Understanding and Helping Drivers with Alzheimer’s Disease

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Alzheimer’s disease, the most common form of dementia, offers unique challenges for law enforcement as the presence of this chronic disease may impair many older adults. The disease challenges law enforcement when an older adult with dementia violates road safety laws. Furthermore, complications arise when law enforcement officers encourage the older adult to continue driving. This article will review these issues by providing background information on the disease, research on driving behaviors affected by Alzheimer’s disease, and suggestions for how to divide attention may be impaired. Finally, the inability to process information is observed in reduced reaction time and driving below the speed limit.

The number of Americans with Alzheimer’s disease and other dementias will grow each year as the proportion of the U.S. population that is over 65 continues to increase. The 1984 criteria for Alzheimer’s disease, which included memory loss as the central characteristic of the disease, was revised in 2011. The new criteria expanded beyond memory loss as the initial or major symptom. They include a wider range of cognitive and behavioral abnormalities, such as word-finding ability or judgment, which may be the first symptoms to appear. The 1984 criteria focused on memory loss as the primary symptom of Alzheimer’s dementia. Behaviors that may impact the ability to drive a vehicle include:

- demonstrating decreased coordination;
- experiencing difficulty judging distance and space;
- becoming lost or feeling disoriented in familiar places;
- experiencing difficulty engaging in multiple tasks;
- having increased memory loss, especially for recent events;
- being less alert to things happening around him or her;
- experiencing mood swings, confusion, or irritability;
- requiring prompting for personal care;
- having difficulty processing information; and
- experiencing difficulty with decision making and problem solving.

How the Signs and Symptoms Affect Driving Ability

Alzheimer’s disease is viewed as a disorder primarily of memory loss. Yet researchers have long known that Alzheimer’s disease is characterized by impairments in several additional areas. The neuropathology of this disease affects several brain areas that are devoted to processing visual functions, which in turn affect attention and cognition. Suzanne Holroyd points out that visual hallucinations are the most common hallucination in Alzheimer’s disease, occurring in 12 percent to 53 percent of people with the disease. Holroyd explains that Alzheimer’s disease is associated with a reduction in these multifactorial abnormalities such as decreased contrast sensitivity (that is, the ability to see an object against a background of similar color or contrast); stereocuity (that is, visual agnosia; that is, the ability to identify familiar objects) create visual hallucinations.

People with Alzheimer’s disease often present first with complaints of visual loss, difficulties recognizing objects, deterioration in eye-hand coordination, and topographic disorientation. These may be related to higher-order cognitive symptoms and a reduction in functional capacities. Everyone seems to understand the effects of vision on driving; however, the effects of cognitive impairments may be impaired by drivers with cognitive deficits and their caregivers.

Shaun Vecera and Matthew Rizzo argue that many of the cognitive, attention-related impairments evident in Alzheimer’s disease might be produced by limitations in visual search and attention. People with Alzheimer’s disease may exhibit impairments in searching through a cluttered visual scene. As in driving, people are required to visually search their environments for information about objects and events. Visual short-term memory may be impaired by not receiving clear visual information at the beginning of the visual search. Impairments in visual short-term memory may mean that the driver may not recognize familiar buildings or objects in an environment of many buildings and objects that would normally provide navigational orientation. Therefore, the need for object memory may contribute to the impairments experienced by drivers with Alzheimer’s disease.

Poor Driving Behaviors Resulting from Impairments

Alzheimer’s disease is a global brain disease, meaning that it affects various areas of the brain resulting in a variety of functional impairments. There are myriad ways that the effects of poor driving may manifest. Becoming less coordinated may result in a driver with dementia having trouble moving a leg from the accelerator to the brake smoothly. Or, the leg may be missed altogether, causing a delay in response time to stop a vehicle. Another example is the inability to judge distance and space, which may result in turning inappropriately across traffic lanes—for example, attempting a left turn when oncoming traffic does not allow, or being less alert to things happening around him or her. The increased memory loss and disorientation in familiar places has led many drivers with dementia to become lost with tragic outcomes. Among 207 reports of lost drivers with Alzheimer’s disease, 70 drivers were not found, 32 drivers were found dead, and 116 drivers were found alive—35 of whom were injured. For the people found alive, the range of miles from the location at which they were last seen was 1 mile to 1,730 miles, with an average of 1.99 days missing. For the people found dead, the range of miles from the point of origin was 4 miles to 930 miles, with an average of 26.76 days until a body was found.

Clearly, law enforcement has a role in preventing these tragedies, as lost drivers may be stopped by law enforcement for poor driving practices or might stop to ask law enforcement officers for directions. Alternatively, officers can use their experience with traffic violations to help drivers with dementia. The loss of driving ability may mean that the impaired driver was stopped by a police officer for a traffic violation. However, they often report, a ticket was issued for a traffic violation, but they feel sorry for the older driver and provide only a verbal warning. Family members struggle with driver cessation—that is, removing the car from the person with Alzheimer’s disease. This can be helpful if there was physical evidence of impaired driving such as tickets and reports sent to the Department of Motor Vehicles to help resolve the argument that it is time to stop driving. Having these physical pieces of evidence can be very helpful if there was physical evidence of impaired driving such as tickets and reports sent to the Department of Motor Vehicles to help resolve the argument that it is time to stop driving.

Possible Solutions

Law enforcement officers are instrumental in assisting drivers with dementia. The assistance may come through issuing tickets for traffic violations in a clear signal to families that it is time to stop driving. Another example is the inability to judge distance and space, which may result in turning inappropriately across traffic lanes—for example, attempting a left turn when oncoming traffic does not allow, or being less alert to things happening around him or her.
There are signs that a driver with dementia is lost. Looking for these signs may help law enforcement provide immediate assistance to the driver with Alzheimer’s disease or other related dementia. For example, when drivers are found lost and request information, these drivers may repeat the same questions—a sign of memory impairment. Moreover, the distance traveled, and how these pieces of information relate to the story the driver is telling. For example, drivers may report they were headed for the grocery store in the next town over, but they do not know how to get there. Police officers often report that they stop a driver because the vehicle is driving too slowly in the lane lines or are driving too fast. Police officers believe they are stopping an intoxicated driver, only to find that the driver is in distress from driving lost. Clearly, a physical and/or verbal cue of the driver home or calling a relative or friend to retrieve the driver. (On a cautionary note, drivers with dementia may not be able to follow a family member home. On numerous occasions, the traffic may require problem-solving skills to continue following a specific vehicle—skills that may be beyond the capabilities of the driver with dementia.)

Another sign that a driver may have Alzheimer’s disease or other related dementia is the driver’s appearance. For example, drivers may be disheveled or dressed inappropriately may be hungry, thirsty, or in need of medications. All these concerns may be approached with thoughtful questioning to decide whether or not a person is memory impaired. Finally, copiloting is not recommended to assist the driver home or calling a relative or friend to retrieve the driver. (On a cautionary note, drivers with dementia may not be able to follow a family member home. On numerous occasions, the traffic may require problem-solving skills to continue following a specific vehicle—skills that may be beyond the capabilities of the driver with dementia.)

Vehicles.

Notes:


5. Ibid., “Drivers with Dementia and Outcomes of Becoming Lost while Driving.”

Please cite as: