

Cellulose for Bioplastics

COST SAVINGS AND FUNCTIONAL SOLUTIONS



A bioplastic is a compostable or biodegradable material that can be formed and molded similarly to a petroleum based thermoplastic material. The difference is the bioplastic comes from natural, renewable resources found in nature.

Having been developed almost a century ago bioplastics are not a new concept, but have been recently thrust to the forefront due to an increased consumer demand for sustainable and environmentally friendly alternatives to traditional plastics. JRS Cellulose helps to not only fulfill the desire for sustainable additives by replacing petroleum based products but also helps break into a wider range of applications where bioplastics were not economically feasible.

Benefits of Including JRS USA Cellulose in Bioplastics



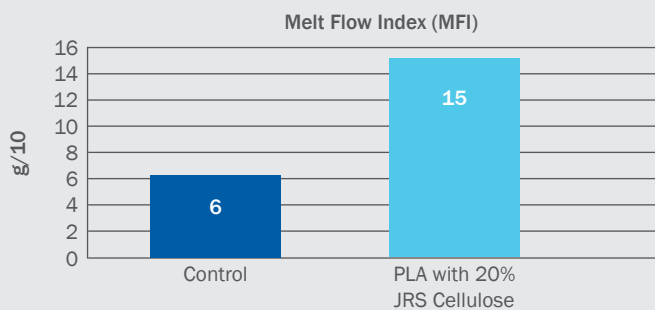
Cost Savings

By including cellulose in the formulation less PLA (Polylactic Acid) is required, offering a cost savings.



Increased Output

Cellulose increases the melt flow index of the plastic, reducing cycle time and allowing for more output.

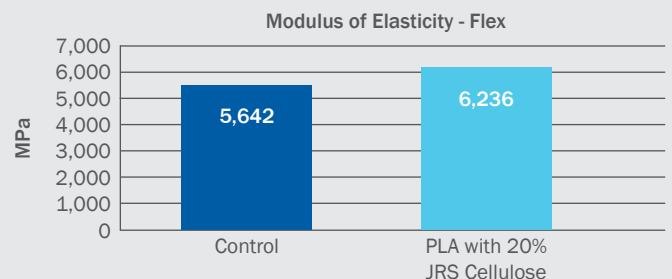


*MFI was run at 190°C with a weight of 2.16kg



Increased Elasticity & Flex Modulus

The molecular structure of cellulose creates a unique mechanical strength and chemical stability. Once oriented in a planar structure, the result is higher strength reinforcement in the plastic compound.



Constant HDT

Cellulose does not affect the crystallinity of the compound, eliminating a decrease in melting point temp.



Environmentally Friendly

Cellulose is biodegradable and compostable.

J. RETTENMAIER USA LP



Fibers designed
by Nature®
A Member of the JRS Group

Your JRS partner for the USA

J. Rettenmaier USA LP
16369 US 131 Highway
Schoolcraft, MI 49087 USA
Tel.: (269) 679-2340
Fax: (269) 679-2364
Web: jrsusa.com

info@jrsusa.com