
RESEARCH BACKGROUNDER

The research results are in, but drivers on their cellphones aren't likely to notice

A recent study commissioned by Insurance Bureau of Canada assessed the effects of cellphone use on the driving behaviour of novice as compared to experienced drivers. The two-part study was conducted in a driving simulator in a university laboratory and on the streets of Calgary; previously in Canada, research of this type had focused only on simulated or closed-circuit on-road courses. Study participants were asked to interact with cellphones and CD players while dealing with traffic situations. The reaction times, eye movements and vehicle control of the participants were measured to assess driver performance.

What we expected to find: Novices on cellphones drive poorly

From the outset, the expectation was that this research would provide evidence that drivers' use of cellphones and CD players is more detrimental to the driving behaviour of novices than it is to that of experienced drivers. IBC's intention was to use this evidence to support a lobby calling for a restriction on novice drivers' cellphone use to be included in graduated licensing programs.

In line with IBC's and the researchers' expectations, the recent study highlighted a couple of small cellphone-related differences between novice drivers and experienced drivers:

- In the simulator, experienced drivers slowed down while on the phone, increasing their margin of safety, but novice drivers did not adopt this safety strategy.
- In the on-road trials, novice drivers wandered more in their lane while dialing or talking on the phone than they did when they weren't distracted. Experienced drivers didn't demonstrate this effect.

As well, the study highlighted some general differences in the driving behaviour of novice drivers as compared to experienced drivers:

- In the simulator, both on and off the phone, novice drivers were slower to detect hazards than were experienced drivers and, consequently, moved closer to the hazards than did experienced drivers.
- In general, the driving of novices was found to be poorer than that of experienced drivers.

These findings are noteworthy enough to be raised as evidence that cellphone use by novice drivers should be restricted within the guidelines of graduated licensing programs. Restrictions on the number of passengers novice drivers can carry, and where and when they can drive are intended to help these drivers focus on the road. A ban on novices' cellphone use while driving would be in line with the restrictions already in place under most graduated licensing systems, and likely assist novice drivers in learning to detect hazards and properly control their vehicles.

But the study results suggested that the concern about drivers using cellphones shouldn't be focused solely on novices.

What we didn't expect to find:

Experienced drivers on cellphones drive just as poorly

The overall conclusion stemming from the study results was that the driving behaviour of novice drivers and that of experienced drivers were both affected by the drivers' use of a cellphone.

- In the simulator, both groups of drivers restricted their visual scanning of the road while they were on the phone.
- In the simulator, experienced drivers on cellphones, despite the fact that they slowed down, were just as slow as novices on cellphones in responding to pedestrian hazards.
- In the on-road trials, both groups of drivers slowed down while they were on the phone, yet still detected hazards more slowly than when they weren't on the phone.

This is strong evidence that driving while on a cellphone increases a driver's crash risk.

Driver distraction is the broader problem

Just as novices aren't the only drivers affected by distraction, cellphones aren't the only distraction. The study results showed that CD players also negatively affect driving behaviour:

- ▶ In the simulator, experienced drivers were slower to respond to road hazards while interacting with a CD player (compared to when they weren't being distracted).

So, it's clear that cellphones and CD players distract drivers. What about MP3 players, PDAs, navigational systems and other high-tech gadgets that drivers will bring into their cars in the future? And technology isn't the only issue. Eating and drinking, personal grooming, looking at a map, and dealing with unruly child passengers also draw a driver's attention away from the road.

The researchers can't possibly keep up.

Perhaps it's time we made the leap from research results to common sense, and acknowledged the fact that **driving while distracted is a road safety issue that can have serious consequences.**
