

Carbon offset

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Climate offsetting can, for example, be done by planting new trees.

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A way to make a process [carbon neutral](#) by compensating for an emission with a reduction in emission elsewhere.

International agreements put limits on the amount of greenhouse gases a company or a nation may emit. When a company or a nation releases more greenhouse gases, it can counter this extra emission by paying another company or nation to emit less greenhouse gas. This is the carbon offset.

There are several different greenhouse gases with different global warming potential. To be able to easily compare carbon offsets, they are measured in metric tonnes of [carbon dioxide equivalent](#). One carbon offset represents the reduction of one metric ton of carbon dioxide, or its equivalent in other greenhouse gases.

There are two [markets for carbon](#) offsets. On the voluntary market individuals and companies can help mitigate global warming by paying for offsets. This is done for idealistic reasons or to improve the profile of the company as there is no law forcing these voluntary offsets. This is the smaller market, but it is growing.

The larger market is where nations and companies are bound by agreements to limit their emission of CO₂ and other greenhouse gases. Here offsets are a way of complying with pre-established goals. This market is more important because much larger amounts of offsets are being traded.

The [Kyoto Protocol](#) uses offsets as a way for governments and private companies to earn [carbon credits](#) which can be traded in a marketplace. This mechanism connects the voluntary and the regulated market.

Offsets are generated from projects with low or no emissions. The most common project type is renewable energy. Planting trees to act as [carbon sinks](#) is another way to offset carbon.

In theory, carbon offsets are more effective than [carbon taxes](#), because reductions in emission can be made where there is the least amount of economic cost associated with the reduction.

How to cite this entry

Lennart Kiil: "Carbon offset". Climate Encyclopedia, climate-encyclopedia.com/carbon-offset, retrieved 23 October 2026.

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