



DIVISION OF
CORPORATION FINANCE

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

February 13, 2013

Via E-mail

Mr. Richard J. Diemer, Jr.
Senior Vice President and Chief Financial Officer
PolyOne Corporation
33587 Walker Road
Avon Lake, OH 44012

**Re: PolyOne Corporation
Form 10-K
Filed February 17, 2012
File No. 1-16091**

Dear Mr. Diemer:

As communicated on February 11, 2013, we have completed our review of your filing. We remind you that our comments or changes to disclosure in response to our comments do not foreclose the Commission from taking any action with respect to the company or the filing and the company may not assert staff comments as a defense in any proceeding initiated by the Commission or any person under the federal securities laws of the United States. We urge all persons who are responsible for the accuracy and adequacy of the disclosure in the filing to be certain that the filing includes the information the Securities Exchange Act of 1934 and all applicable rules require.

Sincerely,

/s/ Terence O'Brien

Terence O'Brien
Branch Chief