



DIVISION OF  
CORPORATION FINANCE

UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION  
WASHINGTON, D.C. 20549

Mail Stop 3561

March 14, 2011

Via U.S. Mail

Ms. Nicole M. Ringenberg, Vice President and Controller  
Monsanto Company  
800 North Lindbergh Boulevard  
St. Louis, Missouri 63167

**Re: Monsanto Company**  
**Form 10-K for the fiscal year ended August 31, 2010**  
**Filed October 27, 2010**  
**Form 10-Q for the quarter ended November 30, 2010**  
**Filed January 7, 2011**  
**File No. 001-16167**

Dear Ms. Ringenberg:

We have completed our review of your Form 10-K and related filings and do not, at this time, have any further comments.

Sincerely,

Linda Cvrkel  
Branch Chief