat);
- energy efficient equipment based on an integrated design, coupled with an effective energy management system that optimizes energy use and efficiency in operating technical equipment.

The "VGP Building Standard" is regularly updated taking into account new studies, technologies and operational feedback from standing assets across the Group. New studies have been and are being conducted to enrich the "VGP Building Standard" with innovative solutions such as geothermal systems, lighting and materials usage.

## Reducing carbon footprint from the construction of new development projects

VGP is analyzing the carbon emissions resulting from construction. Defining a carbon cutting pathway will be specified and fine-tuned in 2022 thanks to the carbon footprint measures in progress and pilot projects identified.

The main levers of this low-carbon construction strategy are the following:

- a “lean building” approach applied from early design phase in close cooperation with our tenants: using reduced-CO<sub>2</sub> materials through optimized design and layout decisions: structure, facilities and equipment, facades, parking spaces, etc.;
- using new solutions for construction projects and choosing alternative, low carbon materials: use of low-carbon concrete and cement, wood, recycled materials, etc. including the selection of suppliers or products on the basis of their place of operation or manufacturing (taking into account the country’s energy mix);
- developing targeted partnerships with construction firms and manufacturers of building materials for the implementation of innovative solutions.

This approach now involves measuring the carbon footprint of our entire project development activities across the life-cycle, through a life-cycle analysis (LCA), starting from the design phase, and with new key indicators of carbon performance within investment decisions with the aim to ultimately optimize the LCA footprint of the entire portfolio and at project specific level.

This comprehensive approach to assessing projects throughout their entire life cycle (construction and operation) supports the policy of reducing the carbon footprint of the Group’s projects and helps making the best construction, technical and

energy choices through a multi-criteria approach (capital expenditures, costs, carbon emissions in construction and in operation, aesthetics and sustainability).

It is an approach that is especially needed for in-situ renewable energy projects and, more broadly, for any energy efficiency solution. It is important to make sure that the carbon emissions avoided in the operation phase are not offset by a larger carbon footprint for the construction phase.

## Water and waste

The Group’s development projects are built in line with the “VGP Building Standard”, the Considerate Construction Charter and BREEAM or DGNB certification water and waste management requirements. In particular, these recommendations include:

- good practice and clear technical steps on how to achieve water efficiency right from the design stage, in particular, in the choice of equipment installed (toilets, urinals, fire extinguishers, sprinkler systems, cooling systems, etc.);
- the production of waste management plans and project-specific reduction/reuse/recycling facilities are considered good practice in how to achieve waste efficiency;
- waste recycling targets and financial incentives are typically used for construction contractors;
- The goal is for the charter to be adhered to at our construction sites. It should be noted that VGP works with large, reputable construction firms, which also apply their own certified construction and demolition waste management schemes.

## **Pollution and environmental risk management**

The Group complies with all applicable environmental legislation across all its activities. The Group's acquisitions and developments are covered by the policy of risk management and subject to health and safety and environmental risk analysis.

As such, the Group's land acquisition process incorporates an assessment of technical, regulatory, health and safety and environmental risks, including soil pollution, wetland protection and climate change, as part of its pre-acquisition due diligence. For both greenfield and brownfield projects, the Group complies with all applicable regulation regarding health, safety and environmental matters. An assessment of the environmental impact of each project is carried out at a very early stage. In the event that a health issue is identified (land degradation, pollution and asbestos in particular) this assessment may result in works to ensure the site is suitable for future use in order to ensure a safe environment for our employees and contracted workforce during construction and for tenants of the park in operation.

## **Sustainable construction**

The Group's Considerate Construction Charter is typically applied to all new greenfield and brownfield construction projects. It describes the Group's requirements and recommendations intended to optimise our worksites' environmental quality whilst minimising pollution for employees and contracted workforce on site, the neighbouring area and the natural environment. It integrates in every respect all the requirements set by the relevant local and national urban planning regulations, as well as the provisions related to the BREEAM and DGNB certification. The goal is for construction contractors to adhere to the Group's Considerate Construction Charter when signing any contracts with VGP

in every region where the Group operates. The Considerate Construction Charter includes the following requirements:

- providing information to people living nearby and limiting traffic disruptions;
- training and informing employees of construction companies;
- ensuring a proper management of risk and of hazardous products' handling;
- managing and limiting noise and visual pollution, as well as the risk of soil, water and air pollution;
- monitoring resources in order to reduce resource consumption.

## **Health and Safety on work sites**

Any contractor or subcontractor overseen by either VGP directly or by a General Contractor are contractually required to make the necessary provisions for site safety and comply with the relevant Health and Safety legislation.

The responsible country Technical Department or the relevant contracting team at the General Contractor develops the technical requirements provided to contractors within the tendering process. These include specific safety requirements, as well as the applicable health and safety standard a successful bidder must comply with. Tender submissions that do not comply with either the technical requirements and the applicable Health and Safety standards are disqualified from the tendering process.

During the construction phase site Health, Safety and Security is continuously monitored by the General Contractor's teams. At every project Health and Safety Coordinators are appointed. They are employed by the Construction Manager (either VGP directly or the General Contractor), with as principal function to coordinate health and safety matters between the various stakeholders.





## **CONSTRUCTION: GREEN CERTIFICATION**

VGP targets a BREEAM or DGNB certification for all of its new greenfield/brownfield construction projects. BREEAM (Building Research Establishment Environmental Assessment Method) and DGNB (Deutsche Gesellschaft für Nachhaltiges Bauen) are the most widely used environmental building certification frameworks in Europe. VGP has set as a minimum requirement to achieve a ranking of “Very Good” or better for construction projects, since 2020 for BREEAM and “Gold” for DGNB construction projects since 2022 (since 2022 the aim is to achieve BREEAM “Excellent” for BREEAM projects).

Both the BREEAM and DGNB certification process acknowledges the project’s environmental efforts, the proactive nature of the policy implemented and the contractor’s technical ability. Right from the design stage, this framework can guide and manage efforts across a series of environmental initiatives relating to energy, resource management, health and wellbeing, water management, pollution control, transport, waste, innovation and the management of the global environmental impact via the use of life cycle assessment tools.

## Reducing carbon impact of construction materials

As part of its commitment to reducing its construction carbon footprint, the Group is analysing its building standard on the choice and use of the materials used in its development projects.

Specifically, it involves:

- adopting a “lean material construction” approach right from the design phase (bearer structure, façade, fixtures and fittings, etc.);
- using new solutions and optimised low-carbon materials (low-carbon cement, bio-sourced materials, recycled materials, etc.);
- insisting that subcontractors put forward alternative solutions optimised in terms of their carbon content;
- adopting a purchasing policy which includes criteria for the carbon content of products and construction materials (requiring environmental and health and safety certification);
- Environmental Product Declarations, taking into account transport distance in respect of materials supply chain as well as energy mix in the countries where the materials are originally manufactured.

In 2021 a methodology for measuring the carbon footprint of new development projects was developed by the Group particularly in order to promote the use of optimal materials with a view to moving towards a smaller carbon footprint for each project.

In the case of a conventional standardized logistics warehouse the carbon impact typically follows the Pareto principle: around 20% of construction materials account for 80% of the construction carbon impact of a project:

- Most of the carbon impact of the construction process of a standardized VGP warehouse is generated by the **structure of the building**, i.e. floor ceilings, pillars, stairs, hall floor, foundations at **around 54%** [102 kg CO<sub>2</sub>-eq./m<sup>2</sup> GLA].
- This is followed by the **building insulation** (facade and waterproofing **around 28%** [53,5 kg CO<sub>2</sub>-eq./m<sup>2</sup> GLA]), technical equipment (around 11% [20 kg CO<sub>2</sub>-eq./m<sup>2</sup> GLA]) and,
- **interior walls (around 8%** [14,5 kg CO<sub>2</sub>-eq./m<sup>2</sup> GLA])
- Earthwork and road systems and on average, fixtures, fittings and finishing works are not considered in the carbon impact calculation.

With this in mind, the Group’s priority is to work towards reducing the carbon impact of the most significant items, beginning with the structure and foundations of the building.

The goal of the policy is to ultimately ensure that materials are matching the carbon goals, that reuse of existing structures and materials is examined, and that preference is given to materials with low environmental impact and to recycled products. The Group began work on identifying and ranking materials as well as seeking alternative solutions so as to produce guidelines for development teams and suppliers (list of preferred materials and those to be avoided).

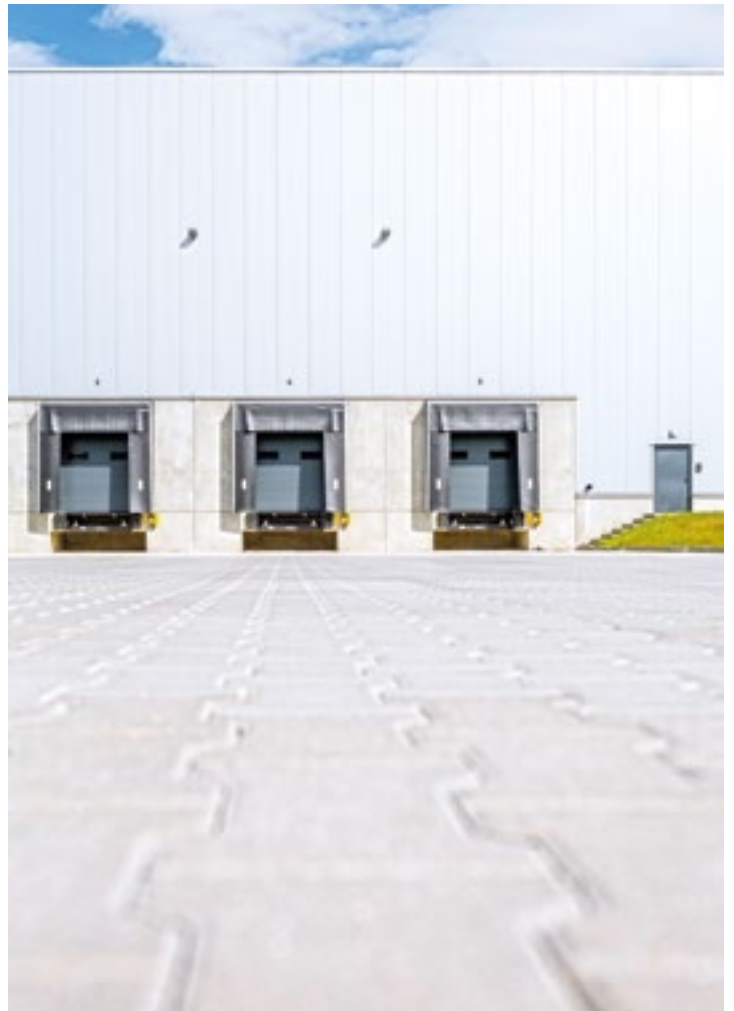
## A responsible supply chain

In line with BREEAM and DGNB certification requirements, the Group's materials policy specifies for our development projects that the aim is for at least 80% of timber used to be certified and originating from sustainably managed forests with FSC or PEFC for example.

This policy is systematically specified in tender documents for construction projects and all contractors are asked to abide by its terms. The Group works with reputable construction companies. In-house project managers are asked to pay closer attention to this contractual requirement.

The Group aims to obtain "post-construction" final certification according to the BREEAM or DGNB standard for all projects built since January 2020. As part of this certification process, the sourcing of wood used during construction is typically again verified and validated.

In line with BREEAM or DGNB certification requirements, the Group deploys a specific addendum regarding materials in the purchasing contracts signed with the main service providers (use of less polluting materials, use of certified timbers, no usage of "Red List" Building Materials that the European Union Commission on Environment designate as harmful to living creatures, including humans, etc).



## **COMFORT, HEALTH, WELL-BEING AND PRODUCTIVITY FOR THE TENANTS OF OUR BUILDINGS**

Comfort and well-being issues are a determining factor in our technical and architectural choices for development of the office as well as warehouse spaces (e.g., façades, sky lights, interior finishes of offices, canteens and other amenities, heating, ventilation and air-conditioning equipment, lighting, occupant control methods, etc.). The VGP Building Standard 'White Book' provides steps on how to achieve comfortable and safe spaces, based on thermal comfort, visual comfort, acoustic comfort and interior air quality.

In our new development projects, sky lights and facades are designed to achieve a balance between thermal performance rating (insulation value, solar factor), carbon performance and visual comfort (daylight illumination, glare control).

Depending on the building usage and tenant demands, the acoustics of our spaces are also designed to provide the best solutions to reduce technical equipment

noise levels, to reduce noise levels passing through facades, to improve interior sound absorption and insulation between premises. Interior surfaces were selected on the basis of their volatile organic compound emissions thresholds, as set by BREEAM or DGNB certification which requires the use of construction products that abide by the best practices in each country.

Moreover, during the design phase of large new offices as part of development projects, comfort and well-being are typically evaluated using dynamic thermal simulation to ensure best levels of comfort during operation. To assess the climate change resilience of projects, the same simulations are also done using future climate change scenarios. Projects must be adapted (or explain how they can easily adapt) to the expected levels of comfort.

The Group works in close cooperation with tenants to provide comfortable and safe spaces. Green Leases and annual meetings to review sustainable targets should be set up with tenants in order to raise awareness of issues amongst the various stakeholders, and set out tenants' responsibilities for the final efficiency factor determined by the use of the spaces provided by us as landlord.



## SUSTAINABLE MANAGEMENT FRAMEWORK FOR STANDING ASSETS

The Environmental Management System (EMS) is implemented across the whole owned and managed joint ventures portfolio in Europe. This pragmatic and dynamic EMS ensures that the Group is able to meet its annual and long-term targets and supports VGP's continuous improvement for each area covered by the Group's ESG policy, including climate change and resource use. It completes the Sustainable Design Framework, as part of the overall policy of managing the environmental quality of the Group's assets throughout their life cycle.

The EMS system is based on four steps of the environmental performance management process: target setting, establishing an environmental action plan, measuring results and reviewing the performance:

- **Group policy and targets:** we aim to set targets for each year for each owned and joint venture managed asset in line with our long-term targets and with the specific characteristics of each individual building and its users;
- **Environmental action plan:** an action plan as part of the certification covering key topics such as energy, greenhouse gas emissions, water, waste, transport and stakeholders is being implemented and challenged for each 100%-owned and joint venture building which has been completed after 1. 1. 2020 or for buildings under construction. For buildings delivered before 1. 1. 2020, VGP aspires to create tailored environmental action plans. Facility managers ensure the environmental performance and monitoring of operations and implement the roll-out of the asset environmental action plans. Additional external technical reviews commissioned by technical teams may also be conducted at asset level when a specific expertise is required;
- **Annual report:** performance is measured and assessed on an annual basis at the site, country and Group levels. A corrective action plan is implemented in case of deviation;
- **Review:** at asset level, the Group conducts internal environmental performance reviews. These reviews are conducted at least on an annual basis by the facility management teams in charge of environmental sustainability at the site/tenant levels and with support from the Group team (sustainable building-, renewable energy-teams). Achievements against targets are reviewed on these occasions.



The Group sets itself strict targets in terms of asset certification under the BREEAM and DGNB standard. This certification policy has been introduced by the Group in 2019 to promote the quality of the environmental management and related performances for our tenants and towards the local communities in which we operate.



## **GREEN LEASES AND TENANT COMMITMENTS**

Since 2021, the Group has been committed to an active policy of promoting “green leases”. Green leases aim at improving tenants’ ESG performance during the operation phase through a set of requirements, including operation and reporting requirements.

This approach, based on dialogue, information, and sharing of best practices, encourages the tenants to play a role in the environmental performance of the assets which they occupy. As well as contributing to decreasing energy and utilities consumption and improving waste management. In that respect, since 2020 and ahead of any regulations, all tenants are being engaged to commit to sharing energy consumption data and the aim is to ensure, in reciprocity, to engage in an annual review, preparing an action plan including various measures to save energy and water and sort waste.

In order to support our tenants, our group policy is to install renewable energy resources on every building where this is technically possible and economically viable to do so.

As part of its operational management process of environmental performance, the Group measures improvements in its energy efficiency per asset. To reach its ambitious targets in terms of energy efficiency, the Group plans to formalise a dedicated Energy Management Action Plan, whereby the assets will be required to have a dedicated energy management plan, setting the operational path towards reaching the objective, with levers identified at asset level to improve energy efficiency, their associated budget, and their gradual implementation schedule. This policy also underlines energy optimisation best practices, and sets the approach to define renewable energies roll-out targets as well as green electricity purchasing.

With regards to technical equipment, the Group has the goal to outfit its assets with Energy Management Systems (EMS), so tenants as well as facility management teams can easily monitor and manage energy performance. Energy efficiency is also a crucial factor when it comes to replacing technical equipment, especially in the context of regular maintenance works related to lighting, heating, cooling and ventilation: low-consumption energy-effective alternatives are systematically considered in the multiannual planning process.

## ENERGY MIX

VGP works at reducing the environmental impact of the energy it consumes in its portfolio buildings as well as in its own offices by generating or purchasing low-carbon or renewable energy from suppliers and generating low-carbon or renewable energy on site. As such, the Group targets to:

- Multiply its installed capacity of on-site renewable energy twentyfold by 2025 (since 2019) to 300MWp so self-consumption can be maximised;
- Progressively extend the Group policy to source where possible 100% electricity from renewable sources for our own offices.



VGP NV  
Generaal Lemanstraat 55 box 4  
2018 Antwerp  
Belgium

TEL +32 3 289 14 30

FAX +32 3 289 14 39

E-MAIL [info@vgpparks.eu](mailto:info@vgpparks.eu)

[www.vgpparks.eu](http://www.vgpparks.eu)