



January 19, 2015

Chairman Fred Upton  
Committee on Energy and Commerce  
2125 Rayburn House Office Building  
Washington, DC 20515

Ranking Member Frank Pallone  
Committee on Energy and Commerce  
2125 Rayburn House Office Building  
Washington, DC 20515

Dear Chairman Upton and Ranking Member Pallone,

Big Ass Solutions is a manufacturer of high-efficiency building components headquartered in Lexington, Kentucky. The company is a true American success story, starting in 1999 with just six employees. Today, Big Ass Solutions employs 835 people, generates more than \$200 million in annual revenue, and has opened four international offices with more growth to come. Big Ass Solutions assembles products in Lexington, creating well-paying domestic manufacturing jobs. Additionally, its financial success extends beyond its own walls, as it sources many parts from domestic suppliers.

On January 12, 2016 the Energy and Power Subcommittee held a hearing to consider draft legislation that would modify a DOE final rulemaking for energy conservation standards on external power supplies (EPS). The purpose of this legislation is to avoid the unintended consequence of discouraging energy conservation in the lighting industry, because EPS products for high-performing light emitting diodes (LEDs) and organic LEDs would be covered under the rule.

**Discussions in January 2016 with Department of Energy officials indicated that the ceiling fan industry would be similarly affected to the lighting industry.** Big Ass Solutions has recently learned that some ceiling fans utilizing DC motors could also be covered under the final rulemaking, because there is a risk that the Department of Energy would view these power supplies as a covered product. DC ceiling fans are the top-performing technologies in their class in terms of energy consumption. This superior performance is enabled specifically by the application of a switching power supply. This technology is superior to previous products, regardless of whether the switching power supply is located internal or external to the end use product. If the Department of Energy's ruling includes power supplies for ceiling fans, some fans could no longer be sold in the United States because a critical component could no longer be manufactured.



Therefore, ironically, the DOE energy conservation standard would cause the most energy efficient fans to be taken off the market in the United States. For Big Ass Solutions, this market represents tens of millions in annual sales and several hundred jobs.

**We request a modification of the draft EPS Improvement Act of 2016 to add ceiling fans powered by DC motors to the list of exceptions.**

Suggested corrective Language

The Preamble is amended as follows:

To amend the Energy Policy and Conservation Act to exclude power supply circuits, drivers, and devices designed to be connected to, and power, light-emitting diodes, organic light-emitting diodes providing illumination *or ceiling fans using direct current motors* from energy conservation standards for external power supplies, and for other purposes

Section 2 is amended follows:

- (ii) EXCLUSION.—The term 'external 14 power supply' does not include a power supply circuit, driver, or device that is de- 16 signed exclusively to be connected to, and power—
- (i) light-emitting diodes providing illumination; *or*
  - (ii) organic light-emitting diodes providing illumination; *or*
  - (iii) *ceiling fans using direct current motors.*

Section 3 is amended as follows:

Sec. 3. Standards for Power Supply Circuits Connected to LEDs, OLEDs, *or DC ceiling fans.*

POWER SUPPLY CIRCUITS CONNECTED TO 2 LEDS OR OLEDS.—Notwithstanding the exclusion described in section 321(36)(A)(ii), the Secretary may prescribe, in accordance with subsections (o) and (p) and section 322(b), an energy conservation standard for a power supply circuit, driver, or device that is designed primarily to be connected to, and power, light-emitting diodes or organic light-emitting diodes providing illumination *or ceiling fans powered by direct current motors.*

...  
ENERGY CONSERVATION STANDARD FOR POWER SUPPLY CIRCUITS CONNECTED TO LEDS OR OLEDS.—Not earlier than 1 year after applicable testing requirements are prescribed under section 343, the Secretary may prescribe an energy conservation standard for a power supply circuit, driver, or device that is designed primarily to be connected to, and power, light-emitting diodes or organic light-emitting diodes providing illumination *or ceiling fans powered by direct current motors.*

For additional background:



- Ceiling fans are already subject to a separate DOE rulemaking for energy conservation standards. A Notice of Proposed Rulemaking (NOPR) for these standards was issued in December 2015. These standards will ensure that the energy consumption of ceiling fans as a final product is regulated.
- Much like an SSL LED driver, many DC motor power supplies consists of a first and second stage. The first stage consists of a voltage level conversion and the second stage consists of the DC motor power supplies which is analogous to the constant current LED drive stage in an SSL. Due to the diverse design of DC motors, the power supply stage is normally separate from the first stage and is custom designed to provide the best system efficiency for a given motor.

We appreciate the opportunity to comment on this draft legislation, and we welcome any questions you may have.

Sincerely,



Patrick Keal  
Government Affairs Director  
Big Ass Solutions

cc:

Subcommittee Chairman Ed Whitfield  
Energy and Power Subcommittee  
Committee on Energy and Commerce  
2125 Rayburn House Office Building  
Washington DC, 20515

Subcommittee Ranking Member Bobby Rush  
Energy and Power Subcommittee  
Committee on Energy and Commerce  
2125 Rayburn House Office Building  
Washington DC, 20515

