



UNITED STATES ENVIRONMENTAL PROTECTION AGENCY
WASHINGTON, D.C. 20460

OCT 21 2008

OFFICE OF
SOLID WASTE AND EMERGENCY
RESPONSE

Mr. Chad Hall
101 Tom Banks Circle
Glennville, GA 30427

Dear Chad:

Thank you for your letter about recycling old tires on the side of the road. Let me assure you that EPA is doing all it can to encourage recycling, not just old tires, but all forms of materials. The EPA has an initiative called the Resource Conservation Challenge or RCC, more information at www.epa.gov/rcc. One of the areas that the RCC looks at is recycling used tires. Several years ago we set a goal to divert 85% of all newly generated scrap tires to reuse, recycling or energy recovery by 2008, and we've reached this goal. (In 1990 only 17% of scrap tires were being recovered.) Finding strong and diverse markets for scrap tires is the best strategy for diverting scrap tires from going to tire piles, landfills or the side of the road.

Most rubber used today does not come from rubber trees. As much as 70% of the rubber used in the US is a man-made synthetic. But we should still try to conserve and recycle it as much as possible. Tires are composed of multiple types of rubber. When rubber is made it is vulcanized. This keeps it from being soft and gooey in the summer or hard and brittle in the winter. Tires also contain steel wire and other fibers to give them strength. Because tires are not homogenous like glass or aluminum and because it can be very difficult to reverse the vulcanization process, tires cannot be simply melted down and then formed into the same product again.

Only a small amount of scrap tire rubber (approximately 3-5%) is incorporated into new tires. It is more efficient to either incinerate them for energy recovery (which saves other resources like coal, oil and natural gas) or recycle them into other products.

Even though used tires may not be suitable to be melted down to make new tires, there are other ways that they can be reused or recycled. Some tires that may be worn down on the tread but still good on the sides can be sent back to the factory to be

retreaded. Retreading saves millions of scrap tires from being disposed of as scrap each year. By one estimate, about 16.5 million tires are retreaded and sold each year in the U.S. and Canada, combined. Most are used by the trucking, aircraft, construction, and agriculture industries, and on US government vehicles.

Another way to recycle old tires is by grinding them up into tiny bits. The ground rubber, called crumb rubber, can be used to make some kinds of new rubber products like traffic cones, playground and other sports surfacing, or added to asphalt to make quieter and longer lasting road surfaces. Crumb rubber uses account for 38 million tires per year or 12% of the total generated. Sometimes larger pieces of chopped up tires, called tire shreds, are used as a lightweight aggregate for civil engineering uses in road construction and building projects. Civil engineering uses accounts for 49 million tires per year or 16% of the total generated. By far the largest use of scrap tires is as fuel as an alternative to coal in cement kilns, pulp and paper mills, and industrial and utility boilers. This accounts for 155 million scrap tires or 52% of the total scrap tires generated in 2005 and saved the equivalent of nearly 481 million gallons of gasoline. This is energy that would go entirely unrecovered every year if these tires were landfilled instead of being used as a fuel source.

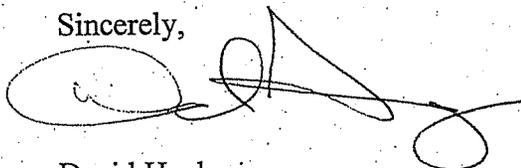
One of the difficulties in recycling rubber is the need to make sure the quality of the used rubber is good enough to meet the requirements of the products being made from it. Sometimes old tires left outside for a long time can become so dirty and degraded that they are no longer capable of being recycled and must then be disposed of in some other environmentally safe manner.

There are approximately 290 million scrap tires generated every year in this country. Most of these are handled appropriately. But unfortunately some of these scrap tires end up on the side of the road. They may get there accidentally by falling off passing vehicles, or they may be deliberately and illegally thrown there by unscrupulous people who don't want to make the effort to handle them properly. Thankfully the number of scrap tires that end up on the roadside is very small compared to the 290 million that are generated each year.

Litter and trash pick up on the side of the road is not something that EPA normally gets involved in (unless it is a spill of a hazardous waste). Most of the time the cleanup of roadside debris is a local issue best handled by the state or county. Sometimes community volunteers will sign up to make sure a specific segment of roadway is kept clear of litter. This can be a good way for local groups to take a part in keeping their communities clean.

Finally, I want to encourage you to keep thinking of new ideas and better ways to preserve and protect our environment. If everyone were to take as much of an interest as you, the world would be a much cleaner place for all of us. Thank you again for your interest in protecting the world we live in.

Sincerely,

A handwritten signature in black ink, appearing to read 'David Hockey', with a large, stylized flourish extending to the right.

David Hockey
Chief, Corrective Action Programs Branch
Office of Solid Waste