

## Why rbST?

## Why NOT?



This summer, Dale Bauman, Liberty Hyde Bailey Professor in Animal Science at Cornell University, along with Judith Capper, Euridice Castaneda-Gutierrez and Roger Cady, created a media buzz with the release of their study entitled "The environmental impact of recombinant bovine somatotropin (rbST) use in dairy production". Their study was featured in various media outlets including Feedstuffs, Foodlink, Scientific American and The Ithaca Journal, and was the topic of invited lectures at the Hudson Institutes Food for

the 21st Century Conference and the 2008 World Dairy Expo. The study evaluates the environmental impact of rbST utilization in lactating dairy cows using three different models: the first measures the impact of rbST use for an average U.S. dairy cow, the second evaluates the environmental impact of an industry-scale adoption of rbST, and the third model examines the environmental impact of producing sufficient milk for the growing US population via conventional, conventional with rbST, or organic production systems.

While various studies have been conducted on the impact of rbST in a wide variety of areas, including cow health, human health, and farm profitability, this study addresses the growing public concern relating to agriculture's global footprint. The study lends support for the use of rbST not only as a valuable management tool for use in dairy production, but also as a way to reduce the number of cows needed to produce a set amount of milk. Fewer cows translates to reductions in feedstuff and water use, cropland, nitrogen and phosphorus excretion, greenhouse gas emissions and fossil fuel use. Using efficient and safe technologies such as rbST therefore enables milk producers to achieve their goals of providing high quality milk, while maintaining their significant contribution to environmental stewardship and conservation.

For more information regarding recombinant bovine somatotropin as well as the complete study "The environmental impact of recombinant bovine somatotropin (rbST) use in dairy production", please see the links below. Also featured is a study released this summer by Vicini et al. entitled "Survey of retail milk composition as affected by label claims regarding farm-management practices."

[Environmental Impact Study](#) – Capper et al. (2008)

[Facts about bST](#) – Bauman Group

[bST Fact Sheet](#) - Cornell University Department of Food Science

[Bovine somatotropin and lactation: from basic science to commercial application](#) – Bauman, et al. (1999)

[Production Responses to bST in Northeast Dairy Herds](#) – Bauman et al. (1999)

[Survey of Retail Milk Composition](#) – Vincini, et al. (2008)