

WHITE PAPER: SPIREON - A PATHWAY TO SAFETY

More Drivers Or Safer Roads?

A Balancing Act, Not a Zero-Sum Game

With the hotly contested 2018 midterm elections now behind us, it's fair to ponder what government is doing about the escalating driver shortage and safety. Although it is too early to tell how power shifts on Capitol Hill and across the country will affect transportation policy, we do know what's already on the table. In the recent Spireon–FreightWaves webinar "Latest In Safety: What Will the Driver Shortage & DRIVE-Safe Act Mean?", FreightWaves Chief Analytics Officer Dean Croke hosted a discussion with David Osiecki, president of Scopelitis Transportation Consulting, on exactly that, including the pros and cons, and short-term and long-term implications currently in play.

One recurring theme is a tug-of-war of sorts between driver shortage relief and driver safety. A closer look at the DRIVE-Safe Act, the Under 21 Military CDL Pilot Program, the Entry-Level Driver Training Rule, and the CDL Drug and Alcohol Clearinghouse reveals nuances that cannot be solved simply by throwing more money, more people, or more training programs at the problem. Enact policy that frees up more potential drivers, then we let more potentially dangerous drivers on the road. Create more sensible rules and reporting on reckless driving, and we will simply lose some drivers. Though the bureaucratic process is often lamented, no change happens in a vacuum. Industry feedback and public comment is essential to avoiding hasty decisions that could cause unforeseen damage. While we just may want more drivers on the road, dammit!, are we willing to sacrifice public safety and a base standard of professionalism just to do it?

THE DRIVE-SAFE ACT

Simply put, the DRIVE-Safe Act is a bill being discussed in Congress that would lower the interstate driving age for commercial drivers. But, why lower the driving age?

"Age is a limiting factor for our industry," says Osiecki, a former executive vice president of the American Trucking Association (ATA) who has represented the trucking industry before state legislatures, federal agencies, U.S. Congress, and national media. "Because of these restrictions, we don't get the young kids coming out of high school who choose not to go to college. And, we won't get them back until later when they decide their original trade choice wasn't really for them."

Osiecki also points out increasing wage competition from those other trades. When they identify their own shortages, they too begin offering more competitive rates, adding more competition to that which already exists within the trucking industry.

The American Transportation Research Institute (ATRI) studied the distribution of employees by industry starting with those in their twenties all the way beyond the age of 65. Unsurprisingly, the



truck transportation industry lags behind construction, professional and business services, and all other industries employing workers in their twenties all the way through their mid thirties. It's only after that age and through the back end of the cycle of life that truck transportation catches up and overtakes other industries in terms of employment percentage.

Even within truck transportation over the years, the ATRI has reported significant declines in employment by age on the lower end of the spectrum between 1994 through 2003 all the way to 2013. Once again, the number of those employed begins to trend upward over the same 20-year span when we look at drivers ages 35 and beyond — up 48 percent for drivers ages 45 to 54, and up a remarkable 126 percent for drivers ages 55 to 64. The workforce population is getting older, and vacated positions are not getting back-filled with younger bodies.

"The LTL [less-than truckload] sector is feeling it and private carriers are feeling it to some degree, but largely, it's an over-the-road, for-hire truckload concern," Osiecki contends.

According to Osiecki via the ATA, of 10 million total CDL holders, approximately 3.5 million are truck drivers. About half of those drivers are heavy-duty tractor-trailer drivers, and about half of that — approximately 500,000 — are over-the-road drivers. The shortage in this segment current sits at about 50,000 to 55,000 drivers, or about 10 percent of the industry — a significant shortfall, especially considering the impact and implications it carries to the economy at large. The problem is only growing with time.

The DRIVE-Safe Act was devised to make the trucking industry younger on the whole. It would open up a two-part apprenticeship program for 18- to 20-year-olds with a CDL to operate interstate commerce, with conditions. The first part of the program would be a 120-hour probationary period including at least 80 driving hours. Upon passage of this first leg, a second 280-hour probationary period would begin with at least 160 hours of driving required in a commercial vehicle. Each of these probationary periods would include restrictions and performance benchmarks.





In the 120-hour period, it would be up to the employer to determine whether the young driver has competency not only to operate on interstate highways, but also to operate in a city, on a rural two-lane road, and at night. Employers would assess the apprentice's safety awareness, his or her ability to manage speed and space management, directional control of the vehicle within the lane, proper scanning of mirrors, proper turning, and compliance and logging of hours of service.

During the 280-hour period, different performance benchmarks would be tracked, including backing and maneuvering, pre-trip checks, fueling, weighing loads, weight distribution and sliding tandems, coupling and uncoupling, turning, and trip planning.

"It seems whomever crafted the language in this bill grabbed a curriculum from a good truck driver training school and built it into the language of the bill as performance benchmarks," observes Osiecki.

These probationary periods also come with certain restrictions. The apprentice has to be accompanied by an experienced driver during both probationary periods. No hazardous materials can be hauled. The vehicle has to be either an automatic or Automatic Manual Transmission with an active braking system (automatic emergency braking) and a forward-facing camera. A speed governor would also be required that would limit the vehicle to no more than 65 mph.

This all sounds reasonable. So, the bill should pass then, right?

"It has a pretty tough road ahead," cautions Osiecki.

The legislation was first introduced in March 2018 as a bipartisan bill in the House. However, once introduced to Senate, it was not met with bipartisan support. With the congressional transition of the 2018 midterms, the bill's passing in 2018 with so little time left on the calendar does not seem feasible. Osiecki is not terribly optimistic that it'll come to fruition in 2019 either. Why?

This is where we come to the other end of the proverbial tug-of-war: safety. Osiecki remembers a number of times — including as recently as the early 2000s — in which the industry tried to find a way to tap into this younger demographic. However, time and again, we are reminded of the inherent dangers of handing the keys to people so young. Most notably, the works of Dr. Ken Campbell of the University of Michigan Transportation Research Institute and Dr. Dan Blower of the University of Michigan back in the late '80s and early '90s throw a very wet towel over the entire premise.

Specifically, in 1990, Dr. Campbell observed a tremendous spike in the risk of fatal accidents involving drivers under the age of 21. A marked decline in risk occurs over the next several years before leveling out around age 27. The findings conclude that younger drivers are about six times more likely to be involved in a crash.



In 1996, Dr. Blower found that property damage and casualties as a result of truck accidents involving CDL holders in Michigan between the same range of ages 18 to 21 also spiked. And though both studies are dated, they still contribute to the debate.

"We have been down this road before in trucking," says Osiecki. "Thus far, it's been a dead end. Safety has been an ongoing concern about not being able to access 18-, 19-, 20-year-old drivers. This time around, will the additional safety technology and speed governing on the truck be enough to get us over the safety concerns and data that Dr. Campbell and Dr. Blower and others have written before?"

UNDER 21 MILITARY CDL PILOT PROGRAM

Back in 2015, the Federal Motor Carrier Safety Administration (FMCSA) was directed by Congress to institute a pilot program for members or former members of the armed forces under 21 years of age. In the Under 21 Military CDL Pilot Program, participants should be gualified (had training) in a military occupational specialty to operate a commercial motor vehicle (CMV) or similar. The obstacle the FMCSA faces here is finding enough people that fit within this narrow category. It's seeking at least 200 drivers that fit into this category for the program's scheduled launch in January 2019. The program is to run for about a year, after which an initial interim report to Congress will be submitted in mid 2020. Data collection will continue through 2022, culminating in a final report in 2023.



"If anybody is expecting this program, that's administratively driven by the Department of Transportation (DOT), to provide relief to the driver shortage anytime soon, I don't think that is realistic," Osiecki warns. "This is a medium- to long-term project. The more near-term solution, if the industry can get over the safety-related concerns, is the DRIVE-Safe Act."

Osecki reports that there is also some consideration within the DOT and FMCSA to open the pilot beyond military, former military, and reservists to include all types of younger individuals not necessarily tied to the industry. In this case, the DOT has the authority to conduct its own pilot program without congressional direction.

The idea behind the program ultimately is to collect data. And if that data is favorable, it could move forward with rule-making to change the driving age. Again though, it would be some time before that outcome could be reached.



ENTRY-LEVEL DRIVER TRAINING RULE

While the DRIVE-Safe Act and Under 21 Military CDL Pilot Program are both measures, on different timelines, that could positively impact the driver shortage, the Entry-Level Driver Training Rule is a safety measure that is likely, unfortunately, to impact the shortage negatively. In summation, the Entry-Level Driver Training Rule is an attempt to raise the training bar within the trucking industry. Specifically, anybody pursuing a CDL will have to go through required training. No longer will it be sufficient to get by with previous experience — say, a person who was raised on a farm and knows how to use farm equipment — and simply study up, walk into the DMV, pass the CDL General Knowledge exam, and obtain a CDL.

The curriculum will now require classroom theory and behind-the-wheel training. While there is no specific hours milestone requirements, it will still be a specific, performance-based curriculum. A certified training provider registry will be established, similar to the medical examiner registry that has been online for a number of years.

"One of the challenges will be whether there is enough interest in the truck-driver training population to go through the hoops to get listed on the registry and meet the new curriculum requirements," posits Osiecki. "It will raise the bar for people to get into the industry, making it tougher to get a CDL, and that's going to impact supply coming in, no matter the age of the person."

Another concern Osiecki brings up is cost. As with any government regulation, new procedures come with a cost. The upside, of course, is a greater level of professionalism and safety among those licensed in the industry.

FIND A JOB

The Entry-Level Driver Training Rule has already been finalized and published by the DOT, and will be implemented in January of 2020.





CDL DRUG AND ALCOHOL CLEARINGHOUSE

The CDL Drug and Alcohol Clearinghouse is another measure that while beneficial to the general safety and professionalism of the truck industry, will likely weed out some bad apples, resulting in losses — hopefully limited — in the workforce. This database will serve as a central repository for all drug and alcohol testing violations by CDL drivers, addressing a long-standing loophole in current reporting.

Previously, if a driver failed his or her drug test on a preemployment screening, the failure wouldn't be reported anywhere since he or she was not hired. This has led to other carriers hiring the offending driver later, unaware of the previous transgression. Moreover, if the driver has an ongoing problem, he or she will likely not have undergone any corrective treatment or recertification to drive again.

As part of the clearinghouse, all parties in the testing process — data carriers, service agents, medical review officers (MROs), and substance-abuse professionals (SAPs) — will be required to report their findings.

Specifically, carriers will have three days to report:

- Tests with 0.04 or higher blood-alcohol content
- Alcohol test refusals
- Drug test refusals
- Actual knowledge situations (observed use, admission to use, DUI traffic citation)
- Negative return to duty tests
- Successful completion of follow-up tests

MROs will have two days to report:

- Verified positive, adulterated, or substituted test results
- Results determined by MRO to be a refusal

And SAPs will have one day to report:

- Identification of driver and date of the initial assessment was initiated
- Completion of a return-to-duty process



Carriers will be required to query the clearinghouse once a year as well as before hiring any driver applicant, setting up two levels of checks to become aware of any past violations.

Osiecki explains, "If a driver works full-time for Carrier A and part-time for Carrier B, either carrier should be able to determine if violations occurred at the other job through the clearinghouse."



Carriers will be required to make previous employer inquiries during the first three years until the clearinghouse is populated. There will be a dual burden on the carriers to query previous employers and query the clearinghouse until it is populated in three years' time.

"The cost is going to go up, the burden is going to go up, and candidly, the drivers that have a problem are going to be discovered more easily as a result of the clearinghouse, which will take them out of the supply for a period of time if not forever, depending on whether they get their problem addressed," observes Osiecki.

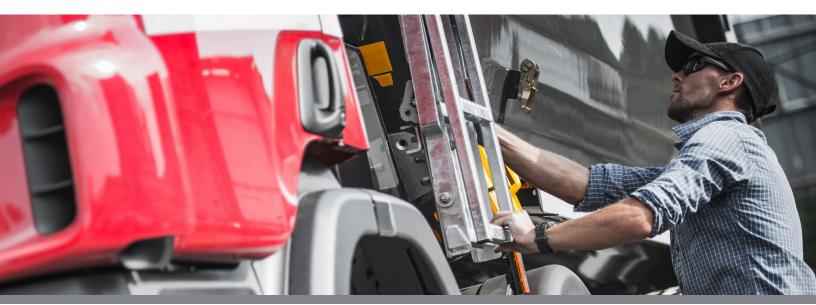
The CDL Drug and Alcohol Clearinghouse will go into effect in January of 2020. The FMCSA is currently in the process of standing it up. Osiecki warns there will be a registration and subscription fee, and some potential hiring delays as a result.

IN SUMMARY

While it may be tempting to tap into new, younger sources of labor to help address the driver shortage, the potential impact to safety should not be forgotten. According to Croke, 80 percent of all FMCSA violations are maintenance related, many of which are triggered from the physical appearance of the vehicle in question. In truckload, with an average of three trailers to every tractor, tractors can end up maintained more poorly than they should be.

"We see a lot of younger drivers that have an inability to understand how a trailer should be maintained," explains Croke. "FreightWaves has partnered with FleetLocate by Spireon because of the way its trailer tracking technology can help improve the maintenance of vehicles before they are put under load."

A solid training program is another effective tool in getting new drivers to not only conduct preand post-trip inspections, but also understand the mechanics of the vehicle they are operating to know what to look for.





"I think some drivers just go through the pre-trip and just tick boxes on an ELD app without physically getting out and looking around the vehicle, which opens up all sorts of opportunities for FMCSA violations," Croke continues.

Another pitfall he warns against is instituting a safety program that throws a common message at all drivers simultaneously.

"I think this is a big mistake a lot of fleets make," says Croke. "They think driver safety is a binary decision — that drivers are either safe or unsafe. What telematics data analytics shows us is that drivers are both safe and unsafe over the continuum of time. You can find drivers that are 100 percent compliant with hours of service, highly trained, and highly skilled, yet sound asleep at the wheel."

Finding exactly when the transition occurs between being safe and unsafe is one of the keys to getting ahead of the safety issue, irrespective of driver age.

"If you can find the drivers that fall outside of your safety model — through third-party data modeling or from your own data science team — you can target that specific group for different remediation techniques every day."

Croke points out a higher voluntary termination rate when the same training is applied to all drivers every year. Experienced drivers get sick of training for training's sake. A better approach, in fleets large and small, is to apply different types of training to different drivers in different situations, rather than the same curriculum for all.

While it's clear there is no magic-bullet solution for either the driver shortage or driver safety, the tug-of-war wages on with several prospects brewing in the mid-to-long term.

For more information about ongoing legislation related to the lowering of the CDL driving age and driver safety, and how trailer tracking technology can improve the safety of your fleet, visit *spireon.com/fleet-management* or call one of our friendly experts at **800.557.1449**.

David Osiecki and Dean Croke were the featured guest speakers for "Latest in Safety: What Will the Driver Shortage & DRIVE-Safe Act Mean?" a recent webinar hosted by Spireon in partnership with FreightWaves. To see the upcoming slate of Spireon webinars featuring fleet and trailer management, visit **spireon.com/webinars**.