

Semiconductor Insider

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Industry News (click title to view original source.)

Electronic Skin Created by UC Berkeley

Engineers at the University of California, Berkeley, have created artificial electronic skin made of semiconductor nanowires that can sense touch. This "e-skin" has the ability to feel and touch objects, and is delicate enough to pick up fragile objects like an egg, yet strong enough to grasp a frying pan.

Clean Room, Clean Robot

Much of the hardware in a clean room robot is the same as any other robot, with the important exception of a combination of sealed covers to prevent particles from escaping the robot. The consumer electronic supply chain is growing, and clean room robotics will play a key part in this growth.

The Threat of Fake Chips

Chips perform key roles in countless commercial products, as well as phone links, banking networks, electronic grids and nuclear power plants. More than 13,000 chips have been imported from China that were altered to resemble those from legitimate companies, including firms Intel, Atmel, Altera and National Semiconductor. Among those buying the chips was the U.S. Navy.

Computers to Run on Their Own Heat Waste

Computers may soon be able to recycle their own waste heat, using a semiconductor called gallium manganese arsenide. The use of thermospintronics would allow a device to sit atop of a traditional microprocessor, and siphon waste heat away to run additional memory or computation.

Will Semicon Growth Subside in 2011?

Chip manufactures are taking a cautious stance as they predict much slower revenue growth in 2011 than experienced in 2010. The general sentiment is that consumer and enterprise spending will be very anemic in the first half of 2011, although the second half should be better.

Seoul Semiconductor Participates in Energy Evaluation Project

Over a period of two years, this project will demonstrate energy conservation efforts that can reduce the residential load on existing electrical grid, and curb dependence on non-renewable energy sources. Data from the house outfitted with Seoul Semiconductor's Acriche LEDs will be compared against a house using compact fluorescent lights.

Tablets vs. PCs

The smartphone and tablet trends have given certain key players many new sources of revenue, but the tablet craze is having a negative effect on PC sales. Semiconductor companies who are focused on PCs are already seeing ratings slashed by analysts, and are beginning to report less-than impressive earnings.

Artificial Diamond Semiconductor

Exploiting a diamond's unique properties such as unmatched density, excellent thermal conduction, and more, is the key to a new kind of semiconductor that could be a revolutionary advance in energy-efficient technology. The artificial diamond super semiconductor is being developed by the National Institute of Advanced Industrial Science and Technology in Japan.

Semiconductors for Radioactive Explosives Detector

One big challenge in making a detector for radioactive explosives is combining the detector's three essential elements in such a way that it won't explode. Redlen Technologies has developed ways to meet that challenge, and now sells \$10 million of its products annually around the world.

M+W Group Receives International Award

International engineering and construction company M+W Group was granted the 'Solar Industry Award' at the Photovoltaic Solar Energy Conference and Exhibition in Valencia, Spain. The prize was awarded to the M+W Group in the category 'Turnkey Company of the Year' by Solar PV Management magazine published in England.

Featured Jobs:

We have over *100 openings* right now!
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Click titles for full details.

Resource Engineer (AMAT 200mm PVD)
1-2 months - France - #1901

Resource Engineer (200mm AMAT EPI)
6 months - Sherman, TX - #1729

Resource Engineer (Diffusion Furnaces)
6 months - USA Travel - #1771

Resource Engineer (Hitachi 700)
1 Year - China - #1884

Resource Engineer (200mm AMAT Endura PVD)
3-6 months - USA Travel - #1848

Resource Engineer (200mm AMAT Producer CVD)
2-3 months - France - #1906

Process Engineer (AMAT 200mm CMP)
Project Based - Austin, TX - #1903

Resource Engineer (LAM 2300, Versys, Exelan)
1 Year - Worldwide Travel - #1493

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Referral Contest Winners November:

Bob S Clifford T John F
Brent N William J

Congrats, and Thank You!

Refer someone, and be entered into the
monthly drawing for a \$50 gift card of
your choice!

[Refer someone now to be entered>>](#)

"N" Quotes

“ NSTAR is a good company to work for. I would like to use this opportunity to say thanks to NSTAR's staff. You're all so great!

- JN, New Mexico

“ I've just celebrated my 5th year anniversary with NSTAR. How many contracting agencies can offer this sort of job security? It's been great!

- BF, Oregon

“ The hiring process went very smoothly. Everyone at NSTAR was very helpful and answered all of my questions

- EO, Washington

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New CoNstruction

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Samsung's Ambitious Project

Austin will soon have one of the biggest chip complexes in North America. The plant expansion is part of Samsung's ambition to become the biggest chipmaker in the world. Phase 1 of the expansion included the construction of the electrical and piping systems, a pure water treatment plant, and a larger gas distribution plant. Phase 2 involves installing and testing hundreds of multimillion-dollar pieces of equipment.

GlobalFoundries Finds New Home

GlobalFoundries celebrated the opening of a 6,000 square-foot lab space that will be used to train nearly 1,000 technicians and engineers expected to work in the clean room at the company's new factory in Malta, NY.

TI Opens Its First Semicon Factory in China

Texas Instruments has opened a Chinese wafer factory which will expand TI's analog chip production capacity and will put its manufacturing close to its growing customer base.

Other News of Nterest

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Google Works On Driverless Cars

Google Inc. has driven thousands of miles with driverless cars. Google's fleet of driverless test cars include six Toyota Priuses and an Audi TT. The goal of the test is to find a way to "help prevent traffic accidents, free up people's time and reduce carbon emissions."

Privacy on the Smart Grid

In 2007, when the Dutch government announced that all 7 million homes in the Netherlands would be equipped with smart meters by 2013, it anticipated little resistance. After all, who wouldn't welcome a device that could save both energy and money? But consumers worried that such intelligent monitoring devices, which transmit power-usage information to the utility as frequently as every 15 minutes, would make them vulnerable to thieves, annoying marketers, and police investigations.

Myspace Launches Mashup with Facebook

On November 18th, Myspace Inc. announced Mashup with Facebook, a new feature where users can create a "personalized stream" of entertainment content. This new feature is a great illustration of Myspace's strategy around social entertainment and enabling the real-time stream.

Pay Phones Make a Comeback

Pay phones, which were nearly as extinct as dinosaurs, are getting a 21st century facelift complete with solar panels and a wireless connection. About 25 upgraded pay phones are already located in downtown Miami. The continued operation of pay phones is imperative on a national, state, county and local level for social and emergency reasons.

FuN Fact: Cyber Monday 2010

Since comScore began tracking e-commerce spending in 2001, it has witnessed five individual shopping days eclipse \$900 million in spending.

To date, Cyber Monday 2010 (Nov. 29) is the only billion dollar spending day on record, followed by Monday, December 6, 2010 with \$943 million and Tuesday, December 15, 2009 with \$913 million. [Read More>>](#)



Ntertainment



photo courtesy of PhotoBucket

ChaNges (click title to view original.)

Sanyo to Close Two Domestic Chip Plants

Japan's Sanyo Electric will close two of its domestic semiconductor plants by 2012 and move production to another plant along with about 1,000 workers. The plants - one in Oizumi, Gunma Prefecture, and the other in Anpachi, Gifu Prefecture - have had declining production efficiency.

Semicon Research Receives Renewal Contract

A University of Sheffield research facility, which studies advances in semiconductors used in the internet, solar cells, DVD players and gas detection, has received a £10 million renewal contract.

Oracle to Acquire Semiconductor Companies

Acquisition of chip designers will provide Oracle with more intellectual property, and allow it to customize its microprocessors precisely in accordance with its own requirements and demands of its clients.

CHiL Semiconductor Expands Worldwide

CHiL Semiconductor Corporation, a developer of integrated circuits, is expanding its worldwide sales and support channels by opening sales offices in Japan and in Europe.

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