

From: [USTAR](#)
To: [Brian Raymond](#)
Subject: March Innovation Utah Insights
Date: Friday, March 21, 2014 9:16:07 AM

Having trouble viewing this email? [click here](#)

Innovation Insights



Volume 8, Issue 43

March 21, 2014

In This Issue

[Genetic Discovery](#)
[Energy Triangle](#)
[Grants](#)
[Bend Labs](#)
[Business Boot Camp](#)

In The News

Concept to Company kicks off \$45,000 competition.

Aspiring entrepreneurs or existing businesses who believe they have the next "Big Thing" will want to enter the upcoming 2014 Concept to Company contest. Utah economic development organizers want to identify and encourage entrepreneurs who bring "value added" growth to the southern Utah region... [Read More](#)

From DNA to diagnosis. The USTAR Center for Genetic Discovery is partnering with California based Omicia, Inc, to make analyzing a patient's genome as routine as performing a blood test. The center, co-directed by Mark Yandell, Ph.D., and Gabor Marth, D.Sc., was launched this month with \$6 million from the University of Utah and the state-funded Utah Science Technology and Research

Becoming a Leader in Genetic Discovery

USTAR, in partnership with the University of Utah Health Sciences, has created a new Genetic Discovery team housed in the School of Medicine to develop and commercialize computational methods of discovering relationships between genes and diseases, enabling more effective diagnoses and treatments, making marketable agricultural discoveries and improving forensic identification methods.



The mission of the genetic discovery team is facilitating the discovery of medically and clinically important genes. Gabor Marth, a human genetics professor with expertise in sequence analysis, and Mark Yandell, a human genetics professor with expertise in interpreting data, will co-direct the center. The two have worked together for more than fifteen years.

Collecting data from the sequence of an individual's chromosomes enables researchers to look for defective genes, or genes that are typically associated with certain diseases. Knowing there's a specific defect in a gene and that there is a therapy available that relates to it can steer a patient towards appropriate treatment. Marth says some diseases are not always caused by the same exact defect or a defect even in the same gene. It could be that any one of twenty genes could be the cause of the disease. In some cases finding a defect in a gene may only tell you that you have a higher probability of developing a certain disease, but it doesn't necessarily mean that you are going to get it. [Read more here](#)

Addressing Utah Energy Issues

Like most states, Utah faces some unique energy problems, but thanks to the new Utah Energy Research Triangle (UERT), several high priority issues will be addressed with seven research projects receiving grant funding.

Awarding these research grants represents further progress on the Governor's 10-Year Strategic Energy

(USTAR) initiative... [Read More](#)

Partner Events

5th Annual Waxy Crude Workshop

Date: April 10, 2014

Time: 9:00 a.m. - Noon

Location: Uintah Basin ATC in Vernal, Utah

For more information, contact Ryan Streams at rstreams@utah.gov

UTC Speed Networking The Utah Technology Council will host a speed networking event for C-level member executives

Date: April 2, 2014

Time: 3:00 - 5:00 p.m.

Location: Salt Lake Community College Miller Free Enterprise Center Rm 203

9750 South 300 West Sandy, UT 84070

[Register Here](#)



Plan, which called for not only the creation of an Office of Energy Development, but also an Energy Research Triangle to build cooperation among Utah's top universities to advance energy innovation in the State.

The Utah Science Technology and Research Initiative (USTAR), the Department of Workforce Services (DWS), the Office of Energy Development (OED) and the Governor's Office of Economic Development (GOED) all contributed to these one year grants, which address wide-ranging issues including energy transportation and infrastructure, environmental quality, resource management and responsible energy development.

The \$445,000 in state funding will be divided between projects associated with Utah's major research universities, including Utah State University (USU), Brigham Young University (BYU) and The University of Utah (U of U), to support and inspire the next generation of Utah talent to focus on energy research.

The seven grant projects cover a wide variety of energy issues. University researchers will collaborate on topics ranging from Uinta Basin air quality to the conversion of carbon dioxide to liquid methanol, which can be used as a valuable chemical feedstock or transportation fuel additive. A third project will examine the flow characteristics in pipelines for Utah's waxy crude oil traveling from the Uinta Basin to refineries. [Read more here.](#)

Bend Labs Extending Success at BiG

We live in a world where interactive technology is becoming increasingly commonplace in our everyday lives. Gaming systems, motion capture animation, smart phones and computers are just a few examples. Shawn Reese, inventor and founder of Bend Labs, and his team are expanding the interactive category by creating a wearable technology that will provide real-time feedback on motion as it relates to the body's joints.



Bend Labs, housed in the BioInnovations Gateway (BiG), is creating a wearable, flexible sensor for joint angle analysis. It attaches to clothing seams and does not impede motion. The sensor will measure flexing and extension abilities of joints in real time. The joint angle data is then stored in Bend Labs' cloud for future joint movement progression analysis.

The first targeted market for the Bend Sensor will be a rehabilitation device for people with knee replacements. Reese said other possible applications include athletic performance, physical therapy and video games.

A common complication after knee surgery is Arthrofibrosis, a stiff knee, which is attributed to not exercising enough or doing the exercises wrong. Bend Labs wants to give the patient a comfortable, interactive brace that they can easily wear. The patient can use Bend Lab's iPad or iPhone app to track their progress using the exercises given to them by their physical therapist.

Once the patient has finished the exercises, they might see a green check mark indicating that the exercise has been completed correctly, or a yellow check mark indicating that the patient didn't do it correctly. This data will be relayed to the physical therapist that keeps tabs on how well the patient is doing. [Read more here.](#)

Boot Camp to Get Utah Companies in Shape

Most emerging businesses face serious challenges. Thanks to the upcoming MountainWest Capital Network Business Boot Camp, young Utah businesses can receive an arsenal of practical ideas and ammunition to battle the most difficult business challenges.



The first annual MWCN Business Boot Camp will be held on March 27, 2014 at the Little America Hotel in Salt Lake City and will offer two tracks focused on the needs of emerging companies of different sizes.

The full-day event is designed to give emerging businesses basic training through valuable instruction from industry experts. Attending companies will gain important knowledge and experience from successful local business experts who will share relevant, valuable tricks, tips and tools to help grow business.

The keynote will be delivered by Jeff Kearn, a well-known figure in the business community and chairman and CEO of Stance Socks. Devin Thorpe, a recognized expert in the rapidly developing crowd funding movement will also give an orientation lecture. The two will set the stage for a day filled with valuable tactics to help foster stronger businesses.

Participants may attend either of two separate tracks engineered to deliver the best information for the size of their company. The start-up track has been designed for companies with up to \$500,000 in revenue and will feature presentations on topics ranging from Basic Training for Startups, Early Stage Financial Issues, Equity Finance for Start-ups, IT Fitness for Emerging Companies and Power Marketing – Putting Investment Dollars to Work. [Read more here](#)

To register for the event, visit www.mwcn.org

**"After seven years of incredible work and some fine-tuning to ensure excellent performance, USTAR is poised to play a major role in keeping Utah's economy strong with world-leading companies and high-paying jobs."
*Greg Bell, USTAR Governing Authority Chairman***

www.innovationutah.com



This message was sent to braymond@daggettcounty.org by jberry@utah.gov

[Unsubscribe](#) | [Manage Subscription](#) | [Forward Email](#) | [Report Abuse](#)



Copyright © 2009 USTAR All Rights Reserved 60 E. South Temple - Third Floor, 801-538-8879, Salt Lake City, UT, 84111

Share this

