



9450 SW Gemini Drive
PMB 44671
Beaverton, OR 97008

January 10, 2021

BY EMAIL

Carolyn Maloney, Chair
House Oversight Committee, US Congress
newyork12urgent@mail.house.gov

Re: The LED Cartel

Dear Carolyn Maloney,

This may be the most important letter that the Soft Lights Foundation has written in the past five years. Because this letter is so important, I am copying the following agencies and authorities:

Sachin Pavithran, Director, US Access Board (pavithran@access-board.gov)
Pete Buttigieg, Secretary, US Department of Transportation (SecretaryScheduler19@dot.gov)
Steven Cliff, Acting Director, National Highway Safety Transportation Administration (steven.cliff@dot.gov)
Ann Carlson, Chief Legal Counsel, NHTSA (ann.carlson@dot.gov)
NHTSA Whistleblower, NHTSA, (NHTSAWhistleblower@dot.gov)
Meera Joshi, Director, Federal Motor Carrier Safety Administration (meera.joshi@dot.gov)
Jennifer Homendy, Chair, National Transportation Safety Board (jennifer.homendy@ntsb.gov)
Stephanie Pollack, Deputy Administrator, Federal Highway Administration (stephanie.pollack@dot.gov)
Ed Markey, Senator, US Congress (eric_kashdan@markey.senate.gov)
Bernie Sanders, Senator, US Congress (info_sanders@sanders.senate.gov)
Jeff Merkley, Senator, US Congress (Caitlin_Buchanan@merkley.senate.gov)
Peter DeFazio, Congressman, US Congress (brittany.lundberg@mail.house.gov)
Merrick Garland, Attorney General, US Department of Justice (askdoj@usdoj.gov)
Christopher Kavanaugh, US Attorney, Western District of Virginia (christopher.kavanaugh@usdoj.gov)
Bridget Brennan, US Attorney, Northern District of Ohio (bridget.brennan@usdoj.gov)
Allen Baldwin, Chief, Emergency Responder Safety Institute (info@respondersafety.com)
David Harkey, President, Insurance Institute for Highway Safety (dharkey@iihs.org)
Lorraine Martin, CEO, National Safety Council (lorraine.martin@nsc.org)
Susanne Seitingner, President, Illuminating Engineering Society (susanne@media.mit.edu)
Ruskin Hartley, President, International Dark Sky Association (ruskin@darksky.org)

Melissa Lynch, Counsel, Natural Resources Defense Council (llynch@nrdc.org)
Laura Thrall, CEO, Epilepsy Foundation (lthrall@efa.org)
John Bullough, Researcher, Icahn School of Medicine, Mount Sinai
(john.bullough@mountsinai.org)

The Soft Lights Foundation has notified each of these decision makers one or more times about the toxicity, hazards, and discriminatory nature of LED light beams. These dangerous LED light beams are unregulated by the government. The reason for this lack of regulation is due to the efforts of the LED Cartel which started at least as far back as 2008.¹

As a comparison to the LED Cartel, Purdue Pharma was a single company that perpetuated the fraud that OxyContin is not addictive. One of their methods of spreading their fraud was by developing talking points. Purdue Pharma would then spread these talking points throughout society via their salespeople and glossy brochures. Over time, almost our entire society, including doctors, insurance companies, and government officials simply assumed that “OxyContin is not addictive” was just common sense, even though hundreds of thousands of Americans were being murdered by this drug.

The LED Cartel is not a single company, but their strategy is the same. They have developed talking points that, by now, almost everyone believes. One talking point is “LEDs save energy”. This is a fraudulent claim, but if you ask around, almost everyone believes it. Another talking point is “Regulations and standards for lighting are technology neutral”. I have personally heard this talking point from engineers at NHTSA, staff at the IIHS, the Illuminating Engineering Society, the International Dark Sky Association, and, today, from the Emergency Responder Safety Institute.

When a common talking point, nearly verbatim, is uttered by nearly every person at nearly every organization, we know that we have been victims of a concerted effort by outside forces to shape our thinking. In this case, this outside force is the LED Cartel.

The Emergency Responder Safety Institute recently commissioned a study by John Bullough of Mount Sinai to investigate the effects of flashing lights on emergency response vehicles. This study was released in January 2022.² We understand that ERSI is partially funded by the US government. The Soft Lights Foundation reviewed the study and discovered that Mr. Bullough failed to account for the different spatial output of LED light beams from a flat surface chip. We therefore submitted a response to ERSI.³ In response, we received a letter from ERSI stating, *“I wish to be clear. The Cumberland Valley Volunteer Firemen’s Association’s Emergency Responder Safety Institute takes no position on any type of lighting technology.”* **When we have shown to ERSI that LED light beams are contributing to the deaths of firefighters and police officers in the line of duty, it is stunning to receive a statement from ERSI that they refuse to take a position on LED light beams.** This is evidence of how effective the LED Cartel has been at pushing their messaging; that somehow LEDs are so wonderful and such a miracle

¹ www.softlights.org/led-fraud

² <https://www.respondersafety.com/news/news/2022/01/new-study-of-driver-perception-of-emergency-warning-lights-and-retroreflective-markings-commissioned-by-the-emergency-responder-safety-institute-yields-surprising-findings/>

³ <http://www.softlights.org/wp-content/uploads/2022/01/Emergency-Responder-Safety-Institute-2.pdf>

tech that, even though people are dying as result of LEDs, we all must continue to use this wonderful technology.

LED light beams trigger epileptic seizures. When the Soft Lights Foundation contacted the Epilepsy Foundation for assistance with this issue, the Epilepsy Foundation refused to help. We understand that the Epilepsy Foundation is partially funded by the US government. The Epilepsy Foundation has told their clients with epilepsy that they are on their own when asking for protection from LED light beams. The Epilepsy Foundation's legal counsel, Allison Nichol, is a former attorney from the US DOJ. Again, it's this idea that LEDs are a miracle cure for saving energy and that the Epilepsy Foundation certainly would not want to interfere with the adoption of such a wonderful technology. The Epilepsy Foundation has been captured by the LED Cartel.

The International Dark Sky Foundation purports to protect the natural night resource, and yet when the Soft Lights Foundation has contacted them and explained to the IDA that LEDs do not save energy and that LEDs create more light pollution than High-Pressure Sodium, the IDA has told us that their certification of fixtures is "technology neutral". Again, we hear the talking point promoted by the LED Cartel.

The sun, a candle, an incandescent light bulb, a fluorescent light, a Compact Fluorescent Light, a High-Pressure Sodium lamp, an LED light beam, and a laser beam all emit visible light, but the LED Cartel wants us to believe that we don't need to develop regulations and standards for each type of light; that we can ignore the unique spatial, spectral, and temporal properties of each natural and artificial technology. This is impossible. NHTSA FMVSS-108 which was written in 1967 when only spatially uniform light sources existed. Attempting to use FMVSS-108 for a spatially non-uniform light source such as an LED is impossible, except that NHTSA adheres to the LED Cartel messaging of "technology neutral." The IES standard IES RP-8-18 for streetlighting is only applicable to spatially uniform lighting, and yet, as the main front organization for the LED Cartel, the IES claims that IES RP-8-18 can be used for LED light beams because the IES standards are "technology neutral."

Flashing lights are regulated by minimum amount of light output, with no or very little regulation for maximum output. There are no regulations for flashing light beams from spatially non-uniform light sources such as LEDs. With LEDs emitting peak luminance values exceeding 100,000,000 nits, and human comfort level being around 300 nits, it is nearly incomprehensible that the government doesn't regulate peak luminance and peak radiance, until we realize that the LED Cartel has spent so much effort ensuring that the government adheres to the "technology neutral" mantra.

Figure 1 is a diagram showing the separate categories of Light and Illumination versus Light Beams. The talking point "technology neutral" cannot be used because these types of electromagnetic radiation are different.

Regulatory Meaning of Light and Illumination

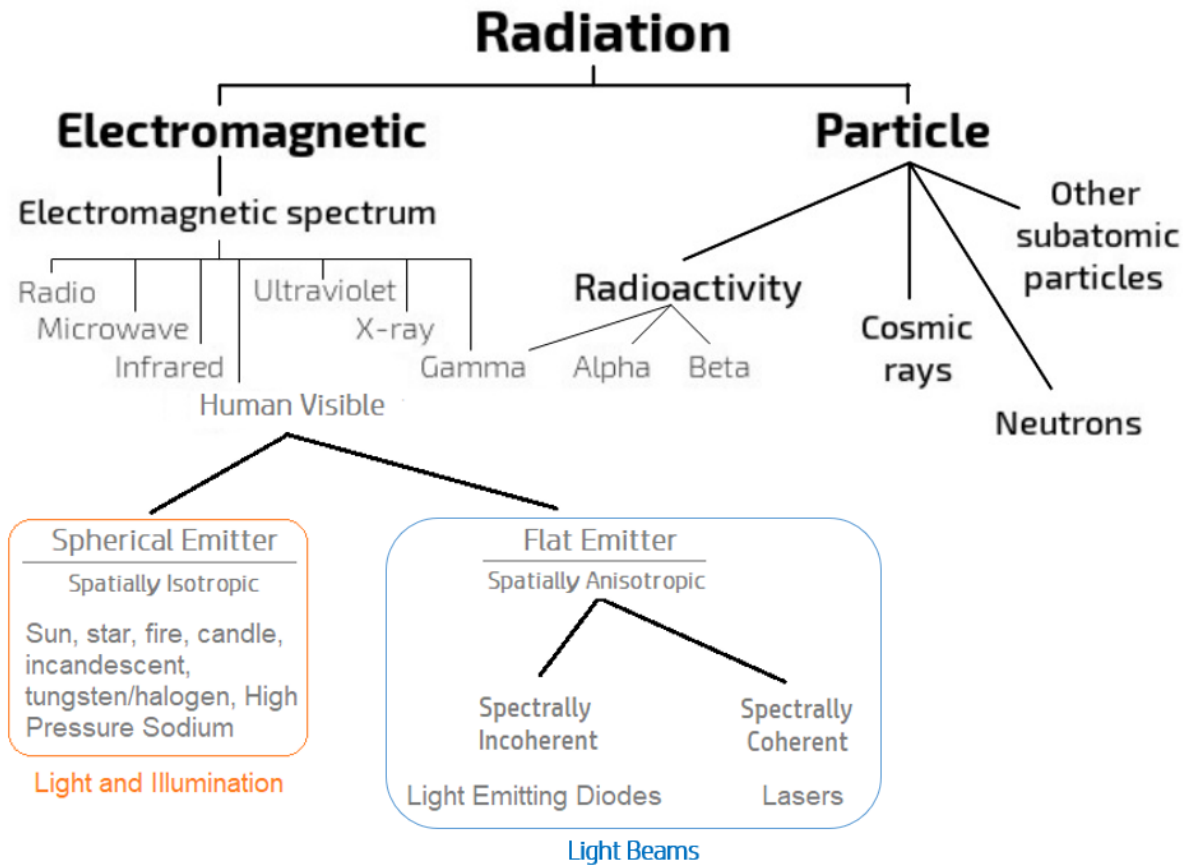


Figure 1 - Radiation Types

Figure 2 is a warning label from an LED flashlight. The phrase “(not even from a distance)” proves that the manufacturer of this LED device understands that LED light beams are entirely different from the uniform light from an incandescent bulb.

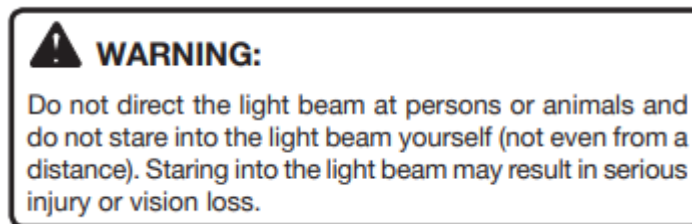


Figure 2 - Warning Label

Figure 3 is a diagram that visually shows the difference in radiation pattern between a spatially uniform source and a non-uniform source from a flat surface. All previous regulations, standards, photometric software, etc. have been written for the spatially uniform light shown on the left. The standards bodies and regulatory agencies have failed to create regulations and standards for non-uniform light sources, shown on the right, and thus Americans are being injured and dying.

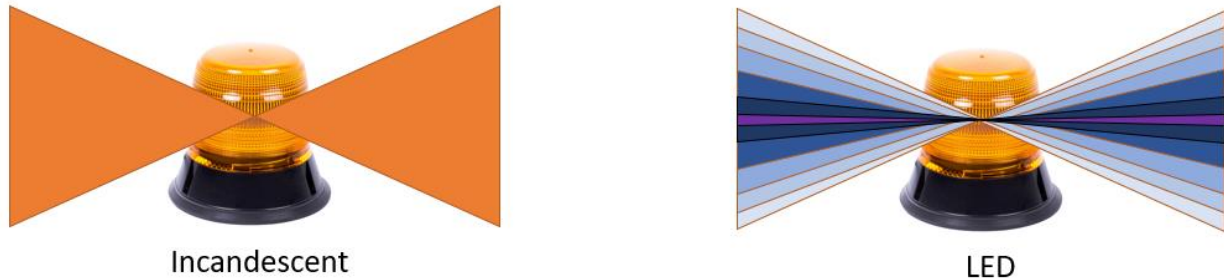


Figure 3 - Incandescent vs. LED Flashing Lights

Figure 4 is a utility truck with LED flashing light beams. Play the video and then ask these questions: “Are LEDs safe?” “Are humans evolutionarily equipped to succeed with this type of electromagnetic radiation being shined directly into their eyes?” “Which agencies are supposed to set standards for LED light beams?” “Are these light beams discriminatory?”

Utility Truck: <https://youtu.be/0MLDA6too1Q>



Figure 4 - Utility Truck

We request that the House Oversight Committee launch a full-scale investigation in the LED Cartel and the LED Fraud.

Sincerely,

A handwritten signature in black ink that reads "Mark Baker". The signature is written in a cursive style with a large initial "M".

Mark Baker
President
Soft Lights Foundation
www.softlights.org
mbaker@softlights.org
9450 SW Gemini Drive PMB 44671
Beaverton, OR 97008