

Traffic Vision is a research project of Orange, aiming at detecting the traffic generated on the roads and highways by trucks and SUVs.

The objective is to derive this information from data generated on a mobile operator network when objects move, within the GDPR framework.

We believe there are several challenges that can be significantly simplified by introducing such big data analysis. Let us consider the two following topics.

First, routing within or around a city: what is the potential impact of implementing a logistic zone on a given location? what would be the impact of closing this or that road, or rerouting traffic momentarily?

This question is easier to answer on a telecom network! But on the terrestrial road network the data available is generally limited to trucks counting or heat maps. Counting and heat maps are valid and useful data however they are “local” both in terms of time and space. They do not introduce the notion of flow, nor do they be used to feed a simulation tool.

Second, limitation of CO2 emission and pollution: while trucks are getting every year better in terms of fuel consumption there remains an expected improvement regarding their actual load. Sharing trucks will not be an easy ride and will involve much more than data. Yet a part of the equation is to have a view on origins/destinations, with enough accuracy to spot opportunities of “truck sharing” and enough fuzziness to respect GDPR. This is one of the main deliverables of TrafficVision.

These are two uses cases among other where TrafficVision will be used.

In the two following diagrams you can see:

- an illustration of trucks origins/destinations in France (we selected the largest volumes of traffic for Origin/Destination)



- an illustration of heatmap around Paris (excluding Paris intra muros)

