

Parkinson's Disease Can Impair Driving

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NEW YORK (Reuters Health) - People with Parkinson's disease may be poorer drivers than others their age, a small study suggests, but there is no clear way to predict which patients may be unsafe on the road.

In road tests of 25 older adults with Parkinson's disease and 21 without the disease, Australian researchers found that those with the neurological disorder tended to have more difficulty maneuvering their cars, negotiating intersections and keeping an eye on their "blind spot."

Parkinson's disease is a progressive disorder marked by the loss of brain cells that produce dopamine, a nerve-transmitting chemical that helps regulate movement. The major effects include tremor, muscle rigidity, slowed movement and problems with balance and coordination.

It's likely that a combination of these movement difficulties and other Parkinson's disease effects, such as problems processing visual-spatial information, explain the poorer driving performance seen in this study, according to the researchers.

However, they found no specific impairments that could reliably predict which study patients would be less safe on the road.

The researchers, led by Dr. Joanne M. Wood of Queensland University of Technology, report the findings in the *Journal of Neurology, Neurosurgery and Psychiatry*.

A number of reports have highlighted the potential for Parkinson's disease medications to trigger "sleep attacks" -- an obvious danger on the road. Less attention has gone toward the effects the disorder itself can have on driving performance-effects that, according to Wood's team, are arguably a more significant source of driving problems than Parkinson's drugs are.

To study the question, the researchers had the subjects drive with an instructor and an occupational therapist who judged their on-the-road skills. Participants were 64 to 65 years old, on average.

Overall, drivers with Parkinson's disease had more difficulties changing lanes, staying in their lanes, reversing and parking the car, negotiating intersections with traffic lights, and checking their blind spot. In addition, instructors were more likely to have to intervene to avoid an accident when riding with a driver with Parkinson's disease.

However, the severity of Parkinson's symptoms, as judged by standard tests, did not reliably predict which drivers might be a hazard on the road, according to Wood and her colleagues.

The findings, they note, suggest that upon diagnosis, people with Parkinson's disease should be told of the possible effects on their driving skills -- and that their road skills should be monitored over time.

"Drivers with Parkinson's disease probably have limited awareness of their deteriorating driving performance and need regular monitoring," Wood and her colleagues write.

Since particular driving skills emerged as problematic in this study, they add, it's possible that "targeted driving retraining" could help people with Parkinson's safely stay on the road -- and maintain their independence for a longer time.

Right now, doctors rely on their own judgment when it comes to advising Parkinson's disease patients to stop driving, Dr. Anette Schrag of University College London notes in an accompanying editorial.

"This study," she writes, "highlights the need to assess driving ability in Parkinson's disease regularly and in a standardized fashion."

Future studies, she adds, should look into which effects of Parkinson's disease seem to impair driving, and whether any "compensatory strategies" can improve patients' road skills.

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