

What is Mental Distraction?

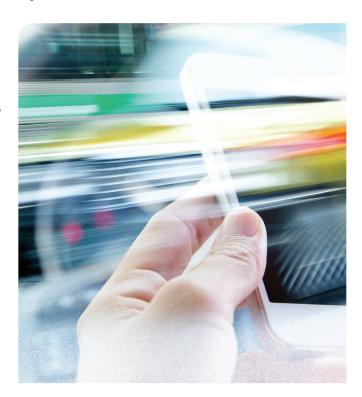
Mental distraction is one of the three types of distractions, next to visual and manual. Mental distraction is more difficult to monitor because most drivers do not know when they are mentally distracted. Therefore, they do not remedy a risky situation like they would if they took their hands off the wheel or eyes off the road.

Multitasking is a myth

Driving and engaging in a cell phone conversation are two tasks that require significant brain power. Contrary to popular belief, the human brain cannot multitask. The brain switches, often rapidly, between two mental tasks, making us erroneously believe we can perform two complex tasks at once. If a driver is talking on a cell phone while driving – whether hands-free or handheld – their brain is switching between the tasks.

Passenger conversations are different

A common myth is that talking on a cell phone while driving is the same as talking to a passenger. An adult passenger can actually make another adult driver safer. That's because adult passengers can see the driving environment and alert the driver to things he or she may not see. This safety measure is lost with cell phone conversations. Also, when the driving environment becomes challenging, the conversation will slow or stop. That is because the brain switches back to the driving task instead of holding a conversation. This ebb in conversation is also lost on cell phone conversations.



The need to be available

People feel obliged to answer their cell phones immediately. We feel an expectation to answer phone calls, text messages or emails right away. Drivers may sometimes answer their phones because they do not want to appear rude.



Delayed Reaction

Cell phone use substantially decreases a driver's reaction time. One study conducted by the University of Utah found that drivers talking on cell phones had slower reaction times than drivers with a 0.08 alcohol concentration, the legal intoxication limit in all states. Braking time also was delayed for drivers talking on cell phones — hands-free or handheld. The difference, of course, is a driver talking on a cell phone can eliminate his risk immediately by hanging up the phone, whereas an alcohol-impaired driver is impaired for the duration of the drive.

Decreased Brain Activity

A study done by Carnegie Mellon University showed a decrease in brain activity of drivers who use a cell phone while driving. The parietal lobe activation, which processes moving visual images while driving, decreases by as much as 37 percent when talking on a phone.

There is no safe way to use a cell phone while driving (handheld or hands-free).

Driving Alone



Driving with Sentence Listening

