



# YOUNG DRIVERS®

# WINTER TIRE FACT SHEET

## THE ONE TIRE MYTH

On the 23rd of February 2015, Young Drivers of Canada set out to test the effectiveness of various types of vehicle tires at its test facility in Markham, Ontario. Invited were Canadian professional automotive journalists and industry representatives to obtain their viewpoints on the testing process and its results, more of which can be seen in the resulting Young Drivers of Canada documentary "Unsafe at Winter Speeds".

**“ ... in the end, winter tires do work better in winter than other classes of tires.**

John Mahler, Toronto Star WHEELS writer

### CHOICE OF WINTER TIRES

#### DEDICATED WINTER TIRE

Winter tires are specifically designed to provide better traction, braking and handling in frost, snow, slush, and also icy conditions. To maximize control and performance, installing four winter tires is important, and not mixing tires of different tread, size and construction.

#### ICE TIRE

An Ice Tire is a subset of Winter Tires manufactured with rubber compounds that work specifically on icy roads, without the necessity for studs. While studded tires are legal in many regions of Canada, Ice Tires attempt to provide the same control in those areas where studs are prohibited.

#### ALL SEASON TIRE

All Season Tires are a good choice for many Canadian drivers, being designed for multi-season use. However, they are not designed for winter conditions. Falling into this category are also tires marked M+S, which although mud and snow capable are actually all-season tires.

#### ALL WEATHER TIRE

All-weather tires designed as true four season tires will carry the Transport Canada pictograph of mountain peaks with snowflakes (see sidebar), showing tires having passed the test as a "snow/winter" tire - be careful to not be fooled by similar, but not identical snowflake designs!

### WHAT TO LOOK FOR

According to Transport Canada, tires that are marked with the pictograph of a peaked mountain with a snowflake must meet specific snow traction performance requirements. These tires are designed specifically for use in severe snow conditions.



### RESOURCES

#### Young Drivers of Canada

- See more on the event at <https://www.yd.com/docs>

#### MTO Ontario Ministry of Transportation

- See "Winter Driving - Be Prepared, Be Safe" at <http://www.mto.gov.on.ca/english/ontario-511/pdfs/winter-safe-driving.pdf>

#### TRAC Tire and Rubber Association of Canada

- See "Tips for Winter Driving" at <http://www.rubberassociation.ca/wintertirevideos/whatyoushouldknow.html>

#### The TORONTO STAR

- See full Test Results at <http://www.thestar.com/autos/2015/02/26/winter-tire-evaluation-day-a-real-eye-opener.html>

Prepared by Young Drivers of Canada.

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### WHEN TO CHANGE

All-season tires function capably in most weather conditions, although when the outside temperature drops below 7 degrees Celsius, the tire's rubber hardens and loses its ability to grip the contact surface. So a good time to change tires is when you change your clock!



### SAVING MONEY

You can actually save money by having 2 sets of tires, including a dedicated Winter Tire. Since All-Season Tires wear faster in the winter, switching to a set of Winter Tires will extend the tread life of and investment in your All-Season Tires, and vice-versa.

### THE RESULTS

The Young Drivers of Canada Winter Tire Challenge tested different types of tire performance in winter conditions, with the following results.\*

\* Results obtained are meant to be illustrative only and not to apply to any particular person, tire or vehicle.

#### CORNERING

The Premium Winter Tire was the quickest through the slalom chicane, 2nd was the Ice Tire, and coming in 3rd was the All Season Tire. The rest of the tires tied for last.

The Premium Winter tire along with the Ice Tire and All Season Tire handled the snow drifts with no loss of forward momentum.

#### SNOW DRIFTS



#### ICE BRAKING

The Premium Winter Tire and Budget Winter Tire had the shortest distances, with the Ice Tire, Mid-cost Winter Tire, and All Season Tire, a fair bit behind. The All Weather Tire came in dead last, with distances and placement speed dependent.

The tires were not subjected to a performance test on startup, but results expectedly would approximate that for Ice Braking.

#### ICE STARTUP