

100% Veg Oil

Vegetable Oil Car

The car which has been converted is a Volkswagen TDI Diesel Estate, W registration. The conversion was carried out by Daniel Blackburn, www.vegoilmotoring.com. It has been converted using an Elsbett single tank conversion kit and the fuel injectors were modified by Elsbett, www.elsbett.com. The kit and labour cost £1000 and the car cost £8000. The whole project was funded by the Coalfields Regeneration Trust.

The car will be used by AAT's two Energy Efficiency Advisors when travelling to visit householders in the local community.

The fuel used is vegetable oil which can be obtained from any shop. It is probably best to get the cheapest shop vegetable oil rather than fish and chip shop oil as the latter has an anti-foaming agent which makes it more expensive.

The car is insured with Royal Sun Alliance at a premium of £1874 and covers any driver to use it. It was difficult to get insurance as the companies differentiate between private motorists and companies. We think this is the first company car running on 100% vegetable oil in the UK.

We are registered with Customs and Excise and pay duty on the oil at 27.1p/litre. We can buy the oil at about 39p/litre.

Advantages:

- The car goes without any noticeable change in power, noise etc.
- Emissions will be minimal as the fuel is from a plant (see Elsbett website for more information on this).
- Carbon neutral.
- Readily available fuel - no need to set up big supply infrastructure as per LPG, hydrogen fuel cells etc.
- In global terms, each region has a range of plants which could produce cheap oil - rapeseed in UK, olive oil in Greece etc. Much more sustainable.
- Suitable for second hand cars which are out of warranty.
- Cheaper than fossil fuels.
- Kit does not take up much room and fits neatly in existing engine space.

Disadvantages:

- Some cars may have problems starting in winter. This shouldn't be a problem for a VW. The solution is to add ordinary diesel.
- Suitable for certain types of fuel pump - Bosch, Daewoo etc. Not so good with CAV Lucas.

- May be problems with some cars if they have computerised fuel injection.
- Car manufacturers don't give a warranty on it for new cars.
- Does not appear there has been sufficient testing in the UK to fit it into the mainstream grants programmes.
 - Most people think it is illegal due to police clamping down on people who add vegetable oil to diesel - labelled the 'Frying Squad' in the media.
 - In Germany, we understand there is no duty on vegetable oil fuel. In the UK, it seems LPG is favoured as it is 9p/litre duty.