



## Toshiba add new line-up of high speed signal transmission photorelays

*New devices boast the industry's smallest footprint*

**Düsseldorf, Germany, 13<sup>th</sup> March 2018** – Toshiba Electronics Europe today announced the launch of two high speed signal transmission photorelays that offer the industry's smallest footprint<sup>[1]</sup>.

The TLP3475S features low on-state output resistance ( $R_{ON}$ ) – typically  $1.1\Omega$  and offers fast switching times of 0.5ms (ton) and 0.4ms (toff). The device is rated for 60V ( $V_{OFF}$ ) and a max. current of 0.4A ( $I_{ON}$ ). The device is housed in an S-VSON4 package measuring just 2.00mm x 1.45mm x 1.65mm.

The TLP3440S is housed in a new S-VSON4T package, which has the same industry-leading small footprint (2.00mm x 1.45mm) as the S-VSON4 but is thinner at just 1.30mm. The TLP3440S features a low  $R_{ON}$  of  $12.0\Omega$  (typ.) and is rated for 40V ( $V_{OFF}$ ) and a max current of 0.12A ( $I_{ON}$ ). Its switching times are 0.2ms (ton) and 0.3ms (toff).

When off, both devices consume just 1nA ( $I_{OFF}$ ). The footprint of the new photorelays is 22.5% smaller than that of existing VSON4 packages. Used in combination, the new devices will help to reduce PCB sizes in all applications including semiconductor testers, probe cards and

replacement of mechanical relays. They can be also be used in gigahertz high-speed signal transmission lines.

Unlike typical photorelays, which have a maximum operating temperature of 85°C, the TLP3440S and TLP3475S can operate between -40°C and 110°C, and therefore simplify system design – especially in industrial and other rugged applications.

The latest Gartner market report recognizes Toshiba as the leading manufacturer of optocouplers by sales in 2015 and 2016, with a 23% sale-based market share in CY2016. (Source: Gartner, Inc. “Market Share: Semiconductor Devices and Applications Worldwide 2016” 30 March, 2017)

Toshiba Devices and Storage Corporation (TDSC) will continue to deliver products that meet the needs of customers by promoting the development of a diverse portfolio of photocouplers and photorelays tailored to market trends.

Notes:

[1] As of 22 September 2017, TDSC survey

###

**About Toshiba Electronics Europe**

[Toshiba Electronics Europe GmbH](#) (TEE) is the European electronic components business of [Toshiba Electronic Devices and Storage Corporation](#). TEE offers European consumers and businesses a wide variety of innovative hard disk drive (HDD) products plus semiconductor solutions for automotive, industrial, IoT, motion control, telecoms, networking, consumer and white goods applications. The company's broad portfolio encompasses integrated wireless ICs, power semiconductors, microcontrollers, optical semiconductors, ASICs, ASSPs and discrete devices ranging from diodes to logic ICs.

Formed in 1973 in Neuss, Germany, TEE has headquarters in Düsseldorf, Germany, with branch offices in Germany, France, Italy, Spain, Sweden and the United Kingdom providing design, manufacturing, marketing and sales. Company president is Mr. Akira Morinaga.

For more company information visit TEE's web site at [www.toshiba.semicon-storage.com](http://www.toshiba.semicon-storage.com).

**Contact details for publication:**

Toshiba Electronics Europe GmbH, Hansaallee 181, D-40549 Düsseldorf, Germany

Tel: +49 (0) 211 5296 0 Fax: +49 (0) 211 5296 79197

Web: [www.toshiba.semicon-storage.com/eu/company/news.html](http://www.toshiba.semicon-storage.com/eu/company/news.html)

E-mail: [discrete-ic@toshiba-components.com](mailto:discrete-ic@toshiba-components.com)

**Contact details for editorial enquiries:**

Michelle Shrimpton, Toshiba Electronics Europe GmbH

Tel: +44 (0)193 282 2832

E-mail: [MShrimpton@teu.toshiba.de](mailto:MShrimpton@teu.toshiba.de)

**Issued by:**

Birgit Schöniger, Publitek

Tel: +44 (0) 20 8429 6554

Web: [www.publitek.com](http://www.publitek.com)

E-mail: [birgit.schoeniger@publitek.com](mailto:birgit.schoeniger@publitek.com)

**March 2018**

**Ref. 7094/A**