

Semi-annual report CO2 performance ladder

Sustainability is an integral part of our work. We owe it to future generations to put sustainability at the heart of everything we do. At Ballast Nedam we believe that every project offers us the opportunity to make a positive contribution, not only to today's world, but tomorrow's world too. We see this as an economic opportunity instead of a threat.

We challenge you to think along with us and to report CO2 saving options on your project to the project management or to mvo@ballast-nedam.nl.

The policy was aimed at reducing CO_2 emissions by 30% by 2020 compared to the reference year 2008, in relation to the turnover of the Group's Dutch activities. After the reorganisation within Ballast Nedam, where amongst other things two productions sites were sold, the reference year 2008 is no longer a realistic base and a new reference year will have to be determined. Therefore, we have set 2019 as the new reference year for our long-term objective for 2030.

New target 2020 - 2030

The 2030 target for scope 1 (natural gas, diesel and other fuels) is a 50% CO₂ reduction compared to 2019. For scope 2 (electricity, district heating and air traffic), Ballast Nedam aims to become completely CO₂ neutral in 2030 (i.e. 100% CO₂ reduction). The total reduction target for 2030 for scopes 1 and 2 together is 56% compared to 2019. The reduction target until 2030 is structured as follows, based on a renewal of our own (lease) vehicle fleet in 2021, 2025 and 2029. Our own vehicle fleet has a major impact on our CO₂ emissions.

Year	2020	2021	2022	2025	2030
CO ₂ reduction percentage	2%	6%	9%	28%	56%

We have also set a target for the CO2 emissions resulting from the activities we carry out and organize (scope 3, purchase and sale of services and products). The environmental impact of services and products in the Ballast Nedam supply chain is determined on the basis of a lifecycle analysis (LCA). For 2020, the reduction target included determining LCAs of products together with our suppliers / subcontractors for at least three products.

After all, energy savings will not be achieved by focusing only on our own consumption. We will need to work together with the chains in which the Group is active to find ways to bring consumption down, such as CO_2 neutral delivery of different materials.

CO₂ – Footprint in first six months of 2020

We improve our energy performance from the projects. The target for 2020 is to achieve a 2% CO₂ reduction compared to the reference year 2019, related to the turnover of our Dutch activities. This concerns our own CO₂ emissions (scope 1 and 2) that arise from the energy consumption in our offices, at our construction sites and production locations and mobility.

Ballast Nedam's energy consumption particularly relates to commuting, transport, use of construction equipment), production in the plants and on the building sites. CO₂ reporting is divided into scope 1, scope 2 and scope 3.

The CO₂ footprint set out below up to week 24, period 6 in 2020 comprises the emission of:

- Scope 1 = 6,844 tonnes (Natural gas, diesel, petrol, CNG and other fossil fuels);
- Scope 2 = 3,410 tonnes (Electricity and district heating)
- Scope 3 = 339 tonnes (Emissions from commuting expenses).



Scope 1 & 2							
	2014	2015	2016	2017	2018	2019	2020
Offices	1,354	1,262	1,339	2,205	1,203	1,195	1,027
Building sites	5,737	3,352	2,699	2,477	3,239	4,935*	5,624
Production sites	6,857	4,349	4,320	393	1,153	1,101	997
Mobility	5,172	3,059	4,000	3,847	3,529	3,443	2,606
Total	19,120	12,022	12,358	8,922	9,124	10,674	10,254

* value corrected after publication 2019

The footprint for the first half of 2020 has decreased slightly in total compared to 2019. The slight decrease is caused by lower CO_2 consumption for the offices and a significant reduction for mobility. This is the result of COVID-19 and the obligation to work from home much more, which means that less energy is consumed in the offices and the number of kilometers driven has decreased drastically. Energy consumption at the construction sites has increased, but can be explained by the increased turnover.

The priorities and opportunities for improving energy performance for Ballast Nedam lies in the reduction for mobility and at the construction sites. In addition to savings on gas and electricity, reduction at the construction site can also include waste management. Read below what good waste management can do for your CO₂.

CO₂ savings through good waste management

The world of waste processing is rapidly growing towards a circular economy. More and more waste can serve as new raw material and waste separation at the source remains the best approach for this.

For most materials, the environmental impact of the recycling process is significantly lower than the environmental impact of the production of new materials. CO₂ emissions are therefore lower for recycled materials, because no new materials need to be extracted and supplied and less waste is incinerated.

For example, did you know that the reuse of 1000 kg of paper reduces the CO2 emissions during paper production by about 850 kg of CO_2 ? This has been calculated based on the cultivation of trees, the transport and the processing of pulp into paper. We hold on to the raw material longer by cutting down fewer trees and reusing paper / cardboard that is already available. The same applies to the reuse of plastic. By reusing plastic, we retain the fossil raw material (petroleum) and therefore also the carbons stored in it. In addition, with the energy saved by recycling 1 plastic bottle, a 60W lamp can burn for 1 hour. Below are two examples related to our own projects.

Project A-pier Schiphol (in progress)

In the first half of 2020, a total of **660 tons** of waste was collected. In addition to mixed construction and residual waste, **6 flows were collected separately**: debris, wood, metal, paper / cardboard, glass and foil. In the next six months, we will be adding an extra flow, namely plaster. For foil and paper / cardboard, 2 compactors have been placed on the construction site. This also reduces the number of transport movements because up to 10 times more waste can be put in the compactor than in a normal container.

	KPI Ballast Nedam	A-pier Schiphol
Separation rate on the construction site	70%	74%

Using the waste data, we have calculated how much CO2 we have saved: 99,498 kg CO2

You can compare this saving with:

- 33,166 days of watching television or;
- 471,577 kilometers driving by car or;
- 17,456 hours of showering.



Hotel Asterweg in Amsterdam (completed)

A total of **420 tons** of waste was collected during construction. In addition to mixed construction and residual waste, **8 streams were collected separately**: debris, wood, metal, plaster, foil, paper / cardboard, EPS and big bags. Roll cages were used on the construction site for the collection of EPS and the big bags.

	KPI Ballast Nedam	Hotel Asterweg
Separation rate on the construction site	70%	84%

Using the waste data, we have calculated how much CO2 we have saved: 51.646 kg CO2

You can compare this saving with:

- 17,215 days of watching television or;
- 244,769 kilometers driving by car or;
- 9,061 hours of showering.