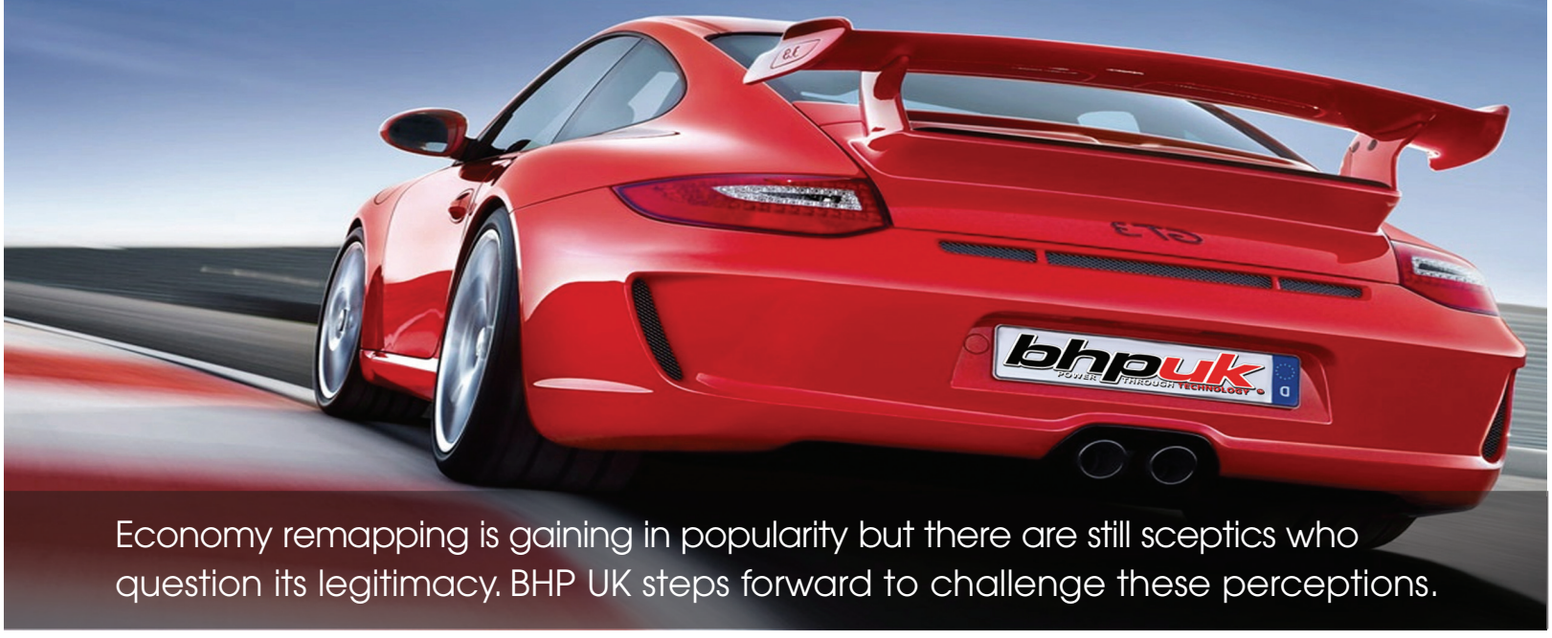
ECONOMY ECONOMICS



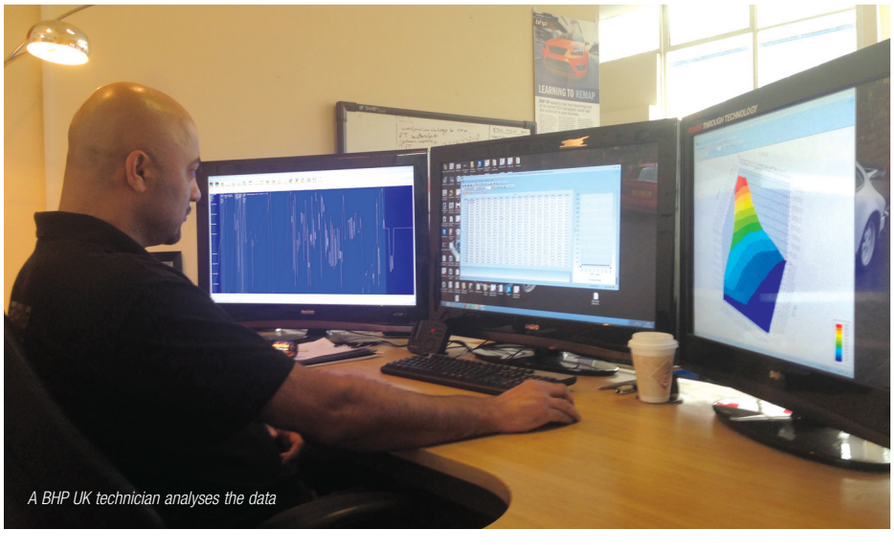
Economy remapping is gaining in popularity but there are still sceptics who question its legitimacy. BHP UK steps forward to challenge these perceptions.

In the current economic climate both businesses and individuals are looking to save money. With the spiralling cost of fuel, it's little wonder that reducing fuel costs is high on the list of priorities. Such a demand for better fuel economy has therefore led to some specialists – such as BHP UK – investing heavily in the research and development of economy ECU remapping.

Mapping for economy

When most people think about remapping for economy, they imagine that we we would reduce the amount of fuel supplied to the engine, by effectively leaning the air-fuel mixture. However as most technicians are aware, leaning the air/fuel mixture is very likely to cause damage to the engine so, in practice, this is not an option. To understand how to improve fuel economy we have to consider the various factors that can degrade fuel economy and these include:

- **Flat spots in the power delivery** – any flat spot in power delivery results in the driver having to open the throttle further to 'pull through' the flat spot.
- **Low torque output at low RPM** – this will usually mean the driver will have to stay in lower gears for longer, especially in conditions when load is increased. A good example of this is when the vehicle is loaded, up hills or when towing.
- **An engine running 'over-rich'** – this often occurs at the top end of the RPM.
- **Lean fuelling maps** – in order to lower the tax banding of a vehicle some manufacturers have been known to make their fuelling maps leaner. This is a practice that is more common than most people would imagine or manufacturers would accept.


A BHP UK technician analyses the data

Remapping dangers

As the remapping market grows, there has been a proliferation of mapping companies that use very basic testing and equipment to remap vehicles. On many occasions they may use the