

Best of Last Week—The directionless universe, China's huge radio telescope and oxytocin enhanced spirituality

September 26 2016, by Bob Yirka

Four potential CMB patterns for universes with direction

(ScienceX)—It was another good week for physics as a team with the University of Calgary and colleagues in the U.S. [teleported a particle of light six kilometers](#) across the city of Calgary's fiber optic cable

infrastructure—leading perhaps, toward a quantum Internet. Also, a pair of researchers at Technion-Israel Institute of Technology, Michael Revzen and Ady Mann, found a way to [retrieve 'lost' information from quantum measurements](#). And a team with University College London and Imperial College London ran a number of stringent tests regarding stretching of the universe, and in so doing, found [they were able to confirm that the universe has no direction](#)—it is, they claim, the same in all directions.

In space news, NASA sent out an announcement that [it plans to reveal 'surprising' activity on Jupiter's moon Europa](#) today. Images from the Hubble telescope have led to speculation that there is something odd going on beneath the surface of the icy moon. Also, after five years of development effort and \$180 million spent, [China began operating the world's largest radio telescope](#)—the 500-meter diameter telescope will be used to detect gravitational waves and to listen to radio emissions from stars and galaxies, and perhaps signs of intelligent extraterrestrial life.

In other news, a multinational group of researchers studying hundreds of new genomes from around the world found that [human DNA could be tied mostly to a single exodus from Africa](#)—they believe that all non-African people alive today descend from a single group of migrants. Also, a team with the Technion-Israel Institute of Technology announced that they had discovered [a cell in spinach that uses sunlight to produce electricity and hydrogen](#) and used it to develop a bio-photo-electro-chemical cell. And a team at the U.S. National Institute of Environmental Health Sciences found that [smoking leaves lasting marks on DNA](#)—they found evidence of changes to 7,000 genes, some of which may lead to diseases. And a combined team of researchers from the University of Houston and the California Institute of Technology announced that they had discovered [a more efficient way to split water to produce hydrogen](#)—perhaps finally leading the way to its wide use as

a fuel.

And finally, if you are one of the millions of people the world over having trouble experiencing oneness with the universe, you might want to take a look at a study done by a team at Duke University, they found that [the hormone oxytocin enhances spirituality](#).

© 2016 ScienceX

Citation: Best of Last Week—The directionless universe, China's huge radio telescope and oxytocin enhanced spirituality (2016, September 26) retrieved 18 April 2024 from <https://sciencex.com/news/2016-09-weekthe-directionless-universe-china-huge.html>

This document is subject to copyright. Apart from any fair dealing for the purpose of private study or research, no part may be reproduced without the written permission. The content is provided for information purposes only.