

Glossary of Common Sustainability Terms

BIODEGRADABLE	A product or material capable of decomposing naturally by micro-organisms.
BIODIVERSITY	The wide variability of organisms on earth and within an ecosystem. Maintaining biodiversity is necessary to preserve the health and survival of an ecosystem.
BIOMASS	Living or recently dead organic material that can be used as an energy source e.g. wood, agricultural crops and waste or ethanol and methane.
BREEAM	Building Research Establishment Environmental Assessment Methodology An environmental assessment method for non-domestic buildings widely used across the UK. It sets the standard for best practice in sustainable design.
CARBON FOOTPRINT	The total amount of greenhouse gases emitted through an activity or from a product, company or person either directly or indirectly. It is generally expressed in equivalent tons of either carbon or carbon dioxide.
CARBON NEUTRAL	The net zero carbon emissions to the atmosphere from a product, company or person. Achieving carbon neutrality means measuring the carbon emissions, then balancing those emissions with carbon reductions or carbon offsets to reach net zero carbon emissions.
CARBON SEQUESTRATION	The uptake and storage of carbon. Trees can be used for carbon sequestration because they absorb carbon dioxide, release the oxygen and store the carbon.
CHP	Combined Heat and Power The simultaneous generation of usable heat and power in a single process.
CLG	Department for Communities and Local Government Sets the policy on local government, housing, urban regeneration, planning and fire and rescue. Also has responsibility for building regulations (in England), fire safety and some housing issues in England and Wales.
CLIMATE CHANGE	A 'statistically significant' change in the 'average weather' that a given region experiences. Climate change on a global scale refers to changes in the climate of the Earth as a whole, including temperature increases (global warming) or decreases, and shifts in wind.
CLOSED-LOOP RECYCLING	The process of utilising a recycled product in the manufacturing of a similar product or the remanufacturing of the same product.
CRADLE-TO-CRADLE	A design philosophy that looks at the life-cycle of a material or product.
CRC	Carbon Reduction Commitment Energy Efficiency Scheme A mandatory cap and trade scheme in the UK that applies to large non energy-intensive organisations in the public and private sectors.



CSH**Code For Sustainable Homes**

An environmental impact rating system for housing in England (similar to BREEAM) setting standards for energy efficiency and sustainability that represent important developments towards limiting the environmental impact of housing.

DEC**Display Energy Certificate**

All public buildings require a DEC which shows the energy usage of the building and its overall energy performance on a scale of A-G. The rating is calculated using actual operational data gathered from the building's gas, electricity and water meters.

DECC**Department for Energy and Climate Change**

Responsible for all aspects of UK energy policy, and for tackling global climate change on behalf of the UK. Key policy areas include Global climate change and energy; UK energy supply; consumer interest and a low-carbon UK.

DEFORESTATION

Cited as one of the major contributors to global warming, it is the conversion of forested land to other non-forest land uses by the removal of trees and destruction of habitat.

ENERGY ASSESSMENT

The preparation and issuing of an EPC and the accompanying Recommendation Report (RR) and the carrying out of any inspections undertaken for the purposes of issuing the EPC or RR.

ENERGY AUDIT

An inspection, survey and analysis of energy flows in a building, process or system with the objective of understanding the energy dynamics of the system under study. Typically conducted to look at ways to reduce the amount of energy input into the system without negatively affecting the output(s).

ENERGY EFFICIENCY

The use of less energy to fulfil the same function or purpose; usually attributed to a technological fix rather than a change in behaviour, examples include better insulation to reduce heating / cooling demand, compact fluorescent bulbs to replace incandescent or proper tyre inflation to improve gas mileage.

ECOSYSTEM

A place having unique physical features, encompassing air, water, and land, and habitats supporting plant and animal life, including humans.

EPBD**Energy Performance of Buildings Directive**

The Directive on the energy performance of buildings (EPBD) is the Directive 2010/31/EU (EPBD, 2003) of the European Parliament and Council on energy efficiency of buildings.

EPC**Energy Performance Certification**

All commercial properties require an EPC which rates the energy efficiency of the building on a scale of A-G, where A signifies the highest level of efficiency. Unlike the DEC (which gives an Operational Rating) the EPC provides an asset rating of the building fabric and fixed services, based on a survey of the building.

EPP CERTIFICATION

The process by which the products or services are certified as Environmentally Preferred Products (EPPs). It addresses all stages of the life-cycle, and incorporates key environmental and human health issues.

FIT / RHI**Feed in Tariff / Renewable Heat Incentive**

A policy mechanism that is designed to encourage the adoption of electricity and heat renewable energy technologies respectively and to help accelerate the move toward security of supply and grid parity.



FOSSIL FUEL

Any fuel source such as natural gas, fuel oil, coal that has a finite supply.

GHG**Greenhouse Gas**

These gases are so named because they contribute to the greenhouse effect due to high concentrations remaining in the atmosphere. The GHGs of most concern include carbon dioxide (CO₂), methane (CH₄), nitrous oxides (N₂O).

GLOBAL WARMING

An increased warming of the Earth's atmosphere which can be caused by an increase of man-made gases that trap the sun's heat. This can effect changes such as sea level rises, changes in rainfall patterns and frequency, habitat loss and droughts.

GREEN BUILDING

A comprehensive process of design and construction that employs techniques to minimise adverse environmental impacts and reduce the energy consumption of a building, while contributing to the health and productivity of its occupants. Common ways of measuring green buildings includes BREEAM, LEED (Leadership in Energy and Environmental Design) certification and Australia's Green Star programme.

GREENHOUSE EFFECT

The trapping of heat within the Earth's atmosphere by greenhouse gases such as carbon dioxide and methane, which accumulate and act as a blanket keeping heat in.

GREENWASHING

The process which a company publicly and misleadingly exaggerates or embellishes the environmental attributes of itself or its products.

IAQ**Indoor Air Quality**

Refers to the contents of interior air that could affect the health and comfort of occupants. Acceptable IAQ is air in which there are no known concentrations of harmful contaminants

ISO 9001**Quality Standard**

A family of standards for quality management systems. ISO 9001 is maintained by ISO, the International Organisation for Standardisation and is administered by accreditation and certification bodies.

ISO 14001**Environmental Standard**

Specifies the requirements for an environmental management system for those environmental aspects of which the organisation has control and over which it can be expected to influence.

LCA**Life Cycle Assessment**

An environmental impact tool used to compare the environmental performance of two or more scenarios. The LCA quantifies the potential environmental impacts, and can highlight areas to target improvements.

LCC**Life Cycle Costing**

A procurement evaluation technique which determines the total cost of acquisition, operation, maintenance, and disposal of items potentially being acquired.

LEED™**Leadership in Energy and Environmental Design**

A US developed green building rating system that encourages and accelerates the global adoption of sustainable green building and development practices.



PV**Photovoltaic**

Solar photovoltaic (PV) collectors are arrays of cells containing a material that converts solar radiation into electricity.

RECYCLING

The series of activities, including collection, separation, and processing, by which materials are recovered from the waste stream for use as raw materials in the manufacture of new products.

RENEWABLE RESOURCES

A resource that can be replenished at a rate equal to or greater than its rate of depletion. Examples of renewable resources include corn, trees, and soy-based products.

ROCS**Renewable Obligation Certificate (ROCs)**

A ROC is the green certificate issued for eligible renewable electricity generated within the UK over 5MW and supplied to customers in the United Kingdom by a licensed supplier.

SAP**Standard Assessment Procedure (SAP)**

The process required for a new residential property at both design stage and upon completion to calculate energy consumption and ensure compliance with Building Regulations. Once the assessment has been carried out on the completed building, an Energy Performance Certificate (EPC) is issued.

SHW**Solar Hot Water**

Panels that collect the solar radiation from the sun and use it to heat a liquid inside. This liquid then transfers its heat to the hot water in a cylinder for use in hot water requirements, e.g. domestic hot water.

SUSTAINABLE DESIGN

Also known as environmental design, environmentally sustainable design and environmentally-conscious design is the philosophy of designing physical objects, the built environment and services to comply with the principles of economic, social, and ecological sustainability.

SUSTAINABILITY

The most widely accepted definition comes from 'Our Common Future' Report of World Commission on Environment and Development, commonly called the Brundtland Report (1983). It says "Sustainable development is development that meets the needs of the present without compromising the ability of future generations to meet their own needs".

VOC**Volatile Organic Compounds**

In sufficient quantities, VOCs can cause irritation and some are suspected of causing or exacerbating acute and chronic diseases. They are generally compounds that evaporate from common housekeeping, maintenance and building products that have been made with organic chemicals.

WASTE-TO-ENERGY

The burning of waste in a controlled-environment incinerator to generate steam, heat or electricity.



The information contained in this Document does not constitute professional advice on any particular matter. While DPP has made every effort to ensure that the information published here is valid and factual for the purpose of general information, no guarantee is given of its accuracy, completeness or currency, nor that it is fit for a particular purpose. For advice on a planning issue or problem, please contact a partner at DPP.