

## Virent BioFormPX® Paraxylene Used to Produce World's First 100% Plant Based Polyester Shirts

**Madison, Wisconsin – April 21, 2016 –** Virent announced today that its BioFormPX<sup>®</sup> paraxylene was used to produce the world's first 100% plant-based polyester shirts. This important project demonstrates the potential of Virent's technology to produce demonstration quantities of bio-based, crude oil free polyester for production of garments and textiles.

Polyester is the largest and one of the fastest growing synthetic fibers in the world. A key raw material for the production of polyester is paraxylene, which today comes exclusively from crude oil. Virent's technology produces BioFormPX paraxylene from plant-based materials, resulting in much lower greenhouse gas emissions, yet with the same versatility and performance as its petroleum counterpart. Based on the success of this project, Virent has proven that 100% plant-based polyester fabrics and petroleum-free polyester garments are achievable and a lower carbon footprint alternative to current petroleum-based fabrics.

"Virent's BioFormPX paraxylene has previously been used to produce 100% plant-based PET plastic bottles. This project demonstrates how our technology and products can also be used to produce crude oil free polyester for use in everyday fabric and fiber applications" said Lee Edwards, Virent CEO. "The fabric and shirts produced from plant-based polyester are identical in all aspects to petroleum polyester, with the important exception that they have a much lower carbon footprint." Far Eastern New Century (FENC) worked with Virent to convert the BioFormPX to bio-polyester, and to produce the bio-polyester fabric and shirts.

In the course of its development work over the last few years, Virent has progressed its BioFormPX paraxylene technology to commercial readiness and improved the process economics. Virent has run its demonstration system to fulfill customer orders for both fuels and chemicals since it started operation in 2010. Virent currently has the capability to produce large quantities of BioFormPX paraxylene and other bio-based aromatic chemicals (benzene, toluene, and mixed xylenes) for application development in areas such as packaging, fabrics, and textiles. Virent also has produced sizable biofuels samples (gasoline, jet and diesel) for customer sampling and product development.

## **About Virent**

Virent is replacing crude oil by creating the chemicals and fuels the world demands using a wide range of naturally-occurring, renewable resources. Its patented technology features catalytic chemistry to convert plant-based materials into a full range of products identical to those made from petroleum, including gasoline, diesel, jet fuel, and chemicals for plastics and fibers. The products are drop-in replacements that enable full utilization of existing logistics infrastructure without blending limitations. The development of Virent's BioForming® technology platform is supported through strategic partners including Cargill, Coca-Cola, Honda, Shell and Tesoro. The company has received several grants from the U.S. Departments of Commerce, Energy and Agriculture and has been recognized with many honors, including the World Economic Forum Technology Pioneer award and the EPA's Presidential Green Chemistry Challenge Award.

Please learn more about us, including <u>photos</u> and more information on the <u>100% bio t-shirts</u>, at <u>virent.com</u>.

Follow us on Twitter

# # #

## Contact

Shelly Norris shelly\_norris@virent.com 608-210-3365 3571 Anderson St. Madison, WI 53704