# Car Corner

## A Smooth Way To Upgrade A Car's Performance

(NAPSA)—Here's a tip for drivers looking for a quick and inexpensive way to improve a car's performance and reliability—select the right motor oil. There are meaningful differences in oils and choosing the right one impacts how well your car runs.

Two components determine how well motor oil will perform in your car. One factor is the base oil and the other is the combination of chemicals (additives) that are added to the base oil.

#### **Base Oils**

The two primary types of base oils used are mineral and synthetic. Mineral oils are by-products of crude oil. These are the cheapest and most widely available oils, which provide minimum levels of performance and protection. Refining reduces the impurities in these oils but leaves molecules of all shapes and sizes.

Synthetic oils are man-made compounds whose molecules are all the same size and shape; consequently, synthetic oil provides less friction and performs significantly better than mineral oils. In fact, synthetic oils are often the factory fills in many new performance and luxury cars.

#### Additives

Regardless of the base oil used, chemicals must be added to give motor oil the characteristics needed to do its job. Typical additives that may be added to base oil include detergents to reduce the formation of residue, defoamants to deter absorption of air, antiwear agents, antioxidants and others. Some of the biggest technological advances in lubrication are now coming through advancements in chemical additives.





Mineral Oil

Synthesized Hydrocarbon

The uniform shape and size of synthetic oil molecules reduce friction for improved performance.

### **Advances In Lubrication**

A handful of "boutique" manufacturers now specialize in developing high-performance lubricants. For example, one high-performance lubricant company, Royal Purple, has developed lubricants that outperform both leading mineral oils and other synthetics using a proprietary additive technology it calls Synerlec. Its oil has been proven in numerous independent tests to reduce engine wear, increase horsepower and torque, and reduce fuel consumption and emissions. Cars using its oils can also go farther between oil changes, saving time and money and reducing the impact on the environment. You can learn more at www.rovalpurple.com.

#### How To Choose Your Motor Oil

For a used car with little life left in it, stick with the cheap mineral-based motor oil. For a car you plan to keep for a few years and want to get a little better performance from, you should at least upgrade to synthetic motor oil. To get the most performance out of your car, truck or RV, or to protect a vehicle you really care about and want to last, upgrade to one of the new high-performance boutique motor oils.