



U.S. Department of Energy  
Energy Efficiency and Renewable Energy

# Voices for SSL Efficiency: Opportunities to Partner and Participate

## *Solid-State Lighting Market Introduction Workshop*

**Boston, MA  
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**U.S. Department of Energy**





# SSL on the Move

What's Next?

- Significant breakthroughs, more to come
- More R&D is needed
- Products on the market



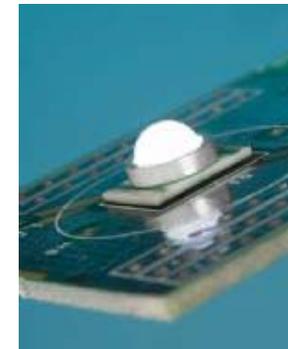


## New Product Announcements

- *“Philips Lumileds shatters 350 mA performance records with 115 lm/W LED”*  
January 2007
- *“Seoul Semiconductor introduces world’s brightest LED, a 240 lumens single die light source” [100 lm/W]*  
December 2006
- *“Nichia delivers 92 lm/W at 350 mA”*  
November 2006
- *“Cree delivers first 160-lumen white power LED” [85 lm/W]*  
October 2006



Seoul Semiconductor



Cree Inc.



# Early Adopters

- Wal-Mart
- California Home Builders
- Federal agencies (FEMP, Defense, Commerce, Agriculture)



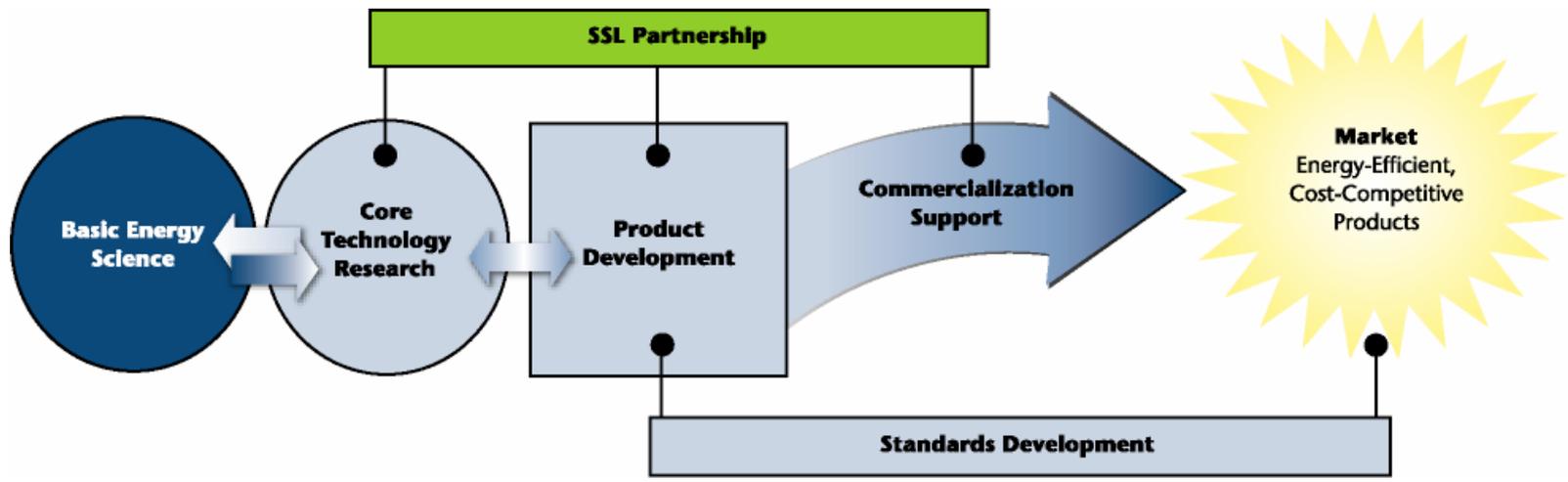


## A Broad National Strategy

- Unique attributes of SSL will trigger fundamental changes:
  - New forms and functions
  - Value chain
  - Delivery channels
- Transition to SSL requires industry-wide solutions
- You have an opportunity to partner, to join in the evolution of the U.S. lighting industry



# DOE Solid-State Lighting 5 Thrust – Total Program



Guiding technology advances from laboratory to marketplace



## DOE Steps Up to the Challenge

- Classic technology displacement challenge
  - Difficult to displace a well-established incumbent
- DOE fosters growing market through:
  - Technology procurement and demonstrations
  - Lighting for Tomorrow
  - ENERGY STAR®
  - Product testing
  - Support for standards and test procedures
  - Technical information network



## Today

- **Kevin Dowling:** SSL essentials
- **Linda Sandahl:** Lessons learned from CFLs
- **Jim Brodrick:** Overview of DOE strategy, Commercialization Support Plan
- **Breakout Session, part 1:** Issues, barriers, information needs, critical allies
- **Tour and Reception:** OSRAM SYLVANIA's LIGHTPOINT facility



## Tomorrow

- **Vrinda Bhandarkar:** Emerging SSL markets
- **Marsha Walton, Mark Michalski, Priscilla Richards:** NYSERDA activities in SSL
- **Updates:** Design competitions, demonstrations, testing, ENERGY STAR®, standards and test procedures
- **Breakout session, part 2:** How can DOE plan elements foster market introduction of new products?



## Take-Home Questions

- Which plan elements can best align with your efforts and how?
- Could there be improvements?
- How would your organization like to participate in DOE activities?
- Who in your organization should we contact?



***“Even if you’re on the right track  
you’ll get run over  
if you just sit there.”***

**Will Rogers**

