COMPLEXITIES OF DRIVING

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Complexities of Driving

- Have I identified any “Key Indicators” that could affect driver performance?
- What do I do now?
- Where do I start?

Complexities of Driving

- What observation skills or resources do I have to consider driving may be an issue.

- Physician, family, OT, PT, SLP, cognitive evaluation.

- *Physical

- Can I safely enter the vehicle with adequate gait, transfers, and demonstrate the ability to safely stow an assistive gait device if needed.

Key Indicators

-Do I have the musculoskeletal requirements to complete pre-drive adjustments of the vehicle. Consider AROM, trunk rotation, strength, pinch, fine motor prehension.

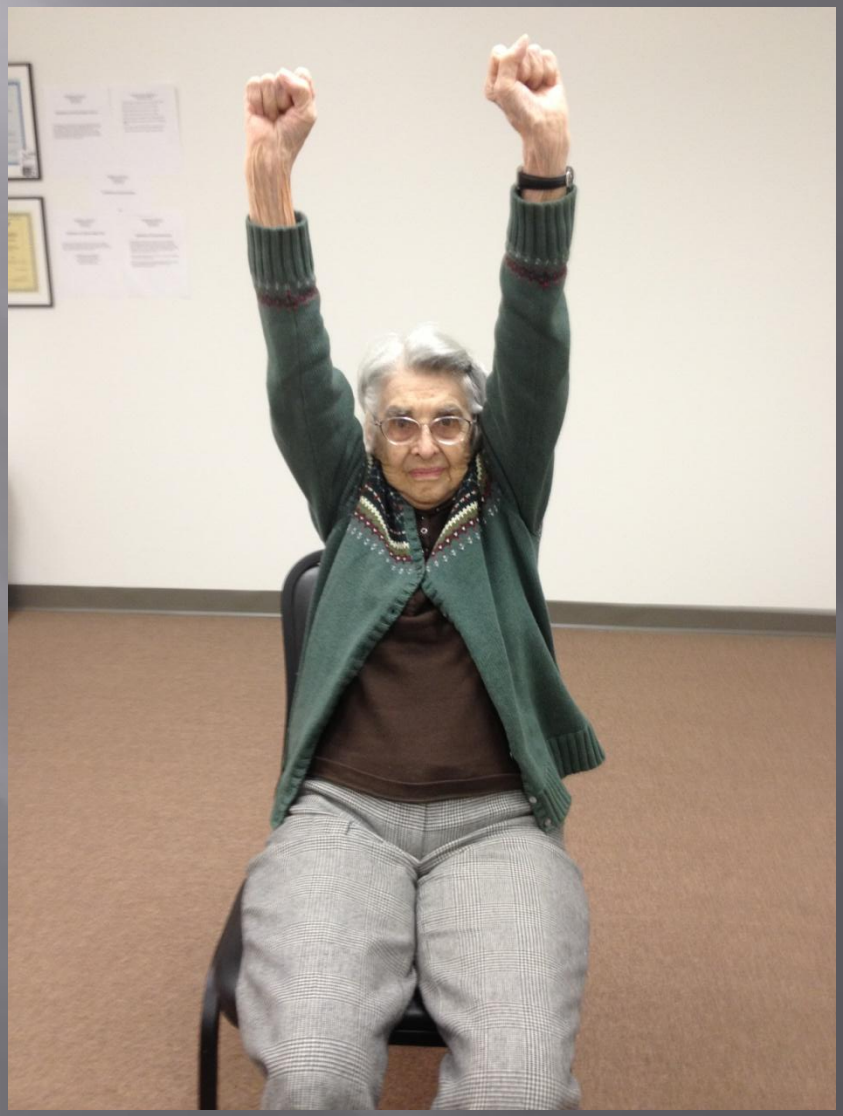
-What do I do when I get into my car? What biomechanics are required to complete pre-drive adjustments?

-Is it ok if I choose not to use them?

Key Indicators

- Does my resident or consumer have the musculoskeletal requirements to “physically” drive using OEM controls.
- Starting, parking brake release, gear shift, steering, gas/brake, turn signals, horn, wiper, wiper wash, cruise, dimmer, etc.
- HVAC, radio, navigation, cell phone.

What range of motion is required to drive?



Is it a simple process….

If ROM was the only consideration then he would not drive.

Or her at 2’9”

Or him as a C5 Quadriplegic

Key Indicators

-Hip flexion, adduction, abduction, knee ext./flexion, ankle dorsa flexion and plantar flexion.

-Sensory discrimination

-AROM patterns in the upper extremities.

-Consider more than just shoulder range of motion. Forearm rotation, wrist function, grasp/release.

Key Indicators

-Look at a biomechanical plane that simulates driving.

-Seated without the affects of gravity and gait.

-Observation of gait is not the plane of driving.

Key Indicators

-What vision is required to drive in our state?

-Where would I find this?

*Glaucoma, macular degeneration, cataract formation, sensitivity to light.

*Refer to your vision specialist with a specific question regarding the consumers ability to drive or need for assessment.

*Has there been any changes that could affect there ability to see when driving.

Key Indicators

-Are we aware of any vision or visual perceptual deficits that could influence driving.

*Distance acuity
*Depth perception
*Horizontal fields
*Color perception
*Contrast sensitivity
*Visual Perceptual

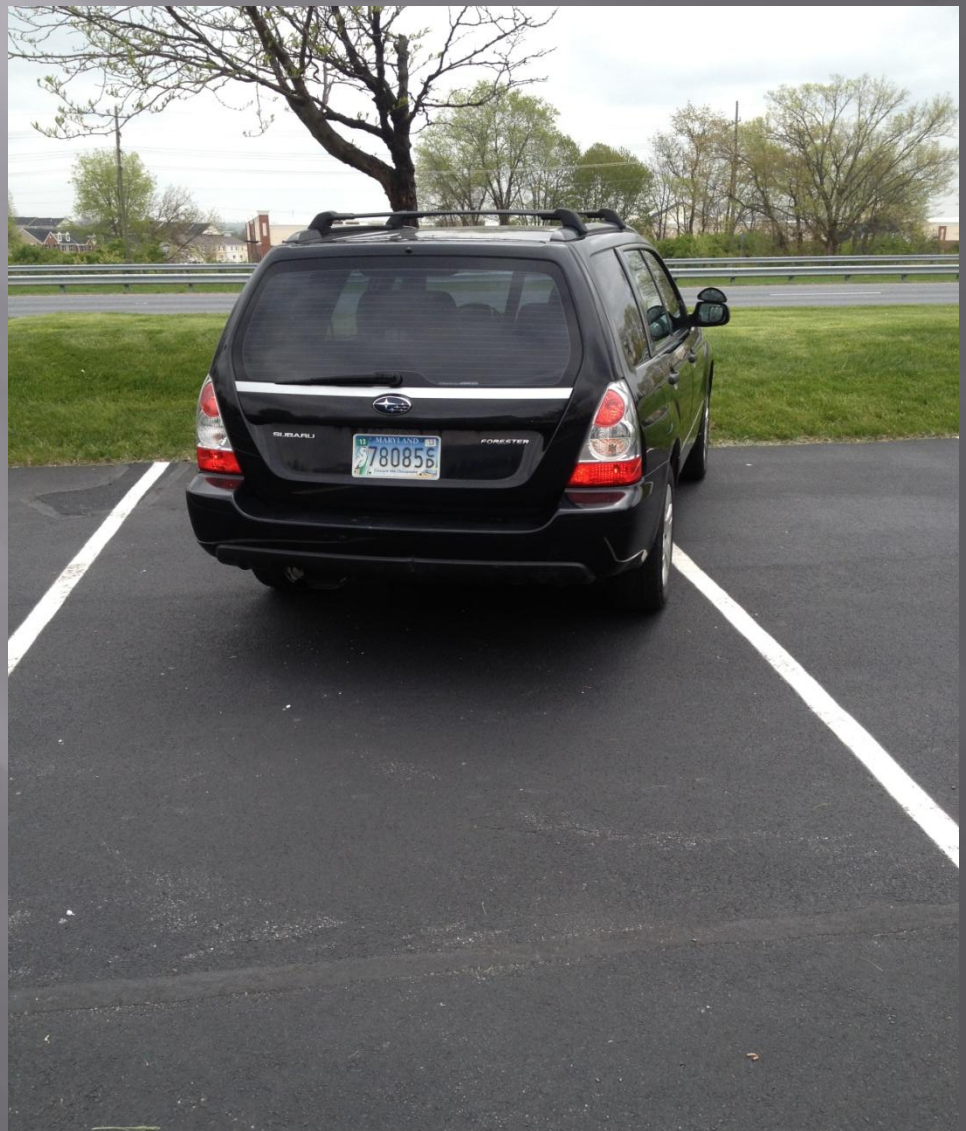
Key Indicators

-If I changed from binocular to monocular driving. Would I anticipate any problem?

-Can you identify any vision problems from your observation of the resident or consumer?

Key Indicators-”I always carry 4 sets of driving glasses!”

Key Indicators
What's wrong with this picture?



Key Indicators

-Cognitive changes and the impact on driving.

-What is needed to “effectively” drive in today’s environment?

Risk Assessment

-Processing of risk is the fundamental cognitive skill a driver uses to avoid accidents and arrive alive. What is risk assessment?

-Processing speeds

-Attention concentration skills

-Memory/recall

-Direction following

-Sequencing

Key Indicators

What do I do now?

-Start by having the difficult conversation with the consumer, family member, and physician.

-Seek resources and refer to a specialist when needed.

Don't try and tackle it alone…

- ADED-The Association for Driver Rehabilitation Specialists www.ADED.net
- AOTA-The American Occupational Therapy Association, Inc. www.aota.org
- Maryland MVA-Driver Wellness and Safety www.mva.maryland.gov