



2287 W. Eau Gallie Blvd, Suite B  
Melbourne, FL 32935  
321.821.2227  
[www.primate-tech.com](http://www.primate-tech.com)  
[info@primare-tech.com](mailto:info@primare-tech.com)

## PRESS RELEASE

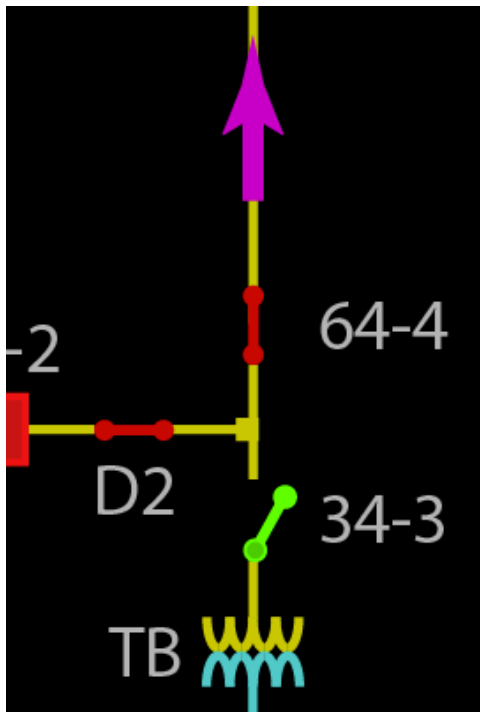
### Primate Demonstrates Direct LED Displays at DistribuTECH 2016

A Viable Video Hardware Solution for Electric Utility Control Rooms

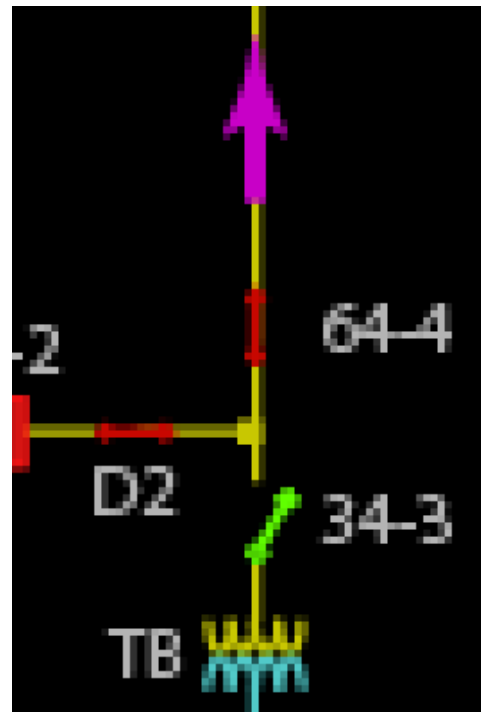
**Melbourne, FL** (February 15, 2016) - During the recent DistribuTECH conference, Primate displayed content for electric system control rooms on four different direct LED displays. The content varied from high level situational awareness displays to detailed schematic drawings. In each instance the precision of Primate's visualization solution allowed rendering of content that exactly aligns with the position of each pixel.

With traditional rendering techniques, which are optimized for high-resolution monitors, display content is anti-aliased and sub-pixel rendering is used to remove rough edges and achieve a smooth and appealing view to the human eye. With direct LED displays, this causes dithering and blurring. These issues are not especially noticeable with moving content, like videos or scrolling text; however, they are an extreme distraction with fixed position content, which is often present in control rooms. Items that are especially challenging for traditional visualization software are text, standard width lines, and symbols, which are prolific in display content for control rooms.

Depicted below is a sample of display content rendered on a typical high-resolution screen, followed by an example of the same content rendered with an LED pixel view, illustrating content appearance on a direct LED display without using Primate's optimization techniques.



Example 1: High Resolution View



Example 2: Direct LED Pixel View without Primate Optimization

Below is a sample of the same LED display, optimized by Primate.

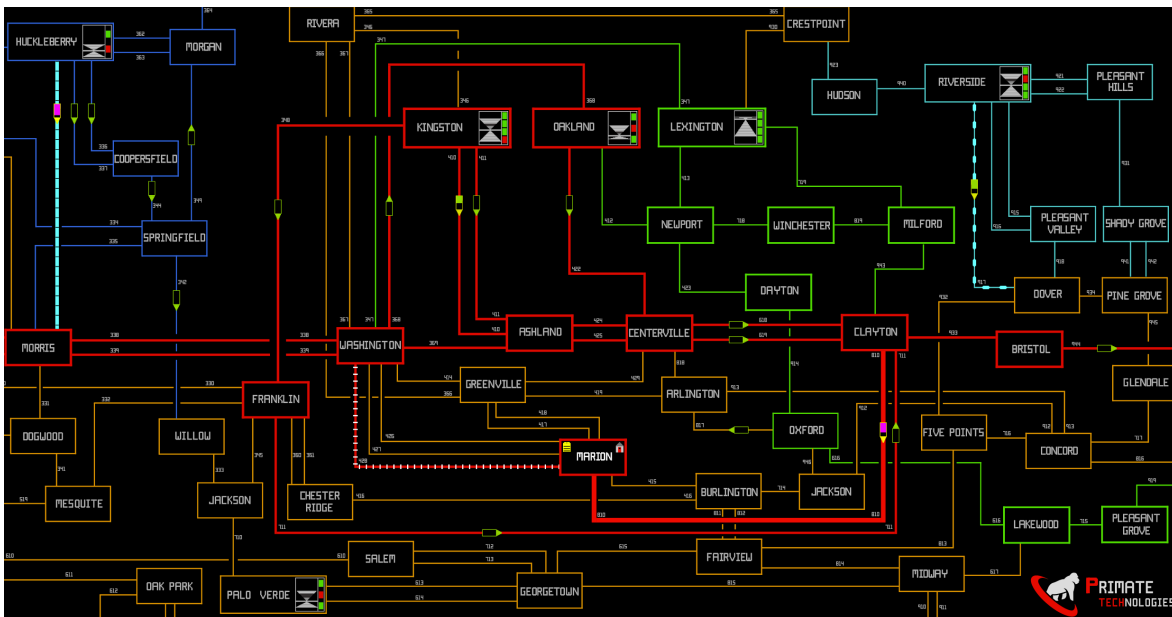


**Example 3:** Direct LED View with Primate Optimization

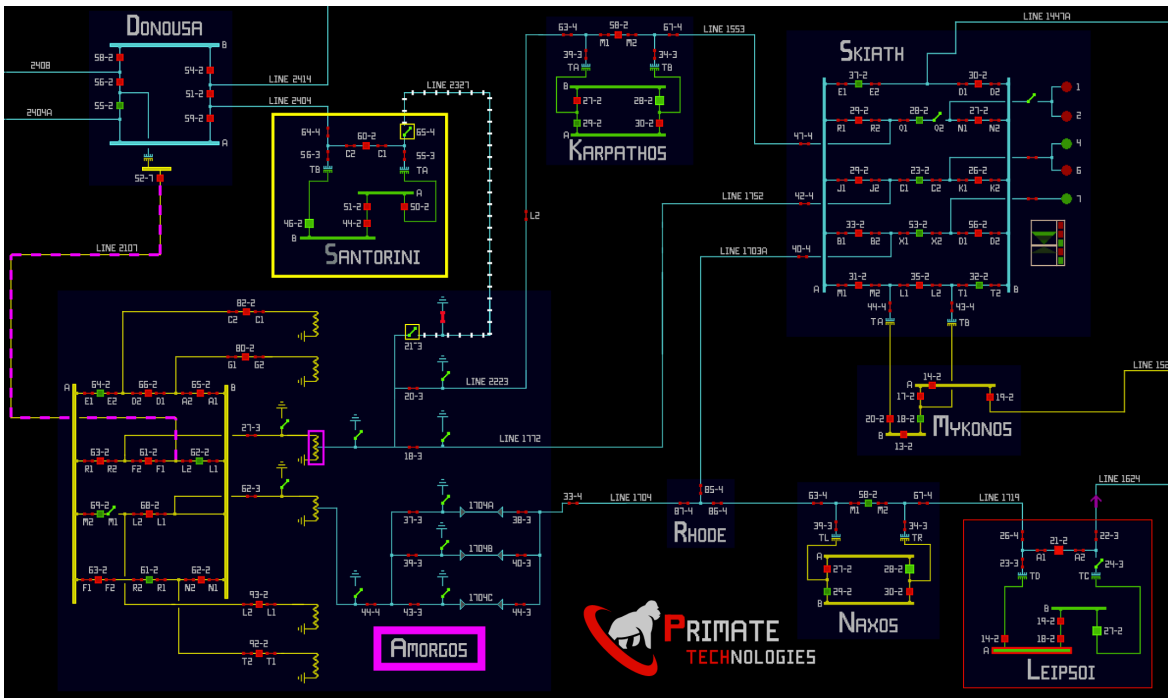
Primate's content is perfectly aligned to the position of each pixel, so the rendered and pixel preview versions of the content are identical. This precise alignment improves the brightness and clarity of the visualization, reducing eye strain in the control room.

A distinct light source illuminates the red, green, and blue (RGB) elements of each pixel within a direct LED display. The close proximity of the individually colored 'lamps' causes the eye to see a blended color, which is the result of the brightness varying for each RGB light source. Rendering high quality content on direct led displays requires specialized graphics design skills to prevent blurry or dithered content.

As demonstrated at the recent exhibition, Primate has mastered the ability to present pixel precise content on direct LED surfaces, making this hardware a viable option for control room video walls. Two examples of Primate's content that has been optimized for direct LED displays follow.



**Example 4:** Primate LED Display



**Example 5:** Primate LED Display

Please contact Primate to learn more about optimizing the quality and value of the content on your new or existing video wall hardware.

**About Primate Technologies, Inc.:** Primate Technologies, Inc., is a visualization software company focused on situational and operational awareness solutions. Primate Technologies has a record of performance for delivering products that exceed industry and regulatory standards including compliance with security requirements. Incorporated in 2001, Primate specializes in software and display content solely within mission critical control rooms. Focus on this market segment, refined design process, and experienced staff make Primate a sought after situational awareness leader.