

The Environmental Certification Barometer

2015 Edition

A study carried out by Green Soluce in partnership with France GBC



Nicolas REGNIER Founding Partner & President.

The Green Soluce team is pleased to present to you the 2015 edition of the **Environmental Certification Barometer.** Like last year, this second edition of the study was carried out with the support of HBS-Research, which enabled us to enhance the reliability and geo-localisation of our data through the database of "La Place de l'Immobilier Pro".

What's new compared to 2014?

First of all, a communications partnership with France GBC has been signed: the association provided us great support in issuing this year's edition of a complex and thorough study, with which we aim to keep on offering reliable figures about NF HQE®, BREEAM® and LEED® environmental certifications to the market.

Then, we have enhanced the content, especially by introducing a distinction between operations undergoing an assessment scheme and fully certified operations, but also by bringing forward the topic of multiple certification of offices in the Île-de-France region. The number of certified building projects in the works phase, which are followed by successful In Use certifications, is also presented.

We warmly invite you to take a look at the results for 2015: enjoy browsing through the Barometer!



Méka BRUNEL

Recognising the value of an **Environmental Certification** Barometer for the sustainable building community, France GBC is pleased to be the communications partner for this 2015 edition, and thus to support a first-class study.

Indeed, this is currently the first and only quantitative study providing reliable figures about the current situation of the main environmental assessment schemes in France. It provides reliable benchmarks to real estate and sustainable building professionals, needed for objective analysis and decision-making. As an annual study, the Environmental Certification Barometer is an opportunity to take a closer look at the underlying green building market trends in France.

Thanks to Green Soluce & enjoy the study!



Green Soluce is a strategy and engineering consulting firm, which specialises in sustainable real estate and sustainability challenges of companies and public or private bodies.

The Green Soluce team is convinced that adopting a 360° vision is the most efficient way to implement a truly effective sustainable real estate strategy. This is why Green Soluce supports its clients with the full range of expertise needed in sustainable building, from upstream strategic thinking to operational technical management of buildings (for exenergy audits, feasibility studies of energy systems, support in environmental assessment schemes, etc.)

Contact: www.greensoluce.com



HBS-Research strives to achieve more transparency in the real estate market.

Therefore, HBS-research was the first company to set up a search engine for benchmarks, to search for companies based on various real estate criteria, for the owners of buildings, to know about ongoing offers, to be able to quantify the Parisian non-domestic buildings stock or the number of environmentally certified projects in France, etc.

Thus, it seemed logical for HBS to take part in bringing this barometer together, which also allows to quantify and track the real estate trends regarding environmental assessments in France.

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NF HQE®, LEED® and BREEAM® certifications

Three environmental certifications stand out in the French non-domestic real estate market: the NF HQE® certification, the BREEAM® certification and the LEED® certification.

The NF HQE® certification

"Haute Qualité Environnementale" (High environmental quality) is a project management system aiming to master the impacts of a new construction or refurbishment project on the external environment as well as on users' comfort level and health, all the while controlling the operational processes linked to the strategic planning, design and construction phases. The goal of this approach is to achieve the Environmental Quality of the Building (QEB).

The certification is delivered by certification body Certivéa, following audits of the Operational Management System (SMO/OMS) and of the Environmental Quality of the Building (QEB), which are each subjected to separate technical schemes. QEB is composed of fourteen targets, divided into the four following categories: Energy, Environment, Health and Comfort.

The BREEAM® certification

"Building Research Establishment Environmental Assessment Method" is an assessment method of a building's environmental performance regarding the design, construction and operations of sustainable buildings, developed by the BRE (Building Research Establishment), a private British organisation.

Among the different available versions of BREEAM®, only the BREEAM® International scheme is used in France.

A first certification process takes place in the strategic planning and design phases. The BREEAM® certification itself is divided into the ten following categories: Management, Health and Wellbeing, Energy, Transport, Water, Materials, Waste, Land Use, Pollution and Innovation.

The LEED® certification

"Leadership in Energy and Environmental Design" is an American assessment system of environmental performance of new construction or refurbishment of buildings delivered by the GBCI (Green Building Council Institute).

The requirements for the LEED® certification are divided into the seven following credit categories: Sustainable Sites, Water Efficiency, Energy & Atmosphere, Materials and Resources, Indoor Environmental Quality, Innovation in Design and Regional priority.

The first five categories refer to the Environmental Quality of the Building. The last two categories refer to the use of innovative technologies and to the geographic situation of the project, which can help achieve bonus points if regional environmental priorities are addressed.

Internationally, other certifications are used such as the German DGNB certification "Deutsche Gesellschaft für Nachhaltiges Bauen e.V.", also called GeSBC, "German Sustainable Building Certificate". However, this certification is not yet widespread enough in France to be relevant for the purpose of this study.



Update of the main results from the 2014 edition

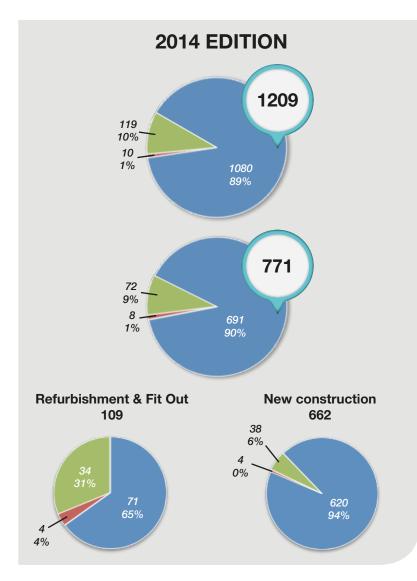
The 2015 edition provides an update of the 2014 edition. The differences in the figures result from new operations entering the certification process and from operations whose certification process has not been successful or whose certificate has been withdrawn. Picture 1 below shows the results for both ongoing and delivered projects. However, the rest of this study focuses only on certified and delivered projects, i.e. which have successfully gone through each step of the certification process.

Starting point: the three official databases











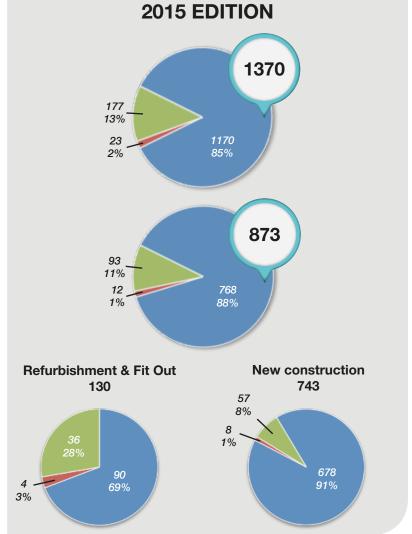


2nd filter: OFFICE building activity



3rd filter: Distinction between Refurbishment & Fit Out and NEW **CONSTRUCTION** projects





Barometer 2015: the key topics to expect

Breakdown by building activity

Evolution of the number of certifications per year

Distinction between new construction and refurbishment projects

Breakdown by assessment method

Works certifications

Distinction between already certified and ongoing certification projects

Level of performance reached

Geo-localisation

Multiple certification

Focus on office building projects

Breakdown by certification option chosen (ex. For BREEAM In-Use®: Asset, Building Management or Occupier Management)

Breakdown by certification

Certifications for operations & maintenance

Focus on office building projects

Geo-localisation



Methodology

Data sources:

The data used in this study come from the following databases available on the websites of the three certification bodies: For NF HQE®: http://www.certivea.fr/nos-certifications/certifications-batiments-non-residentiels/nf-hqe-batiments-tertiaires For BREEAM®: http://www.greenbooklive.com/search/scheme.jsp?id=202

For LEED®: http://www.usgbc.org/projects

The data were retrieved on December 31st 2014.

Green Soluce

- Knowledge of the certification schemes
- Expertise in environmental assessment and the specific certification processes
- In charge of checking the data and identifying missing information
- In charge of exploiting the data and carrying out critical analysis

HBS Research

- In charge of geo-localising the projects
- In charge of obtaining and verifying the information about the buildings: surface area by activity, building permits and lease agreements

Updating the database used for the 2014 edition:

- Taking into account the progress of projects in the certification process
- Incorporating the new projects registered during the year 2014
- Deducting the operations having lost their certification or whose certification process did not succeed.

Database of the study:

The data were manually checked and completed, even corrected where necessary for increased relevance.

- The activity type of the building was checked for each NF HQE®, LEED® and BREEAM® project.

 It was noted that the scheme used for a type of activity does not always match the real activity of the building. For example, offices certified under the "commercial" scheme or projects certified under the "office" scheme are in fact schools.
- In the case of buildings used for multiple activities, only the main activity in terms of major surface area is used, in order to avoid duplicates. For example: a project consisting of 700 m² of offices and 8000 m² of logistics platform falls into the logistics platform category and not into the office category.
- The type of project for the building (either new construction or refurbishment) has been verified for each HQE®, LEED® and BREEAM® project. It was noted that the specific scheme used for a type of project does not always match the reality. For example, a building certified under the refurbishment NF HQE® scheme is in fact a new construction project.
- Plus, each building has been geo-localised, and duplicates were deleted.
- Indeed, the same project may include several buildings certified at the same address. In this study, only one certification has been counted for one address, and thus for one project.
- A project with a double certification, for example which is certified both HQE® and LEED®, is included in the count for each certification, as the goal of the present study is to compare the number of environmental certifications in France.
- Only icertifications pertaining to operations & maintenance valid at the date of December 31st 2014 are included in this study.

Data analysis:

On the basis of these data, we studied the French non-domestic environmental certification market. Office certifications clearly stand out as making out the large majority of certifications in France. Thus, the following pages of the study focus on this type of building activity.

The number of certified operations in the Île-de-France region being far higher than in the rest of the country, the focus of the present study has therefore been set on this region.

Finally, for sake of completeness, we have addressed the topic of operations and maintenance of existing buildings, as it represents a major challenge in reducing the impact of the building sector on the environment.





Part 1: The environmental certification in the works phase



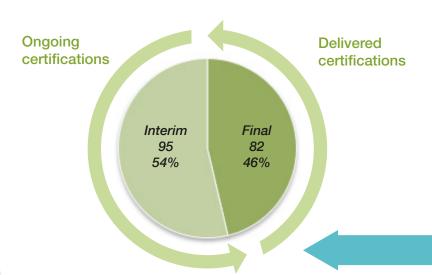
1.1. The environmental certification for non-domestic buildings in France

1.1.1. Obtained and ongoing certifications

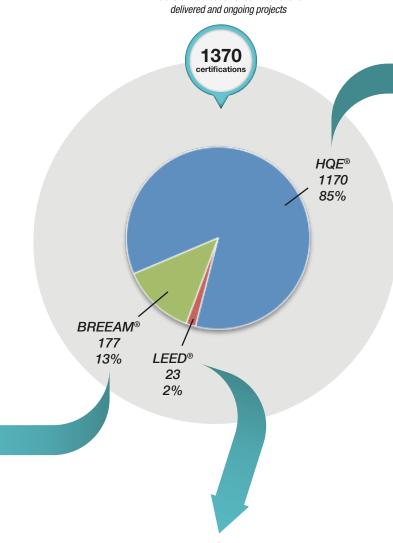
On December 31st 2014, the non-domestic building market counted 1370 certifications: 598 were ongoing and 772 were already obtained.

177 projects were BREEAM® certified or in the process of obtaining the BREEAM® certification, among which:

- 95 projects met the assessment criteria at the design stage. They obtained a temporary, so-called "Interim" certificate.
- 82 projects were delivered and were BREEAM® certified.



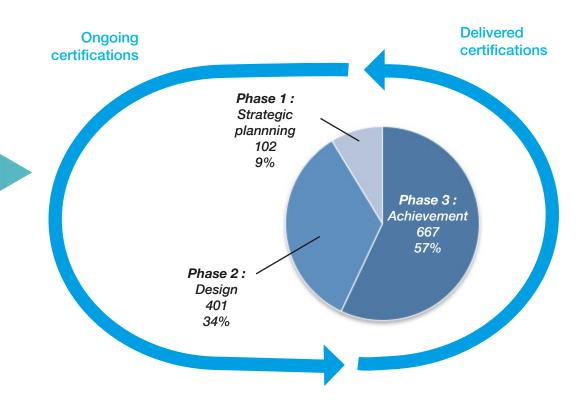
Picture 2: Certification stages of BREEAM® certified projects



Picture 3: Distribution of certifications for

23 operations successfully completed the LEED® certification process.

However, if the LEED® assessment system includes information exchange with the certification body during the project, the database provided by the USGBC does not indicate that certificates are attributed at intermediate stages, unlike the NF HQE® and BREEAM® certifications.



Picture 4: Certification stages of NF HQE® certified projects

In France, the French HQE® certification prevails with 1170 certified and ongoing projects.

The « NF Bâtiments Tertiaires – Démarche HQE®» certification delivers a certificate at the end of each strategic planning, design and delivery phase of the project.

- 503 projects are in the process of certification, among which:
- → 102 are in the strategic planning phase
- > 401 are in the design phase
- 667 projects underwent and passed the audit of the delivery phase.

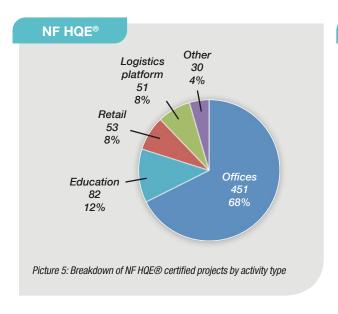
Compared to the 2014 edition, 140 new operations entered the NF HQE® certification process and 50 operations were withdrawn from the database by Certivéa, for the following reasons:

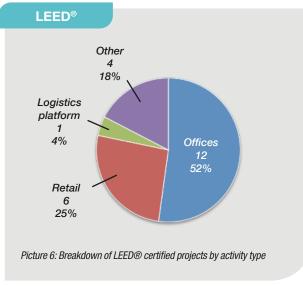
- 26 projects were not successful
- 7 projects had their certification withdrawn by the certifying body for going against and not fulfilling all the conditions of the procedure, such as client default, missing information or refusal to carry out an additional audit.
- 7 operations were withdrawn from the "NF Bâtiments tertiaires" scheme, designed for non-domestic buildings, to be included in the "NF Equipments sportifs" scheme, designed for sports facilities.
- 10 have changed ownership

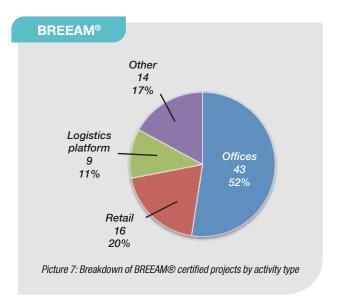
In order to compare the three NF HQE®, LEED® and BREEAM® certification systems objectively, the present study only takes into account the projects, which have validated all the steps of the certification process.



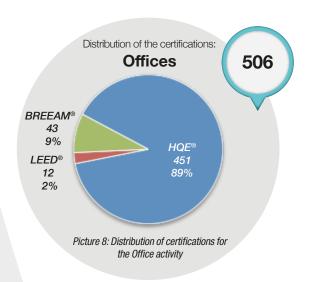
1.1.2. Breakdown of certified projects by activity type

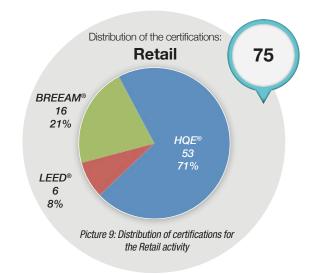


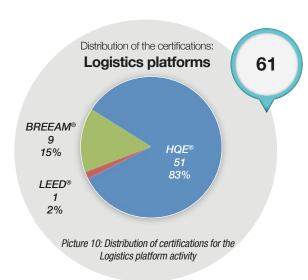




1.1.3. Breakdown of the certifications for each main activity type

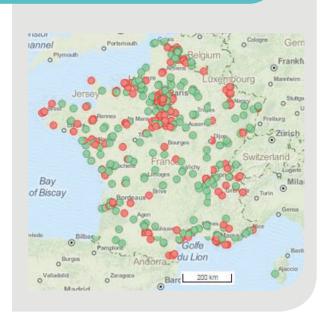






1.1.4. Location of certified projects in France

Map 1: Location of HQE® certified projects in France



Map 2: Location of BREEAM® certified projects in France



Map 3: Location of LEED® certified projects in France



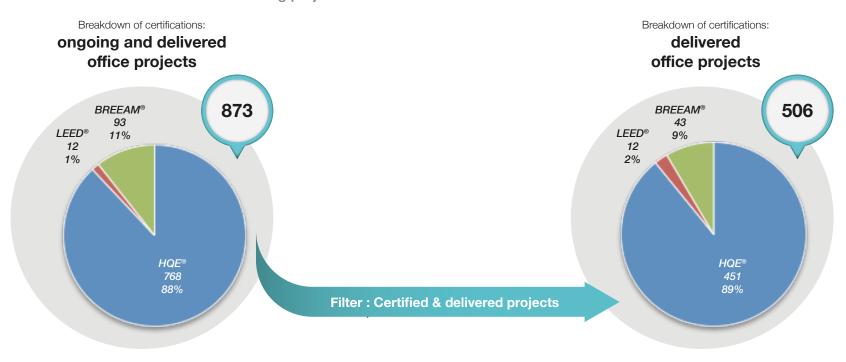
Project, which has been certified & delivered

Project in the process of certification

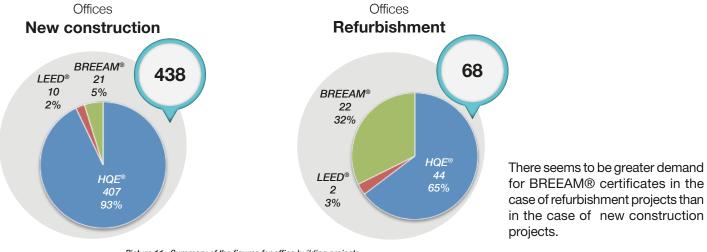


1.2. The environmental certification for office building projects

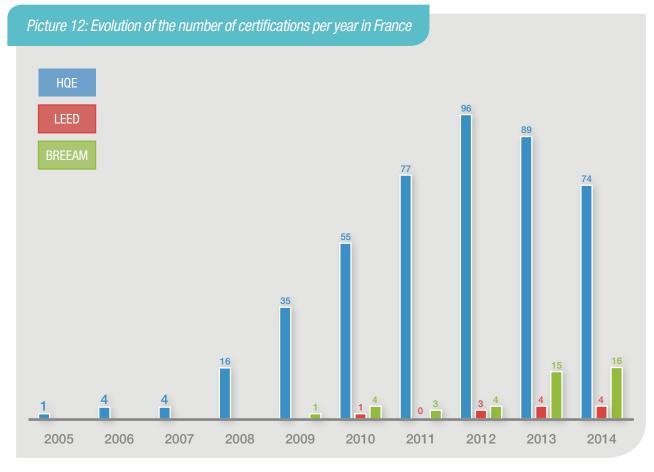
1.2.1. Breakdown of the certifications for office building projects

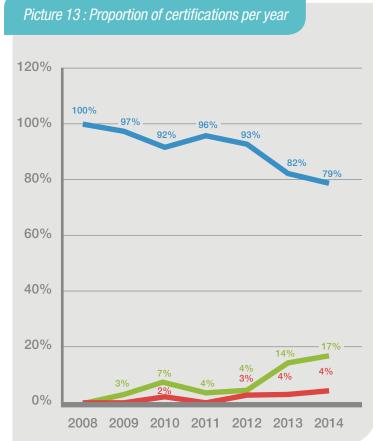


Filter: Type of project in the works phase (New construction or Refurbishment)



Picture 11: Summary of the figures for office building projects





NF HQE® accounts for 79 % of the office projects certified in 2014. BREEAM® and LEED® certifications represent respectively 17% and 4 % of the certification market for this particular type of building activity.

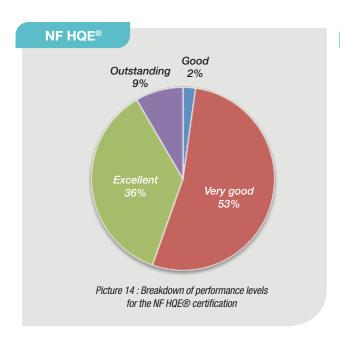
The NF HQE® certification, which has been present on the French market since 2005, prevails for office building certification projects. However, the number of NF HQE® certifications has been decreasing for the past two years.

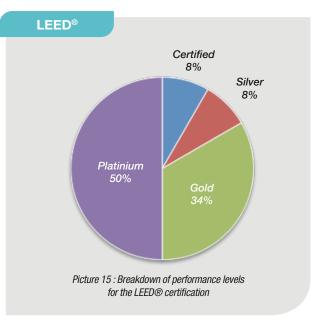
The BREEAM® certification, which has emerged more recently, is increasing its presence on the French market substantially.

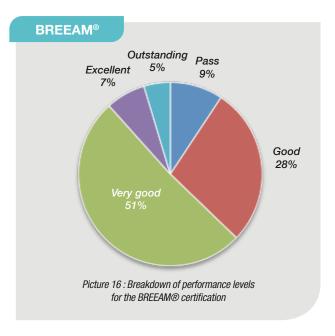
The LEED® certification remains minor on the market.











Each certification system has its own performance scale:



The NF HQE® certification rates the environmental performance of a building project according to four performance levels. The performance level mostly achieved is HQE® "Very Good", followed by HQE® "Excellent".



The LEED® certification rates the environmental performance of a building project according to four performance levels.

The performance level mostly achieved is "Platinum", followed by "Gold".

Assessment rating	Starrating	
Unclassified		
Acceptable	*	
Pass	**	
Good	***	
Very Good	****	
Excellent	****	
Outstanding	****	

The BREEAM® certification rates the environmental performance of a project according to five performance levels.

The performance level mostly achieved is "Very Good", followed by "Good".

1.2.4. Location of certifications in the Ile-De-France region



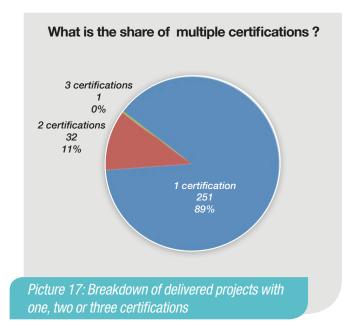
Map 5 : Location of HQE® certified projects in Ile-de-France Sartrouville Saint-Denis Le Bourge Houilles Drancy Saint-Germain-en-Lay Rosn Rueil-Malmaison Marly-le-Roi Montreuil La Celle-Saint-Cloud Charenton-le-Pont Chaville Versailles Alfortville Créteil L'Hay-les-Roses -Bretonneux s-le-Bretonneux

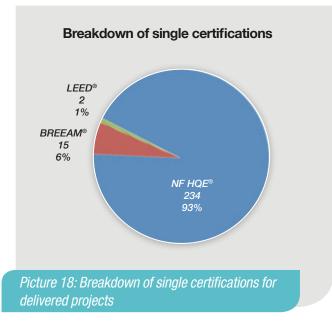
- Certified & delivered project
- Ongoing certification project

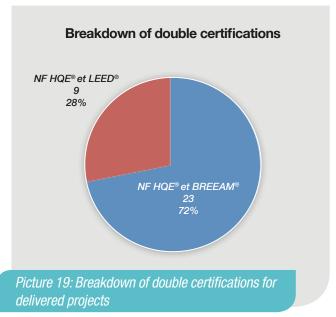










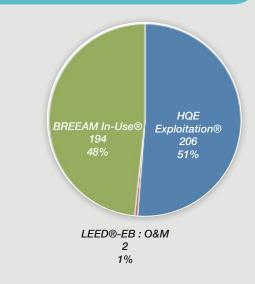


Part 2: The environmental certification for operations & maintenance of existing buildings



2.1. Projects with at least one operations & maintenance certification

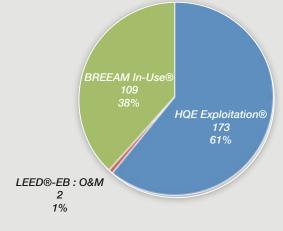




402 projects had a valid certification at the date of January 1st 2015.

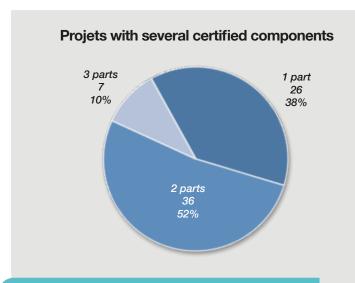
For 147 projects, the choice was made to sustain the new construction or refurbishment certification with a certification pertaining to operations and maintenance.



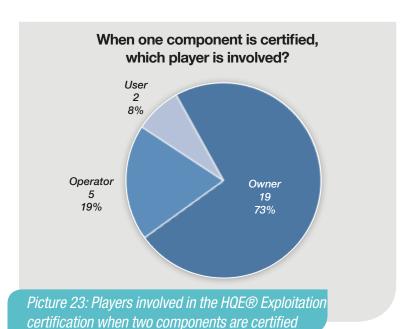


For 284 office buildings, the choice was made to obtain a certification pertaining to operations and maintenance.

2.2. The "HQE® Exploitation" certification



Picture 22: Breakdown of projects with one, two or three HQE® exploitation certified components

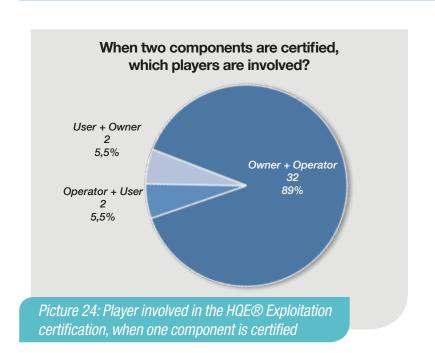


69 non-domestic building projects are certified according to the 2013 version of the HQE® Exploitation. The 2013 version of the HQE® Exploitation is meant for three players of the building industry and values their sustainable building practices:

- The owner of the building: the intrinsic environmental quality of the building is assessed and certified by the "Bâtiment Durable" component (Sustainable Building) of the certification.
- The operator of the building: efficient environmental management of the building regarding operations and maintenance is assessed and certified by the "Gestion Durable" component (Sustainable Management) of the certification.
- The user of the building: best environmental practices regarding the use of private spaces are assessed and certified by the "Utilisation Durable" component (Sustainable Use) of the certification.

The initiative to value the building project with a certification pertaining to operations and maintenance may come from one or several players:

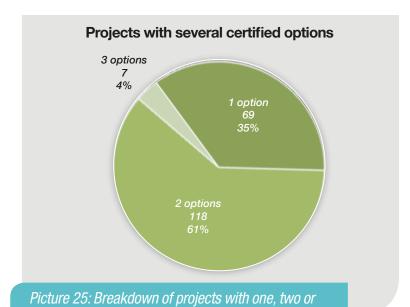
- For 26 projects, one player is involved in such a certification.
- For 36 operations, two players are involved in such a certification.
- For 7 operations, all three players are involved in such a certification





2.3. The BREEAM-In-Use® certification

three BREEAM-In-Use® certified options



194 non-domestic building projects are BREEAM-In-Use® certified.

The BREEAM-In-Use® certification is meant for three players of the building industry and values their sustainable building practices:

- The owner of the building: the intrinsic environmental quality of the building is assessed and certified by the "Asset Performance" option.
- The operator of the building: efficient environmental management of the building regarding operations and maintenance is assessed and certified by the "Building Management" option.
- The user of the building: best environmental practices regarding the use of private spaces are assessed and certified by the "Organisational Management" option.

The initiative to value the building project may come from one or several players:

- For 69 operations, one player is involved in such a certification.
- For 118 operations, two players are involved in such a certification.
- For 7 operations, all three players are involved in such a certification.



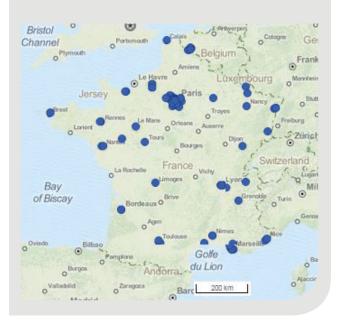


2.4. Location in France of non-domestic building projects certified for operations & maintenance

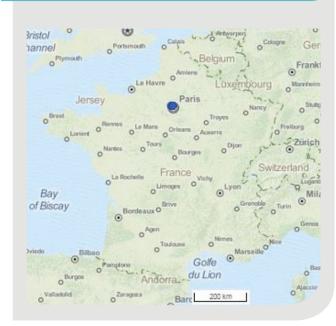
Map 7: Breakdown of HQE® Exploitation certifications in France



Map 8: Breakdown of BREEAM In-Use® certifications in France



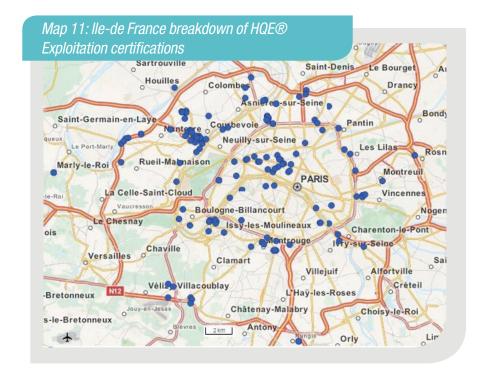
Map 9: Breakdown of LEED®-EB : 0&M certifications in France



Certification pertaining to operations and maintenance



2.5. Location in Île-de-France of certified office building projects for operations & maintenance



Certification pertaining to operations and maintenance





Definition of key terms

Activity

Main function of a building

BREEAM®

"Building Research Establishment Environmental Assessment Method" is an environmental certification delivered by the BRE (Building Research Establishment).

BREEAM In-USE®

"Building Research Establishment Environmental Assessment Method" certification pertaining to the operations and maintenance of non-domestic existing buildings

Certificate

A certificate is the document proving the environmental quality of a new construction or refurbishment project, which has been delivered.

Works certification

A works certification pertains to new construction or refurbishment projects. This type of certification allows for environmental requirements to be included from the design phase onward, in order to design a building with low environmental impact. Obtaining a certificate in the works phase guarantees that the building has been eco-designed.

Operations & maintenance certification

An operations & maintenance certification monitors how the building is used and maintained to ensure its intrinsic performance does not degrade over time. This type of certification is meant to help distinguish existing buildings with environmental and energy performance achievements, which meet current best practices. By monitoring a building's overall operations and maintenance, the certification allows to lower its environmental impact, its carbon footprint, and especially its water and energy consumption, as well as its waste production. Usage and maintenance costs are thus optimised and the building is managed sustainably.

HQE®

Haute Qualité Environnementale (High Environmental Quality) delivered by certification body Certivéa.

HQE® Exploitation

"High Environmental Quality" certification for the operations and maintenance of existing buildings

LEED®

Environmental certification "Leadership in Energy and Environmental Design" delivered by the GBCI (Green Building Council Institute).

LEED®-EB: O&M

"Leadership in Energy and Environmental Design" certification for the operations and maintenance of existing buildings

Project

A project refers to one or more buildings located on the same parcel.

Non-domestic building stock

The non-domestic building stock refers to all non-residential public and private buildings. It includes offices, retail, logistics, education, and buildings of other activity types (prisons, sports facilities, etc.)



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About France GBC...

France GBC is the French network in sustainable building and urban planning and was founded at the end of 2010 as a non-profit organisation by the industry's leading corporate players. It is the French member of the World Green Building Council, the leading organisation at a global level, which gathers professionals committed to sustainable building in over 100 countries.

France GBC 's role is to accelerate change in favour of sustainable building. Thus, the organisation's members are driven by 5 principles of action: to advocate, federate, encourage, provide support and benchmark in the field of sustainable building.

France GBC is a dynamic platform to exchange ideas, a space to address sustainable building issues and carry out lobbying together with all the main players of the industry: other associations, professional federations, project owners, architects, major players in building & services, experts, investors, users, building operators & maintenance specialists. France GBC's members tackle sustainability issues both regarding domestic and non-domestic buildings.

The organisation is especially active on topics, which it is convinced are drivers of increased sustainable building: one is Corporate Social Responsibility in the real estate / construction industry, the second is affordable construction.

Internationally, France GBC is the spokes organisation of the French position on sustainable building and provides support in promoting French companies' services in sustainable building within the GBC network.

Some highlights of the work carried out by France GBC:

- French CSR reporting guide for the real estate / construction industry
- The France GBC Green Building Week
- The environmental reporting trophies
- The France GBC breakfast talks, organised in partnership with Busines
- Active involvement within the European GBC network

- ...

France GBC

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