



Shell
TapUp™

In partnership with

AVK
THE POWER PEOPLE



HVO FUEL*

WHAT IS HVO?

HVO stands for hydrotreated vegetable oil. It is considered a premium renewable biofuel for conventional diesel engines. HVO is a 2nd generation biofuel, which means, unlike conventional diesel, it comes from a non-food bio-feedstock, that does not compete with the food chain. With HVO you can reduce greenhouse gas emissions and other pollutants by up to 80-90%. HVO is suitable for new and existing diesel generators. Because the chemical makeup of HVO fuel is similar to conventional diesel, it can be substituted for conventional diesel with little or no modification needed to the engines. We advise checking with the manufacturer for compatibility.

HOW IS HVO MADE?

HVO is produced by hydrotreating vegetable oils and fats – renewable materials which can be sustainably regrown when needed. To obtain HVO fuel from biomass, the biomass is gasified in a process called 'pyrolysis' where synthetic gas is created. The gas is then converted to liquid using a Fischer-Tropsch-like method. Biomass-to-liquid contains very few sulphur particles and aromatics, so they cannot be released during combustion in the engine. This lowers the fine particulate emissions.

* Source: <https://www.gbf.ltd/gd>

HVO FUEL

BENEFITS OF USING HVO

■ Drop-in solution

HVO can be used in both heavy-duty and light-duty engines as a straight replacement for traditional diesel fuels without needing to make alterations

■ Cold-weather performance

With a higher cetane number than diesel and a low cloud point, HVO allows for improved cold-start properties, clean combustion and a reduced risk of gelling during extreme cold temperatures

■ Clear and colourless

There is no harmful smoke on start up and HVO improves the air quality around the engine as compared to the use of conventional diesel

■ Long storage shelf life

Because HVO does not oxidate or absorb water, it has a long storage shelf life, which decreases the requirement for ongoing testing

EMISSION COMPARISON

CO₂e
CARBON DIOXIDE
EMISSIONS

NO_x
NITROGEN OXIDE
EMISSIONS

PM
PARTICULATE
MATTER EMISSIONS

TECHNICAL
SPECIFICATIONS

-90%

-20%

-80%

EN¹⁵⁹⁴⁰ and ASTM^{D975}

