



LED Maker Bridgelux Targets General Lighting

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by Martin LaMonica

At the current rate of technology development, it's possible that LED replacements for 60-watt incandescent bulbs could drop below \$10 by the end of this year, said Mark Swoboda, the president of LED maker Bridgelux.

Although technically feasible, that six- or eight-fold price drop is not likely to happen. Swoboda figures that price could only be reached in the case of a lighting company selling directly to a customer.



One of Bridgelux's coin-size arrays, which are designed for a range of lighting applications.
(Credit: Bridgelux)

Still, prices are falling and efficiency is improving. Bridgelux on Wednesday is set to introduce a line of LED arrays which can be used in different applications, such as household lightbulbs, down lights, and street and commercial lighting.

With the new line of LEDs, the amount of light per watt has improved by over 30 percent in the past year and the costs have fallen between 10 percent and 30 percent, Swoboda said.

"Our core technology has improved to the point where it can deliver a light source that makes it very easy for a lamp or luminaire company to meet or exceed requirements to meet EnergyStar or (California's lighting efficiency standard) Title 24," Swoboda said.

Silicon Valley-based Bridgelux, which recruited former Seagate CEO Bill Watkins as chief executive officer earlier this month, makes the lighting components needed to make an LED bulb or lamp. It uses indium gallium nitride treated with phosphorus as its semiconductor material, which Swoboda said offers a good-quality light at relatively low costs.

In terms of energy efficiency, he said that lights using its LED chips exceed the efficiency of compact florescent lighting and have the advantage of lasting longer.

Its latest line of arrays range in output from 240 lumens to over 4,500 lumens, making them suitable for both general consumer lighting and commercial applications, such as retail stores. A 60-watt bulb is about 800 lumens and a 150-watt bulb is about 2,000.