Vehicle Tyre Treads and how to check the tread on the tyre.

Braking distances and tread depths

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1. Added meaning of Aquaplaning and hyroplaning.

What's the tread depth of your tyres? You probably don't know the answer to this question – and, honestly, I can't blame you for not knowing. It generally isn't the kind of detail that's at the forefront of your minds. That said, your tread depth is actually really important when it comes to the safety and performance of your tyres.

The truth is that tread depth isn't that complicated and is a great way to measure how worn-out your tyres are. In Australia, the tread depth of new tyres is 8.0mm. It's recommended you look for new tyres when the tread depth is 3.0mm. The minimum legal tread depth allowed on your tyres is 1.6mm and at this point **you must replace** your tyres.

You might be wondering why I recommend new tyres at almost double the minimum legal tread depth. Tread depth actually makes a big difference to your car's handling, cornering and, most importantly, its stopping ability. This is especially true in wet conditions. Consider the image below*:

When travelling at 80km/h in the wet, you see a hazard in the road and need to stop quickly. On a new tyre, you'll come to a stop comfortably and with reduced risk of aquaplaning. On a tyre that's been worn down to 3.0mm in tread depth, the same car will still be travelling over 30km/h at the point the new tyre would have stopped, and will take an additional 9.5m to stop.

When driving on a tyre with the minimum legal tread depth of 1.6mm the same car will be travelling

over 40km/h when the car with the new tyre has stopped and will still be in excess of 30km/h when the car with 3.0mm tread depth has stopped. It'll take 18.6m more distance than the car on the new tyre to stop.

Another way to think of it is in car-lengths. If the average Australian sedan is about 5m in length, then it's nearly two full car-lengths needed to stop with 3mm tread depth, and just over three-and-a-half car-lengths to stop with 1.6mm tread depth.

If you see the tread less than 3.0 please add it to your vehicle log that I and Karlisle see and we can add it to the next service.

Don't know how to check your tyre thread. Use the quick 20 cent coin check. Here is the link https://www.bridgestonetyres.com.au/life-hack-how-to-check-your-tyre-tread

Aquaplaning or Hydroplaning:

Low or Poor tyre tread can cause Aquaplaning or hydroplaying. The term aquaplaning is commonly used to refer to the skidding or sliding of a cars tires across a wet surface. Hydroplaning occurs when a tire encounters more water than it can scatter. Water pressure in the front of the wheel pushes water under the tire, and the tire is then separated from the road surface by a thin film of water and loses traction. The result is loss of steering, braking and power control. For more information on this refer to https://www.safemotorist.com/Articles/Hydroplaning_Basics/

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