

Tannas Electronic Displays

Newsletter on Developments in LCD Resizing

May 14, 2013

Vol. 1, No. 1

Display Week is Coming

Tannas Electronic Displays (TED), which develops and licenses LCD resizing technology, will erect its newly designed exhibit in Booth 817 at the Society for Information Display's Display Week, Tuesday May 21 through Wednesday May 23. The event will be held in the Vancouver Convention Centre in Vancouver, British Columbia.

"The new booth is more attractive than what we had before," said TED Sales and Marketing Manager Ken



Figure 1. TED's booth at Digital Signage Expo 2013. The booth at SID Display Week will be bigger. (Photo: Ken Werner)

Werner, "but, more important, it helps us tell our story much more clearly."

Some of our licensees will be exhibiting their products at the TED booth or will have literature describing their products, services, and activities. In addition, other exhibitors at Display Week will be showing products that incorporate resized displays made by TED licensees.



TED continues to improve resizing and sealing technology, to patent the new developments, and to support its existing and future licensees. In addition, TED itself does panel resizing in prototype, design-sample, and proof-of-concept quantities. As a customer's production rises to pilot-line and high-volume quantities, we help the customer make a smooth transition to one of our licensees. Some customers have chosen to become licensees themselves, and produce resized displays for their own internal use.

TED will be speaking with existing and prospective licensees and customers during Display Week. Please email Larry Tannas at l.tannas@tannas.com or Ken Werner at kwerner@nutmegconsultants.com for an appointment. The potential for resized LCDs is tremendous and growing. See the opportunities for yourself in Booth 817.

What We Learned at DSE 2013

For the first time, TED exhibited at Digital Signage Expo, which was held in Las Vegas from February 26 to 28 this year. Exhibitors were up 22% from 2012, according to DSE, but it felt like more than that, and the energy level was high.

The signage divisions of most of the major panel makers had major presences on the show floor. We were pleased to find an increasing number of vendors showing high-aspect-ratio signs with panels resized by TED licensees. Viewsonic showed one of the largest selections, with modules made by STI, one of our Korean licensees.

Bi-Search International (BSI) showed one of the most interesting resized displays, a 26-inch LCD that was not only resized to 1366x384 pixels, but was also curved! Lots of interest from beverage companies, said BSI Account Sales Manager Jason Lee. The LCD panel came

from LG Display, and was then resized by Tovis (Incheon, Korea) under the TED license. After resizing the panel, Tovis heated the LCD gently prior to bending it and placing it in its curved bezel, said Tovis's In Ho Cho.



Figure 2. BSI display with LCD resized and curved by TED licensee Tovis of Incheon, Korea. (Photo: Ken Werner)

At TED, we enjoy thinking of imaginative applications for resized displays, such as digital signs that will fit between the windows and roof of subway cars and other mass-transit vehicles. But at DSE we discovered that a routine LCD size used in several brands of kiosk was reaching end of life, and that the companies that deploy these kiosk networks have a pressing need to take a slightly larger size of LCD and trim less than an inch off one side so it can replace damaged displays in existing kiosks or be used in new kiosks without requiring a design change. Yes, we can do that.

Please discuss your panel resizing ideas with us, whether they are over-the-top imaginative or urgently down to earth.

GSD is Latest TED Licensee

The week before SID Display Week, **GSD** (Gumi-city, Korea) became TED's newest licensee – the eighth in the last 12 months. GSD will be using the licensed technologies to make ultra-wide displays. All eight licensees are applying the licensed technologies to resize LCDs for digital signage and commercial applications.

Here are the other licensees.

ANNAX (Anzeigesysteme GmbH, Munich, Germany) is resizing LCDs for internal use in its own railroad and other transportation information systems.

BMG MIS (Ulm, Germany) is focusing on digital signage.

LITEMAX Electronics (Shin-dian City, Taiwan) is using the technology for its Spanpixel line of high-aspect-ratio displays, including the new 37-inch-diagonal

Model SSD3625 with 1920x268 pixels (16:2.2 aspect ratio) and 1000-nit luminance.

MRI (Atlanta, Georgia) is custom resizing transparent LCDs for commercial refrigerator doors to replace the typical glass doors used in supermarket refrigerator cases.

STI (Anseong City, Korea) is resizing panels for a variety of customers, as is **TOVIS** (Incheon, Korea), which made the curved and resized display for BSI.

In Shanghai, there is recent licensee **VitroLight**.

Additional licensees will be announced soon. If you would like to explore the benefits of becoming a TED licensee, please email Larry Tannas at l.tannas@tannas.com or Ken Werner at kwerner@nutmegconsultants.com.

TED Protects Its Licensees

TED supports its licensees by sharing the results of new R&D efforts in resizing, and by training in new techniques. TED also protects its licensees by diligently policing the marketplace for infringers attempting to compete unfairly.

In September 2012, Tannas settled a patent infringement lawsuit with Luxell Technologies, Inc., in which Tannas asserted U.S. Patent Nos. 7,525,633, 7,535,547, and 8,068,206 (the Tannas Patents) against Luxell. Although the terms of the settlement are confidential, the Court issued an Order stating that Luxell does not dispute that its accused products were made by a process that infringes each of the Tannas Patents. (A copy of the order is available upon request.) In addition, Tannas obtained a license (including rights to sublicense) to Luxell's U.S. Patent No. 7,161,651 entitled "Method of Resizing a Liquid Crystal Display." When Luxell then violated the terms of settlement, Tannas promptly obtained a judgment for \$281,173 plus interest.

We invite all companies interested in resizing to speak with us. Our goal is for you to join the Tannas Electronic Display family of licensees, thus assuring yourself that you are using the latest and most effective resizing technology.