UNDERSTANDING PREDICTIVE CRUISE CONTROL

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If you received a truck built in 2012 or 2013, you may have noticed some new hardware on the dash panel to your right. Since early 2012, all Freightliner units have been built with the OnGuard collision safety system. Later in the first quarter of 2013, new Freightliner units were built with another system called Predictive Cruise Control (PCC).

PCC is a system that, along with GPS, uses very accurate measurements of all of the hills and slopes on about 250,000 miles of U.S. highways to determine the best speed to approach the coming terrain. The system knows what road you are on, and looks about one mile ahead to see if a hill or combination of hills is coming. The system calculates the best approach speed, and then automatically alerts the cruise control to temporarily change the set point, up to 4 MPH up or down. The PCC gauge will show you what the PCC system is doing. The graphic shows how the PCC system works.

Looking at the right side of your dash, the display for OnGuard is usually to the left and just a little below the Qualcomm display.

The picture here shows a Generation 1 OnGuard system. Newer versions have a slightly different display that is trimmed in all black (no blue surrounding the display).

Also in the picture is an early version of the PCC gauge (the round 2 inch gauge). Newer versions of the Cascadia (with the black dash color instead of wood grain) have the PCC display built into the center (digital) display of the gauge cluster. The PCC screen can be accessed by using the “+” button while in cruise mode.

So what is the bottom line? What should you do? The PCC system is designed to increase fuel efficiency and decrease the number of shifts required to climb most hills. Set your cruise like you normally would, but keep in mind that during an approach to a hill, the PCC system may slowly increase your speed a few miles per hour.

Also, the system may slow you down a bit (like just before the crest of a hill). Don’t stomp the throttle. Just let the system work. You will still have to manage your overspeed percentage if you get close to 70 MPH (overspeed ±), but the PCC system will not add to your overspeed ± time. If the PCC system fails or cannot get an accurate position, it will revert back to normal cruise control.