

Plant makes biomaterial for everyday uses

By Larisa Brass

Monday, April 4, 2011

A key ingredient in everyday products from carpet to cosmetics no longer comes from an oil field but a cornfield.

At the Dupont Tate & Lyle Bio Products Co. plant in Loudon, production of the biomaterial known as 1,3 propanediol or Bio-PDO is expanding in response to demand for greener products, says Joseph DeSalvo, marketing director for the joint venture, which opened the plant in 2006.

Using corn sugar as a feedstock, the process emits up to 40 percent less greenhouse gases and uses up to 40 percent less energy over the life cycle of the product, according to the company.

The company has begun an expansion of the \$100 million facility, which employs approximately 50 people. The plant draws its feedstock from an adjacent Tate & Lyle plant, which produces corn syrup and the glucose used for production of PDO. The expansion should be complete by the close of second quarter 2011.

The plant produces two grades of material for uses in the polymer and fluids industries — with applications that include a polymer used in the Mohawk brand of carpet known as SmartStrand and airplane de-icing fluids — as well consumer applications including moisturizers and other skin-care products, home cleaners and cosmetics. For example, some Method-brand cleaning and soap products, sold in Target and Lowe's stores, use Bio-PDO, DeSalvo says.

'It's a real building block kind of material that has a lot of different applications,' he says.

Sales of the product are strong in Europe, with revenues 'pretty equally split' between domestic and overseas, DeSalvo says.

Even though the economy has suffered, demand is climbing for bio-based products, he says.

Dupont and Tate & Lyle 'both invested in our company because going down the road ... they really look at this as a growth opportunity overall,' he says.

Speaking of down the road, Dupont has struck another partnership, this one in the biofuels business, with Danish company Danisco and locally-grown Genera Energy, where work is being done to process plant material from corn and grasses into ethanol.

Larisa Brass is a contributing writer for the Greater Knoxville Business Journal.



© 2011 Scripps Newspaper Group — Online