



Human Environment and Transport
Inspectorate
*Ministry of Infrastructure
and Water Management*



Duty of care related to export of low quality gasoline and diesel to West-African countries

4 Networkdays

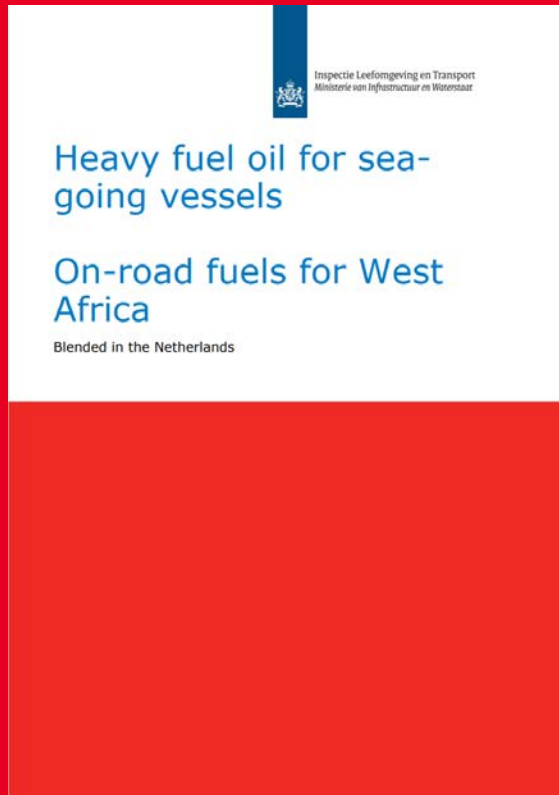
28-29 September 2023

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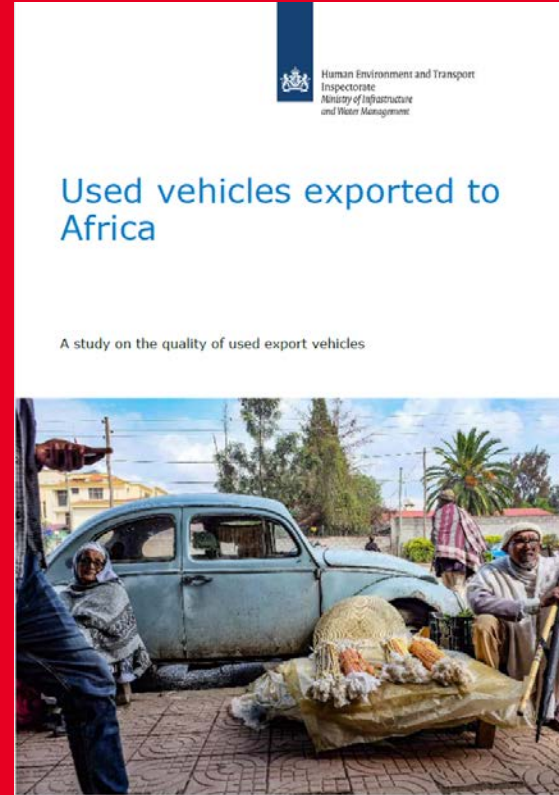


Human Environment and Transport Inspectorate (ILT) and TNO published three reports

2018



2020

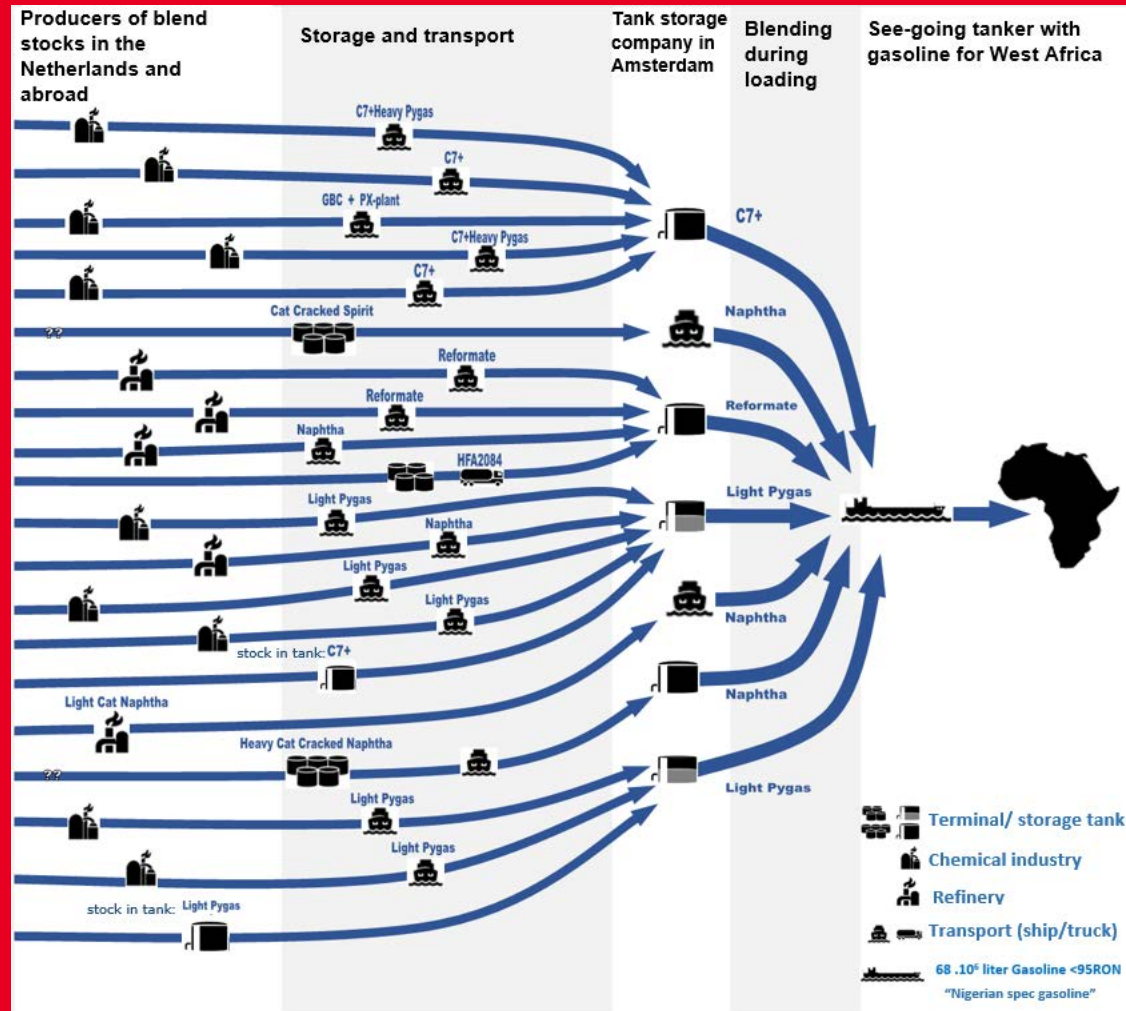


2021





ILT: On-road fuels for West Africa (2018)



Blending takes place at terminals in the Netherlands

Example of the origine of the many different mainly cheap blendstocks used to produce a WAF-gasoline (West African Fuel)



ILT: On-road fuels for West Africa (2018)

Petrol and diesel for West African countries contained high levels of sulphur, benzene and manganese

Sulphur level could be 300 times the 10 ppm that is maximum in Europe

Use of benzene rich blendstocks (e.g. 40 %) raised benzene levels up to 8 %, well above the European standard of 1 %

Manganese containing additives added to adjust the Octane number due to the use of cheap blendstocks – manganese not allowed in European petrol



ILT: Used vehicles exported to Africa (2019)

Average age 16 years, many EURO 3, sometimes EURO 4 emission quality.

Often didn't have a valid periodic roadworthiness certificate

Around 80% of petrol vehicles when tested catalytic converted still functioned

Catalytic converter sometimes removed



TNO: Petrol fuel quality and its effects on the vehicle technology and the environment (2021)

European petrol fuel quality fully compatible to old vehicles such as EURO 3

Fuel quality is of key importance to protect the health of people and the environment, independent of the age of the vehicle, the technology used or even the maintenance of the vehicle

Sulphur and metal components in petrol seriously compromise the efficiency of the emission control systems of petrol engines

Benzene emissions (carcinogen) in old cars substantial higher

500 ppm sulphur can already lead to severe increase in emissions after 15000 km and turns a EURO 3 into a EURO 1 car



Starting point conceptual frame work / approach

Several reports stated low quality fuels and old vehicles causes air pollution contributing to serious health issues in urban areas in sub-sahara Africa like in West African countries

Coherence approach: first better quality fuels than better vehicles

TNO scientific conclusions about low quality petrol also applies to reduction of sulphur levels in diesel
=> immediate reduction of SO₂ and emission PM_{2,5}

Actions of Dutch authorities/ILT:

- duty of care a legally binding principle in Dutch Environmental Management Act
- publication of *Policy Rule on maintaining the quality of petrol and diesel intended for export to low and middle income countries outside the EU, with special reference to the ECOWAS countries*
- inspection and enforcement program



ILT's follow-up on the 3 studies

Duty of care obligation in Environmental Management Act

'Any person who professionally manufactures a substance, mixture or genetically modified organism, or imports it into the Netherlands, applies it, processes it or makes it available to another person, and who knows or could reasonably have suspected that their actions with this substance, mixture or organism could cause hazards to human health or the environment, is obliged to take all measures that can reasonably be required of them to prevent or limit these hazards as much as possible.'



Specifications fuels in Policy Rule:

- As of August 15 2022:
 - Sulphur: petrol 150 ppm max
diesel 350 ppm max
 - Benzene: 1% max
 - Manganese: 6 mg/l max
- As of April 1 2023:
 - Sulphur: both fuels 50 ppm max
 - Benzene: 1% max
 - Manganese: 2 mg/l max

Main exporting countries of gasoline to Nigeria (<https://comtrade.un.org/data>)



2019	2020	2021
Netherlands 5,418,004,764 kg (53.6%)	Netherlands 4,223,958,162 kg (39.8%)	Netherlands 4,201,384,895 kg* (33.1%)
Norway 1,038,172,300 kg (10.3%)	Norway 1,605,675,300 kg (15.1%)	Belgium 3,292,216,505 kg** (25.9%)
UK 968,475,290 kg (9.6%)	Belgium 1,314,091,920 kg (12.4%)	Norway 1,852,435,600 kg (14.6%)
Belgium 926,067,406 kg (9.2%)	UK 880,461,166 (8.3%)	UK 1,044,643,061 kg (8.2%)

Follow-up on the 3 studies

- Clean air human right since 8 October 2021 (UN Human Right Council)
- UNEP-Netherlands high level African Ministers Meeting on clean fuels November 2022 Nairobi
- Benelux Union working group to promote clean fuels exported from EU-countries



Inspection and enforcement

- Inspection of Certificates of Analyses of petrol and diesel exported
 - Assessment of Customs data on export
- Findings first round about 25 % compliant
- several intentional orders to impose an administrative penalty,
 - followed by administrative meetings,
 - in coordination with the pressure of a possible criminal courtcase by gathering information using authority of Economic Offences Act (criminal law).

Findings second round > 95% compliance



State of play

- Despite compliance in the Netherlands getting an international level playing field a serious concern,
- Do other (EU) countries have an equivalent of the Duty of Care (e.g. France, Belgium, Switzerland, Letvia Spain, Norway, UK and US)?
- New concept (EU) ELV directive contains requirements on the export of used vehicles



Thanks for your attention!

Hand out: Policy rule & civil court decision, UNEP-recommendations

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