

February 1, 2012

## Mitsubishi Kagaku Media Six models of tubular LED light bulbs to be released under the Verbatim® brand

Mitsubishi Kagaku Media Co., Ltd. (HQ: Minato-ku Tokyo; president: Shigenori Otsuka; hereinafter "Mitsubishi Kagaku Media") will begin selling six models of tubular LED light bulbs under the Verbatim® brand in early February. These tubular LED light bulbs can be used to replace the tubular fluorescent light bulbs widely used in offices, factories, warehouses, commercial facilities, etc.\*1

These products, in addition to the obvious advantages of long life and flicker prevention, also provide major energy savings and comfortable, very safe lighting. For instance, the FLD24DT series tubular LED light bulbs (equivalent to type-40 tubular fluorescent bulbs) reduce energy consumption by about 44%, while the FLD48DT series bulbs (equivalent to type-110 tubular fluorescent bulbs) reduce it by about 57%.<sup>\*2</sup> As for yearly CO<sub>2</sub> emissions, the FLD24DT series reduces yearly emissions by about 40 kg, while the FLD48DT series reduces yearly emissions by about 140 kg, so they are environmentally friendly products that contribute to the reduction of CO<sub>2</sub> emissions.<sup>\*3</sup> Also, the rated life of these products is 50,000 hours,<sup>\*4</sup> much higher than the approximately 12,000 hours of FLR rated life of ordinary tubular fluorescent bulbs, keeping maintenance costs in check.

Mitsubishi Kagaku Media is expanding its LED light bulb sales globally, having launched in Europe in 2010 and in the US, Australia, and Japan in 2011. Continuing on from LED light bulb sales, they are also beginning to sell tubular LED light bulbs. Mitsubishi Chemical, the parent company of Mitsubishi Kagaku Media, has been developing LED materials for many years. Combining the knowledge of Mitsubishi Chemical with the product planning and quality management power of Mitsubishi Kagaku Media, Mitsubishi Kagaku Media will continue to provide safe and reliable products.

Mitsubishi Kagaku Media is therefore striving to provide a comfortable environment for the people, society and the earth.

\*1. Some construction work is required for installation.

\*2. The power consumption of FLD24DT series bulbs, equivalent to type-40 tubular fluorescent bulbs, is about 48W (for two bulbs), while that of ordinary type-40 tubular fluorescent bulbs is about 85W (for two bulbs), a savings of about 44%. The power consumption of FLD48DT series bulbs, equivalent to type-110 tubular fluorescent bulbs, is about 96W (for two bulbs), while that of ordinary type-110 tubular fluorescent bulbs is about 225W (for two bulbs), a savings of about 57%.

\*3. CO<sub>2</sub> emission factor: 0.384 (Kg-CO<sub>2</sub>/kWh), calculated for one light (two bulbs) × 12 hours/day × 20 days/month

\*4. "Rated life" indicates the time it takes for the total luminous flux to reach 70% of its initial value. This is not the guaranteed life of the product.

### About Verbatim

Verbatim is a global brand of Mitsubishi Kagaku Media sold in over 120 countries worldwide, with the largest market share\* of the recordable optical disc sold worldwide by brand for six consecutive years. Verbatim was born in 1969 in the State of California in the United States. Mitsubishi Chemical Corporation (known as Mitsubishi Kasei Corporation at that time), the

parent company of Mitsubishi Kagaku Media, purchased Verbatim in 1990. LED light bulbs with the Verbatim brand first went on sale in Europe in September 2010, and can now also be found in the US, Australia, and Japan. Sample kits for OLED lighting have been sold under the VELVE brand since April 2011.

※2005-2010; the largest market share of the recordable CD/DVD/BD sold worldwide by brand for six consecutive years (according to the SCCG/JRIA data)

### **Features of Verbatim® tubular LED light bulbs**

- 1) Wide emission angle of 150°
- 2) Can be used even in locations where electromagnetic interference is a concern, since noise is minimized
- 3) The unique design of the power supply unit provides major reductions in flickering
- 4) Polycarbonate is used to prevent scattering of glass if the bulb falls due to an earthquake, etc.
- 5) RoHS-compliant and environmentally friendly
- 6) The main unit of the tubular LED bulb and the dedicated power unit are designed to be isolated for safety reasons
  - The power supply unit is PSE-certified in Japan according to the Electrical Appliances and Material Safety Act
  - The tubular LED bulb main unit has been made lighter in weight, reducing the risk of falling, etc.
  - Internal heat generation in the tubular LED bulb main unit is minimized, increasing its life (rated life: about 50,000 hours)
  - Improves reliability and safety without the use of existing fluorescent light bulb ballasts

### **<Items on sale>**

Required combined sale of tubular LED light bulbs and dedicated power-supply units.

Model no.	Dedicated power-supply unit	Type	CCT (k)	Rated lifetime (h)	On-sale date
FLD12DT40KNP	FLD12DTSMPS	equivalent to type-20 tubular fluorescent bulbs	4000	50,000	Early February
FLD12DT50KNP			5000		
FLD24DT40KNP	FLD24DTSMPS	equivalent to type-40 tubular fluorescent bulbs	4000		
FLD24DT50KNP			5000		
FLD48DT40KNP	FLD48DTSMPS	equivalent to type-110 tubular fluorescent bulbs	4000		
FLD48DT50KNP			5000		

### **For further information, please contact**

Yukana Yamashita  
 Mitsubishi Kagaku Media Co., Ltd.  
 Tel: [+81] 3-5484-3972  
 Fax: [+81] 3-5484-8224  
 URL: <http://www.mcmedia.co.jp/>

Public Relations Department  
 Mitsubishi Chemical Corporation  
 Tel: [+81] 3-6414-3730

Consumer contact  
 Customer Service  
 Mitsubishi Kagaku Media Co., Ltd.  
 Toll free Tel: 0120-34-4160 (Japan only)