



## **Toshiba adds automotive display interface bridge ICs for IVI systems**

New devices address the issue of incompatible interfaces with new display types

**Düsseldorf, Germany, 2<sup>nd</sup> June 2020** – Toshiba Electronics Europe GmbH (“Toshiba”) has added two newly developed display interface bridge ICs to their product lineup for automotive in-vehicle infotainment (IVI) systems.

Through the greater complexity and extended functionality of automotive IVI systems, the number of display panels incorporated into modern vehicles has increased significantly, with IVI systems often including several different display interface types (like LVDS, etc.). Consequently, some current systems cannot support emerging protocols - such as display serial interface (DSI) and embedded DisplayPort (eDP), due to incompatibilities between interface standards.

To address this issue, designers are turning to interface bridge ICs such as Toshiba’s new TC9594XBG and TC9595XBG.

The TC9594XBG supports a parallel input (24bit @ 166MHz) and provides a 4-lane x 1 channel MIPI® DSI-TX output. The TC9595XBG can accept two input types; 4-lane x 1 channel MIPI® DSI or MIPI® DPI (24bit @ 154MHz) and outputs VESA® DisplayPort™ 1.1a.

Both devices offer WUXGA (1900 x 1200 @ 24bit) resolution and are housed in a 7mm x 7mm / 0.65mm pitch VFBGA80 package. The TC9594XBG operates from -40°C to +105°C while the TC9595XBG covers -40°C to +85°C.

Toshiba has significant experience in developing MIPI® interface bridge ICs for consumer use. The new TC9594XBG and TC9595XBG devices add an automotive capability to the lineup, solving interface incompatibility issues, especially in IVI systems.

Sample shipments of the new TC9594XBG device started in May 2020 and samples for TC9595XBG will follow later this year.

Follow the links below for more information on Toshiba's display interface bridge ICs:

<https://toshiba.semicon-storage.com/eu/semiconductor/product/interface-bridge-ics-for-mobile-peripheral-devices/display-interface-bridge-ics/detail.TC9594XBG.html>

<https://toshiba.semicon-storage.com/eu/semiconductor/product/interface-bridge-ics-for-mobile-peripheral-devices/display-interface-bridge-ics/detail.TC9595XBG.html>

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## **About Toshiba Electronics Europe**

[Toshiba Electronics Europe GmbH](#) (TEE) is the European electronic components business of [Toshiba Electronic Devices and Storage Corporation](#) (Toshiba). 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, ASSPs and discrete devices ranging from diodes to logic ICs.

TEE has headquarters in Düsseldorf, Germany, with branch offices in France, Italy, Spain, Sweden and the United Kingdom providing design, manufacturing, marketing and sales. The company president is Mr. Tomoaki Kumagai.

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: [solution-marketing@toshiba-components.com](mailto:solution-marketing@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)1582 390 980

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

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

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