

Policy Title: **SAFE AMBULANCE OPERATION:
Use of Lights and Sirens**

No. L - 2

Board Approval: 11/9/23
Chiefs Approval: 11/30/23

Effective: 12/1/23

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This policy is taken almost entirely from Illinois statute. It is intended to provide legal and best practice position statements from multiple EMS organizations. It is not intended to be exhaustive from all current sources of information.

I. Patient Safety Considerations/National Model EMS Guidelines

- A. Routine use of lights and sirens is not warranted.
- B. Even when lights and sirens are in use, always limit speeds to level that is safe for the emergency vehicle being driven and road conditions on which it is being operated (NASEMSO, 2022. Model Clinical Guidelines Version 3)

II. POLICY

- A. Evidence tells us that **NOT** using red lights and sirens (L&S) should be the rule – and using them should be an infrequent exception. Like every practice, procedure, policy and protocol in EMS, red lights and sirens (RLS) use must be safe and have a proven benefit to patient care. And the practice should be curtailed if it doesn't. (Wolfberg, 2016)
- B. **RESPONSE TO THE SCENE**
 1. Illinois law allows all EMS vehicles to respond to a bona fide emergency call using L&S and adhering to industry safety standards for running in emergency mode.
 2. All requests for EMS service via 911 shall be considered **a bona fide emergency** until evaluated by the EMS clinician. An EMS responder may choose to downgrade the response based on dispatch information or other facts known about the call.
 3. **Safety first:** EMS personnel and patients shall always be properly restrained when inside a moving ambulance.
- C. **RESPONSE TO THE RECEIVING FACILITY**
 1. Every decision to use L&S in emergency mode must be based on the patient's clinical condition, the estimated time saved by a L&S transport, and the increased risk of an EMS vehicle crash during a L&S transport.
 2. **The NWC EMSS EMS MD authorizes transport using L&S** in compliance with Illinois laws regarding "Conditions for operating ambulances and rescue vehicles" while also observing national safe ambulance operation guidelines and adhering to industry safety standards of running in emergency mode for the following.
 - a. **911 ALS patients** who meet **time-sensitive** criteria (black box notation in the SOPs) from the scene to a hospital Comprehensive ED.
 - b. **Critical patients who require ALS inter-hospital monitoring/interventions** from one facility to another unless specifically contraindicated by the patient's condition.
 - c. EMS practitioners may request permission to transport using L&S if they believe the patient's condition will be worsened by a delay equivalent to the time that can be gained by emergent transport using L&S.
 3. All ALS transports of non-time-sensitive patients; BLS patients, and scheduled patient transports of stable patients from home to a medical facility, one medical facility to another, or from a medical facility to a patient's residence shall be conducted **WITHOUT** L&S.
- D. **EMS personnel education:** "All emergency vehicle operators shall successfully complete a robust initial emergency vehicle driver training program. Operators should have regular CE on emergency vehicle driving and appropriate use of L&S" (Joint statement, 2022).

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E. Lights & Sirens use as part of the QI plan:

1. "Emergency vehicle crashes and near misses shall trigger clinical and operational QI reviews within the agency" (Joint statement, 2022).
2. "EMS leadership should monitor the rates of use, appropriateness, EMS protocol compliance, and medical outcomes related to L&S use during response and patient transport" (Joint statement, 2022).
3. "Report any potential safety issues with an ambulance or other EMS vehicle to the NHTSA Office of Defects Investigations" (NHTSA, 2022)

III. RATIONALE

- A. The primary mission of the EMS System is to provide out-of-hospital health care, saving lives, and improving patient outcomes when possible while promoting safety and health in communities. In selected time-sensitive medical conditions, the difference in response time with L&S theoretically may improve the patient's outcome.
 - B. While decreasing response and transport times has been a traditional purpose of using L&S, data from multiple studies do not support that premise. The average time saved ranges from 42 seconds to 3.8 minutes (Joint statement, 2022).
 - C. Operators of EMS vehicles are afforded the privilege of using emergency L&S and emergency response mode to increase vehicle visibility and to as other drivers for the right of way so EMS can continue to their destination while minimizing the number of times they are required to slow down for other vehicles on the roadway.
 1. The most common reason that civilian vehicles collide with emergency vehicles is that the civilian driver did not yield to the emergency vehicle.
 2. EMS vehicle operations using L&S pose a significant risk to both EMS practitioners and the public. L&S use is associated with markedly higher rates of ambulance crashes and higher rates of EMS provider fatalities than on-LYS operations (Wolfberg, 2016). "EMS providers are at greater risk of death on the job than their police and firefighter counterparts with 74% of EM fatalities being transportation-related" (NASEMSO).
 3. Right of way is not accompanied by an authorization to exceed speed limit or disregard rules of the road. If the emergency vehicle is traveling too fast, other drivers may not have time to yield and pull over or they may panic and react in a way that doesn't help clear the path for the emergency vehicle (Fraley, 2022). A L&S response increases the chance of an EMS vehicle crash by 50% and almost triples the chance of crash during patient transport (Joint statement, 2022).
 4. Running in emergency mode risks a roll-over crash: Ambulances have a high center of gravity and do not have "pursuit packages" found in law-enforcement vehicles.
- IV. **Statute:** PA 100-962, eff 1-1-19 | 625 Illinois SB 1251 amends the Illinois Compiled Statutes (ILCS). Illinois Vehicle Code enrolled 5-11-23 SECTION 11-1421 **Conditions for operating ambulances and rescue vehicles.**
- A. *No person shall operate an ambulance or rescue vehicle in a manner not conforming to the motor vehicle laws and regulations of this State or of any political subdivision of this State as such laws and regulations apply to motor vehicles in general, unless in compliance with the following conditions:*
 - B. *The operator of the ambulance or rescue vehicle shall have documented training in the operation of an ambulance or rescue vehicle prior to operating that vehicle. This training shall include the proper use of warning lights and sirens, situations where warning lights and sirens are warranted, and the provisions of this section.*

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1. *The person operating the ambulance shall be either responding to a bona fide emergency call or specifically directed by a licensed physician to disregard traffic laws in operating the ambulance during and for the purpose of the specific trip or journey that is involved;*
 2. *The ambulance or rescue vehicle shall be equipped with a siren producing an audible signal of an intensity of 100 decibels at a distance of 50 feet from the siren, and with a lamp or lamps emitting an oscillating, rotating or flashing red beam directed in part toward the front of the vehicle, and these lamps shall have sufficient intensity to be visible at 500 feet in normal sunlight, and in addition to other lighting requirements, excluding those vehicles operated in counties with a population in excess of 2,000,000, may also operate with a lamp or lamps emitting an oscillating, rotating, or flashing green light;*
 3. *The aforesaid siren and lamp or lamps shall be in operation at all times when it is reasonably necessary to warn pedestrians and other drivers of the approach thereof during such trip or journey, except that in a municipality with a population over 1,000,000, the siren and lamp or lamps shall be in operation only when it is reasonably necessary to warn pedestrians and other drivers of the approach thereof while responding to an emergency call or transporting a patient who presents a combination of circumstances resulting in a need for immediate medical intervention;*
 4. *Whenever the ambulance or rescue vehicle is operated at a speed in excess of 40 MPH, the ambulance or rescue vehicle shall be operated in complete conformance with every other motor vehicle law and regulation of this State and of the political subdivision in which the ambulance or rescue vehicle is operated, relating to the operation of motor vehicles, as such provision applies to motor vehicles in general, except laws and regulations pertaining to compliance with official traffic-control devices or to vehicular operation upon the right half of the roadway; and*
 5. *The ambulance shall display registration plates identifying the vehicle as an ambulance.*
 6. *The driver of an ambulance or rescue vehicle may proceed past a red traffic control signal or stop sign if the ambulance or rescue vehicle is making use of both the audible and visual signals meeting the requirements of this Section, but only after slowing down as necessary for safe operation.*
- C. *The foregoing provisions do not relieve the driver of an ambulance or rescue vehicle from the duty of driving with due regard for the safety of all persons, nor do such provisions protect the driver from the consequences resulting from the reckless disregard for the safety of others)*

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