

**Wheels:** Dr. P has another question, “My old BMW has been a lot noisier than in the past. I know tires can be the cause, but they were recently replaced. A friend said that a bad wheel bearing can be the cause. Is this true and if so, how can I tell if the noise is caused by the tires or a wheel bearing?”

**Halderman:** Good question. Noises are one of the most difficult faults for a technician to locate. In this case, determining if the noise is caused by a tire(s) or a wheel bearing is relatively easy.

- If the noise is the same on all types of road surfaces, then the most likely cause is a wheel bearing.
- If the noise changes while driving on different road surfaces, then the tires are the most likely cause.

According to automotive engineers, about 80% of the tire noise is transmitted through the chassis to the interior, leaving about 20% of the noise heard through the air. Wheel bearing noise is mostly transmitted through the chassis and is very similar to a noisy tire.

**Wheels:** Does replacing wheel bearings cost a lot?

**Halderman:** It depends on the type and location of the wheel bearing. Many wheel bearings are included as part of the hub assembly, while others are a simple replaceable part. Shops and dealers can give you an estimate after the diagnosis has confirmed the cause of the noise.

