

UNITED STATES SECURITIES AND EXCHANGE COMMISSION WASHINGTON, D.C. 20549-7010

April 29, 2011

Paul E. HuckSenior Vice President and Chief Financial OfficerAir Products and Chemicals, Inc.7201 Hamilton BoulevardAllentown, Pennsylvania 18195-1501

Re: Air Products and Chemicals, Inc. Form 10-K for the Fiscal Year Ended September 30, 2010 Filed November 23, 2010 File No. 1-04534 Response Letters Dated March 28, 2011 and April 20, 2011

Dear Mr. Huck:

We refer you to our comment letters dated March 15, 2011 and April 8, 2011 regarding business contacts with Cuba, Iran, Sudan, and Syria. We have completed our review of this subject matter and have no further comments at this time.

Sincerely,

Cecilia Blye, Chief Office of Global Security Risk

cc: Pamela Long Assistant Director Division of Corporation Finance