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## Disclaimer Calculation of CO2 emissions from road freight

ALPI Danmark A/S discloses CO2 emissions for road freight on each invoice. The calculation includes the entire route from sender address to recipient address, incl. any ferry crossings. The calculations are carried out in our own internal CO2 calculator, which was launched in 2022.

## Data source for CO2 emissions on invoice

CO2 data on the invoice are the most accurate calculations ALPI can provide. The calculation includes empty driving of 8%. It is expected that the trucks will run with 80% load. The CO2 calculator uses weight as the main indicator for the shipped goods.

Currently, the only available fuel included in the calculation is biodiesel 5%. It is expected to be extended to different fuel types in future versions of the CO2 calculator. The total carrying weight of the truck is included as 26 tonnes.

The data for the CO2 calculator is based on standardized data from ALPI's internal system and external routing API services. The calculation method follows the GLEC standard and the EN16258 approach with an ambition to be in line with the upcoming ISO14083 standard.

On the invoice, the result from the CO2 calculator is disclosed in TTW – Tank to Wheel. TTW include the direct CO2 emissions from fuel combustion. The result is measured in CO2e - equivalence, which includes all greenhouse gasses (not just CO2).

## Data source for combined CO2 reports

On request, ALPI Danmark A/S can prepare combined CO2 reports for customers for a given period. The data source is basically the same as described above with a single deviation for ferry crossings. In the combined reports, ferry crossings are converted to road transportation.

In the combined reports, the result is reported in both TTW – Tank to Wheel, and WTW – Well to Wheel.

TTW include the direct CO2 emissions from fuel combustion, while WTW also includes the indirect emissions from the entire supply chain. The result is measured in CO2e - equivalence, which includes all greenhouse gasses (not just CO2).

Some customers have special wishes to get CO2 data on something that is not included in the above calculation. In such cases, it may be necessary to use external CO2 calculators or obtain data from third parties. It may also be necessary to use estimates. It appears from the report if the figure is estimated or comes from third parties. We point out that we do not always have the opportunity to check CO2 calculations obtained from sources other than our own CO2 calculator.





Sometimes there are several legs in the transport. We currently have no option to include travel by courier in the calculations. Trains are currently calculated as truck transport. Driving with external hauliers, who are not part of ALPI's systems, is based on an estimate.

Note: A 5% margin of error has been incorporated into the combined reports. This means that there can be errors in up to 5% of the data base.

