

Keeping Our Streets Accessible at Night

Nia Knox, MPP

Description: Program to Educate All Cyclists (PEAC) is a nonprofit that empowers individuals with disabilities to practice active transportation and self-advocacy through cycling, walking, and busing. This document aims to support PEAC's efforts to improve the accessibility of commonly used streets by educating decision makers for future policy action. By ensuring that streets are cognitively accessible, our communities remain navigable for everyone.

Background: In municipalities that choose to enable it, traffic signals enter late-night flash (LNF) mode when traffic volume is sufficiently low.¹ When enabled, the intersection on the "major street" displays a flashing yellow light, while the intersection on the "minor street" receives a flashing red light. Drivers on the major street are not required to stop, while drivers on the minor street yield to traffic on the major street.² Municipalities that elect to use LNF disrupt normal signaling operations for pedestrians.

The Problem: Pedestrians rely on crosswalks to gauge whether a road crossing is reasonably safe. Not only do late-night flash operations suspend the normal crosswalk signaling cycle, but the lack of a yield requirement for drivers on the major road makes crossing the major road difficult. By allowing drivers on the major road to move through the intersection without stopping, LNF operations benefit motorists at the expense of pedestrians, a concerning deference in light of national trends regarding pedestrian safety and heightened safety issues among nighttime drivers.

Evidence: Despite only 25 percent of driving occurring after dark, about half of all traffic fatalities happen at night, highlighting that nighttime driving is inherently riskier than daytime driving due to decreased visibility.³ Among nighttime drivers, intoxication and fatigue are additional concerns. Driving under the influence of alcohol or drugs reduces a driver's ability to operate a vehicle safely.⁴ Driving while drowsy has similar effects as driving under the influence of alcohol, as fatigue slows reaction time and impedes judgement.⁵ Experts at the National Sleep Foundation reached the consensus that inadequate sleep renders motorists unfit to drive, explaining that getting only 3 to 5 hours of sleep in the proceeding 24

¹ My UP Now, "How does MDOT determine when traffic lights go into flash mode?", news segment, posted August 1, 2014, YouTube, 1 min., 42 sec., https://www.youtube.com/watch?v=ybHbv_H3ISQ.

² Bo Lan and Raghavan Srinivasan, "Safety Evaluation of Discontinuing Late-Night Flash Operations at Signalized Intersections," *Repository & Open Science Access Portal (ROSA P)*, FHWA-HRT-13-069 HRDS-20/08-13(750)E, August 1, 2013, <https://rosap.ntl.bts.gov/view/dot/34851>.

³ "Nighttime Visibility: General Information," Safety, Federal Highway Administration, August 25, 2023, <https://highways.dot.gov/safety/other/visibility/nighttime-visibility-general-information>.

⁴ "Drug-Impaired Driving," National Highway Traffic Safety Administration, accessed June 9, 2025, <https://www.nhtsa.gov/risky-driving/drug-impaired-driving>.

⁵ "Drowsy Driving," Michigan State Police, accessed June 9, 2025, <https://www.michigan.gov/msp/divisions/ohsp/safety-programs/drowsy-driving>.

hours would impair otherwise healthy drivers.⁶ Nighttime is dangerous for pedestrians and cyclists, and choosing to enable LNF mode complicates these inherent safety concerns.

Implications for Accessibility: LNF operations impede nighttime roadway accessibility. Federal rule mandates that Accessible Pedestrian Signal (APS) features—including audio cues and vibrations pedestrians can feel at crosswalks—are always available wherever pedestrian signals operate, yet LNF suspends APS functions, violating federally enforceable standards for accessibility.⁷ When LNF mode is chosen, normal signaling operations that provide clear, unambiguous instructions for both motorists and pedestrians are overridden. Guidelines governing traffic become situation-specific, suddenly making a street that was navigable hours earlier difficult to navigate. This abrupt change can be especially disorienting for people with cognitive disabilities, who often depend on consistent traffic signals to navigate confidently and safely. For example, a PEAC student who easily navigated their route to their restaurant job in the afternoon found it nearly impossible to get home at night when standard signals were replaced by LNF mode operations, and the lack of a yield requirement heightened this student's safety concerns.

The choice to enable LNF mode makes crossing intersections inaccessible for individuals with cognitive disabilities because individuals with cognitive disabilities like concrete decisions. A 2009 study revealed that eliminating late-night flash operations reduced injury crashes in a South Carolina town by 60 percent.⁸ Restoring nighttime accessibility by maintaining consistent signaling operations makes roads cognitively accessible, rendering our streets safe and navigable for 8- and 80-year olds alike.

Proposed Action: We recommend two options: either maintain daytime signal operations, or provide a pedestrian push button with the ability to override LNF by triggering a signal change.

- *Preferred: Maintain daytime signal*

In light of safety and accessibility concerns, municipalities ought to maintain consistent intersection signaling operations instead of choosing to enable LNF mode. This approach requires minimal additional funding, as the intersections and signaling software already exist. It is also feasible, as traffic signals can be manually adjusted and municipalities have the authority to manage traffic signals within their jurisdiction.

- *Compromise: Pedestrian push button*

If maintaining consistent signaling faces resistance, municipalities should ensure pedestrians can trigger a signal change at intersections where LNF is active. This could take the form of a crosswalk button that activates a pedestrian green light and an opposing red light. While the specific form this strategy takes should be guided by traffic engineers, this action offers the same funding and feasibility benefits as option one.

⁶ Charles A. Czeisler et al., "Sleep-deprived motor vehicle operators are unfit to drive: a multidisciplinary expert consensus statement on drowsy driving," *Sleep Health*, June 2016, 2(2):94-99, doi:10.1016/j.sleh.2016.04.003.

⁷ U.S. Access Board, *Public Rights-of-Way Accessibility Guidelines (PROWAG)*, 36 CFR Part 1190 Final Rule, published in Federal Register, Vol. 88, No. 152, 8 August 2023. See sections R206 (Pedestrian Signal Heads and Pedestrian Activated Warning Devices) and R307 (Pedestrian Push Buttons and Passive Pedestrian Detection), <https://www.access-board.gov/prowag/>.

⁸ Stanley Polanis, "Signal Flashing Mode Removed During Late-Night/Early Morning-Operation," FHWA Highway Safety Programs, Federal Highway Administration, January 2009, <https://highways.dot.gov/safety/learn-safety/noteworthy-practices/signal-flashing-mode-removed-during-late-nightearly>