CRAVATH, SWAINE & MOORE LLP

ALLEN FINKELSON
RONALD S. ROLFE
MAX R. SHULMAN
STUART W. GOLD
JOHN W. WHITE
JOHN E. BEERBOWER
EVAN R. CHESLER
MICHAEL L. SCHLER
RICHARD LEVIN
B. ROBBINS KIESSLING
ROGER D. TURNER
PHILIP A. GELSTON
RORY O. MILLSON
RICHARD W. CLARY
WILLIAM P. ROGERS, JR.
JAMES D. COOPER
STEPHEN L. GORDON
DANIEL L. MOSLEY
GREGORY M. SHAW
PETER S. WILSON
JAMES C. VARDELL, III
ROBERT H. BARON

KEVIN J. GREHAN STEPHEN S. MADSEN C. ALLEN PARKER MARC S. ROSENBERG SUSAN WEBSTER ROWAN D. WILSON PETER T. BARBUR SANDRA C. GOLDSTEIN THOMAS G. RAFFERTY MICHAEL S. GOLDMAN RICHARD HALL ELIZABETH L. GRAYER JULIE A. NORTH ANDREW W. NEEDHAM STEPHEN L. BURNS KATHERINE B. FORREST DANIEL SLIFKIN JEFFREY A. SMITH ROBERT I. TOWNSEND, III WILLIAM J. WHELAN, III SCOTT A. BARSHAY

Worldwide Plaza 825 Eighth Avenue New York, NY 10019-7475

TELEPHONE: (212) 474-1000 FACSIMILE: (212) 474-3700

CITYPOINT
ONE ROPEMAKER STREET
LONDON ECZY 9HR
TELEPHONE: 44-20-7453-1000
FACSIMILE: 44-20-7860-1150

WRITER'S DIRECT DIAL NUMBER

PHILIP J. BOECKMAN ROGER G. BROOKS WILLIAM V. FOGG FAIZA J. SAEED RICHARD J. STARK THOMAS E. DUNN MARK I. GREENE SARKIS JEBEJIAN JAMES C. WOOLERY DAVID R. MARRIOTT MICHAEL A. PASKIN ANDREW J. PITTS MICHAEL T. REYNOLDS ANTONY L. RYAN GEORGE E. ZOBITZ GEORGE A. STEPHANAKIS DARIN P. MCATEE GARY A. BORNSTEIN TIMOTHY G. CAMERON KARIN A. DEMASI LIZABETHANN R. EISEN DAVID S. FINKELSTEIN DAVID GREENWALD

RACHEL G. SKAISTIS
PAUL H. ZUMBRO
JOEL F. HEROLD
ERIC W. HILFERS
GEORGE F. SCHOEN
ERIK R. TAVZEL
CRAIG F. ARCELLA
TEENA-ANN V. SANKOORIKAL
ANDREW R. THOMPSON
DAMIEN R. ZOUBEK
LAUREN ANGELILLI
TATIANA LAPUSHCHIK
ERIC L. SCHIELE
ALYSSA K. CAPLES
JENNIFER S. CONWAY
MINH VAN NGO

SPECIAL COUNSEL SAMUEL C. BUTLER GEORGE J. GILLESPIE, III

(212) 474-1912

August 31, 2010

Airgas, Inc.

Additional Solicitation Materials

Filed August 27, 2010

File No. 1-09344

Filed by Air Products Distribution, Inc. and Air Products and Chemicals, Inc.

Dear Ms. Campbell Duru:

On behalf of our clients Air Products and Chemicals, Inc. ("<u>Parent</u>") and Air Products Distribution, Inc. ("<u>Purchaser</u>"), a wholly owned subsidiary of Parent (together with Parent, "<u>Air Products</u>"), I am writing to respond to the comments of the staff of the Division of Corporation Finance, Office of Mergers and Acquisitions (the "<u>Staff</u>"), of the Securities and Exchange Commission (the "<u>Commission</u>") delivered to us telephonically on August 30, 2010, regarding the press release issued by Air Products on August 27, 2010.

Air Products supplementally advises the Staff that over the past several weeks, Air Products has had discussions with a number of Airgas's significant stockholders, directly or through its financial advisors or MacKenzie Partners, its information agent and proxy solicitor. In these discussions, a number of these stockholders characterized their recent interactions with Airgas and its representatives as Airgas in effect suggesting promises of a potential sale or auction process for the company in the spring/summer of 2011 in exchange for a vote against Air Products' January Annual Meeting Proposal. We further note that Air Products' statement in its August 27 press release was qualified as being Air Products' belief-- a qualification that Airgas has repeatedly failed to use in connection with many of its questionable statements, including those we highlighted in our letters to you on August 17, 2010 and August 6, 2010.

We also respectfully refer the Staff to Airgas's press release and letter to stockholders dated August 30, 2010, in which Airgas publicly announced its commitment to call a special meeting of stockholders on June 21, 2011, if Air Products' January Annual Meeting Proposal is not approved by stockholders. In these materials, Airgas explains that its proposal would give Airgas more time as Airgas "proactively explores ways to enhance stockholder value". Air Products views these public statements as consistent with, and additional support for, the belief expressed in its August 27, 2010 press release.

If you have any questions regarding the contents of this letter, please contact me at the number listed above.

Respectfully,

/s/ James C. Woolery

James C. Woolery

Mellissa Campbell Duru, Esq.
Special Counsel
Office of Mergers and Acquisitions
U.S. Securities and Exchange Commission
100 F Street, NE
Washington, DC 20549-3628

Copy to:

John D. Stanley, Esq.
Senior Vice President and General Counsel
Air Products and Chemicals, Inc.
7201 Hamilton Boulevard
Allentown, PA 18195-1501

VIA EDGAR, FACSIMILE and FEDERAL EXPRESS