


November 1997

JCT
JOURNAL OF COATINGS TECHNOLOGY



1998
Buyers'
Guide

Photo courtesy of Sun Chemical Co.

Technical Focus Article:

Exposure Studies of Exterior Latex House Paints Containing Kaolin Clay Pigments

Spotlight:

The Success of UV/EB Curing: Environmental Compliance, Performance and Safety





SER-AD™ ADDITIVES FOR WATERBORNES

Recommended for Leading Formulators and Environmentally Concerned Companies

SER-AD™ coatings additives were developed to be nature-friendly, much as the waterborne coatings in which they're used. When you formulate with these SER-AD products, you will improve finish quality and address issues such as odor, VOCs and harmful compounds.

SER-AD FA 379 is the nitrite-free solution to flash rusting. This anti-corrosive additive forms a monomolecular barrier to protect the metal surface from water and improve coating adhesion. Effective during manufacturing, storage and application, SER-AD FA 379 permanently inhibits corrosion, long after the coating has dried.

SER-AD FX 1070, a VOC-free, unique PUR thickener, increases high-shear viscosity to provide improved brushing characteristics and higher film build for a better coating appearance.

SER-AD FX 511, a low-odor coalescing agent that promotes the formation of continuous films in a broad range of water-reducible resins, stays in the coating longer to help prevent cracking.

SER-AD Additives for Waterborne Formulations. Think of them as Mother Nature's assistants for your toughest formulation problems.

HÜLS AMERICA INC.
Coatings Raw Materials
220 Davidson Ave.
Somerset, New Jersey 08873
(800) FOR-HÜLS (367-4857)
Fax (732) 560-6355

In Canada: (905) 451-3810
In Mexico: (52-5) 536-4646

For other countries:
SERVO-DELLEN B.V.
+31 (0) 74 377 5343



HCI-0040-R1

hüls
HÜLS AMERICA INC.

The Americas *at* *your* Fingertips

FSCT'S 1998 SHOWS

ICE '98:

NEW ORLEANS

OCTOBER 14-16, 1998

ERNEST N. MORIAL

CONVENTION CENTER

NEW ORLEANS,

LOUISIANA

MIAMI

APRIL 15-17, 1998

ICE LATINOAMERICA '98

MIAMI BEACH

CONVENTION CENTER

MIAMI, FLORIDA

Reaching:

The Caribbean

Central America

South America

MEXICO

JULY 23 & 24, 1998

PANAMERICAN

COATINGS EXPO

WORLD TRADE CENTER

MEXICO CITY, MEXICO

ICE '98: NEW ORLEANS
OCTOBER 14-16, 1998

MIAMI
APRIL 15-17, 1998
ICE LATINOAMERICA '98

MEXICO
JULY 23 & 24, 1998
PANAMERICAN COATINGS EXPO



For information, call FSCT Headquarters at (610) 940-0777
or visit our web site at <http://www.coatingstech.org>

What Do These Terms Have In Common?

ACETYLATED CONGO S.B.P. SPIRITS SAGGING

They can all be found in the NEW Coatings Encyclopedic Dictionary

Editor: Stanley LeSota

This is the world's most up-to-date, comprehensive, authoritative reference for the language of *YOUR INDUSTRY*.

- ▶ Over 6,000 industry terms defined
- ▶ Cross referenced for synonyms and related categories
- ▶ Current industry vocabulary, including state-of-the-art technologies and regulatory terms
- ▶ Quick, clear references for technical, as well as commonly used industry terms

This is a **MUST HAVE** resource for *anyone* working in the paint, coatings, ink, art, visual and related industries.

Perfect for marketing, sales, R&D, chemists, government and regulatory workers, artists, architects, manufacturers, technicians, teachers, students and more. Developed and approved by the Federation of Societies for Coatings Technology.



Call 610-940-0777

Fax 610-940-0292

Or use the order form below.

**CALL
NOW TO
RESERVE
YOUR
NEW EDITION!
610-940-0777**

YES! Send me the *NEW EDITION* of the *COATINGS ENCYCLOPEDIA DICTIONARY NOW!*
Please refer to #JC1197 when ordering

Number of Copies _____	Federation Members	Soft Cover	Hardback
	Non-Members	\$80*	\$105*

I am paying by: Check or money order Company Purchase Order (please attach)
 MasterCard Visa American Express

Credit Card Number _____ Exp. Date _____

Signature _____

Company name _____ Attn: _____

Address _____ City/State/Zip _____

Mail to: Federation of Societies for Coatings Technology, 492 Norristown Rd., Blue Bell, PA 19422-2350

*Volume pricing is also available on orders of 5 or more. Please call for more information. Shipping and handling charges and appropriate sales tax (PA 6%) are additional.



Technology Forum

- 13** Exposure Studies of Exterior House Paints Containing Kaolin Clay Pigments—T.T. Broome
This paper presents data on performance of pigments in latex exterior house paints derived from kaolin. The paints were prepared containing several such pigments and were exposed to the weather at four locations for two to six years.

Spotlight

- 29** The Success of UV/EB Curing: Environmental Compliance, Performance and Safety—L. Burak
UV/EB technology is widely used in the coatings, graphic arts, electronics, and adhesives industries. It can be applied to almost any substrate. Specific applications include beverage cans, floor tiles, plastic cups, etc.

Federation News

- 8** 1997-98 FSCT Officers: Thomas Hill, of Western New York Society, Elected 76th President of the Federation, at 75th Annual Meeting in Atlanta, GA
- 9** FSCT to Sponsor Two Shows in 1998 for Latin America; Singapore Site of FSCT/OCCA Show & Conference in 1999

Departments

Comment	7	Obituary	193
Industry News	10	New FSCT Members	194
Meetings Update	12	New Products	195
Regulatory Update	189	Calendar of Events	198
Society Reports	191	Advertisers' Index	203
People in the News	193	Humburg from Hillman	204

Buyers' Guide Contents

- 35** Supplier Listings
- 109** Product Listings
- 165** Distributor Listings

See next page for full Buyers' Guide contents.

© 1997 by FEDERATION OF SOCIETIES FOR COATINGS TECHNOLOGY

The JOURNAL OF COATINGS TECHNOLOGY (ISSN 0361-8773) is published monthly by the Federation of Societies for Coatings Technology, 492 Norristown Rd., Blue Bell, PA 19422-2350, Phone (610) 940-0777; Fax: (610) 940-0292.

Periodicals postage paid at Blue Bell, PA and at additional mailing offices. POSTMASTER: Send address changes to JOURNAL OF COATINGS TECHNOLOGY, 492 Norristown Rd., Blue Bell, PA 19422-2350.

Subscription: U.S. and Canada - 1 year, \$60; 2 years, \$110; 3 years, \$170. Europe (Air Mail) - 1 year, \$90; 2 years, \$170; 3 years, \$260. Other Countries - 1 year, \$75; 2 years, \$140; 3 years, \$220.



หนังสือสมัครสมาชิกสมาคมวิชาการ
 2020 2941

Buyers' Guide Contents

35 Supplier Listings*

Listed alphabetically, suppliers are categorized into five groups: Raw Materials, Production Equipment, Laboratory Apparatus & Testing Equipment, Services, and Computer Software. Each listing contains addresses, phone, fax numbers, and contacts, as well as products/services supplied.

109 Product Listings*

This section is categorized in five primary areas: Raw Materials, Production Equipment, Laboratory Apparatus & Testing Equipment, Services, and Computer Software. Companies that provide the products/services listed appear in alphabetical order.

165 Distributor Listings*

Distributors and independent sales agents are listed alphabetically and by geographical territory.

* Advertisers in the 1997 JCT Buyers' Guide are presented in boldface type with the company name capitalized *

Raw Materials

Chemical Specialties

Abrasives/Anti-Skid	109
Acids (Non-Fatty)	109
Adhesion Promoters	109
Amine Neutralizers	109
Anti-Blocking Agents	109
Anti-Floating Agents	109
Anti-Flooding Agents	109
Anti-Foaming Agents	110
Antioxidants	110
Anti-Rust Agents	110
Anti-Sagging Agents	111
Anti-Settling Agents	111
Anti-Skinning Agents	111
Bodying Agents	111
Catalysts	111
Caustics and Caustic Sodas	111
Coalescing Agents	111
Corrosion Inhibitors	111
Dispersing Agents & Surfactants	111
Driers	113
Fillers, Natural, Cellulosic, Polymeric	113
Flame and Smoke Retardants	113
Flattening Agents	113
Flocculants	113
Flow Control Agents	113
Freeze Thaw Stabilizers	114
Glycerine	114
Homogenizers	114
Ink Additives	114
Light Stabilizers	114
Masking Agents	114
Misc. Other Additives	114
Misc. Other Chemical Specialties	116
Misc. Viscosity, Suspension and Flow Control Agents	116
Monomers	116
Photocuring Materials/Photoinitiators	116
Plasticizers	116
Preservatives	116
Printing Ink Dispersants & Vehicles	117
Printing Ink Varnishes & Compounds	117
Reactive Diluents	117
Stabilizers	117
Static Preventive	118
Stearates	118
Surface Conditioners & Lubricants	118
Suspension Agents	118
Texturizers	118
Thickening Agents	118
UV Absorbers	120
Varnishes	120
Water Repellents—Silicone, Corrosion Inhibitors	120

Water Treatment Chemicals	120
Waxes	120

Oil/Fatty Acids

Castor Oil (Dehydrated)	121
Coconut Oil	121
Fatty Acids	121
Hydrocarbon Ink Oils	121
Linseed	121
Marine	121
Oiticia Oil	121
Soybean	121
Sunflower	121
Synthetic & Modified Oils	121
Tung Oil	121

Pigments

Black/Brown/Gray Pigments	121
Blue Pigments	122
Corrosion-Inhibiting Pigments	122
Dyes	124
Extender Pigments	124
Green Pigments	125
Iron Oxide Pigments	125
Metallic Flakes and Powdered Pigments	126
Other Pigments	127
Pigment Dispersions (Aqueous)	127
Pigment Dispersions (Non-Aqueous)	128
Red Pigments	128
White Pigments	130
Yellow and Orange Pigments	131

Resins

Acrylic Resins	132
Alkyd Resins	132
Amino Resins	133
Bitumens	133
Cellulose Derivatives	133
Epoxy Hardeners—Chemicals	134
Epoxy Resins	134
Ester Gums	134
High-Solid Resins	134
Hybrid Resins	134
Hydrocarbon Resins	134
Maleic Resins	135
Melamine & Melamine Type Resins	135
Misc. Type Resins	135
Natural Resins	135
Nitrocellulose	136
Nylon Resins	136
Oleoresinous Varnishes	136

Phenolic Resins	136
Phenoxy Resins	136
Polyamide Resins	136
Polybutenes	136
Polyester Resins	136
Polyethylene Resins	138
Polypropylene Resins	138
Polysaccharide Resins	138
Rosin Esters	138
Rosin Salts	138
Silanes	138
Silicone Polyesters	138
Silicone Resins	138
Styrene Resins	138
Terpenes	138
TGIC Resins	138
Ultraviolet Curing Resins	138
Urethane Crosslinkers	140
Urethane Lacquers	140
Urethane & Polyurethane Resins	140
Vinyl Resins	140
Vinyl Chloride & Vinylidene Chloride Polymer Emulsions	140
Water-Thinned Resins	140

Solvents

Alcohols	142
Aliphatic Hydrocarbons	142
Aromatic Hydrocarbons	142
Chlorinated Solvents	142
Custom Solvent Blending	142
Denatured Ethyl Alcohols	142
Esters	142
Glycol Ethers	142
Glycols	142
Hydrocarbon Solvents	142
Ketones	142
Nitroparaffins	142
Reclaimed Solvents	142
Misc. Solvents	142

Production Equipment

Agitators	144
Blenders	144
Blending Tanks	144
Cleaning	144
Compressors	144
Containers	144
Curing Systems	146
Dispensers	146
Disperser Blades	146
Dispersers	146
Distillation	147
Filling/Packaging/Labeling	147
Material Handling & Conveyors	147
Film Applicators	149
Films	149
Filtering/Straining	149
Grinding/Milling	150
Grinding Media	151
Heat Boilers	151
Infrared Curing Equipment	151
Ink Production Equipment	151
Instrumentation and Control	152
Mixing and Dispersing	153
Pumping/Metering	155
Ram Dischargers	156
Reactor and Recovery Systems	156
Robotics/Automation	156
Safety/Fire Protection	156
Solvent Recovery	156
Spray Booths	156
Tinting	156

Laboratory Apparatus & Testing Equipment

Accelerated Weathering	157
Balances/Scales	157
Coating Application	157
Color/Optical/Appearance Measurements	157
Densitometers	157
Gages	157
Gas Chromatographs	158
Holiday Detectors	158
Humidity/Condensation/Ultraviolet Chambers	158
Lab Mills	158
Light Booths	158
Ovens	158
Particle Characterization	158
pH Meters	158
Physical/Mechanical	158
Reflectometers	159
Rheologicals	159
Spectrophotometers	159
Stirrers	159
Surface Tension Instruments	159
Test Charts/Panels	159
Test/Measurement	159
Viscosity Meters	160
Misc. Testing Equipment	160

Services

Air Pollution/Effluent Control	161
Consulting/Testing	161
Educational	161
Engineering Services	162
Environmental/Regulatory Services	162
Exposure Testing	162
Graphic Arts	162
Packaging Design—Custom	162
Publishing	162
Research & Development	162
Safety/Health Services	162
Surface Preparation/Cleaning Pretreatment	162
Turnkey Processes	162
Waste Disposal	162

Computer Software

Software	163
Formulation	163
Hazardous Material Handling	163
Inventory	163
Laboratory Analysis	163
MSDS	163
Production	163
Regulatory Compliance	163
Misc. Computer Software	163

Although every effort has been made to assure the accuracy of information contained in this Buyers' Guide, the Federation of Societies for Coatings Technology and the JCT are not responsible for errors or omissions. Information has been compiled from responses by individual companies to the mailed questionnaire.

None of the information included in this directory may be used to create, in whole or in part, any mailing list or other data compilation, in written or electronic form to be sold or otherwise distributed. Failure to comply with this restriction constitutes a violation of the copyright laws of the United States.

The JOURNAL OF COATINGS TECHNOLOGY is published monthly by the Federation of Societies for Coatings Technology at 492 Norristown Rd., Blue Bell, PA 19422-2350. Phone: (610) 940-0777. FAX: (610) 940-0292; Web Site: <http://www.coatingstech.org>.

Annual dues for Active and Associate Members of the Federation of Societies for Coatings Technology is \$25.00. Of this amount, \$16.75 is allocated to a membership subscription to this publication. Membership in the Federation is obtained through prior affiliation with, and payment of dues to, one of its 26 Constituent Societies. Non-member subscription rates are:

	U.S. and Canada	Europe (Air Mail)	Other Countries
1 Year	\$60.00	\$90.00	\$75.00
2 Years	\$110.00	\$170.00	\$140.00
3 Years	\$170.00	\$260.00	\$220.00

When available, single copies of back issues of the JOURNAL OF COATINGS TECHNOLOGY are priced as follows: \$10.00 each for current calendar year issues; \$15.00 each for all other issues.

Publisher Robert F. Ziegler
 Editor Patricia D. Ziegler
 Technical Editor Ray A. Dickie
 Managing Editor Kathleen M. Wikiera
 Associate Editor Jonna D. Coachman
 Director of Marketing Lyn Pallock
 Subscription Fulfillment Manager Audrey E. Boozer
 National Advertising Representative Scott Walter
 22785 Cass Ave., Woodland Hills, CA 91364
 (818) 224-3226; Fax: (818) 222-0194

Publications Committee

B. Carr, Chair
 R.E. Bish
 R.A. Dickie
 J. Hinkle
 L. Price
 J. Stauffer
 R. Woodhull
 P.D. Ziegler
 R.F. Ziegler

Editorial Review Board

Ray A. Dickie, Chair
 M. Ahmed
 D.R. Bauer
 H. Bender
 R.F. Brady, Jr.
 J.H. Braun
 C.R. Hegedus
 L.W. Hill
 S.F. Kia
 J.V. Koleske
 J.W. Martin
 J.L. Massingill
 D. Nordstrom
 P.E. Pierce
 G.R. Pilcher
 T. Provder
 R.A. Rynzt
 C.K. Schoff
 R. Stanzola
 J.O. Stoffer

The JOURNAL OF COATINGS TECHNOLOGY has first rights to the publication of papers presented at the International Coatings Technology Conference of the Federation and at local and regional meetings of the Federation's Constituent Societies.

The JOURNAL OF COATINGS TECHNOLOGY is available on microfilm from University Microfilms, a Xerox Co., Ann Arbor, MI 48106.

The Federation of Societies for Coatings Technology assumes no responsibility for the opinions by authors in this publication.

Copyright 1997 by the Federation of Societies for Coatings Technology. All rights reserved. No portion of this publication may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying, recording or by any information storage or retrieval system without permission in writing from the publisher. Authorization to photocopy items for internal or personal use, or the internal or personal use of specific clients is granted by the Federation of Societies for Coatings Technology for users registered with the Copyright Clearance Center (CCC) Transactional Reporting Service, provided that the base fee of \$1.00 per copy, plus .25 per page is paid directly to CCC, 27 Congress St., Salem, MA 01970. For those organizations that have been granted a photocopy license by CCC, a separate system of payment has been arranged. The fee code for users of the Transaction Reporting Service is: 0032-3352/86 \$1.00 + .25.

FSCT Board of Directors—1997-98

PRESIDENT

*THOMAS E. HILL
 Cortex Corp.
 24 Lily Brooke Ct.
 E. Amherst, NY 14051

PRESIDENT-ELECT

*FOREST FLEMING
 Akzo Nobel Coatings, Inc.
 1431 Progress St.
 P.O. Box 2124
 High Point, NC 27261

SECRETARY-TREASURER

*GERRY J. GOUGH
 ICI Packaging Coatings
 Holden Surface Coatings Ltd.
 Bordesley Green Rd.
 Adderley Park, Birmingham,
 B9 4TQ, England

DEBAR W. ALLEN
 Bruning Paint Co.
 Baltimore, MD

GEORGE AMRICH, JR.
 Benjamin Moore & Co.
 Flanders, NJ

EVANS ANGELOS
 Omya, Inc.
 Clarendon Hills, IL

*JAY AUSTIN
 Halox Pigments
 Amherst, IN

A. CLARKE BOYCE
 A.C.B. Consultants
 Oakville, Ont., Canada

DONALD W. BOYD
 PPG Industries, Inc.
 Allison Park, PA

LARRY BRANDENBURGER
 The Valspar Corp.
 Minneapolis, MN

VALERIE BRAUND
 General Paint Ltd.
 Vancouver, B.C., Canada

J. BROWN
 Blagden Chemicals Ltd.
 Cheshire, England

BRENDA L. CARR
 Coatings Development Co.
 Painesville, OH

J. ANDREW DOYLE
 National Paint and
 Coatings Association
 Washington, D.C.

*VAN S. EVENER
 Toledo, OH

PAMELA GEDDES
 IIMAK
 Amherst, NY

JAMES E. GEIGER
 Consultant
 Largo, FL

*TERRY GELHOT
 Carboline Co.
 St. Louis, MO

JAMES D. HALL
 ICI Paint Co.
 Los Angeles, CA

MARCELO HERRERA
 DuPont, S.A. de C.V.
 Mexico, D.F., Mexico

WILLIAM M. HOLLIFIELD
 D & L Paint Co.
 Liberty, IN

DAVID JACK
 Technical Coatings Co., Ltd.
 Burlington, Ont., Canada



CHARLES A. KAPLAN
 Gillespie Coatings, Inc.
 Longview, TX

MAUREEN M. LEIN
 Textron Automotive
 Technology
 Dover, NH

GARY MARSHALL
 Chemcraft Sadolin Inc.
 Walkertown, NC

JAMES A. McCORMICK
 Enhansco
 Ponte Vedra Beach, FL

*J. DICK MULLEN
 G-3 Industries
 Aurora, CO

LAWRENCE J. MURPHY
 Temec Co., Inc.
 N. Kansas City, MO

HORACE PHILIPP
 PWGSC
 Ottawa, Ont., Canada

GEORGE R. PILCHER
 Akzo Nobel Coatings, Inc.
 Columbus, OH

YVON POITRAS
 Richmond, B.C. Canada

GAIL POLLANO
 Zeneca Resins
 Wilmington, MA

PATRICIA SHAW
 Radiant Color
 Richmond, CA

JEFFREY C. STURM
 Kop-Coat Inc.
 Pittsburgh, PA

GUY SULLAWAY
 International Paint Co.
 Houston, TX

ROBERT D. THOMAS
 Consultant
 Media, PA

ANDREW TRAISTER
 Courtaulds Coatings, Inc.
 Louisville, KY

*Executive Committee Members

EXECUTIVE VICE

PRESIDENT
 ROBERT F. ZIEGLER
 FSCT Headquarters
 492 Norristown Rd.
 Blue Bell, PA 19422

A Guide to the Future



What would you do if you could glimpse into the future? What would guarantee your company a position of leadership in the next century?

According to Daniel Burrus, the respected technology forecaster, many of the brightest minds at the largest companies look to the future—and yet still miss the mark.

Burrus, who presented the E.W. Fasig Keynote Address at the FSCT Annual Meeting in Atlanta, GA, on November 3, provided audience members with some notable instances. "Take, for example, Sears. The 'Great American Retailer' back in the late 80s. They looked to the future. What did they miss? A company called Wal-Mart!"

Advances in technology can change reality and thereby change the future. Burrus emphasized the need for companies to develop strategies that can quickly adapt to changing realities.

But, who has a clue as to what these new technologies will be? "Knowledge-sharing" organizations such as the Federation of Societies for Coatings Technology play a critical role. Through the Federation's activities and publications, more than just information is given—the experience, talent and vision of people are communicated. Each issue of the Journal of Coatings Technology contains peer-reviewed technical articles which advance the knowledge of the industry and provide insight into future directions. As companies tighten R&D budgets, the JCT becomes an even more valuable asset.

How else can you determine what will be critical as the industry moves forward? Through shared communication with those who are key suppliers to the industry. Last year, the JCT introduced its first annual Buyers' Guide. This Guide featured the products and services of nearly 800 suppliers. Building on that initial success, the 1998 JCT Buyers' Guide offers information on nearly 1000 of the industry's leading companies—suppliers of raw materials, production equipment, laboratory apparatus and testing equipment, services, and computer software. In addition, an expanded listing of distributors and independent sales agents provides details on geographic territories covered as well as the principals represented. Unlike many similar guides, the JCT updates each listing annually so that the most accurate and up to date information is provided. This year, many companies added e-mail addresses insuring even faster and more direct communication.

So, what strategies do you have in place to guarantee your company's success in the 21st Century? As Daniel Burrus urged the audience in Atlanta, spend time looking at the visible future. "The more you look, the more you'll see." We hope the opportunities provided by the JCT and the Buyers' Guide will help direct your vision more clearly into our shared future.

Patricia D. Ziegler
Director of Publications

1997-98 FSCT OFFICERS

Thomas Hill, of Western New York Society, Elected 76th President of Federation, At 75th Annual Meeting in Atlanta, GA

Thomas E. Hill (Western New York Society), Managing Director, Cortex Inc., became the 76th President of the Federation of Societies for Coatings Technology (FSCT), Blue Bell, PA, on November 5, 1997, at the close of the Federation's Annual Meeting in Atlanta, GA.

Forest Fleming (Piedmont Society), Technical Director of Industrial Wood Building Products Group of Akzo Nobel Coatings Inc., High Point, NC was named President-Elect, and Gerry J. Gough (Birmingham Club), Head of Quality Control/Deputy Quality Representative of ICI Packaging Coatings (Holden Surface Coatings Ltd.), Birmingham, England, was elected to serve as Secretary-Treasurer.

President Hill

Mr. Hill currently serves as a member of the FSCT Executive Committee. He served as the Western New York Society Representative to the Federation Board of Directors from 1983-90. In addition, Mr. Hill has served on the Program, Investment, and Paint Show Exhibits Committees. He also served on the Program and Educational Committees of the Western New York Society.

A member of the coatings industry for 27 years, Mr. Hill was educated at

West Virginia University and the State University of New York at Buffalo.

President-Elect Fleming

Mr. Fleming, formerly Secretary-Treasurer, currently serves on the Federation Executive Committee and is a member of the Finance Committee. He is also Secretary-Treasurer of the Coatings Industry Education Foundation (CIEF).

He was President of the Piedmont Society (1989-90) and served on the Society's Executive, Program, Publications and Technical Committees. In 1988, while serving as Membership Committee Chair, Mr. Fleming was presented with a Certificate of Appreciation for the exemplary increase of Society's membership during the 1987-88 year.

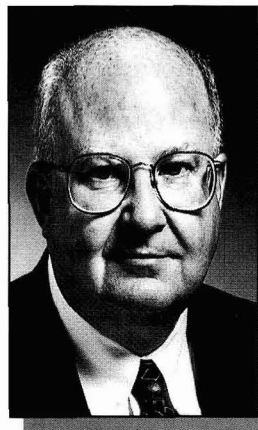
He was graduated from Western Carolina University with a Bachelor of Science Degree in Biology with a minor in Chemistry and has been affiliated with the coatings industry for 20 years.

Secretary-Treasurer Gough

Mr. Gough served as Chair of the Federation's Society Speaker Awards (1987-88), was a member of the Liaison Committee, and serves as a member of the FSCT's Representative to IUPAC. Mr.

Gough has been the Birmingham Club's Representative to the FSCT Board of Directors since 1990 and has served on the FSCT Executive Committee since 1994.

President of the Club in 1987-



T.E. Hill

88, he was Publicity Officer in 1983-94, and served on the Club's Executive, Technical, and Membership Committees. Mr. Gough received the Birmingham Paint, Varnish & Lacquer Club Distinguished Service Certificate in 1994.

Graduated from Coventry Technical College in 1975, Mr. Gough has been active in the coatings industry for 28 years.

EXECUTIVE COMMITTEE

Van S. Evener (Detroit Society), Vendor Coordinator, BASF Corp., Whitehouse, OH, has been elected to serve a three-year term on the Federation Executive Committee.

He is currently on the FSCT Board of Directors as the Detroit Society Representative, and has served as President of the Detroit Society.

Mr. Evener received the B.S. Degree in Business Administration from Heidelberg College and has been active in the coatings industry for 25 years.

BOARD OF DIRECTORS

Elected to serve two-year terms as Members-at-Large on the Board of Directors for 1997-98 are **Valerie M. Braund** (Pacific Northwest Society), Laboratory Manager, General Paint, Vancouver, B.C., and **Gail Pollano** (New England Society), Sales Manager, Zeneca Resins, Wilmington, MA. **James McCormick** (Southern Society), Managing Director, Enhansco, Ponte Vedra



F. Fleming



G. Gough



V.S. Evener

Beach, FL, has been elected to serve a two-year term on the Federation Board of Directors.

Ms. Braund has served as a member of the FSCT Technical Advisory Committee and was a member of the FSCT/NPCA Manufacturing Management Committee.

At the Society level, she served as a member of the PNWSCT Technical Committee and was Chair for the Pacific Northwest Safety & Manufacturing Seminar. In 1988, Ms. Braund was the recipient of the MMA Award for the Society's Safety Video, and in 1989 was awarded the James Leider Outstanding Service Award for a variety of projects undertaken. She was presented with the "Women in Coatings Award—Communications," for the publication of a series of educational leaflets entitled "Pacific Northwest Paintmaker."

Ms. Braund received a National Certificate in Chemistry in 1961 from Llandaff College, and in 1977 received A.T.S.C. through the Oil & Colour Chemists' Association. She has been active in the coatings industry for 38 years.

Ms. Pollano chaired the FSCT Technical Advisory Committee and has served as a member of the following Committees: Corrosion, Professional Development, Annual Meeting Program, and Planning.

She was twice the President of the New England Society and served on the Technical Committee.

Ms. Pollano attended Boston University and received a B.A. Degree in 1976; in 1992 she received an MBA from New Hampshire College. She has been a member of the coatings industry for over 20 years.

Mr. McCormick, Past-President of the Federation (1978-79), was the 1997 recipient of the Federation's most prestigious award, the George Baugh Heckel Award. Mr. McCormick has chaired various committees of the Federation, including: Finance, Nominating, Bylaws, Planning, Joint Education, Public Relations, and Membership Services. He served as a member of the FSCT Headquarters Building Committee.

Before becoming a member of the Southern Society, Mr. McCormick was active in the Baltimore Society, serving as its President.

A member of the coatings industry for 46 years, Mr. McCormick attended McCov College and Johns Hopkins University.

FSCT to Sponsor Two Shows in 1998 for Latin America; Singapore Site of FSCT/OCCA Show & Conference in 1999

The Federation of Societies for Coatings Technology has announced that it will sponsor trade shows and technical conferences for the Latin American coatings industry in Miami Beach and Mexico City in 1998 and, in a cooperative venture with the Oil & Colour Chemists' Association, will co-sponsor a trade show and conference in Singapore in 1999.

ICE Latinoamerica '98

As sponsor of the well-known International Coatings Expo and Technology Conference (ICE), the FSCT and *Inpra Latina*, a publishing leader in the Latin American coatings industry, will co-sponsor ICE Latinoamerica '98, at the Miami Beach Convention Center on April 15-17. In conjunction with the expo a two-day series of conferences on April 15-16 under the theme, "Coatings Across the Americas," will explore the current environmental regulatory issues facing the paint and coatings industry. Clean Air Act legislation, how it effects coatings formulation and manufacturing processes are topics currently under development. Both the expo and conference are directed toward the South and Central American coatings industry. ICE Latinoamerica '98 will feature the exhibits of suppliers of raw materials, manufacturing equipment and services for Latin American manufacturers of paints, coatings, inks, adhesives, and sealants.

Technical Directors, and Research and Development, Manufacturing, and Management personnel are invited to attend this important industry event. Registration fee for the environmental conference is \$495 (U.S.) which includes entrance to ICE Latinoamerica '98.

Co-located with ICE Latinoamerica '98 in Miami Beach will be *Plásticos de las Americas*, an exposition for the Latin American plastics manufacturing industry. Together, they offer a unique opportunity to learn of the latest developments in materials handling and processing, as well as the state of the current environmental regulations and their potential affect on the Latin American market.

1998 Panamerican Coatings Expo

The FSCT will hold its second Panamerican Coatings Expo for the Mexican coatings industry at Mexico City's premier convention facility, the World Trade Center, on July 23-24. Last held in 1996, the FSCT will co-sponsor the event with the Mexico Paint and Printing Ink Manufacturers Association, ANAFAPYT. A one-day technical seminar will be conducted during the event.

FSCT's ICE Latinoamerica '98 and the 1998 Panamerican Coatings Expo represent the FSCT's commitment to providing quality trade show opportunities to coatings industry suppliers and the growing Latin American coatings manufacturing industry.

Information on conference and attendance registration or exhibit participation for ICE Latinoamerica '98 or the 1998 Panamerican Coatings Expo may be obtained by contacting the FSCT at 492 Norristown Rd., Blue Bell, PA 19422 (USA); Tel. 610-940-0777; Fax 610-940-0292; or through the FSCT website, <http://www.coatingstech.org>.

Pacific Paint Show and Technology Conference

The FSCT and the Oil and Colour Chemists' Association (OCCA) have announced that the organizations will co-sponsor the Pacific Paint Show and Technology Conference, scheduled to be held in Singapore in September 1999. The exhibition and technical educational program for the Asian coatings industry is the first cooperative venture between the two largest coatings industry technical organizations in the world.

The announcement was made at a press conference held at the recent International Coatings Expo in Atlanta. FSCT President Jay Austin, OCCA President Roland Staples and Fred Morpeth, Managing Director of SURFEX Ltd., said that the cooperation between the two coatings technical groups in the production and promotion of the Singapore event constitute a major commitment to provide a quality exposition and educational programming for the Asian coatings community.

Mr. Austin noted that the cooperative event is a response to a mutual concern by the groups about the increased expansion of exhibition sponsorship by for-profit companies which "take the income derived from shows and provide no return to the industry. The FSCT and OCCA," he said, "use the income to subsidize the significant educational and professional development opportunities to our members." Mr. Staples agreed, saying that the Singapore Section of OCCA is anxious to provide on-site assistance.

Mr. Morpeth said that SURFEX Ltd., a wholly-owned subsidiary of OCCA, would be responsible for managing the Pacific Paint Show, while the FSCT would develop the technology conference. "Together, the two organizations will create an exciting, successful event, he said.

Bounty Hunter Groups Begin Filing Actions On Prop. 65 Suits on Environmental Exposures

A report by the Environmental Legislative and Regulatory Advocacy Program (ELRAP) states that new, small "bounty hunter" groups are apparently turning attention away from violations of Proposition 65 requirements for consumer product exposure warnings, an area that has proven so lucrative to groups like As You Sow, and filing actions on alleged violations of warning requirements for "environmental exposures." One such group, the Corporation For Clean Air, recently filed suit against 50 trucking companies in the Bay Area, contending that the companies are violating Prop. 65 by failing to issue public warnings of possible exposure to diesel exhaust, a Prop. 65 listed

carcinogen. According to the group's attorney, "We're not targeting any companies with less than \$500 million annual gross revenue." Under Prop. 65, the group is able to keep 25% of any state fines levied against the firms.

Another Prop. 65 case pursued by a new "bounty hunter" organization targeted a group of hospitals in the Sacramento area, which had jointly published a warning for emissions of ethylene oxide, and were attacked because of the presumed inadequacy of their notice. It included a number of disclaimers, stating the chemical was essential for use in sterilizers and they intended to continue its use to protect the health of patients. The suit contended these disclaimers had

the effect of negating the Prop. 65 warning and justifying continued emissions. In a settlement, the hospitals were forced to make a cash payment to the group, discontinue use of the chemical and change the warning.

Another example is a legal action which was recently brought against Akzo Nobel over alleged emissions of hexavalent chromium. The environmental group bringing the action apparently obtained their information from the company's "Toxic Hot Spots" filing with the SCAQMD, which is a matter of public record.

OSHA Extends Methylene Chloride Compliance

According to the Halogenated Solvents Industry Alliance (HSIA), Inc., Washington, D.C., the Occupational Safety and Health Administration (OSHA) has agreed to extend the deadline for compliance with the new workplace limits for methylene chloride (MC) by an addi-

tional 45 days. As a result, companies will not have to be in compliance with the new limits or to implement medical surveillance programs until about December 21, 1997, at the earliest.

The 45-day extension, announced in a letter to legal counsel for HSIA, follows a similar 30-day delay (from October to November) approved by OSHA earlier this month.

In January 1997, HSIA and several affected businesses filed a legal challenge of the MC standard, which was subsequently consolidated with the challenge of the United Auto Workers (UAW). After several months of discussion, HSIA and UAW have worked out a compromise proposal to extend compliance deadlines for several industry sectors and to add medical removal provisions to the existing medical surveillance requirements.

"The HSIA/UAW proposal would give companies in the furniture refinishing polyurethane foam, small aircraft stripping, and other sectors between 1 1/2 and 2 1/2 more years to comply with the 25-ppm limit," noted Steve Risotto, HSIA's Communications Director. HSIA and UAW expect shortly to file a joint motion asking OSHA to adopt the compromise proposal. OSHA has indicated that it will give careful consideration to the motion. HSIA and UAW would withdraw their lawsuits after OSHA takes final action to implement the extensions and other changes.

Pigment Dispersions and Ink Businesses Acquired by Hüls

Hüls America Inc., Somerset, NJ, has acquired the Australian and New Zealand-based pigment dispersions and ink businesses of Yorkshire Group Plc, Leeds, United Kingdom. Effective immediately, the companies will operate as Colortrend Pty. Ltd. and Colortrend Ink New Zealand Ltd.

Under terms of the agreement, Hüls has acquired Yorkshire's Australian production facilities in Dandenong, Victoria, and in Ingleburn, New South Wales, as well as their ink blending facilities in Australia and New Zealand.

Yorkshire manufactures pigment dispersion for paints, coatings, plastics, and a variety of other applications as well as a range of inks for printing on all types of packaging materials including corrugated and other cardboard boxes, labels, signs, food wrapping, and carry bags.

Ciba Specialty Chemicals Buys Two of Dow's Epoxy Lines

The Performance Polymers Division of Ciba Specialty Chemicals Corp., Brewster, NY, has purchased Dow Chemical Co.'s, Quatrex® resin and Tactix® resin product lines and technology. Included in the range of products acquired are multifunctional epoxy systems and cyanate esters. In the area of intellectual property, numerous patents have been assigned or licensed.

The products will continue to be manufactured at Dow's Freeport, TX, Contract Manufacturing Services facility.

ISO 9002 Certification Granted to PATCO

PATCO Defoamer Additives Division of American Ingredients Co., Kansas City, MO, has received the ISO 9002 Certificate of Compliance for its Manufacturing and Warehousing Facility in Grandview, MO. The ISO 9002 Certificate was awarded by ABS Quality Evaluations of Houston, TX, and has been accredited by the Dutch Council for Certification.

The ISO Certification covers all aspects of manufacturing, receiving, warehousing, and the shipment of goods from its warehouse and manufacturing site. American Ingredients Co. manufactures additives for processed foods and the baking industry. The PATCO Defoamer Additives Division manufactures a range of anti-foam and defoamer products for food, coatings, ink, and industrial applications.

Meeting a world of needs today and tomorrow...



At Bayer, we believe your coatings are only as good as the materials you put into them.

That's why we work hard to provide you with quality polyurethane raw materials and high performance pigments for your specific applications. Coatings manufacturers all over the globe depend on the expertise of Bayer's international technical staff and its reputation for service as a supplier of materials for formulating coatings for the automotive, architectural, maintenance, industrial and wood coatings markets.

So whether you are searching for the right resin to reduce the VOC of your formulation without reducing its performance, or you are looking for the best iron oxide or high-performance organic pigment to color it, call Bayer Corporation — your technical partner for coatings.

For information about our wide range of products for the coatings industry, call **1-800-662-2927**.



Bayer Corporation • 100 Bayer Road • Pittsburgh, PA 15205 • (412)777-2000

"60 Years of Polyurethanes" to be Explored at Detroit Mercy's International Symposium

The International Symposium and Exhibition "60 Years of Polyurethanes" is slated for January 15-16, 1998. The symposium, which highlights advancements in the field of polyurethanes, is sponsored by The Polymer Institute of the University of Detroit Mercy, Detroit, MI, and co-sponsored by The Society of the Plastics Industry (SPI)-Polyurethane Division, and the Society of Plastics Engineers (SPE)-Detroit Section. The symposium will be held at the Ward Conference Center on the Detroit Mercy campus in Detroit, MI.

The symposium has been designed for research directors, scientists and engineers, managers and technical representatives, as well as members of government agencies and professional societies.

The presentations will focus on new trends in the major areas of polyurethanes, including the following:

"Historical Development of Polyurethanes"—Kurt C. Frisch, Polymer Institute, University of Detroit Mercy;

"60 Years of Polyurethanes—Still Going Strong"—Reinhard Clausius, Bayer AG;

"Ultra-Low Monol Polyols—Polyurethanes Applications"—Paul T. Bowman, Nigel Barksby, Steven D. Seneker, and Calvin C. Shen, ARCO Chemical Co.;

"New Advances in CASE Technology Utilizing Reduced Unsaturation Polyether Polyols"—Roeland Tuinman, BASF Corp.;

"New Advances in Polyurethane Additives"—G.J. Wasilczyk, Air Products and Chemicals, Inc.;

"Silicone Surfactants, Unique Additives to Optimize Polyurethane Foam Manufacturing"—Georg Burkhardt and Andreas Weier, Th. Goldschmidt AG;

"Next Generation Blowing Agents for Thermal Insulation Foams"—Ian R. Shankland and David J. Williams, AlliedSignal, Inc.;

"Revolutionary New Stabilization Technology for Polyurethanes"—Steven M. Andrews, Ciba Specialty Chemicals Corp.;

"Recent Progress in Polyurethane Elastomers"—Klaus H. Sommer, Peter H. Markusch, H. Georg Schmelzer, J.W. Rosthauser, K.W. Haider, C. Steinlein, and C.D. Eisenbach, Bayer Corp.

"Polyurethane Networks with Chemical Clusters"—K. Dusek, J.-P. Pascault, M. Spírková and J. Somvářsky, Institute of Macromolecular Chemistry;

"New Developments in Polyurethane Elastomers Made with Aliphatic Long Chain Diols"—M.A. Masse, D.L. Handlin Jr., and S.S. Chin, Shell Chemical Co. and A. Sendjarevic, V. Sendjarevic, and K.C. Frisch, Polymer Institute, University of Detroit Mercy;

"Effect of Crosslink Variation on Physical Properties of Polyurethanes"—Wally Chang, Witco Corp.;

"Urethane-Containing Interpenetrating Polymer Networks with Non-Linear Optical Properties"—Harry L. Frisch, State University of New York at Albany;

"New Polyurethanes' Special Applications in Japan"—Fukuhiro Hayashi, Mitsuru Omoto, and Max Ozeki, INOAC Corp.;

"Two-Component Waterborne Coatings: Now and Into the Next Century"—M. Shaffer, P.B. Jacobs, K. Best, T. Wayt, M. Dvorchak, and P. Yu, Bayer Corp.;

"Polyurea Spray Technology in Commercial Applications"—Dudley J. Primeaux, Huntsman Corp.;

"Material and Processing Requirements for Rigid Polyurethane Foams Blown with Hydrocarbons and Hydrofluorocarbons"—Sachchida N. Singh, ICI Polyurethanes;

"Advances in Flame Retarding Flexible Polyurethane Foam"—Richard S. Rose, L.J. Likens, and P. Jacobs, Great Lakes Chemical Corp.;

"A New Approach to the Design of Foam Cored Carpet Composites Using a Simple Vehicle Interior Noise Model"—A. Cunningham and N.C. Hilyard, ICI Polyurethanes;

"Novel Delayed Action Catalyst/Co-Catalyst System for CASE Applications"—K.C. Frisch Jr. and P.T. Engen, 3M Corp.;

"Polyurethanes in Biomedical Applications: Promises of the Past, Present Realities, and Vibrant Future"—Richard J. Zdrahala, Advanced Bio-Surfaces, Inc.;

"Processing Overview of Bonded Polyurethane Foams"—Brian Fogg and Trent Shidaker, ICI Polyurethanes;

"Polyurethane Foams Blown with Liquid Carbon Dioxide; Seven Years of Research—Three Years of Industrial Experience"—Max Taverna, Cannon Group;

"Long Fiber Injection (LFI), a Process for the Production of Glass Fiber Reinforced High Strength Composites in PUR"—Adolf Bauer, Krauss Maffei Kunststofftechnik GmbH; and

"Polyurethane Glycolysis: Expanding Applications"—Kimberly You, BASF Corp.

In addition to the technical presentations, an exhibition by polyurethane manufacturers will be held concurrently with the symposium.

The registration fee is \$600 and includes the conference, proceedings, refreshment breaks, two luncheons, a banquet, and wine and cheese farewell.

For additional information, contact Eleanore Eldred or Jiri E. Kresta, Polymer Institute, University of Detroit Mercy, P.O. Box 19900, Detroit, MI 48219-0900; (313) 993-1270.

Pacific Northwest Society Issues Call For Papers

The Pacific Northwest Society for Coatings Technology will conduct its 51st Annual Technical Symposium on May 1-2, 1998, at the Doubletree Inn at the Quay, Vancouver, WA.

The theme for the 1998 Symposium is "Maximizing Performance Properties and Minimizing Production Problems of Waterborne Coatings." In conjunction with this theme, the Symposium's Technical Committee is seeking technical papers to be presented on this subject.

Prospective authors are invited to submit a brief outline of their proposed presentation to Darin Shields, Hahn Northwest, Inc., P.O. Box 56, Ridgefield, WA 98642; (360) 887-1015. The deadline for submission is January 5, 1998.

For more information on the 1998 Symposium, contact Debra Severson, Miller Paint Co., 12730 N.E. Whitaker Way, Portland, OR 97230; (503) 255-0190.

Exposure Studies of Exterior House Paints Containing Kaolin Clay Pigments

Thad T. Broome—J.M. Huber Corp.*

INTRODUCTION

In the 12 months ending September 1996, 2,775 million liters (733 million gallons) of architectural coatings were manufactured in the U.S.,¹ of which exterior latex house paints represented a substantial part. While other extender pigments, such as silica and calcium carbonate, are probably most widely used in these products, there are, to the author's knowledge, a substantial number of commercial exterior latex house paints manufactured in the U.S. that utilize pigments derived from kaolin clay.

A literature search found support for such usage in several extensive studies reported about 30 years ago. These include works by Liberti,² Vannoy,^{3,4} the Los Angeles Society for Coatings Technology,⁵ and Brooks, et al.⁶ Brooks specifically concentrated on varieties of clay pigments in vinyl acetate copolymer latex, acrylic latex, and linseed oil formulations exposed on 500 white pine panels with calcium carbonate and talc pigments, as well as several commercial paints as controls. In single-extender formulations, clay pigments chalked more rapidly than control extenders, but outperformed controls in mildew resistance and general appearance; a delaminated kaolin having large diameter platelets showed best overall performance among all extenders. In mixed extender formulations, a combination of two-thirds delaminated kaolin and one-third coarse calcium carbonate had the best tint retention in the study while also showing good mildew resistance, no iron staining, and enhanced opacity.

There were at least two reasons for this concentration on exposure work in the area of extender pigment selection in the 1960s. One was hope among paint technologists that basic theory might be developed on which extender selection could be based; a symposium in the late 1950s keynoted by Elm,⁷ as well as the Los Angeles Society study,⁵ attest to this. The other reason was the development of the first U.S. commercial exterior latex house paints for wood surfaces. Nationwide marketing of these products first occurred in 1958.⁸ These products created a pressing need for more data on extender pigment performance, as evidence accumulated that talc, very widely used in oil paints at the time, had more limited usefulness in latex paints.^{2,4,6}

In the ensuing 30 to 35 years, although many advances have been made in latex resins, other formula ingredients, and in the understanding of formulation principals, reports of exposure studies that included clay-extended latex paints have been lacking. This period has also seen new develop-

ments in clay pigments, particularly the introduction of additional varieties of calcined clays and of structured pigment, a pigment type produced through an inorganic hydrothermal reaction.

Exposure studies were therefore undertaken to develop exterior performance data on present day clay pigments in coatings which used currently available ingredients and present day formulation approaches. Since the usefulness and general performance characteristics of several clay pigments in exterior paints have been established by earlier investigations, the emphasis of this study was on comparison of clay pigments, including both established and more recently developed types.

EXPERIMENTAL

Selection of Formula Ingredients

While the present study was intended to update the work of Brooks et al.,⁶ it did not attempt to duplicate formulas used by those investigators, since some principal ingredients are no longer available. However, formula ingredients and parameters were in fact quite similar in many respects to those used in the earlier study.

Resins used included one acrylic and three vinyl acrylic latex emulsions. Table 1 shows typical characteristics of these four materials. The acrylic resin and vinyl acrylic resin No. 1 are established types that have been widely used for over 20 years. The other two vinyl acrylic resins were relatively new when this work was begun; they are designed for increased pigment binding and abrasion resistance, and, among other differences, are slightly harder and somewhat smaller in particle size than resin No. 1. Selection of resins and other materials was based on recommendations of suppliers and on the author's experience, including the knowledge that while first quality exterior latex house paints usually utilize acrylic resins, large volumes of vinyl acrylic resins are presently being consumed in lower cost commercial products.

An enamel-grade titanium dioxide pigment (TiO₂) having good, but not maximum, chalk resistance was chosen to provide a degree of chalk resistance believed commonly present in U.S. commercial exterior latex house paints. Additives were chosen as representative of common U.S. industry usage.

The following extender pigments were evaluated in various combinations as described in a later section. Characteristics typical of these pigments are shown in Table 2.

*One Huber Rd., Macon, GA 31298.

Table 1—Typical Properties of Resins Used

Resin Properties	Vinyl Acrylic Emulsions			Acrylic Emulsion
	#1	#2	#3	
Solids, % by weight	55.0	55.0	55.0	55.0
pH	5.0	5.0	4.0	8.25
Density, g/ml (lb./gal.)	1.08 (9.0)	1.08 (9.0)	1.08 (9.0)	1.07 (8.9)
Particle size, microns	0.4	0.3	N/A	0.25
Viscosity, cps	2250	600	300	300
Glass transition temp., °C	+1	+12	+5	+2
Minimum filming temp., °C	+5	+8	N/A	N/A
Surfactant type	Non-ionic	Non-ionic	Non-ionic/Anionic	Anionic
Polymer specific gravity	N/A	1.15	N/A	N/A

N/A = not available

Table 2—Typical Properties of Extender Pigments Used

Pigment Property	Calcium Carbonate	Coarse Hydrus Kaolin	Delaminated Kaolin	Conventional Calcined Clay
Type	Classified	Hydrus	Hydrus	Anhydrous
Manufacturing process	Dry Ground	Water Washed	Delaminated washed	Calcined
Form	Fine powder	Fine powder	Fine powder	Fine powder
Specific gravity	2.71	2.60	2.60	2.63
Hegman grind	4.0	4+	4+	5+
Surface area B.E.T., m ² /g	N/A	6-11	11-15	7-9
Bulking value, g/ml (lb./gal.) ...	2.71 (22.6)	2.60 (21.7)	2.60 (21.7)	2.62 (21.9)
Bulking value, ml/g (gal./lb.) ...	0.370 (0.0443)	0.385 (0.0461)	0.385 (0.0461)	0.381 (0.0457)
Moisture, % max. as produced	N/A	1.0	1.0	0.5
325 Mesh residue, % max	0.01	0.05	0.005	0.01
Average stokes equivalent particle diameter, microns ...	6.0	4.0	1.0	1.4
Oil absorption, g/100 g pigment, ASTM D 281	16	25-30	40-45	54
Brightness, % reflectance	87.0	81.0-83.5	87.5-89.0	90.0-93.0
pH, 100 g pigment/ 250 ml water	9.3	6.0-7.5	6.0-7.5	5.0-6.0

Pigment Property	Premium Calcined Clay	Structured Pigment	Structured Flattening Pigment
Type	Anhydrous	Structured pigment	Structured pigment
Manufacturing process	Calcined	Water washed	Water washed
Form	Fine Powder	Fine powder	Fine powder
Specific gravity	2.63	2.40	2.4
Hegman grind	5+	4.5+	4.0
Surface area B.E.T., m ² /g	13-17	N/A	6.0
Bulking value, g/m (lb./gal.)	2.62 (21.9)	2.40 (20.0)	2.40 (20.0)
Bulking value, ml/g (gal./lb.)	0.381 (0.0457)	0.417 (0.0500)	0.417 (0.0500)
Moisture, % max. as produced	0.5	3.0	4-5
325 Mesh residue, % max	0.01	0.10	0.5
Average stokes equivalent particle diameter, microns	0.7	1.7	6.0
Oil absorption, g/100 g pigment, ASTM D 281	75-85	95	100
Brightness, % reflectance	92.0-94.0	93.0	90.0
pH, 100 g pigment/250 ml water ..	5.0-6.0	11.0	11.0

N/A = Not available

Table 3—Zinc-Free Vinyl Acrylic Latex Exterior House Paint Formulations

Formula Ingredients	Extender Pigment Systems										
			#1	#2	#3	#4	#5				
Units	Pounds	Gallons									
Water	275.2	33.0	<p>NOTE: Quantities are units per 100 gallons of paint. To convert to kilograms and liters per 1,000 liters of paint, multiply pounds by 1.198 and gallons by 10.00.</p> <p>This portion master-batched — same in all paints.</p>								
Cellulosic thickener	4.0										
Aminomethylpropanol, 95%	2.0										
Defoamer	1.8										
Ethylene glycol	27.8	3.0									
Polyacrylate dispersant, 30%	5.2										
Potassium tripolyphosphate	1.0										
Fungicide	5.0										
Nonionic surfactant	2.2										
Coalescing agent	11.8	1.5									
Total pigment volume		13.2	Same in all paints								
Titanium dioxide, enamel grade ...	225.0		225.0	225.0	203.9	225.0					
Conventional calcined clay	100.0		—	—	100.0	—	—				
Premium calcined clay	—		67.7	67.7	—	—	—				
Structured pigment	—		—	—	33.7	—	—				
Delaminated kaolin	—		—	—	—	—	100.0				
Calcium carbonate	45.6		78.9	—	21.5	—	—				
Coarse hydrous kaolin	—		—	75.6	—	—	—				
Structured flatting pigment	—		—	—	—	—	33.4				
Water	66.4	8.0	<p>This portion master-batched — same in all paints.</p>								
Cellulosic thickener	1.0										
Aminomethylpropanol, 95%	1.0										
Defoamer	1.8										
Vinyl acrylic emulsion, 55%	354.2	39.4									
PVC,%	40.0										
Solids by volume, %	33.0										
								40.0	40.0	40.0	40.0
								33.0	33.0	33.0	33.0

Calcium carbonate was a natural dry-ground coarse pigment, a type widely used in exterior latex house paints in the U.S. and similar to that used by Brooks.

Hydrous kaolin was a coarse water-washed clay, very similar to that used by Brooks.

Delaminated kaolin consisted of large-diameter hexagonal platelets from water-washed clay, very similar to that used by Brooks.

Conventional calcined clay, as described in Table 2, was a type of anhydrous clay offered by all U.S. clay suppliers; hence, the name used here. Brooks used a very similar pigment.

Premium calcined clay was a finer particle size, high oil absorption, high brightness anhydrous clay, presently widely used in paper coatings with limited use in paints. Not used by Brooks.

Structured pigment requires explanation. Calcined clays, produced by subjecting hydrous kaolins to high temperatures in order to drive off water of hydration and fuse kaolin booklets (stacks of platelets) into a structure that provides increased light scattering, can be termed structured pigments, as can some other extender pigments. However, the material referred to here belongs to a recently introduced class of clay pigments produced by slurring selected hydrous kaolin in a caustic soda solution at elevated temperatures and pressures. Particles are fused into house-of-cards structures without loss of water or hydration. Resulting pigments have many internal air interfaces for light refraction, with bluer undertone, lower density, higher oil absorption, and higher pH than are found in calcined clays (see Table 2). These pigments were not available to Brooks.

Structured flatting pigment was a version of the class of pigments just described, which has a large particle size, making it effective as a flattening agent.

Basic Formulations

Two basic formulations were used. They were chosen based on the author's experience and advice of resin suppliers to represent current industry practice. Initial work and screening exposure tests utilized a zinc-oxide-free basic formula made with vinyl acrylic latex resins and intended to represent lower cost paints (see Table 3). The balance of exposures involved a higher solids, and thus higher cost, basic formula containing zinc oxide, with revision of the dispersant system necessary to provide stability with this reactive pigment. This latter formula was used with both vinyl acrylic and acrylic resins (see Tables 4 and 5).

These formulations were not intended to represent optimum conditions for any single ingredient, but rather to provide direct comparisons of the extender pigment combinations being evaluated. Dispersion and letdown portions of each formula were accordingly master batched, to the extent possible, to minimize compounding variables. Thus formula adjustment of, for example, coalescent, might have provided improved performance with a given resin. The results obtained may therefore be of limited value for drawing conclusions concerning ingredients other than the extender pigments.

Control Points

The first pigmentation shown in Table 3, having an extender pigment mixture of approximately two-thirds

Table 4—Zinc-Bearing Vinyl Acrylic Latex Exterior House Paint Formulations

Formula Ingredients	Extender Pigment Systems							
	#6		#7	#8	#9			
	Pounds	Gallons						
Units								
Water	240.0	28.8	<p>NOTE: Quantities are units per 100 gallons of paint. To convert to kilograms and liters per 1,000 liters of paint, multiply pounds by 1.198 and gallons by 10.00.</p> <p>This portion master-batched — same in all paints.</p>					
Cellulosic thickener	4.0							
Ethylene glycol	27.9	3.0						
Fungicide	6.0							
Defoamer	2.0							
Polyacrylate dispersant, 30%	8.0							
Aminomethylpropanol, 95%	1.0							
Nonionic surfactant	2.0							
Potassium tripolyphosphate	1.5							
Total pigment volume		16.4						
Titanium dioxide, enamel grade	250.0							
Zinc oxide	25.0							
Coarse hydrous kaolin	87.7							
Delaminated kaolin	96.2							
Premium calcined clay	—		64.8	—	—			
Coarse hydrous kaolin	—		32.1	48.1	—			
Structured pigment	—		—	44.4	—			
Conventional calcined clay	—		—	—	97.3			
Water	69.4	8.3	<p>This portion master-batched — same in all paints.</p>					
Cellulosic thickener	1.2							
Defoamer	2.0							
Coalescing agent	11.3	1.4						
Vinyl acrylic emulsion, 55%	357.9	39.8						
PVC, %		45.0				45.0	45.0	45.0
Solids by volume, %		36.4				36.4	36.4	36.4

Table 5—Zinc-Bearing Acrylic Latex Exterior House Paint Formulations

Formula Ingredients	Extender Pigment Systems							
	#6		#7	#8	#9			
	Pounds	Gallons						
Units								
Water	240.0	28.8	<p>NOTE: Quantities are units per 100 gallons of paint. To convert to kilograms and liters per 1000 liters of paint, multiply pounds by 1.198 and gallons by 10.00.</p> <p>This portion master-batched — same in all paints.</p>					
Cellulosic thickener	4.0							
Ethylene glycol	27.9	3.0						
Fungicide	6.0							
Defoamer	2.0							
Polyacrylate dispersant, 30%	8.0							
Aminomethylpropanol, 95%	1.0							
Nonionic surfactant	2.0							
Potassium tripolyphosphate	1.5							
Total pigment volume		16.4						
Titanium dioxide, enamel grade	250.0							
Zinc oxide	25.0							
Coarse hydrous kaolin	87.7							
Delaminated kaolin	96.2							
Premium calcined clay	—		64.8	—	—			
Coarse hydrous kaolin	—		32.1	48.1	—			
Structured pigment	—		—	44.4	—			
Conventional calcined clay	—		—	—	97.3			
Water	76.1	9.1	<p>This portion master-batched — same in all paints.</p>					
Cellulosic thickener	1.2							
Defoamer	2.0							
Coalescing agent	11.3	1.4						
Acrylic emulsion, 55%	343.0	38.5						
PVC, %		45.0				45.0	45.0	45.0
Solids by volume, %		36.4				36.4	36.4	36.4

Table 6—Latex Exterior House Paint Primer Formulation

Formula Ingredients	Primer Used on Huber Panels		Primer Used on Huber Test Wall	
	Pounds	Gallons	Pounds	Gallons
Water	143.9	17.3	135.4	16.2
Cellulosic thickener	2.1		2.1	
Polyacrylate dispersant, 30%	5.2		5.2	
Nonionic surfactant	1.0		1.0	
Defoamer	1.0		1.0	
Ethylene glycol	35.0	3.8	35.0	3.8
Titanium dioxide, enamel grade	150.0	4.4	150.0	4.4
Microcrystalline silica	75.5	3.4	—	—
Coarse hydrous kaolin	77.3	3.6	217.2	10.0
Fungicide	9.0		9.0	
Defoamer	1.0		1.0	
Coalescing aid	5.5		5.5	
Acrylic emulsion, 55%	450.4	50.6	395.0	44.4
Water	111.5	13.4	143.8	17.3
Cellulosic thickener	1.0		2.5	
Ammonia, 28%	2.0		2.0	
PVC, %				38.0
Solids by volume, %		38.0		38.0

NOTE: Quantities are pounds per 100 gallons of paint. To convert to kilograms and liters per 1,000 liters of paint, multiply pounds by 1.198 and gallons by 10.00.

conventional calcined clay and one-third calcium carbonate, served as a control pigmentation for the zinc-free formula series. The author has had much successful experience with this combination, and earlier investigators have reported good results from calcined clays in exterior coatings^{2-4,6,13}

The first pigmentations, with an extender pigment mixture of approximately one-half coarse hydrous kaolin and one-half delaminated kaolin, shown in Tables 4 and 5, were used as control pigmentations for the zinc-bearing exposure series. These pigments have also been established by earlier investigators as dependable performers in exterior latex paints.^{2-4,6}

A control paint was prepared for each formula/resin combination used in the study. Control paints on exposure panels, described in a later section, were in all cases made with the same resin as the paints for which they served as controls.

Extender Pigment Combinations

Selection of extender pigment combinations was based on principles established by earlier investigators. Coarse particle extenders are known to give generally better tint retention and chalk resistance than fine particle extenders.²⁻⁶ However, inclusion of a significant proportion of finer particle extenders is common practice due to the considerable enhancement of TiO₂ efficiency, and thus opacity, which they have been found to contribute.⁹⁻¹³ Calcium carbonate is known to be more chalk resistant than clay pigments, but also more susceptible to staining.²⁻⁶ Large platelet delaminated kaolin has shown promise of better chalk resistance and color retention than other hydrous kaolins.⁶

The various extender pigment combinations which were substituted into the two basic formulas are shown in Tables 3-5. Each is a combination of a coarse extender—defined for this paper as having an average Stokes equivalent particle diameter of 4.0 microns or more—and a fine particle extender having an equivalent diameter of less than 2.0 microns. Coarse pigments included calcium carbonate, hydrous kaolin, and structured flattening pigment; fine pigments were the two calcined clays, delaminated kaolin, and the finer structured pigment, all as previously described.

Extender pigment ratios in the individual paint formulas, that is, within the individual two- or three-extender combinations, were chosen to provide desired paint properties, as follows. PVC was held constant within each basic formula series, therefore, it was believed important to adjust extender pigment ratios in such a way that critical pigment volume concentrations (CPVCs) were also the same, to the extent that this was possible to determine, in order to insure that exposed films had similar PVC/CPVC ratios and thus similar amounts of free binder. This was done by assuming, based on the established principle that optical as well as physical properties of films pass through significant discontinuities at CPVC,^{14,15} that, for constant PVC formulations that differ only in extender pigment types and quantities, equal optical properties will indicate equal PVC/CPVC ratios and thus equal binder demand. Paints within a basic formula series were therefore assumed to be similar in binder demand (that is, in PVC/CPVC ratio, and thus in CPVC, since PVCs were equal) when their reflectances after tinting and their contrast ratios before tinting were respectively very similar. Tinting was accomplished by the addition of one percent by weight of commercial glycol-based black colorant. Several trial batches of each basic formulation with each extender pigment combination were therefore prepared and tested using each control pigmentation as standard in its own series for these optical properties, and thus for binder demand and CPVC, until binder demands of all pigment combinations within each basic formula series were believed to be as similar as was practical to achieve. In the zinc-free formula series, tinted reflectances fell within a range of +/-0.7 reflectance units and contrast ratios within a range of +/-0.0075 units. In the zinc-bearing formula series, the range for tinted reflectance was +/-0.9 and that for contrast ratio was +/-0.0015.

Tables 3-5 show that extender systems evaluated included the following.

Among paints based on the zinc-free formulation,

- two used primarily conventional calcined clay as the fine particle extender;
- two used primarily premium calcined clay as the fine particle extender;
- one used primarily delaminated clay as the fine particle extender;
- two used primarily calcium carbonate as the coarse particle extender (comparing the two calcined clays); and

Table 7—Panel Exposure Ratings at Huber, GA

Southern yellow pine, south vertical, two coats WHITE over latex primer. Each value is derived from five or more panel ratings.

Extender Pigment Systems in Zinc-Free Formulations	Exposure Time, Months				
	10	25	34	42	69
General Appearance					
Premium calcined clay/calcium carbonate (Pigment system #2) Mean	9.6	7.5	7.7	6.3	6.4
..... Std. dev.*	0.3	0.8	0.8	1.5	1.2
Premium calcined clay/hydrous kaolin (Pigment system #3) Mean	10	10	9.2	7.7	7.7
..... Std. dev.	0	0	0.6	0.6	0.2
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4) Mean	10	7.5	7.9	6.8	7.1
..... Std. dev.	0	0.8	0.9	1.0	0.6
Chalk Resistance					
Premium calcined clay/calcium carbonate (Pigment system #2) Mean	10	9.7	8.8	8.5	6.0
..... Std. dev.	0	0.5	0.7	0.5	0.6
Premium calcined clay/hydrous kaolin (Pigment system #3) Mean	10	8.7	7.3	7.9	4.0
..... Std. dev.	0	0.9	1.4	0.8	0
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4) Mean	9.3	8.7	7.7	8.1	6.2
..... Std. dev.	0.4	0.9	0.5	0.4	0.4
Resistance to Dirt Collection					
Premium calcined clay/calcium carbonate (Pigment system #2) Mean	10	7.0	8.7	6.8	8.0
..... Std. dev.	0	0	0.5	0.7	0.6
Premium calcined clay/hydrous kaolin (Pigment system #3) Mean	10	10	9.5	8.6	8.8
..... Std. dev.	0	0	0.5	0.3	0.2
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4) Mean	10	8.0	8.7	7.8	8.4
..... Std. dev.	0	1.4	0.5	0.6	0.6
Mildew Resistance					
Premium calcined clay/calcium carbonate (Pigment system #2) Mean	10	7.0	8.6	6.7	7.8
..... Std. dev.	0	1.4	0.8	1.2	1.0
Premium calcined clay/hydrous kaolin (Pigment system #3) Mean	10	10	9.5	8.2	8.6
..... Std. dev.	0	0	0.5	0.2	0.5
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4) Mean	10	7.5	7.7	7.5	7.9
..... Std. dev.	0	0.8	0.9	0.5	0.7
Resistance to Darkening					
Premium calcined clay/calcium carbonate (Pigment system #2) Mean	8.0	6.8	7.5	6.0	7.7
..... Std. dev.	0	0.4	1.0	0.6	0.9
Premium calcined clay/hydrous kaolin (Pigment system #3) Mean	10	10	9.5	9.1	9.0
..... Std. dev.	0	0	0.5	0.2	0
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4) Mean	10	9.2	9.3	8.0	8.2
..... Std. dev.	0	0.4	0.5	1.0	0.8

*Standard deviation

- two were free of calcium carbonate.

Paints based on the zinc-bearing formulation utilized only clay extenders, with hydrous clay as the coarse extender in all cases and with each of the following fine particle extenders used in one paint: delaminated clay; conventional calcined clay; premium calcined clay; and structured pigment.

In one case—the zinc-free combination of conventional calcined clay, calcium carbonate, and structured pigment—titanium dioxide was reduced in order to evaluate exterior performance of this combination when used as partial TiO₂ replacement. This variation in TiO₂ loading invalidates the previously described assumption, and the binder demand of

this paint must be considered as unknown relative to its control.

The combination of delaminated kaolin and structured flattening pigment was chosen because use of delaminated kaolin can result in an objectionable degree of sheen if an effective flattening pigment is not present.

Primers

As described in the following, latex primers were used on most exposure panels at Huber, GA, while an alkyd primer was used at Charlotte, NC. Formulas for these latex primers are shown in Table 6. The first formula shown was used on south

Table 7—Panel Exposure Ratings at Huber, GA, *Continued*

Southern yellow pine, south vertical, two coats GRAY over latex primer. Each value is derived from five or more panel ratings.

Extender Pigment Systems in Zinc-Free Formulations	Exposure Time, Months					
	10	25	34	42	69	
General Appearance						
Premium calcined clay/calcium carbonate (Pigment system #2)	Mean	10	9.0	9.0	7.3	7.4
.....	Std. dev.*	0	0	0.8	0.5	0.5
Premium calcined clay/hydrous kaolin (Pigment system #3)	Mean	10	9.3	8.8	7.5	6.6
.....	Std. dev.	0	0	0.9	0.5	0.5
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4)	Mean	10	7.3	7.6	7.8	7.6
.....	Std. dev.	0	0.5	0.7	0.4	0.6
Chalk Resistance						
Premium calcined clay/calcium carbonate (Pigment system #2)	Mean	10	10	8.5	8.3	5.4
.....	Std. dev.	0	0	1.0	0.5	0.8
Premium calcined clay/hydrous kaolin (Pigment system #3)	Mean	10	10	8.0	8.5	4.0
.....	Std. dev.	0	0	1.6	0.8	0
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4)	Mean	10	9.0	7.3	8.3	6.2
.....	Std. dev.	0	0	0.5	0.5	0.4
Resistance to Dirt Collection						
Premium calcined clay/calcium carbonate (Pigment system #2)	Mean	10	10	9.3	8.0	8.2
.....	Std. dev.	0	0	0.5	0	0.4
Premium calcined clay/hydrous kaolin (Pigment system #3)	Mean	10	10	9.3	8.0	9.0
.....	Std. dev.	0	0	0.5	0	0
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4)	Mean	10	8.3	8.8	8.1	8.6
.....	Std. dev.	0	0.9	0.4	0.2	0.4
Mildew Resistance						
Premium calcined clay/calcium carbonate (Pigment system #2)	Mean	10	7.0	9.3	8.2	7.9
.....	Std. dev.	0	0	0.5	0.4	0.5
Premium calcined clay/hydrous kaolin (Pigment system #3)	Mean	10	10	8.7	8.3	9.0
.....	Std. dev.	0	0	0.8	0.5	0
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4)	Mean	10	6.8	7.7	8.3	8.8
.....	Std. dev.	0	0.4	0.5	0.5	0.2
Resistance to Fading						
Premium calcined clay/calcium carbonate (Pigment system #2)	Mean	10	10	9.5	9.0	9.2
.....	Std. dev.	0	0	0.5	0	0.8
Premium calcined clay/hydrous kaolin (Pigment system #3)	Mean	10	9.3	8.8	8.8	7.6
.....	Std. dev.	0	0.5	0.7	0.4	0.8
Conventional calcined clay/struct. pigment/calcium carbonate (Pigment system #4)	Mean	9.2	8.2	8.0	9.2	8.9
.....	Std. dev.	0.2	0.7	0	0.4	0.2

* Standard deviation

vertical panels at Huber. By the time the test walls at Huber were prepared, however, information on the possible carcinogenicity of crystalline silica had been published, and this pigment was therefore removed as a precaution, resulting in the second formula shown. The alkyd primer used at Charlotte was a commercial product.

Characterization of Paints

All paints were characterized and compositions confirmed by testing for density, nonvolatile content by weight, viscosity, fineness of grind, reflectance, opacity, reflectance after tinting, sheen, and gloss using appropriate ASTM test methods.

Paints were also tested for scrub resistance, a test normally associated with interior paints. However, the author has encountered a substantial number of attempts by paint technologists to expedite exterior performance evaluations through the use of such tests. Development of data necessary to demonstrate the degree of correlation which actually exists between exterior exposure and scrub resistance was felt to be worthwhile.

Preparation and Evaluation of Exposure Panels

In accord with recognized good practice in exterior exposure testing of paints,^{16,17} wood panels were selected to mini-

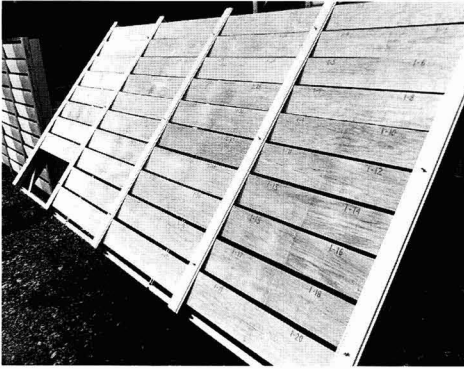


Figure 1—White test paints and controls applied one coat without primer on southern yellow pine, exposed on aluminum racks at 45° south in Huber, GA.

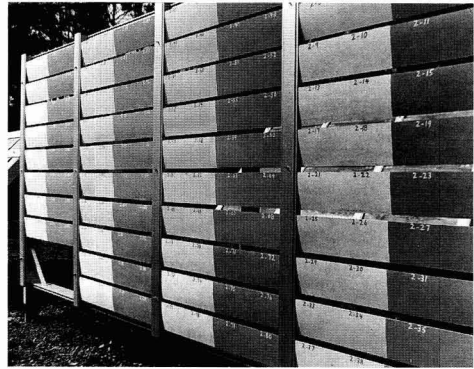


Figure 2—White and gray test panels and controls applied two coats over latex primer on southern yellow pine, exposed south vertical in Huber, GA.

Table 8—Test Wall Exposure Ratings* at Huber, GA

Extender Pigment Systems in Zinc-Free Formulation	Exposure Time, Months					
	5	14	23	34	58	71
Southern yellow pine, south, two coats WHITE over latex primer.						
General Appearance						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	9.2	8.5	8.5	8.1	7.2	6.1
Premium calcined clay/hydrous kaolin (Pigment system #7)	9.2	8.8	8.5	8.5	7.2	6.2
Structured pigment/hydrous kaolin (Pigment system #8)	9.2	9.0	8.5	8.0	6.8	4.8
Conventional calcined clay/hydrous kaolin (Pigment system #9)	9.2	8.5	8.5	8.8	7.8	6.8
Resistance to Chalking						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	9.8	10	9.5	8.5	8.0
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	10	10	9.5	8.0	6.0
Structured pigment/hydrous kaolin (Pigment system #8)	10	10	10	9.5	8.5	7.2
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	9.5	10	9.0	8.5	7.8
Resistance to Mildew						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	10	9.5	8.1	7.2	7.2
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	10	9.5	8.5	7.5	7.8
Structured pigment/hydrous kaolin (Pigment system #8)	10	10	9.5	8.5	7.0	6.5
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	10	9.5	8.8	7.5	7.8

mize surface irregularities and were prepared by a single trained technician at each exposure location. Paints were applied in the laboratory at normal spreading rates. All panels were allowed to dry under ambient conditions for 24 hr before being recoated, and for seven days before being placed on exposure. All panels were prepared in duplicate and a portion of each panel was coated with a control paint previously described. Panels were exposed at Huber, GA; Charlotte, NC; Cary, NC; and Miami, FL followed by additional exposure of these latter panels at Cary, NC. Panels were mounted in a variety of positions as described. Paints were exposed in both whites and tints. Panel ratings based on accepted pictorial standards¹⁸ were made by the author at all locations with the exception of ratings of the Miami and Cary panels, which were made by experienced local technicians. Panels were rated for general appearance, chalking, erosion, cracking, flaking, dirt accumulation, mildew, darkening (whites only), and fading (tints only). These conditions were rated on a scale of 0 to 10 where 0 represented total failure and 10 represented no detectable deterioration.

The rating of white latex paints for darkening requires explanation. To the maximum extent possible, this rating excludes discoloration from dirt and mildew. It represents tannin staining and other discoloration believed to result from interaction between wood substrates and paint ingredients, particularly calcium carbonate.⁶

Three series of panels were exposed at Huber, GA. The first of these included only white zinc-free paints, all of which were based on vinyl acrylic resins as previously described. These paints were exposed at 45° south on 15 cm (6 in.) smooth-sawn beveled southern yellow pine siding cut to 91 cm (36 in.) lengths and mounted on aluminum racks. Paints were applied in a single coat on bare, back-primed panels. This series was designed to fail quickly, thus yielding early, coarsely differentiated results. Ratings were made at 4, 10, and 16 months (see Figure 1).

The second series included the same formulation and extender systems as the first series, on the same type of back-primed yellow pine panel, but exposed south vertical, two coats over latex primer. Gray tints as well as whites were exposed, grays being made by addition of one percent by weight of commercial glycol-based black colorant to the white paints. Ratings were made at 4, 10, 16, 25, 34, 44, and 69 months (see Figure 2).

The third series at Huber included the four extender pigment combinations in the zinc-bearing formula, each made up in one vinyl acrylic resin (resin No. 2) and in the acrylic resin, and exposed in whites and gray tints. These exposures were not on conventional test fence panels, but rather the paints were applied to a two-sided test wall, having vertical walls approximately 1.5 meters (5 ft) high facing north and south. Each side had a 31 cm (12 in.)

Table 8—Test Wall Exposure Ratings* at Huber, GA, Continued

Systems in Zinc-Free Formulations	Exposure Time, Months					
	5	14	23	34	58	71
General Appearance						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	9.0	6.5	5.2	4.2	5.5	6.2
Premium calcined clay/hydrous kaolin (Pigment system #7)	9.0	6.0	5.0	5.5	5.5	6.0
Structured pigment/hydrous kaolin (Pigment system #8)	9.0	6.5	5.5	5.0	5.5	6.0
Conventional calcined clay/hydrous kaolin (Pigment system #9)	9.0	6.0	5.5	4.5	5.5	6.0
Resistance to Chalking						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	10	9.5	10	9.8	10
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	10	9.5	10	9.8	10
Structured pigment/hydrous kaolin (Pigment system #8)	10	10	9.5	10	9.8	10
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	10	9.5	10	9.8	10
Resistance to Mildew						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	9.5	6.8	6.2	5.5	6.9
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	9.5	7.5	7.5	5.5	7.2
Structured pigment/hydrous kaolin (Pigment system #8)	10	9.5	7.0	6.5	5.5	7.2
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	9.0	7.0	6.5	5.5	7.0

Table 8—Test Wall Exposure Ratings* at Huber, GA, *Continued*

Southern yellow pine, south, two coats GRAY over latex primer.						
Extender Pigment Systems in Zinc-Free Formulation	Exposure Time, Months					
	5	14	23	34	58	71
General Appearance						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	9.5	9.2	9.1	8.0	7.1	5.0
Premium calcined clay/hydrous kaolin (Pigment system #7)	9.5	9.2	8.5	8.0	7.5	5.0
Structure pigment/hydrous kaolin (Pigment system #8)	9.5	9.0	8.5	8.2	7.8	5.2
Conventional calcined clay/hydrous kaolin (Pigment system #9)	9.5	9.5	9.2	8.0	7.5	5.8
Resistance to Chalking						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	10	10	9.0	7.5	7.4
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	10	10	8.5	6.0	6.0
Structured pigment/hydrous kaolin (Pigment system #8)	10	10	10	9.0	7.0	5.8
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	10	10	9.0	8.5	8.0
Resistance to Mildew						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	10	10	8.0	7.0	6.8
Premium calcined clay/hydrous kaolin (Pigment system #7)	10	10	10	8.0	7.5	7.5
Structured pigment/hydrous kaolin (Pigment system #8)	10	10	10	8.0	7.5	8.0
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	10	10	7.8	7.2	6.8
Resistance to Fading						
Delaminated kaolin/hydrous kaolin (Pigment system #6)	10	9.8	10	9.0	9.0	7.5
Premium calcined clay/hydrous kaolin (Pigment systems #7)	10	8.5	9.0	8.0	8.0	6.5
Structured pigment/hydrous kaolin (Pigment system #8)	10	7.8	8.0	7.8	8.0	6.2
Conventional calcined clay/hydrous kaolin (Pigment system #9)	10	10	10	9.0	9.0	6.8

*Values for delaminated kaolin/hydrous kaolin are means of four area ratings. Other values are means of two area ratings.

overhang, boxed and faced with exterior grade plywood and roofed with roofing shingles. Walls were southern yellow pine novelty siding. Test areas were coated with a latex primer and two coats of test paints on the south wall, primer and single coats of test paints on the north wall. Each test paint was applied in a stripe from bottom to top of the wall, including boxing and fascia boards. Stripes were 25 cm (10 in.) wide on the south wall and 51 cm (20 in.) wide on the north wall. Whites and tints were applied to the southern exposure of the wall, and whites only to the northern exposure. Siding was cut in 1.5 meter (5 ft) lengths, and each 1.5 meter wall section included a stripe of control paint in each appropriate color. Test walls were rated at 5, 14, 23, 34, 58, and 71 months (see *Figure 3*).

Since each test area on these test walls included a series of panels at varying distances from the ground and from the overhang and since each test area was rated as a whole, most ratings are subjectively judged averages. Chalking was evaluated at the vertical midpoints of these test areas.

In Charlotte, paints exposed were the same as in the first two series at Huber—that is, only zinc free vinyl acrylic based paints. Panels were again 15 cm (6 in.) smooth-sawn beveled siding of southern yellow pine, cut to 91 cm (36 in.) lengths. Two coatings of paint were applied over a commercial alkyd primer, with a control paint on each panel. Only white paints were exposed in Charlotte. Exposures were at 45° south. Ratings were made at 12, 22, and 38 months (see *Figure 4*).

Table 9—Statistical Analysis of Panel Exposure Ratings at Huber, GA

Southern yellow pine, south vertical, two coats WHITE over latex primer.

Pigment System Pairs Compared	General Appearance	Resistance to Chalking	Resistance to Dirt Collection	Resistance to Mildew	Resistance Darkening
# 1 vs. #2	#1>#2*	#2>#1	Equal	Equal	#1>#2
#1 vs. #3	#3>#1	#1>#3	#3>#1	#3>#1	#3>#1
#1 vs. #4	Equal	#1>#4	Equal	#1>#4	#4>#1
#1 vs. #5	Equal	#1>#5	Equal	#1>#5	#5>#1
#2 vs. #3	#3>#2	#2>#3	#3>#2	#3>#2	#3>#2
#2 vs. #4	Equal	#2>#4	#4>#2	#2>#4	#4>#2
#2 vs. #5	#5>#2	#2>#5	Equal	Equal	#5>#2
#3 vs. #4	#3>#4	Equal	#3>#4	#3>#4	#3>#4
#3 vs. #5	#3>#5	Equal	#3>#5	#3>#5	#3>#5
#4 vs. #5	Equal	Equal	Equal	Equal	#4>#5*

Comparisons of pairs of extender pigment systems, combining data for all time periods and all resins.
 For example, #1>#2 means Pigment System #1 is rated superior to System #2 to a statistically significant degree.
 EQUAL means no statistically significant difference.
 Tests marked * are at 90% confidence level; otherwise 95% confidence level.

Table 10—Statistical Analysis of Panel Exposure Ratings

Statistical Ranking of Pigment Systems

Characteristics of Exposed Films	First	Second	Third	Fourth	Fifth
Huber, GA Series 1, southern yellow pine, 45° South, one coat WHITE unprimed, three ratings over 16 months					
General appearance	#3	#2	#5	#1	#4
Huber, GA Series 2, southern yellow pine — south vertical, two coats WHITE over latex primer, seven ratings over 69 months					
General appearance	#3	#1,#5		#4	#2
Resistance to chalking	#2	#1	#3,#4,#5		
Resistance to dirt collection	#3	#4	#1	#2,#5	
Resistance to mildew	#3	#1	#2	#5	#4
Resistance to darkening	#3	#4	#5	#1	#2
Huber, GA Series 2, southern yellow pine — south vertical, two coats GRAY over latex primer, seven ratings over 69 months					
General appearance	#1,#2		#3,#5		#4
Resistance to chalking	#1	#2	#3,#4,#5		
Resistance to dirt collection	#3	#2	#4	#1,#5	
Resistance to mildew	#3	#1	#2,#4,#5		
Resistance to fading	#1	#2	#3,#5		#4
Cary, NC, white pine — south and north vertical, and southern yellow pine — 45° South, two coats BLUE unprimed, three ratings over 24 months					
General appearance	#3	#1	#2,#5		#4
Resistance to chalking	#1	#2	#3,#4,#5		
Resistance to mildew	#1,#2#3			#5	#4
Resistance to fading	#1	#2,#5		#4	#3
Miami, FL & Cary, NC, white pine — south vertical, two coats BLUE unprimed, four ratings over 72 months					
General appearance	#2	#1,#5		#3	#4
Resistance to chalking	#1	#2	#4,#5		#3
Resistance to mildew	#2	#1,#3		#4,#5	
Resistance to fading	#1	#2	#4,#5		#3
Charlotte, NC, southern yellow pine — 45° south, two coats WHITE over alkyl primer, three ratings over 38 months					
Resistance to mildew	#1,#2		#3,#5		

Statistical tests combined all time periods and all resins.

Table 11—Panel Exposure Ratings* at All Sites After Two Years Exposure

Extender Pigment Systems in Zinc-Free Formulation	White Paints	
	Location and Substrate	
	Huber, GA: SYP— S. Vertical, 2 Ct. on Latex Primer	Charlotte, NC: SYP— S. 45°, 2 Ct. on Alkyd Primer
General Appearance		
Conventional calcined clay/calcium carbonate (System #1)	8.2	8.0
Premium calcined clay/calcium carbonate (System #2)	7.5	7.3
Premium calcined clay/hydrous kaolin (System #3)	10.0	6.3
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	7.5	7.7
Delaminated kaolin/structured flattening pigment (System #5)	8.3	7.7
Resistance to Chalking		
Conventional calcined clay/calcium carbonate (System #1)	9.3	7.0
Premium calcined clay/calcium carbonate (System #2)	9.7	7.0
Premium calcined clay/hydrous kaolin (System #3)	8.7	6.3
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	8.7	6.7
Delaminated kaolin/structured flattening pigment (System #5)	8.7	7.7
Resistance to Mildew		
Conventional calcined clay/calcium carbonate (System #1)	8.5	7.8
Premium calcined clay/calcium carbonate (System #2)	7.0	8.3
Premium calcined clay/hydrous kaolin (System #3)	10.0	5.2
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	7.5	6.8
Delaminated kaolin/structured flattening pigment (System #5)	8.2	6.7
Resistance to Darkening		
Conventional calcined clay/calcium carbonate (System #1)	8.2	6.7
Premium calcined clay/calcium carbonate (System #2)	6.8	5.8
Premium calcined clay/hydrous kaolin (System #3)	10.0	7.7
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	9.2	7.7
Delaminated kaolin/structured flattening pigment (System #5)	9.3	7.2

Paints exposed in Cary were the same as in Charlotte. However, all paints were tinted with four fluid ounces of phthalo blue glycol based commercial colorant per gallon; no white paints were exposed. All paints were exposed north and south vertical on white pine panels, and at 45° south on southern yellow pine panels, two coats without primer in all cases. Panels were rated at 6, 19, and 24 months.

Paints exposed in Miami and Cary were the same as in the earlier Cary, including the blue tint. All paints were exposed south vertical on white pine panels, two coats without primer. Panels were rated at six months, one year, and two years in Miami, after which they were transferred to Cary and were rated there at six years.

The three northern Georgia and North Carolina exposure environments differ somewhat. The Huber site is rural, on open, flat land; the Charlotte site is industrial (adjacent to a polymer plant); the Cary site is located in an office park surrounded by hardwood trees. The Miami site is a commercial weathering station.

Statistical Analysis of Data

Analysis of data was done by use of the sign test* to a 95% level of confidence where possible and to a 90% level of confidence when necessary to obtain significant differences. This statistical method allowed comparison of samples of weathered film characteristics, as represented by exposure panel ratings, from the several populations of films represented in this work, where a population was postulated to be

all films of a given formulation exposed under a given set of conditions now and in the future. This test does not require assumption that the populations are normally distributed or have equal variances.¹⁹

Extender pigments were compared by testing general appearance ratings from each of the three exposure series at Huber and from each of the other locations, as well as ratings for the individual film characteristics of chalk resistance, resistance to dirt collection, mildew resistance, resistance to darkening, and fade resistance, to the extent that this was judged to be productive from the various locations.

Vinyl acrylic resins were compared by testing general appearance ratings from the one coat, 45° south exposures and the south vertical panel exposures at Huber, GA. The vinyl acrylic and acrylic resins used on the test walls in Huber were also compared against each other using general appearance ratings.

To the extent necessary to provide sufficient sample sizes for analysis, data for multiple resins, multiple periods of

* The sign test compares two groups of ratings or rankings, typically where quantitative measurements are not possible, using the signs, positive or negative, of observed differences rather than quantitative magnitudes. Each extender pigment system was compared to each other system by determining the sign of the difference from each comparable pair of panel ratings. The sign test was then applied to the resulting groups of signs, to determine whether, in each system pair, one system rated higher than the other at the desired level of confidence. Tables 9 and 10 show how these results were translated into pigment system rankings. Resins were ranked in the same way.

Table 11—Panel Exposure Ratings* at all Sites after Two Years Exposure, *Continued*

Extender Pigment Systems in Zinc-Free Formulation	Colored Paints		
	Location and Substrate		
	Huber, GA: SYP, 2 Vert., 2 Ct. Gray on Latex Primer	Cary, NC: S. & N. Vert. + SYP S. 45°, 2 Ct. Blue Unprimed	Miami, FL: WP, S. Vert., 2 Ct. Blue Unprimed
General Appearance			
Conventional calcined clay/calcium carbonate (System #1)	9.0	8.4	8.0
Premium calcined clay/calcium carbonate (System #2)	9.0	8.2	7.0
Premium calcined clay/hydrous kaolin (System #3)	9.3	8.4	6.3
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	7.3	7.9	5.3
Delaminated kaolin/structured flattening pigment (System #5)	8.0	8.0	6.7
Resistance to Chalking			
Conventional calcined clay/calcium carbonate (System #1)	10.0	9.1	7.7
Premium calcined clay/calcium carbonate (System #2)	10.0	8.8	6.7
Premium calcined clay/hydrous kaolin (System #3) 10.0	8.1	5.7	
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	9.0	8.2	6.3
Delaminated kaolin/structured flattening pigment (System #5)	9.0	8.2	5.0
Resistance to Mildew			
Conventional calcined clay/calcium carbonate (System #1)	7.6	8.6	8.7
Premium calcined clay/calcium carbonate (System #2)	7.0	8.5	8.7
Premium calcined clay/hydrous kaolin (System #3)	10.0	8.6	8.7
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	6.8	7.9	6.0
Delaminated kaolin/structured flattening pigment (System #5)	7.2	8.1	8.3
Resistance to Fading			
Conventional calcined clay/calcium carbonate (System #1)	10.0	8.7	7.0
Premium calcined clay/calcium carbonate (System #2)	10.0	8.2	4.7
Premium calcined clay/hydrous kaolin (System #3)	9.3	7.7	3.3
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	8.0	8.2	5.3
Delaminated kaolin/structured flattening pigment (System #5)	8.3	7.9	4.0

SYP = southern yellow pine, WP = white pine.
* Values are means of three or more panel ratings.

exposure time, and (at Cary) multiple substrates and panel positions, were combined in pigment tests. Data from multiple extender pigments, multiple periods of exposure, and (on the test wall) multiple panel positions were combined in resin tests. Resistance to erosion, flaking, and cracking are not included in reports of statistical analyses, because panel ratings for these characteristics seldom had values below eight, and differences between the pigment systems were not statistically significant. Resistance to mildew and dirt collection were omitted from the Miami and Cary analyses for similar reasons and because the number of data points available from these panels was marginal for meaningful results. The limited number of data points available from Charlotte permitted only comparison of paints containing calcium carbonate with those containing none.

RESULTS AND DISCUSSION

Ratings of Exposure Panels and Test Wall Areas

One of the most striking results of this work is the similarity in performance of all the paints tested. Of 23 paints reported, each exposed as white and one or two colors, and each exposed on 16 or more panels or on two or more test wall areas, all gave reasonably good performance over the two- to six-years period.

This is demonstrated for panel exposures in *Table 7*, which reports arithmetic means and standard deviations of panel ratings from the Huber south vertical panel series for extender pigment systems No. 2, premium calcined clay/calcium carbonate; No. 3, premium calcined clay/hydrous kaolin; and No. 4, conventional calcined clay/structured pigment/calcium carbonate. The first two of these were two of the better systems evaluated, while the third system produced the lowest overall ratings. As this table shows, the spread between performances of these paints was remarkably small and ratings were quite good over the six-year test period.

This situation was particularly notable on the test wall, where none of the four white or four gray paints tested could be shown statistically to have an advantage over the six years of exposure. While fewer data points were available from the test wall than from the panel exposures, the 30 data pairs which were in most cases available for each sign test should have permitted detection of all but small differences. *Table 8* reports arithmetic means of test wall ratings of the eight paints for four of the most significant film characteristics.

Statistical Comparisons of Extender Pigments

Table 9, which compares each pair of extender pigment systems for each of several film characteristics of white paints



Figure 3—White and gray test paints and controls applied two coats over latex primer on southern yellow pine, exposed on test wall at south vertical in Huber, GA.



Figure 4—White test paints and controls applied two coats over alkyd primer on southern yellow pine, exposed on aluminum racks at 45° south in Charlotte, NC.

on the Huber south vertical panel exposures, illustrates the type of results generated by the sign test. Confidence levels achieved for each test are indicated. Table 10 reports rankings derived from this type of data, for all sites and exposures series for which data were sufficient to reveal significant statistical differences.

As previously stated, attempts at statistical analysis of test wall data found no significant differences between extender pigment systems. Various approaches were tried, but no meaningful ranking of these paints has been achieved. All four performed well. The balance of this discussion, therefore, is derived from panel exposure results and pertains to the zinc-free formulation in vinyl resins.

The following overall rankings of pigment systems are based on equal weightings for general appearance and for resistance to chalking, mildew, dirt collection, darkening of whites, and fading of colors. White paint No. 3, premium calcined clay/hydrous clay, ranked first for all characteristics except chalk resistance, in which it ranked equal to the other all-clay systems. Thus it was the best overall white paint tested. White paint No. 1, conventional calcined clay/calcium carbonate, and No. 5, delaminated clay/structured flattening pigment, made up the middle range, ranking below average for mildew resistance and dirt collection in the former case, and for mildew resistance and general appearance in the latter. Although white paint No. 2, premium calcined clay/calcium carbonate, ranked first for chalk resistance, problems with darkening and dirt collection brought it down to a tie for last place with paint No. 4, conventional calcined clay/structured pigment/calcium

carbonate. This last paint suffered from mildew and had poorer general appearance.

Colored paints No. 1, conventional calcined clay/calcium carbonate, ranked as the best overall colored paints despite some tendency to dirt collection. (Note that the plural is used because both gray and blue paints were tested in each pigment system.) Their strengths were resistance to chalking and fading. Colored paints No. 2, premium calcined clay/calcium carbonate, were a close second besting No. 1 in mildew resistance and resistance to dirt collection. Among the all-clay systems in colored paints, paint No. 3, premium calcined clay/hydrous clay, showed good mildew resistance and general appearance but chalked and faded considerably. None of the other colored paints exhibited above average characteristics. It should be noted that the data from Miami had a significant effect on rankings of colored paints. Chalking and fading were dramatically greater at that location than at the other sites (see Table 11).

Comparison of Performance of Vinyl Paints after Two-Years Exposure at Different Sites

Table 11 presents site comparisons for the maximum period for which all panels were exposed by showing arithmetic means of panel ratings at two years from each exposure location. In examining it, however, one must bear in mind that differences go considerably beyond geographical location. In fact, climatic differences were not great with the exception of Miami. Wood species and panel positions, and

Table 12—Correlation Between Scrub Resistance and Exterior Performance

Extender Pigment Systems in Zinc-Free Formulation	Scrub Resistance Means of Three Resins		General Appearance Rankings (See Explanation Below)	
	Cycles	Rank	Whites	Colors
Conventional calcined clay/ calcium carbonate (System #1)	1841	Second	Second (tie)	First (tie)
Premium calcined clay/ calcium carbonate (System #2)	1710	Third	Fifth	First (tie)
Premium calcined clay/ hydrous kaolin (System #3)	1212	Fourth	First	Third (tie)
Conventional calcined clay/ structured pigment/calcium carbonate (System #4)	1899	First	Fourth	Fifth
Delaminated kaolin/ structured flattening pigment (System #5)	629	Fifth	Second (tie)	Third (tie)

Sources of exterior performance rankings: Whites from statistical analysis of Huber, GA panel series #2, general appearance ratings; Colors from mean of statistical analysis rankings of Huber, GA series #2, Cary, NC and Miami, FL/Cary, NC exposures, general appearance ratings.

Table 13—Scrub Resistance of Five Pigment Systems in Three Vinyl Acrylic Resins

Extender Pigment Systems in Zinc-Free Formulation	Scrub Cycles		
	Resin #1	Resin #2	Resin #3
Conventional calcined clay/calcium carbonate (System #1)	1085	2426	2011
Premium calcined clay/calcium carbonate (System #2)	964	2285	1880
Premium calcined clay/hydrous kaolin (System #3)	677	1581	1378
Conventional calcined clay/structured pigment/calcium carbonate (System #4)	1400	2294	2002
Delaminated kaolin/structured flattening pigment (System #5)	397	738	752

particularly primers used, may well be the most significant differences. While all panels compared had two coats of finish, Huber panels were latex primed, Charlotte panels were alkyd primed, and Cary and Miami panels were unprimed.

At least three interesting observations can be made from these data.

(1) All-clay extender systems were particularly susceptible to mildew growth when applied over alkyd primer, but paints having a substantial loading of calcium carbonate showed much better mildew resistance on these panels. This observation is supported by the statistical pigment system ranking reported from Charlotte in Table 10, where limited data permitted only a ranking for mildew resistance of paints containing relatively high loadings of calcium carbonate (systems #1 and #2) versus those containing no calcium carbonate (systems #3 and #5). The calcium-carbonate-bearing paints ranked higher.

(2) Latex-primed panels generally outperformed alkyd-primed and unprimed panels of the same finish coats.

(3) The previous observation concerning latex primer did not apply to mildew resistance of unprimed panels, which exceeded that of latex-primed panels, although it should be noted that this comparison is between blue panels (unprimed, at Cary) and gray panels (latex-primed, at Huber). Also, the Cary two-year results are arithmetic means of ratings from white pine panels exposed both south and north vertical as well as southern yellow pine exposed at 45° south, while the Huber results are from south vertical exposures of southern yellow pine only.

Statistical Comparison of Resins

Differences found between resins were surprisingly minor. In fact, analysis of all data from paints based on the three vinyl resins totaling 80 or more panels for each resin and exposures at four sites revealed no statistically significant differences between these three resins at the 95 or 90% confidence levels, although, based on inspection of the raw panel ratings, specific resins may have shown advantages or disadvantages for certain film characteristics at specific exposure time periods.

Comparisons of vinyl resin No. 2 and the acrylic resin used on the test wall ranked the acrylic better for general appearance overall and in colored paints, better for chalk resistance in white paints, and better for resistance to dirt collection in colored paints. But the vinyl resin ranked better for chalk resistance in colored paints and for resistance to dirt collection in white paints, and 15 other tests showed no statistically significant differences.

Comparison with Results of Earlier Investigators

It is interesting to compare these results with those of the 30-year old study by Brooks et al.,⁶ who exposed similar paints for five years at the same principal location used in this present

study. The present study obtained ratings which are generally higher, at five years, by about two rating units, for the characteristics reported by Brooks (general appearance, mildew resistance, resistance to chalking). This may indicate substantial improvement in performance of present day raw materials. It is also noteworthy that Brooks used an oil-based primer on two-thirds of each panel. The remainder of each panel was self-primed. Results with an alkyd primer in this present study suggest that an oil primer could have detracted from performance of some of the finish coats evaluated.

Scrub Resistance and Exterior Performance

Table 12 shows with considerable clarity the lack of correlation between scrub resistance and performance on exterior exposure. Table 13 shows scrub test results for each resin and pigment system. Scrub resistance varied greatly with resin used in identical pigmentations and varied consistently with pigmentation regardless of resin (possibly correlating with pigment hardness). However, exterior performance, as represented by statistical rankings of general appearance of exposures, showed no apparent relationship to scrub resistance ranking.

CONCLUSIONS

Several clay pigments provided good exterior performance in exterior latex house paints applied to wood when exposed at multiple locations for up to six years.

The relatively small differences in exterior performance between the pigment systems tested, which was confirmed by statistical analysis of a rather large number of exposures, may be related to the effort made to standardize the free binder level in the test paints. This possibility points to areas for future work, to establish possible optimum exterior formulations in terms of free binder (PVC/CPVC), and to further test the standardization of free binder through measurement of optical properties.

Calcined clay provided the best white paint in the study when combined with coarse hydrous kaolin, and the best colored paints when combined with coarse calcium carbonate. This white paint was notable for freedom from darkening and low dirt collection, while these colored paints exhibited the best tint retention in the study. All paints containing calcined clay ranked high for mildew resistance, except when used in a calcium carbonate free pigment system applied over alkyd primer.

In formulations used in this study, premium calcined clay did not show a performance advantage sufficient to justify its higher cost. It should be noted, however, that for a given binder demand, premium calcined clay is used at a lower level with a higher level of coarse extender. This permits an increased loading of calcium carbonate, which should provide improved mildew resistance over alkyd primer and

improved tint retention in colors, and will help to offset the higher cost of the calcined clay.

The promising exterior performance of delaminated clay which had been reported by earlier investigators was neither confirmed nor refuted by this study. The middle-quality performance of this pigment may have been due to the presence of structured flattening pigment with the delaminated clay in one formulation, as well as to the lack of detectable performance differences between pigment systems in the second formulation in which it was used.

Additional work is needed if structured clay pigments are to be established as suitable for exterior use. They should not be written off at this point, however, for two reasons. First, the zinc-free pigment system which contained the finer particle size structured pigment in this study was not standardized for binder demand. High binder demand, rather than structured pigment performance, may have accounted for the relatively poorer performance of this paint. Second, the zinc-bearing pigment system in which this pigment was used was standardized for binder demand and performed equally with the other zinc-bearing systems evaluated.

Some conclusions seemed inescapable to the investigator when the actual panels were examined. One of these is that calcium carbonate is a very useful ingredient for paints which will be applied over alkyd primer, if they are to resist mildew; this is reflected in the two-year ratings of the white paints at Huber as compared to those at Charlotte, as shown in Table 11. Another conclusion is that exposure at Miami must be viewed as an accelerated test, which is excellent for establishing relative chalk and fade resistance, but is not realistic for paints which will not be used in such climates. A third conclusion is that latex primer generally enhances performance considerably as compared to either no primer or alkyd primer. However, there was an anomaly at Cary, where mildew resistance of unprimed blue-tinted panels was superior to that of latex-primed gray panels at Huber.

Differences in overall exterior performance among the four resins used in this study were small to a degree which was surprising to the investigator. Statistical analysis of the data indicates that choice of resins from this group is not a major consideration, even though both vinyl and acrylic resins were included.

Scrub resistance showed no significant correlation with exterior performance. Its use in evaluation of exterior paints should be discouraged.

References

- (1) "Business Activity Indicators," *Mod. Paint Coat.*, 87, No. 2, 14 (1997).
- (2) Liberti, F.P., "The Function of Extender Pigments in Exterior Vinyl Emulsion Paints," *Official Digest*, 33, No. 434, 390 (1961).
- (3) Vannoy, W.G., "Extenders in Outside House Paints," *Official Digest*, 31, No. 441, 1215 (1961).
- (4) Vannoy, W.G., "Paint and Pigment Variations as Tested on Wood," *Official Digest*, 35, No. 461, 537 (1963).
- (5) Los Angeles Society for Coatings Technology, "Surface Area/PVC Relationships for Various Extender Pigments," *Official Digest*, 33, No. 442, 1461 (1961).
- (6) Brooks, L.E., Sennett, P. and Morris, H.H., "Kaolin—Five Years on the Test Fence," *JOURNAL OF PAINT TECHNOLOGY*, 40, No. 520, 240 (1968).
- (7) Elm, A.C., "Size and Shape Properties of Representative White Hiding and Extender Pigments," *Official Digest*, 31, No. 413, 720 (1959).
- (8) Lowrey, E.J., personal communication.
- (9) Stieg, F.B., "The Geometry of White Hiding Power," *Official Digest*, 34, No. 453, 1065 (1962).
- (10) Cuthrone, Luigi, "Influence of Fine-Particle Size Extenders on the Optical Properties of Latex Paints II," *JOURNAL OF COATINGS TECHNOLOGY*, 58, No. 736, 83 (1986).
- (11) Braum, J.H., "Crowding and Spacing of Titanium Dioxide," *JOURNAL OF COATINGS TECHNOLOGY*, 60, No. 758, 67 (1988).
- (12) Brooks, L.E. and Morris, H.H., "The Function of Modified Kaolins in Flat Wall Paint," *Official Digest*, 37, No. 489, 1204 (1965).
- (13) Madson, W.H., "White Hiding and Extender Pigments," *Federation Series on Coatings Technology*, Federation of Societies for Paint Technology, Philadelphia, 1967.
- (14) Paul, S., *Surface Coatings Science and Technology*, John Wiley & Sons, New York, 1985.
- (15) Patton, T.C., *Paint Flow and Pigment Dispersion*, John Wiley & Sons, New York, 1979.
- (16) Storer, R.H. (Ed.), *1988 Annual Book of ASTM Standards*, Vol 6.01, American Society for Testing and Materials, Philadelphia, 1988.
- (17) Sward, G.G. (Ed.), *Paint Testing Manual*, American Society for Testing and Materials, Philadelphia, 1972.
- (18) *Pictorial Standards of Coatings Defects*, Federation of Societies for Coatings Technology, Philadelphia, 1979.
- (19) Hamburg, M., *Statistical Analysis for Decision Making*, Harcourt Brace Jovanovich, New York, pp 542-545, 1983.

The Success of UV/EB Curing: Environmental Compliance, Performance and Safety

Lujean Burak—The Sartomer Company*

INTRODUCTION

Since its commercial introduction over 25 years ago, ultraviolet (UV) and electron beam (EB) curing has enjoyed steady growth in demand and usage and has become one of the fastest growing coatings technologies in the world. The UV/EB cure industry currently commands 2% of the world paint and coatings market, and experts predict this share will double over the next five years. The U.S. market alone garners \$300 million per year in sales with a 10% annual growth rate.

Its performance and environmental advantages are responsible for UV/EB curing technology's rising popularity. These advantages include faster cure time, coating quality, and low solvent levels. Higher flash points, 100% reactivity, and equipment friendliness are some additional UV/EB benefits.

The technology is widely used in the coatings, graphic arts, electronics, and adhesives industries. It can be applied to almost any substrate. Specific applications include beverage cans, floor tiles, plastic cups, screen-printing, ink, and photoresists.

KEY FORCES BEHIND UV/EB'S GROWTH

Environmental Compliance

Concern for the environment is beginning to permeate all aspects of life and business. Governments around the world are passing legislation mandating tougher controls on volatile organic compound (VOC) emissions. These reforms include many of the solvents used in conventional paints, inks, and coatings.

UV/EB curing complies with all of these environmental regulations, because it is solvent-free and usually VOC-free, depending on the volatility of the monomers used. The process involves 100% solids – the amount of liquid applied before the curing process is equal to the amount of solid coating after curing is complete.

Improved Performance Properties

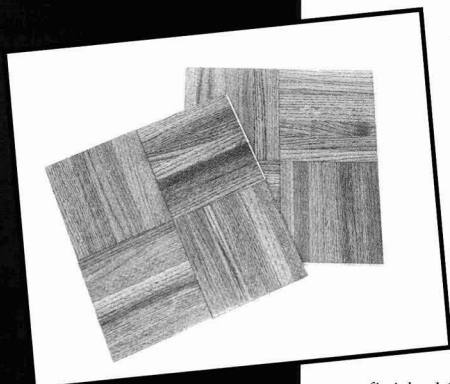
Environmental compliance is not the only reason for UV/EB curing's increasing popularity, however. This technology also offers substantial energy savings, shorter production times, and faster cure rates. In terms of quality, UV/EB produces paints and coatings with exceptional color density, gloss and durability. This technology enables formulators to reduce VOCs and energy consumption as they produce high-quality finished films and high-technology coatings.[†]

UV/EB TECHNOLOGY

UV/EB curing involves the polymerization of the coating materials directly onto a substrate. Polymerization is a chemical reaction where the simple compounds in the coating formula crosslink, thus converting the liquid material into the solid, cured film.

*502 Thomas Jones Way, Exton, PA 19341

[†]RadTech International North America, *UV/EB Curing Primer*, Northbrook, IL, (January 1995).



JCT Spotlight: The Success of UV/EB Cure

UV curing begins when ultraviolet light is directed onto the coating formula. Photoinitiators in the formula absorb the UV energy and form free radicals. These free radicals then trigger the polymerization process. This is known as *free radical* polymerization. In most cases, the cure is complete in fractions of a second.

In EB curing, an electron beam is directed at the formula. No photoinitiators are used, because the electrons have enough energy to initiate polymerization directly. As in UV, the process is complete in milliseconds.

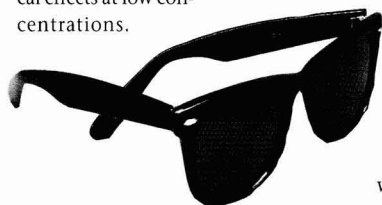
UV/EB formulations are comprised of four key components: oligomers, monomers, photoinitiators, and additives.

Oligomers

Urethane Acrylates: Oligomers are high molecular weight, viscous materials that form the backbone of the formulation. They determine the overall properties of the cured material, including viscosity, hardness, flexibility, weathering, and chemical resistance.

Conventional coatings may be based on isocyanates, epoxies or polymeric resins used in solvent-based, high-solids, or emulsion application systems. UV/EB-cured coatings are based on similar backbone structures. Isocyanates and urethane pre-polymers are end-capped with hydroxyl acrylates and methacrylates, which eliminates hazards. The group forms a non-volatile urethane. The unsaturated group, comprised of an acrylate, methacrylate, vinyl, or allyl, is used for the free radical polymerization.

The amount of free isocyanate or free hydroxy unsaturation in urethane acrylates typically is undetectable. Isocyanates have considerable toxicological effects at low concentrations.



The isocyanate free urethane acrylates are low skin and eye irritants compared to their isocyanate-terminated counterparts. This property practically eliminates the health and safety hazards involved with the use of these chemicals as pre-polymers.

Urethane acrylates are among the most versatile backbones in the UV/EB field. Typical urethane acrylate molecular weights are 800 to 5000. A urethane prepolymers made of polyol end-capped with a di-isocyanate is used in conventional solvent-based and two-component coatings. These same prepolymers may be end-capped with reactive acrylates for use in UV/EB curing.

The urethane acrylates are generally viscous and require elevated temperatures or dilution with the reactive monomers to reduce the viscosity. There is little possibility of volatile-free isocyanates due to the nature of urethane acrylate manufacturing.

Epoxy Acrylates

Epoxy acrylates are the largest-volume oligomer class in the UV/EB industry. A bisphenol A epoxy resin is reacted with acrylic acid or methacrylic acid to provide unsaturated terminal reactive groups. The versatility of the backbone structure provides a wide range of chemical coating properties. The epoxy-based oligomers may be viscous and have the same handling precautions as the urethane acrylates.

The acrylic acid/epoxy reaction to make a bisphenol A diacrylate destroys any free ingredients such as epichlorohydrin used to make the bisphenol A epoxy starting raw material.

Monomers

Monomers are low-molecular-weight materials. They can be mono-



functional, difunctional, or multifunctional and serve to dilute the formulation to achieve the required application viscosity.

Low-viscosity reactive monomers provide application viscosity, adhesion, and leveling properties. Conventional coatings depend on solvents such as toluene, methylethyl ketone, acetates, or even water to reduce viscosity. These solvents or diluents must be removed with hot forced air ovens or infrared heaters.

This process is required for the coating resin to dry or crosslink to form a coating.

The reactive monomers in UV/EB crosslink to provide a cured, cross-linked coating with no volatile organic compounds. Reactive monomers provide solvent-like properties and adjust viscosities for easy application. The molecular weights are generally greater than 200, making the coating very low in volatility. The monomers themselves have low vapor pressure with flash points greater than 93°C, which minimizes the risk of fire hazards. Most monomers are classified as non-hazardous under the Department of Transportation regulations.

Monomer functionality, backbone structure, polarity, surface tension, viscosity and solubility provide adhesion, leveling, surface wetting, gloss, and reactivity. These chemicals require standard safety and handling equipment.

Photoinitiators

As mentioned, photoinitiators perform a key role in UV formulas, as they initiate the process by absorbing the UV energy and forming the free radicals that trigger the polymerization process.

Additives

Additional additives, such as pigments, fillers, defoamers, and adhe-

JCT Spotlight: The Success of UV/EB Cure

sion-promoters, may be included in both UV and EB formulas to achieve specific performance properties.

The selection of UV cure versus EB is determined by production runs and the thickness of the film. UV curing systems are more suited for narrow web operations and for short-run productions such as printing operations. Ultraviolet light's energy is absorbed mostly at the surface of the film, while electrons' energy can penetrate through the thicker material. With its greater penetration abilities, EB curing is better suited for very high processing speeds and for thicker, denser, and more opaque materials.

The capital costs for UV and EB systems differ significantly. A production-sized electron beam accelerator can cost around \$500,000 or more, depending upon the degree of customization. UV systems can range from small production units costing several tens of thousands of dollars to large-scale units in the hundreds of thousands of dollars range. These systems also involve high conversion expenses and higher raw materials costs.

However, these costs are offset by the technology's 100% conversion (versus 33% for most solvent-based systems), reduced energy consumption (up to 80%), lower operating and maintenance costs, and the elimination of ventilation systems, solvent recovery systems, and air scrubbers. UV/EB curing also requires less factory space, eliminates clean-up time and results in less press down-time in the graphics industry.

Performance Applications

UV/EB's performance benefits present compelling reasons for manufacturers to switch. As mentioned, UV/EB offers improved gloss, scratch and abrasion resistance, chemical resistance, hardness, elasticity, adhesion and bond strength. These superior properties can result in higher sales and increased market share.

The coatings market is one of the largest product markets for UV/EB curing. UV/EB, unlike other emerging

technologies such as powder coatings, can be applied to essentially any substrate imaginable. Therefore, UV/EB-cured coatings are ideal for a wide range of paper and board, flooring, plastics, metal, leather, textiles and wood applications, as the following examples illustrate:

Metal: UV coatings for metal cans have been commercially successful for several years. It is an attractive process, because the production speeds obtained with UV cure are well above those with solvent- or water-based systems.

Both two- and three-piece cans can be produced on lines where UV is part of the original equipment. Existing lines also can be upgraded by UV lamps to replace traditional ovens. UV/EB coatings are more durable, bright and scratch-resistant. Coors Brewing Company was one of the first beer manufacturers to convert its can production process to UV/EB.

Another significant and rapidly growing metal application area for UV coatings is exterior-galvanized steel pipes. UV coatings can offer outstanding weatherability. They can withstand salt corrosion, sunlight and moisture as well as friction and abrasion. These coatings are ideal for fence posts, highway guardrails, road signs, and parking meters.

Wood: Wood coatings, specifically unsaturated polyester wood fillers, represent one of the first commercially successful uses of UV curing technology in the U.S. UV topcoats are used on particleboard, cabinets, and paneling as well as top-of-the-line furniture and hardwood flooring. UV topcoats boast excellent abrasion and stain resistance for longer product life.

Plastics: Rigid plastics such as lenses, cups, credit cards, films, compact disks, computer keyboards, bottles, automotive headlight assemblies, and vinyl flooring have seen increased usage of UV/EB coatings. In fact, vinyl flooring is the second

largest market for UV/EB coatings. UV/EB coatings are able to enhance the durability of these end products.

NEW TECHNOLOGY BREAKTHROUGHS

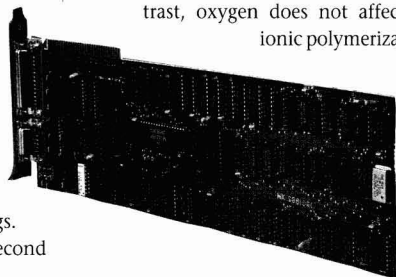
The applications mentioned are just a few of the thousands that are possible with UV/EB technology. New technological breakthroughs and the production of even more advanced products are generating new applications every day.

Each year, dozens of monomers, oligomers and photoinitiators are introduced. They are the result of teamwork between the manufacturers and coatings formulators. Among the advanced products currently being developed are (1) lower skin irritation monomers and oligomers and (2) monomers and oligomers that enhance weather resistance and high gloss properties.

Cationic Curing

Cationic curing is an emerging cure system, which is based on acrylate chemistry. Cationic curing is *ionic* polymerization and utilizes cycloaliphatic epoxies and vinyl ethers. When cationic photoinitiators are exposed to ultraviolet light, they decompose to yield an acid catalyst, which triggers polymerization.

The main advantage of ionic curing over free radical curing is reduced oxygen inhibition. Many of the monomers used in free radical curing have difficulty curing in the presence of oxygen. To compensate, free radical systems must use higher functional and higher weight monomers and special photoinitiator packages. In contrast, oxygen does not affect ionic polymeriza-



JCT Spotlight: The Success of UV/EB Cure

tion. Cationic curing yields coatings that adhere better to plastic and metal, especially aluminum.

Dual Cure

Another cure process that promises to open doors for UV/EB is dual cure. Most UV/EB coatings have been applied to flat products such as paper and wood panels. Three-dimensional objects often were unsuitable for UV/EB, because the shapes caused shadows that could not be reached by UV light. This unequal exposure affected the crosslink density and the end performance properties.

Combining UV/EB cure with thermal cure systems provides a solution to this problem. This dual process utilizes UV/EB's acrylated oligomers and thermal cure's two-component polyurethanes. After a material has been exposed to UV/EB, it is then placed in bake cycles to crosslink the materials not exposed to UV/EB's radiant energy. These bake cycles can enhance the toughness of some metal coatings.

All of these advancements and breakthroughs are not chance occurrences nor do they come from isolated

research. Researchers work side-by-side with paint and coating formulators to find out what their needs are and tailor new innovations. Developing custom solutions helps uncover application opportunities and stimulates and propels the development of the technology itself.

Safety Concerns and Shielding Requirements

Because EB processing can generate X-rays, ozone, and oxides of nitrogen, suitable ventilation and specialized shielding equipment must be used, and operators must be trained to safely operate this equipment. By adhering to these safety precau-

tions, odor, ozone, and exposure to secondary X-rays can be virtually eliminated.

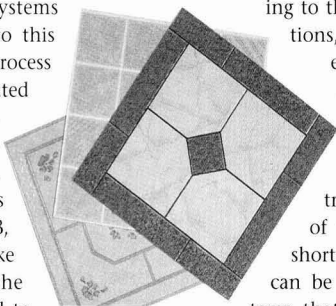
Since electrons give up most of their energy in a short distance, workers can be protected by systems that ensure electrical capture. To protect workers from possible exposure to secondary X-rays, low-energy EB accelerators are encased in lead equipment. To stop X-rays produced by an accelerator with accelerating voltages up to 300 KeV, a lead

case 2.5 cm (1 inch) thick is usually sufficient. Accelerators with KeV levels of 150 to 300 are often called self-shielded. However, as acceleration voltages go beyond 600 KeV, a separate concrete vault is needed to eliminate X-ray emissions.

The lead equipment encases the entire accelerator chamber and the under beam openings for material transport. These under beam openings are also placed at a specific angle and length to further shield the worker from X-ray emission. In addition, most EB accelerators are configured with devices that detect background X-rays. If background X-ray levels are too high, the accelerator automatically shuts down.

CONCLUSION

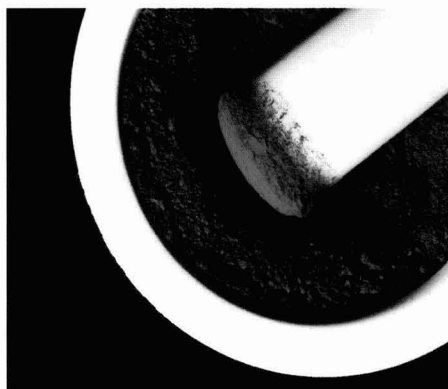
With new developments and processes constantly being developed and stricter environmental regulations being passed every day, UV/EB curing is growing increasingly popular. UV/EB technology makes products better, tougher and more durable. It accomplishes this without using harmful solvents or producing hazardous emissions. As a result, UV/EB promises to be a major player in the coatings industry in the 21st Century and beyond.



HEUCOROX[®]

IRON OXIDE PIGMENTS
FOR THE PAINT INDUSTRY

JANUARY 1997
Official
START UP



THE NEW
QUALITY
STANDARD
FOR
IRON OXIDES



.COPY & FAX... COPY & FAX... COPY & FAX... COPY & FAX... COPY & FAX..

SAMPLE & TECHNICAL DATA

To



Fax-No. **(1) 215-736-2249**

Heucotech Ltd.,
99 Newbold Road, Fairless Hills
Pennsylvania 19030

Techn. Data Sample

HEUCOROX®-Yellow 150 MF

HEUCOROX®-Red 305 MF

HEUCOROX®-Red 310 MF



HEUCOROX®-Red 320 MF

HEUCOROX®-Red 330 MF

HEUCOROX®-Black 960 MF



from

Name

Company

Address

Telephone

Fax

.....
.....
.....
.....
.....
.....
.....

Supplier Listings

Raw Materials	35
Production Equipment.....	73
Lab Apparatus and Testing Equipment	89
Services	99
Computer Software	106

Advertisers appear in bold.

Raw Material Suppliers

A

Aarbor International Corp.
9434 Maltby Rd.
Brighton, MI 48116
Phone: (810) 220-0080
Fax: (810) 220-0088
E-Mail: aarbor@ismi.net
Ping Dong, V.P., Marketing; Kaushik Doshi,
Technical Dir.
Blue Pigments
Green Pigments
Metallic Flakes and Powdered Pigments
Red Pigments
Yellow and Orange Pigments

ABCO Enterprises, Inc.
3450 Eagle Dr.
Allegan, MI 49010
Phone: (616) 673-5822
Fax: (616) 673-6005
Steve Melville, Technical Sales; Ruth
Feuerstein, Sales Mgr.
Black/Brown/Gray Pigments
Pigment Dispersions (Aqueous)

ABITEC Corp.
501 W. 1st Ave.
Columbus, OH 43215
Phone: (614) 429-6427
Fax: (614) 299-8279
Frank DeTrano, V.P.; Phil Lacke, Mgr.
Sales/Marketing
Bodying Agents
Coconut Oil
Dispersing Agents & Surfactants
Driers
Esters
Soybean
Stearates
Sunflower

Surface Conditioners & Lubricants
Suspension Agents
Synthetic & Modified Oils
Thickening Agents

Accurez Corp.
300 E. Primm St.
St. Louis, MO 63111
Phone: (314) 638-1211
Fax: (314) 638-2322
Roger Heitland, President; Janine Hofer,
Business Mgr.; Robert Gaal, Technical Dir.
Acrylic Resins
Alkyd Resins
Epoxy Resins
High-Solid Resins
Oleo-resinous Varnishes
Polyester Resins

Aceto Corporation
One Hollow Lane
Lake Success, NY 11042
Phone: (516) 627-6000
Fax: (516) 627-6093
Roy Goodman, Group V.P.
Adhesion Promoters
Antioxidants
Cellulose Derivatives
Coalescing Agents
Esters
Preservatives
Static Preventive
TGIC Resins
Thickening Agents

ACTI-Chem
55 Quarry Rd.
Trumbull, CT 06611
Phone: (203) 268-1497
Fax: (203) 268-4760
Jerry Tracey, Technical Dir.; James
Whittaker, Sales Mgr.
Preservatives

ADM Co. ADM Lecithin Div.
4666 Faries Pkwy.
Decatur, IL 62525
Phone: (217) 424-5898
Fax: (217) 424-4119
Pat Schroder, V.P., Lecithin
Anti-Sagging Agents
Anti-Settling Agents
Dispersing Agents & Surfactants
Ink Additives
Misc. Viscosity, Suspension and Flow Control
Agents
Printing Ink Dispersants & Vehicles
Suspension Agents

ADM Tronics, Inc.
224-S Pegasus Ave.
Northvale, NJ 07647
Phone: (201) 767-6040
Fax: (201) 784-0620
Andre DiMino, Executive V.P.
Acrylic Resins
Adhesion Promoters
Anti-Foaming Agents
Ink Additives
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Viscosity, Suspension and Flow Control
Agents
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Static Preventive
Varnishes

Aerocote Corp.
P.O. Box 15849
Houston, TX 77220
Phone: (713) 224-6185
Fax: (713) 223-5229
Lisa A. Smith, Administrative Supervisor;
Craig S. Smith, Plant Mgr. & Sales
Aliphatic Hydrocarbons
Corrosion Inhibitors

Misc. Solvents
Preservatives
Terpenes



More than chemicals. Chemistry.

Air Products & Chemicals, Inc.
7201 Hamilton Blvd.
Allentown, PA 18195-1501
Phone: (610) 481-4911
Fax: (610) 481-4381
E-Mail: info@apci.com
Product Information Center
(800) 345-3148

Adhesion Promoters
Anti-Foaming Agents
Catalysts
Corrosion Inhibitors
Dispersing Agents & Surfactants
Epoxy Resins
Flow Control Agents
Ink Additives
Misc. Other Additives
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Reactive Diluents
Surface Conditioners & Lubricants
Urethane & Polyurethane Resins
Vinyl Resins

SEE OUR AD ON OPPOSITE PAGE.



Akzo Nobel Resins
4730 Crittenden Dr.
Louisville, KY 40209
Phone: (502) 361-9491
Fax: (502) 375-5477

Michael Kelly, Dir. Sales & Marketing;
Neil Wilson, Technical Service Mgr.

Acrylic Resins
Alkyd Resins
Amino Resins
Epoxy Resins
High-Solid Resins
Melamine & Melamine Type Resins
Polyester Resins
Styrene Resins
Urethane & Polyurethane Resins
Water-Thinned Resins

Akzo Nobel Inc.
Resin Div.

P.O. Box 349
Baxley, GA 31513
Phone: (912) 367-3616
Fax: (912) 367-5754

Hugh Mayers, Marketing Mgr.

Ester Gums
Maleic Resins
Misc. Type Resins
Natural Resins
Phenolic Resins
Rosin Esters

Albright & Wilson UK Ltd.
Surface Technologies Div.
P. O. Box 3, 210-222 Hagley Rd. West
Oldbury, West Midlands B68 0NN
United Kingdom
Phone: 44 (0) 121-420-5468
Fax: 44 (0) 121-420-5321
Corrosion Inhibitors
Corrosion-Inhibiting Pigments

Alcoa Industrial Chemicals
P.O. Box 300
Bauxite, AR 72011
Toll Free: (800) 860-3290
Fax: (501) 776-4904
T.R. Clever, M. Howard
Extender Pigments
Flame and Smoke Retardants

Alex Color Co.
119 N. Union Street
Shenandoah, PA 17976
Toll Free: (888) ALEX-COLOR
Phone: (717) 462-3500
Fax: (717) 462-0788
Joseph J. Alex, President; Joseph M. Alex,
Sales & Marketing
Black/Brown/Gray Pigments
Blue Pigments
Green Pigments
Iron Oxide Pigments
Pigment Dispersions (Aqueous)
Red Pigments

Allied Colloids, Inc.
2301 Wilroy Rd.
P. O. Box 820
Suffolk, VA 23439-0820
Phone: (757) 538-3700
Fax: (757) 538-0204
George Blanchard, Product Specialist
Acrylic Resins
Anti-Foaming Agents
Dispersing Agents & Surfactants
Flocculants
Flow Control Agents
Misc. Viscosity, Suspension and Flow Control
Agents
Printing Ink Dispersants & Vehicles
Thickening Agents

AlliedSignal Inc., Specialty Chemicals
101 Columbia Rd.
Morristown, NJ 07962
Phone: (973) 455-5191
Fax: (973) 455-5000
Sandra Beachlin, Dir. Sales/Marketing
Adhesion Promoters
Catalysts
Corrosion Inhibitors
Flame and Smoke Retardants
Ink Additives
Light Stabilizers
Other Pigments
Preservatives
Stabilizers
Surface Conditioners & Lubricants
UV Absorbers
Water Treatment Chemicals

Allo Colouring Co.
P.O. Box 471
Ontario, CA 91762
Phone: (909) 986-7061
Fax: (909) 391-1094
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Resin Emulsion



Alnor Oil Co.
70 East Sunrise Hwy.
Valley Stream, NY 11581
Phone: (516) 561-6146
Fax: (516) 561-6123
Marjorie Klayman, V.P.; Gordon Kaplan,
V.P.; Ray Linke, Sales & Edible &
Industrial Oils; Maria Hornburg, Sales &
Drying Oils
Castor Oil (Dehydrated)
Coconut Oil
Fatty Acids
Glycerine
Linseed
Oiticica Oil
Soybean
Sunflower
Tung Oil

SEE OUR AD ON PAGE 135.

American Casein Co.
Div. of Protein Polymer Group
109 Elbow Ln.
Burlington, NJ 08016
Phone: (609) 387-3130
Fax: (609) 387-7204
Robert E. Ball, Technical Sales
Adhesion Promoters
Amino Resins
Anti-Rust Agents
Dispersing Agents & Surfactants
Ink Additives
Misc. Other Additives
Misc. Type Resins
Misc. Viscosity, Suspension and Flow Control
Agents
Natural Resins
Pigment Dispersions (Aqueous)
Printing Ink Dispersants & Vehicles
Thickening Agents

American Chemet Corp.
400 Lake Cook Rd., Ste. 223
P.O. Box 437
Deerfield, IL 60015
Phone: (847) 948-0800
Fax: (847) 948-0811
W.W. Shropshire, President; Skip Klatt,
V.P.; Kim A. Klatt, V.P.
Red Pigments
White Pigments

American Colors, Inc.
160 E. Market St.
P.O. Box 397
Sandusky, OH 44871-0397
Phone: (419) 621-4000
Fax: (419) 625-3979
Matt Kosior, Technical Dir.
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

American Gilsonite Co.
136 E. So. Temple St., #1460
Salt Lake City, UT 84111-1104
Phone: (801) 524-7900
Fax: (801) 328-9116
K. Clark Christensen, President; Joe
Baldassare, V.P. Mktg.; Chad K. Nielson,
Domestic Sales Rep.
Hydrocarbon Resins
Ink Additives
Natural Resins

Defect-free surfaces start with imagination, hard work and a little Surfynol[®] Surfactant.



When it comes to formulating compliant coatings and inks, an ounce of prevention is worth a pound of cure. With Surfynol surfactants as part of your starting formulation, you can avoid the time consuming and costly process of balancing improved wetting with foam control.

Since Surfynol surfactants lower both dynamic and equilibrium surface tension in waterborne systems, wetting is enhanced — which means customers get few or no defects, even with spray or very high application speeds.

Surfynol surfactants also offer superior flow and leveling without foam. And they work in other compliant systems, including powder and high-solids. So make sure your time and talent are backed up by a wetting agent that's right from the start. Call 800-345-3148 or 610-481-6799 for a free sample. Or visit our web site at www.airproducts.com/chemicals.

**AIR
PRODUCTS** 

More than chemicals. Chemistry.

Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds

American Lecithin Co.
115 Hurley Rd., Unit 2B
Oxford, CT 06478
Phone: (203) 262-7100
Fax: (203) 262-7101
Bernard A. Yemc, Marketing Mgr.
Dispersing Agents & Surfactants
Printing Ink Dispersants & Vehicles

A.M.S.
125 MacQuesten Pkwy., S.
P.O. Box 2500
Mt. Vernon, NY 10550
Phone: (914) 699-9712
Fax: (914) 699-2312
E-Mail: sales@amsglobal.com
Randie S. Meshirer, V.P. Sales
Abrasives/Anti-Skid
Anti-Rust Agents
Black/Brown/Gray Pigments
Blue Pigments
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Dyes
Extender Pigments
Flame and Smoke Retardants
Green Pigments
Iron Oxide Pigments
Masking Agents
Metallic Flakes and Powdered Pigments
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Solvents
Other Pigments
Photocuring Materials/Photoinitiators
Printing Ink Varnishes & Compounds
Red Pigments
Surface Conditioners & Lubricants
Varnishes
Water Repellents—Silicone, Corrosion
Inhibitors
White Pigments
Yellow and Orange Pigments

Amoco Chemicals
Chemical Intermediates Div.
801 Warrenville Rd., MC 6018
Lisle, IL 60532
Toll Free: (800) 621-4567
Acids (Non-Fatty)
Aromatic Acids
Monomers
Reactive Diluents

Anderson Development Co.
1415 E. Michigan St.
Adrian, MI 49221
Phone: (517) 263-2121
Fax: (517) 263-1000
Jack F. Georgal, Dir. Marketing
Acrylic Resins
Flattening Agents
Hybrid Resins
Misc. Other Chemical Specialties
Styrene Resins
Urethane & Polyurethane Resins



ANGUS Chemical Co.
1500 E. Lake Cook Rd.
Buffalo Grove, IL 60089
Phone: (847) 215-8600

Fax: (847) 215-8626
Amine Neutralizers
Corrosion Inhibitors
Dispersing Agents & Surfactants
Ink Additives
Misc. Other Additives
Nitroparaffins
Preservatives
Water Treatment Chemicals
SEE OUR AD ON PAGE 112.

Apollo Colors, Inc.
3000 Dundee Rd., Ste. 415
Northbrook, IL 60062
Phone: (847) 564-9190
Fax: (847) 564-9296
Larry D. Bykerk, V.P. Sales & Marketing
Blue Pigments
Pigment Dispersions (Aqueous)
Red Pigments
Yellow and Orange Pigments

Arakawa Chemical (USA) Inc.
625 N. Michigan Ave., Ste. 1700
Chicago, IL 60611
Phone: (312) 642-1750
Fax: (312) 642-0089
Mack Harashima, President; David
Nagasawa, Mgr.
Alkyd Resins
Ester Gums
Fatty Acids
Hydrocarbon Resins
Ink Additives
Maleic Resins
Natural Resins
Oleoresinous Varnishes
Phenolic Resins
Plasticizers
Rosin Esters
Rosin Salts
Terpenes

ARCO Chemical

ARCO Chemical Co.
3801 West Chester Pike
Newtown Square, PA 19073
Phone: (610) 359-2000
Fax: (610) 359-2841
Alcohols
Glycol Ethers
Glycols
Styrene Resins
Urethane & Polyurethane Resins
SEE OUR AD ON PAGE COVER 3.

Aristech Chemical Corp.
600 Grant St.
Pittsburgh, PA 15219
Phone: (412) 433-2747
Alcohols
Ketones
Plasticizers
Polypropylene Resins

Arizona Oxides L.L.C.
8250 N. El Mirage Rd.
El Mirage, AZ 85335
Toll Free: (800) 576-1500
Phone: (602) 935-9350
Fax: (602) 935-9365
Vince Scott, Executive V.P. & G.M.
Iron Oxide Pigments

Asbury Carbons, Inc.
Div. of Asbury Graphite Mills, Inc.
405 Old Main St.
P.O. Box 144
Asbury, NJ 08802
Phone: (908) 537-2155
Fax: (908) 537-2908
E-Mail: asbury@eclipse.net
Nicholas T. Mares, Industrial Sales Mgr.;
Albert V. Tamashausky, Dir. Technical
Services
Black/Brown/Gray Pigments
Extender Pigments
Flame and Smoke Retardants
Ink Additives

Ashtand Chemical Co.
IC & S Div.
P.O. Box 2219
Columbus, OH 43216
Phone: (614) 790-3440
E-mail: csr@ashchem.com

Acrylic Resins
Adhesion Promoters
Alcohols
Alkyd Resins
Anti-Foaming Agents
Antioxidants
Catalysts
Corrosion Inhibitors
Dispersing Agents & Surfactants
Epoxy Resins
Flame and Smoke Retardants
Flocculants
Flow Control Agents
Ink Additives
Maleic Resins
Misc. Other Additives
Misc. Other Chemical Specialties
Phenolic Resins
Plasticizers
Polyester Resins
Polyethylene Resins
Preservatives
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Silicone Polyesters
Silicone Resins
Styrene Resins
Suspension Agents
Texturizers
Thickening Agents
UV Absorbers
Varnishes
Vinyl Resins
Water Repellents—Silicone, Corrosion
Inhibitors
Water Treatment Chemicals

Atomergic Chemetals Corp.
222 Sherwood Ave.
Farmingdale, NY 11735-1718
Phone: (516) 694-9000
Fax: (516) 694-9177
M. Blum, V.P.; M. Samuels, Product Mgr.
Antioxidants
Blue Pigments
Cellulose Derivatives
Corrosion Inhibitors
Extender Pigments
Green Pigments
Preservatives
Red Pigments
Yellow and Orange Pigments

Automation Products Inc.
3030 Max Roy St.
Houston, TX 77008
Phone: (713) 869-0361
Fax: (713) 869-7332
Sales/Information: Technical Applica-

tions Dept.

Misc. Viscosity, Suspension and Flow Control Agents

Dynatrol® The Best Available!



■ ACCURATE measurement of % SOLIDS and % CONCENTRATION at process conditions.
 ■ For SOLVENT or WATER ADDITION CONTROL on PAINTS, COATINGS, ADHESIVES, INKS, RESINS, DYES, etc.
 Automation Products, Inc.,
 3030 Max Roy Street, Houston, Texas 77008-9981 USA
 Fax 713-869-7332 Phone 800-231-2062 D328-CL111

Aztec Peroxides, Inc.
 One Northwind Plaza
 7600 West Tidwell, Ste. 500
 Houston, TX 77040
 Phone: (713) 895-2000
 Fax: (713) 895-2040
 Nicholas J. Motto, Mgr.
 Catalysts

B

Baker Petrolite
 Polymers Div.
 6910 E. 14th St.
 Tulsa, OK 74112
 Phone: (918) 836-1601
 Fax: (918) 834-9718
 Rodney Foster, Technical Sales Rep.;
 James Vaughan, Customer Service Mgr.
 Adhesion Promoters
 Dispersing Agents & Surfactants
 Fatty Acids
 Ink Additives
 Maleic Resins
 Waxes

BASF

BASF Corp.
 3000 Continental Dr., N.
 Mt. Olive, NJ 07828-1234
 Toll Free: (800) 433-4739
 Fax: (800) 426-3562
 Black/Brown/Gray Pigments
 Blue Pigments
 Corrosion-Inhibiting Pigments
 Dyes
 Green Pigments
 Iron Oxide Pigments
 Light Stabilizers
 Metallic Flakes and Powdered Pigments
 Other Pigments
 Pigment Dispersions (Aqueous)
 Red Pigments
 UV Absorbers
 Waxes
 Yellow and Orange Pigments
SEE OUR AD ON THIS PAGE.

BASF Corp.
 Coatings Raw Materials Div.
 11501 Steele Creek Rd.
 Charlotte, NC 28273
 Toll Free: (800) 395-5152
 Fax: (704) 587-8157
 E-Mail: smitha@basf.com

Alan Smith; Edmund Keil
 Acrylic Resins
 Styrene Resins
 Ultraviolet Curing Resins



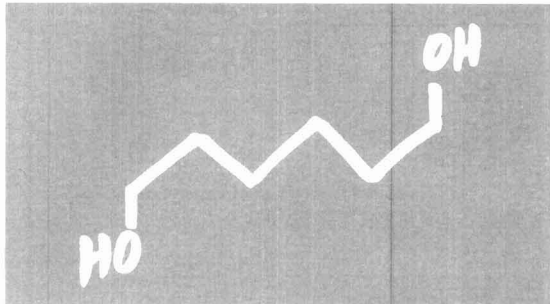
Bayer Corporation
 100 Bayer Rd.
 Pittsburgh, PA 15205-9741
 Phone: (412) 777-2000
 Fax: (412) 777-4431

Web: www.bayerus.com

- Acids (Non-Fatty)
- Acrylic Resins
- Black/Brown/Gray Pigments
- Blue Pigments
- Dyes
- Green Pigments
- High-Solid Resins
- Iron Oxide Pigments
- Maleic Resins
- Misc. Type Resins
- Monomers
- Nylon Resins
- Pigment Dispersions (Aqueous)
- Pigment Dispersions (Non-Aqueous)
- Plasticizers
- Polyamide Resins

B A S F I N T E R M E D I A T E S

1,6 HDO® Hexanediol



Can HDO work for you?

Look at these performance characteristics:

- Improved flexibility
- Greater elasticity
- Better oil resistance
- Good anti-leaching properties
- Good adhesion
- Surface hardness
- Hydrolytic stability
- Dry grip

Look at some applications in Polyurethanes:

- Automotive coatings
- Epoxy adhesives
- Personal care

In Polyesters:

- High solids formulation for coil coatings
- Modifier for PE resins
- Hot melt adhesives

In Acrylics:

- Radiation curable coatings
- GMA acrylic alloys

At BASF, we don't make your products. We help make them better.

HDO is a registered trademark of BASF Corporation

Call us!

Mike Travers
 (800) 526-1072
 Ext: 4773
 Fax: (201) 426-4752
 Canada: (416) 674-2888
 Fax: (416) 674-2839

Creative Chemistry for Creative Chemists.



Circle No. 166 on the Reader Service Card

Polyester Resins
Red Pigments
Silicone Resins
Ultraviolet Curing Resins
Urethane & Polyurethane Resins
Urethane Crosslinkers
Urethane Lacquers
Water-Thinned Resins
White Pigments
Yellow and Orange Pigments

SEE OUR AD ON PAGE 11.

Betz Dearborn
 Metals Process Group
 200A Precision Dr.
 Horsham, PA 19044
 Phone: (215) 355-3300
 Fax: (215) 773-2800
 Web: www.betzdearborn.com
 Mitch Kassouf, Technical Marketing Dir.;
 Holly Davis, Marketing
 Communications
 Corrosion Inhibitors
 Misc. Other Chemical Specialties
 Pretreatment Chemicals



Borden Inc.
114 Industrial Blvd.
Morganton, NC 28655
Phone: (704) 584-3800
Fax: (704) 584-3885
Dave Blough, National Account Mgr.;
Peter Wallace, National Sales Mgr.
 Amino Resins
 Anti-Blocking Agents
 Catalysts
 Dispersing Agents & Surfactants
 Melamine & Melamine Type Resins
 Plasticizers

SEE OUR AD ON PAGE 133.

Browning Chemical Corp.
 707 Westchester Ave.
 White Plains, NY 10604
 Phone: (914) 686-0300
 Fax: (914) 686-0310
 Joseph Golinowski, V.P.
 Acids (Non-Fatty)
 Alcohols
 Antioxidants
 Blue Pigments
 Caustics and Caustic Sodas
 Chlorinated Solvents
 Dispersing Agents & Surfactants
 Esters
 Fatty Acids
 Glycerine
 Glycol Ethers
 Glycols
 Green Pigments
 Ketones
 Stearates
 Water Treatment Chemicals
 White Pigments

Buckman Laboratories, Inc.
 1256 N. McLean Blvd.
 Memphis, TN 38108
 Toll Free: (800) 282-5626

Fax: (901) 726-5970
 Anti-Foaming Agents
 Anti-Rust Agents
 Catalysts
 Corrosion Inhibitors
 Corrosion-Inhibiting Pigments
 Dispersing Agents & Surfactants
 Flame and Smoke Retardants
 Preservatives

Burgess Pigment Co.
 P.O. Box 349
 Sandersville, GA 31082
 Phone: (800) 841-8999
 Fax: (912) 552-1772
 Malcolm S. Burgess, Jr., President & CEO;
 Daniel O. Adrien, Executive V.P.; Lewis
 Berry, Research Dir.; John Ballard, National
 Coatings Mgr.
 Extender Pigments

Burlington Bio-Medical & Scientific Corp.
 222 Sherwood Ave.
 Farmingdale, NY 11735
 Phone: (516) 694-9000
 Fax: (516) 694-9177
 E-Mail: BABL28A@prodigy.com
 Bill Rudy, V.P. Sales/Marketing
 Antioxidants
 Ink Additives
 Misc. Other Additives
 Misc. Other Chemical Specialties
 Preservatives

BYK-Chemie USA
 524 South Cherry St.
 P.O. Box 5670
 Wallingford, CT 06492-7651
 Phone: (203) 265-2086
 Fax: (203) 284-9158
 Robert H. McMullin, Business Mgr.
 Anti-Blocking Agents
 Anti-Floating Agents
 Anti-Flooding Agents
 Anti-Foaming Agents
 Anti-Sagging Agents
 Anti-Settling Agents
 Catalysts
 Dispersing Agents & Surfactants
 Ink Additives
 Surface Conditioners & Lubricants
 Thickening Agents

C

CABOT

Cabot Corp.
CAB-O-SIL Div.
700 E. U.S. Highway 36
Tuscola, IL 61953-9643
Phone: (217) 253-3370
Fax: (217) 253-4334
Lee Soule, Marketing Mgr., Coatings;
Bob Lin, Sr., Technical Service Specialist
 Anti-Foaming Agents
 Anti-Sagging Agents
 Anti-Settling Agents
 Dispersing Agents & Surfactants
 Extender Pigments
 Flattening Agents
 Flow Control Agents
 Ink Additives
 Thickening Agents

SEE OUR AD ON PAGE 41.

Cabot Corp.
 Special Blacks Div.
 Billerica Technical Center
 157 Concord Rd., P.O. Box 7001
 Billerica, MA 01821-7001
 Toll Free: (800) 662-2313
 John Foster, Technical Service Mgr.
 Black/Brown/Gray Pigments

Calgon Corp.
 P.O. Box 1346
 Pittsburgh, PA 15230
 Phone: (732) 382-8982
 Fax: (732) 382-9326

Captan Associates, Inc.
 P.O. Box 504
 Brick, NJ 08723
 Phone: (732) 840-1244
 Fax: (732) 840-1211
 Dyes
 Ink Additives

Cardinal Color & Chemical Inc.
 50-56 First Ave.
 Paterson, NJ 07524
 Phone: (201) 684-1919
 Fax: (201) 684-0865
 David White, V.P. Technical Sales; Leo
 Masciulli, President
 Pigment Dispersions (Aqueous)
 Pigment Dispersions (Non-Aqueous)

Cardolite Corp.
 500 Doremus Ave.
 Newark, NJ 07105
 Phone: (973) 344-5015
 Fax: (973) 344-1197
 Deirdre Igo, Marketing Communications;
 Tony Stonis, President; Ken Sielski, Sales
 Rep.; Paul Nowak, Sales Rep.
 Epoxy Hardeners-Chemicals
 Epoxy Resins
 Plasticizers
 Reactive Diluents

Cargill, Inc.
 P.O. Box 5694/MS2
 Minneapolis, MN 55440-5694
 Phone: (612) 742-6286
 Fax: (612) 742-6722
 Bill Reutz, Dept. Mgr.
 Linseed
 Soybean
 Sunflower

Carroll Scientific, Inc.
 5401 Dansher Rd.
 Countryside, IL 60525
 Phone: (708) 579-8000
 Fax: (708) 579-9477
 Ronald L. Levitt, V.P. Sales; Richard M.
 Bradley, V.P., R & D; Alan I. Kalmikoff, V.P.,
 Marketing & International Business
 Anti-Blocking Agents
 Flattening Agents
 Flow Control Agents
 Ink Additives
 Printing Ink Dispersants & Vehicles
 Printing Ink Varnishes & Compounds
 Surface Conditioners & Lubricants
 Waxes

CasChem, Inc.
 40 Ave. A
 Bayonne, NJ 07002
 Toll Free: (800) CAS-CHEM
 Fax: (201) 858-0308
 John T. Doherty, National Sales Mgr.
 Anti-Rust Agents



I RECOMMEND A 5½ IRON.

LOOKING FOR A MORE CUSTOMIZED SOLUTION?

At Cabot, we offer something new and truly unique: customized performance particles for the paint and coatings industry.

We work closely with our coatings partners to develop and produce precise specialty carbon blacks and Cab-O-Sil® fumed silicas to meet exact control requirements for high performance applications.

We don't simply "tweak" an existing product to get you "close enough" to your objective. We create performance particles to match your precise specifications.

To learn more about our customized performance particles, contact our Cab-O-Sil Division at 1-800-222-6745 (or 217-253-3370) and our Special Blacks Division at 978-670-7001.

It's no longer simply a matter of pulling a club out of the bag. It's about designing precise solutions that hit the target—every time.

Cab-O-Sil® is a registered trademark of Cabot Corporation.

Specialists in FINE PARTICLE Technology™

CABOT

Circle No. 229 on the Reader Service Card

Castor Oil (Dehydrated)
Catalysts
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Plasticizers
Reactive Diluents
Urethane & Polyurethane Resins
Waxes

CCP
820 E. 14th Ave.
N. Kansas City, MO 64116
Toll Free: (800) 821-3590
Fax: (816) 391-6141
Mike Kaza, Business Mgr.; Dennis Ryer,
Technical Dir.

Acrylic Resins
Alkyd Resins
Anti-Sagging Agents
Epoxy Resins
Flow Control Agents
High-Solid Resins
Misc. Viscosity, Suspension and Flow Control
Agents

Oleoresinous Varnishes
Polyester Resins
Silicone Polyesters
Styrene Resins
Urethane & Polyurethane Resins

CDI Dispersions
27 Haynes Ave.
P.O. Box 2639
Newark, NJ 07114
Phone: (201) 824-1806
Fax: (201) 824-3947
Merrill D. Garret, V.P.

Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

Celite Corp.
c/o World Minerals, Inc.
137 West Central Ave.
P.O. Box 519
Lompoc, CA 93436
Toll Free: (800) 342-8667
Fax: (805) 735-5699
Customer Service Dept.
Anti-Blocking Agents
Catalysts
Extender Pigments

Cellulose Filler Factory
10200 Worton Rd.
Chestertown, MD 21620
Phone: (410) 810-0779
Fax: (410) 810-0779
E-Mail: fiber@cellulosefillerfactory.com
Michael Auth, Sales/Marketing
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Misc. Viscosity, Suspension and Flow Control
Agents
Thickening Agents

Central Soya Co., Inc.
P.O. Box 1400
Fort Wayne, IN 46801-1400
Phone: (800) 348-0960
Fax: (219) 425-5485
Charles Worrall, Lecithin Marketing Mgr.
Dispersing Agents & Surfactants
Soybean

Cerdec Corp.
West Wylie Ave.
Washington, PA 15301
Phone: (412) 223-5900
Fax: (412) 229-5388
Gil Burkhart, Technical Sales; Joe Sarver,
Technical Service Mgr.
Black/Brown/Gray Pigments
Blue Pigments
Corrosion-Inhibiting Pigments
Green Pigments
Red Pigments
Yellow and Orange Pigments

Chattem Chemicals, Inc.
3801 St. Elmo Ave.
Chattanooga, TN 37409
Phone: (423) 821-7616
Fax: (423) 825-0507
Richard D. Giles, Dir. Aluminum Derivatives
Business Unit; James H. Kedrowski, V.P.
Sales/Marketing
Bodying Agents
Catalysts
Driers
Ink Additives
Thickening Agents
Water Treatment Chemicals

Chemcor
48 Leone Ln.
Chester, NY 10918
Phone: (914) 469-5800
Fax: (914) 469-5855
Mike Scher; John Molle, Technical Dir.
Anti-Blocking Agents
Misc. Other Additives
Misc. Type Resins
Plasticizers
Surface Conditioners & Lubricants
Waxes

The Chemical Co.
19B Narragansett Ave.
Jamestown, RI 02835
Phone: (401) 423-3100
Fax: (401) 423-3102
Alcohols
Alkyd Resins
Flame and Smoke Retardants
Glycols
Maleic Resins
Melamine & Melamine Type Resins
Oleoresinous Varnishes
Phenolic Resins
Polyester Resins
Rosin Esters
Styrene Resins

Chemicals Incorporated
12321 Hatcherville Rd.
Baytown, TX 77520
Phone: (281) 576-5000
Fax: (281) 576-5712
E-Mail: emr@chemicalsinc.com
Ash Moza, President; Ernie Ramirez, Dir.
Sales/Marketing; Mahmoud Kheidec,
Technical Mgr.
Acrylic Resins
Adhesion Promoters
Antioxidants
Driers
Misc. Other Chemical Specialties
Oleoresinous Varnishes
Phenolic Resins
Styrene Resins



Ciba Specialty Chemicals Corp.
Pigments Div.
325 Water Street
Wilmington, DE 19804-2434
Phone: (302) 633-2000
Fax: (302) 996-2990

Jim Delaney
Blue Pigments
Dyes
Green Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Red Pigments
Yellow and Orange Pigments

Ciba Specialty Chemicals Corp.
Additives Div.
540 White Plains Rd.
P.O. Box 2005
Tarrytown, NY 10951
Phone: (914) 785-2000
Fax: (914) 785-4532
Anti-Rust Agents
Antioxidants
Catalysts
Corrosion Inhibitors
Light Stabilizers
Misc. Other Additives
Photocuring Materials/Photoinitiators
Preservatives
Stabilizers
UV Absorbers

SEE OUR ADS ON PAGES 43 & 45.

Cimbar Performance Minerals
25 Old River Rd. SE
P.O. Box 250
Cartersville, GA 30120
Phone: (770) 387-0319
Fax: (770) 386-6785
Albert Wilson, General Mgr.; James D.
Liner, Dir. Sales; Kenneth
Haagenson, Technical Sales Rep.; Mandy
Foote, Sales Rep.
Fillers-Natural, Cellulosic, Polymeric
Suspension Agents
Thickening Agents

For the latest in Federation

news, visit us on-line!

<http://www.coatingstech.org>





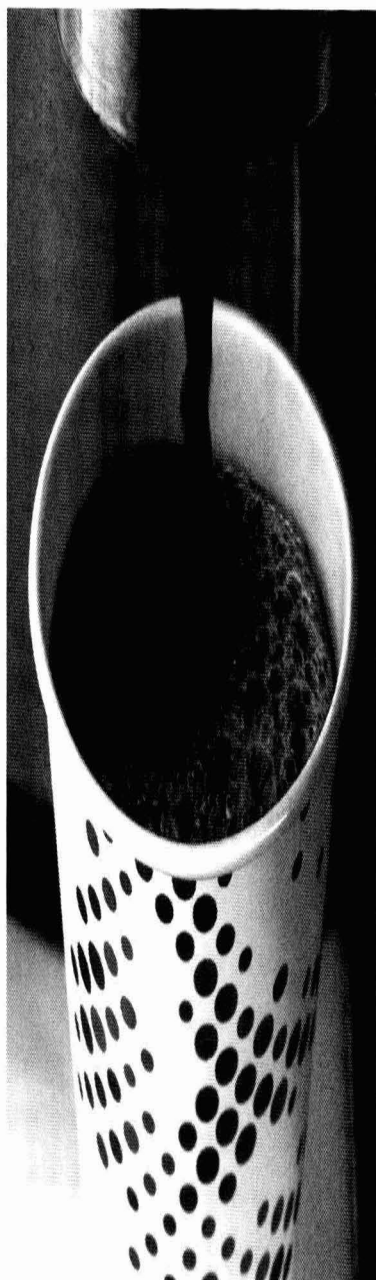
NO POSTAGE
NECESSARY
IF MAILED
IN THE
UNITED STATES

BUSINESS REPLY MAIL
FIRST-CLASS MAIL PERMIT NO. 28 DEER PARK, NY

POSTAGE WILL BE PAID BY ADDRESSEE

CIBA SPECIALTY CHEMICALS
ADDITIVES DIVISION
94 E JEFRYN BLVD STE C
DEER PARK NY 11729-9825





I like my coffee with
the sweet smell of success.
Send me detailed information.

Name

Title

Company

Address

City, State Zip

Telephone

Fax

JCT117



Smell the coffee — not the printing on the cup.

Irgacure® 2959 photoinitiator virtually eliminates odor of UV cured inks and coatings.

Irgacure 2959 is a highly reactive photoinitiator suitable for such UV curable systems as clear coatings, printing inks, adhesives and potting compounds. Since it does not produce benzaldehyde and may become incorporated in the polymer backbone, Irgacure 2959 cured films typically have very low odor, if any.

What's more, Irgacure 2959 keeps your printing as colorful and glossy as the

design calls for. All of which makes it an ideal photoinitiator for odor critical applications.

Best of all, because of increased efficiencies in our manufacturing processes, Ciba Additives can provide Irgacure 2959 photoinitiator at dramatically reduced prices — now and for the foreseeable future.

Use Irgacure 2959 in your curing operation. You can pause during your coffee break to smell the roses.

*For more information
call us at 1-800-881-8449*

Ciba Specialty Chemicals
USA

Additives
Imaging and Coating Additives
www.cibas.com



Value beyond chemistry

Clarence Resins & Chemicals, Inc.
8171 Main St.
Williamsville, NY 14221
Phone: (716) 632-6100
Fax: (716) 632-8706

Alkyd Resins
Bitumens
Black/Brown/Gray Pigments
Blue Pigments
Dyes
Epoxy Resins
Extender Pigments
Flow Control Agents
Glycol Ethers
Hydrocarbon Resins
Ink Additives
Iron Oxide Pigments
Maleic Resins
Misc. Type Resins
Misc. Viscosity, Suspension & Flow Control Agents
Natural Resins
Phenolic Resins
Plasticizers
Reclaimed Solvents
Rosin Esters
Stearates
Styrene Resins
Thickening Agents
White Pigments
Yellow and Orange Pigments

Clariant Corp.
Additives Div.
4000 Monroe Rd.
Charlotte, NC 28205
Phone: (704) 331-7035
Fax: (704) 377-1064
E-Mail: Joe—Webster@Clairant.com
Joe Webster, Technical Mgr., Additives
Antioxidants
Flame and Smoke Retardants
Light Stabilizers
UV Absorbers
Waxes

Cleveland Pigment & Color Co.
1680 E. Market St.
Akron, OH 44305
Phone: (330) 794-9977
Fax: (330) 794-6425
Kevin I. Hershfield, President; Patrick O'Connor, Sales Rep. (Ohio);
Black/Brown/Gray Pigments
Blue Pigments
Color Matching
Extender Pigments
Green Pigments
Iron Oxide Pigments
Other Pigments
Red Pigments
Yellow and Orange Pigments

Coldec Inc.
4141 Burns Rd.
Palm Beach Gardens, FL 33410
Phone: (561) 624-0077
Fax: (561) 624-3708
E-Mail: coldec@flinet.com
Terry Markham, V.P.
Paint Flake

Color Corporation of America
1215 Nelson Blvd.
Rockford, IL 61104
Phone: (815) 987-3777
Fax: (815) 964-0559
Dennis Dempsey, Dir. Sales & Marketing;
Jon Remissiong, Regional Sales Mgr.; Bob Colon, Regional Sales Mgr.; Mark Nelson, Dir. Technical Sales; Stephen Korenkiewicz, Technical Dir.
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

Columbian Chemicals Co.
1600 Parkwood Cir.
Atlanta, GA 30339
Phone: (770) 951-5700
Fax: (770) 951-5742
E-Mail: lthieman@phelpsd.com
Ted Reilly, Dr. Global Marketing, Industrial Carbon Black
Black/Brown/Gray Pigments

Composite Particles, Inc.
2330 26th St., SW
Allentown, PA 18103
Phone: (610) 791-9900
Fax: (610) 791-2486
Van J. Macomb, V.P. Marketing
Abrasives/Anti-Skid
Fillers-Natural, Cellulosic, Polymeric
Misc. Other Additives
Surface Conditioners & Lubricants
Texturizers

Composition Materials Co., Inc.
1375 Kings Hwy., E.
Fairfield, CT 06430
Phone: (203) 384-6111
Fax: (203) 335-9728
Alan K. Nudelman, President
Abrasives/Anti-Skid
Anti-Sagging Agents
Fillers-Natural, Cellulosic, Polymeric
Printing Ink Dispersants & Vehicles
Static Preventive

Condea Vista Co.
900 Threadneedle
Houston, TX 77079
Phone: (281) 588-3000
Fax: (281) 588-3119
E-Mail: dloughlin@cvcnet.com
Alcohols
Dispersing Agents & Surfactants
Misc. Solvents
Misc. Type Resins
Thickening Agents
Vinyl Resins

Consolidated Color Corp.
12316 E. Carson St.
Hawaiian Gardens, CA 90716
Phone: (562) 420-7714
Fax: (562) 425-2460
E-Mail: polychrome2@earthlink.net
Dana Harding, President; Glenn Wool, Sales Mgr.
Anti-Sagging Agents
Anti-Settling Agents
Dyes
Light Stabilizers
Misc. Other Additives
Misc. Other Chemical Specialties
Other Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
UV Absorbers

Continental Dispersions, Inc.
850 Hawthorne Ln.
West Chicago, IL 60185-1966
Phone: (630) 231-7000
Fax: (630) 231-7623
E-Mail: blackbases@aol.com
Black/Brown/Gray Pigments
Pigment Dispersions (Non-Aqueous)

Cookson Matthey Pigments & Dispersions
3333 Canal St.
Jacksonville, FL 32209
Phone: (904) 356-2080
Fax: (904) 356-1080
Larry Lane, Sales/Marketing Mgr.; Michael

McKenna, National Sales Rep.
Black/Brown/Gray Pigments
Blue Pigments
Driers
Green Pigments
Ink Additives
Iron Oxide Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Red Pigments
UV Absorbers
Waxes
Yellow and Orange Pigments



Cortec Corp.
4119 White Bear Pkwy.
St. Paul, MN 55110
Toll Free: (800) 4-CORTEC
Phone: (612) 429-1100
Fax: (612) 429-1122
E-Mail: info@cortecvci.com
Markus Bieber, Coatings Sales Mgr.
Corrosion Inhibitors
Water Treatment Chemicals
SEE OUR AD ON PAGE 120.

CPS Chemical Company, Inc.
123 White Oak Ln., P.O. Box 162
Old Bridge, NJ 08857
Phone: (732) 607-2700
Fax: (732) 607-2562
Howard Stevenson, Business Mgr.
Acrylic Resins
Epoxy Resins
Flocculants
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Viscosity, Suspension & Flow Control Agents
Monomers
Photocuring Materials/Photoinitiators
Reactive Diluents
Ultraviolet Curing Resins
Water Treatment Chemicals

CR Minerals Corp.
14142 Denver West Pkwy., Ste. 101
Golden, CO 80401
Toll Free: (800) 527-7315
Phone: (303) 278-1706
Fax: (303) 278-7729
Laura Banks, Dir., Sales Administration;
Arlen Cornett, Sr., V.P.
Extender Pigments

Crescent Bronze Powder Co., Inc.
3400 N. Avondale Ave.
Chicago, IL 60618-5432
Phone: (773) 539-2441
Toll Free: (800) 445-6810
Fax: (773) 539-1131
Monte Lazarus, President; Stephen M. Fuglsang, V.P.
Metallic Flakes and Powdered Pigments
Other Pigments

Crosfield Company
101 Ingalls Ave.
Joliet, IL 60435
Phone: (815) 727-3651
Fax: (815) 727-5312
Todd Ryne, Business Mgr., Surface Coatings
Anti-Blocking Agents
Flattening Agents

CVC Specialty Chemicals, Inc.
2980 Rt. 73 North
Maple Shade, NJ 08052
Phone: (609) 482-0800
Fax: (609) 667-8270
John Cech, General Mgr.
Epoxy Resins
Reactive Diluents

CYRO, Inc.
100 Enterprise Dr., 7th Fl.
Rockaway, NJ 07866
Phone: (201) 442-6000
Fax: (201) 442-6117
Dolores Artz
Acrylic Resins

Cytec Industries, Inc.
Five Garret Mountain Plaza
West Paterson, NJ 07424
Phone: (201) 357-3469
Fax: (201) 357-3055

Adhesion Promoters
Alkyd Resins
Amino Resins
Antioxidants
Catalysts
Corrosion Inhibitors
Dispersing Agents & Surfactants
Epoxy Resins
Flame and Smoke Retardants
Flocculants
Flow Control Agents
High-Solid Resins
Ink Additives
Light Stabilizers
Melamine & Melamine Type Resins
Misc. Other Additives
Monomers
Phenolic Resins
Polyamide Resins
Printing Ink Dispersants & Vehicles
Stabilizers
Static Preventive
Urethane & Polyurethane Resins
UV Absorbers
Water Treatment Chemicals

D

Daicolor-Pope, Inc.
33 Sixth Ave.
Paterson, NJ 07524
Phone: (201) 278-5120
Fax: (201) 279-1256
E-Mail: daicolor@aol.com
Norman H. Russo, Sr. V.P.; M. Kondo,
National Sales Mgr.
Black/Brown/Gray Pigments
Blue Pigments
Dyes
Green Pigments
Other Pigments
Pigment Dispersions (Aqueous)
Red Pigments
White Pigments
Yellow and Orange Pigments

Daniel Products Co., Inc.
400 Claremont Ave.
Jersey City, NJ 07304
Phone: (201) 432-0800
Fax: (201) 432-0226
Martin L. Feldman, V.P. Marketing; Michael
C. Frantz, V.P. Sales
Anti-Foaming Agents
Anti-Settling Agents
Bodifying Agents
Dispersing Agents & Surfactants

Driers
Flattening Agents
Flow Control Agents
Ink Additives
Misc. Other Additives
Misc. Viscosity, Suspension & Flow Control Agents
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Printing Ink Dispersants & Vehicles
Surface Conditioners & Lubricants
Thickening Agents
UV Absorbers
Waxes

Daubert Chemical Co., Inc.
4700 S. Central Ave.
Chicago, IL 60638
Phone: (708) 496-7350
Fax: (708) 496-7367
Mike Dwyer, President; Dick Bramwell, Dir.
Sales; Glenn Bilek, Dir. Business Devel.
Epoxy Resins

Day-Glo Color Corp.
4515 St. Clair Ave.
Cleveland, OH 44103
Toll Free: (800) 4-DAY-GLO
Phone: (216) 391-7070
Fax: (216) 391-7751
E-Mail: dayglo@dayglo.com
Jon Aber, Marketing Mgr.

Dyes
Other Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Varnishes

Degen Oil and Chemical
200 Kellogg St.
Jersey City, NJ 07305
Phone: (201) 432-1192
Fax: (201) 432-8483
E-Mail: degen@eclipse.net
Paul Varga, V.P.; Felipe Martin, V.P.

Alkyd Resins
Ink Additives
Linseed
Marine
Oleoresinous Varnishes
Plasticizers
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Soybean
Synthetic & Modified Oils
Tung Oil

Degussa

Degussa Corp.
65 Challenger Rd.
Ridgefield Park, NJ 07660
Anti-Blocking Agents
Anti-Foaming Agents
Anti-Settling Agents
Black/Brown/Gray Pigments
Blue Pigments
Catalysts
Flattening Agents
Flow Control Agents
Metallic Flakes and Powdered Pigments
Misc. Other Chemical Specialties
Misc. Viscosity, Suspension & Flow Control

Agents
Monomers
Thickening Agents
UV Absorbers
Water Repellents-Silicone, Corrosion Inhibitors

SEE OUR AD ON PAGE 49.

Delta Colours
5060 N. Royal Atlanta Dr., #22
Tucker, GA 30084
Toll Free: (800) 886-6981
Fax: (770) 934-4376
E-Mail: abelouw@aol.com
Shawn Hays, President; Abe Louw, General
Mgr.

Blue Pigments
Corrosion-Inhibiting Pigments
Green Pigments
Iron Oxide Pigments
Red Pigments
White Pigments
Yellow and Orange Pigments

Dexter Chemical Corp.
845 Edgewater Rd.
Bronx, NY 10474
Phone: (718) 542-7700
Fax: (718) 991-7684
Sheldon W. Goldstein, V.P., Industrial
Chemicals Div.
Anti-Rust Agents
Dispersing Agents & Surfactants

Dianal America Inc.
9675 Bayport Blvd.
Pasadena, TX 77507
Phone: (281) 474-7777
Fax: (281) 474-2757
Shoichi Usui, Executive V.P.; Gary
Warehime, Mgr., New Business Devel.
Acrylic Resins

Dock Resins Corp.
1512 W. Elizabeth Ave.
Linden, NJ 07036
Phone: (908) 862-2351
Fax: (908) 862-4015
A. Wayne Tamarelli, Chairman; Philip I.
Barbanel, President; Joseph Barbanel,
General Mgr.; Jeffrey M. McKeon, Dir. Sales

Acrylic Resins
Alkyd Resins
Amino Resins
Epoxy Hardeners-Chemicals
High-Solid Resins
Hybrid Resins
Misc. Type Resins
Printing Ink Dispersants & Vehicles
Styrene Resins
Urethane & Polyurethane Resins



Dominion Colour Corporation
Working Together For Quality

Dominion Colour Corporation
1800 Ironstone Manor, Unit 2
Pickering, Ont. L1W 3J9
Canada
Phone: (905) 837-4000
Fax: (905) 837-2859
Jeff Cox, V.P., Marketing; Steve
McFarlane, V.P., Sales
Pigment Dispersions (Aqueous)
Red Pigments
Yellow and Orange Pigments

SEE OUR AD ON PAGE 143.

Dover Chemical Corp.
3676 David Rd., NW
Dover, OH 44622

Phone: (330) 343-7711
 Fax: (330) 364-1579
 Dave Schlarb, Marketing Mgr.; Jim MacNeil, Technical Mgr.; Jim Giammarco, Marketing Mgr.

Adhesion Promoters
 Antioxidants
 Corrosion Inhibitors
 Flame and Smoke Retardants
 Ink Additives
 Misc. Other Chemical Specialties

The Dow Chemical Co.
 Emulsions Polymers Div.
 2040 Dow Center
 Midland, MI 48674
 Toll Free: (800) 447-4369
 Acrylic Resins
 Styrene Resins

Dow Corning Corp.
 P.O. Box 0994
 Midland, MI 48686-0997
 Toll Free: (800) 252-9899
 Fax: (517) 496-4586
 E-Mail: inquiry@concentric.net
 Customer Service Dept.

Adhesion Promoters
 Anti-Blocking Agents
 Anti-Floating Agents
 Anti-Foaming Agents
 Anti-Rust Agents
 Catalysts
 Dispersing Agents & Surfactants
 Ink Additives
 Silanes
 Silicone Resins
 Static Preventive
 Surface Conditioners & Lubricants
 Varnishes
 Water Repellents-Silicone, Corrosion Inhibitors

Dry Branch Kaolin Company
 Route #1, Box 468-D
 Dry Branch, GA 31020
 Phone: (912) 750-3500
 Fax: (912) 746-0217
 Extender Pigments

DSM Resins U.S., Inc.
 Augusta Riverfront Ctr-Ste. 580
 One 10th St.
 Augusta, GA 30901
 Phone: (706) 849-6717
 Fax: (706) 849-6777
 Richard M. Sligh, President; Levonne Burnett, Customer Service Coordinator; Stewart McKenzie, Sales Mgr.; Steve Jenkins, Wet Resins Acct. Exec.; Manuel Tyler, Tech. Service Mgr.

Amino Resins
 Epoxy Resins
 High-Solid Resins
 Misc. Type Resins
 Phenolic Resins
 Polyester Resins
 TGIC Resins
 Ultraviolet Curing Resins
 Water-Thinned Resins



DuPont, Specialty Chemicals
 Chambers Works
 Deepwater, NJ 08023
 Phone: (609) 540-2158
 Fax: (609) 540-3886

E-Mail: charles.k.taylor@usa.dupont.com
 John Longoria, Tech. Service Eng.;
 Charlie Taylor, Sr. Tech. Service Assoc.
 Anti-Blocking Agents
 Dispersing Agents & Surfactants
 Ink Additives

SEE OUR AD ON PAGE 114.

DUR-O-Lite
 CBC Paints and Coatings
 3661 Meadville Dr.
 Sherman Oaks, CA 91403
 Phone: (818) 789-3872

Charles Below
 Anti-Sagging Agents
 Extender Pigments
 Fillers-Natural, Cellulosic, Polymeric
 Flame and Smoke Retardants
 Flattening Agents
 Homogenizers
 Misc. Viscosity, Suspension and Flow Control Agents
 Suspension Agents
 Texturizers
 Thickening Agents
 UV Absorbers
 White Pigments

Dynamic Color Solutions, Inc.
 2024 S. Lenox St.
 Milwaukee, WI 53207
 Phone: (414) 769-2580
 Fax: (414) 769-2585
 Cathy Higgins, V.P. Sales & Marketing; Jim Crawford, President
 Iron Oxide Pigments

E

Eagle Zinc Co.
 30 Rockefeller Center, Ste. 2825
 New York, NY 10112
 Phone: (212) 582-0420
 Fax: (212) 582-3412
 Allen S. Perl, V.P.
 Anti-Rust Agents
 Corrosion-Inhibiting Pigments
 Metallic Flakes and Powdered Pigments
 Preservatives
 White Pigments
 Yellow and Orange Pigments

Eastman Chemical Co.
 Coatings, Inks, Resins Divs.
 P.O. Box 431
 Kingsport, TN 37662
 Phone: (423) 229-1212
 Fax: (423) 229-1194
 Acids (Non-Fatty)
 Adhesion Promoters
 Alcohols
 Anti-Foaming Agents
 Anti-Sagging Agents
 Antioxidants
 Cellulose Derivatives
 Coalescing Agents
 Denatured Ethyl Alcohols
 Dispersing Agents & Surfactants
 Esters
 Flow Control Agents
 Glycol Ethers
 Glycols
 Ink Additives
 Ketones
 Misc. Other Chemical Specialties
 Plasticizers

Surface Conditioners & Lubricants
 Thickening Agents
 UV Absorbers
 Waxes

Ebonex Corporation
 2380 S. Wabash
 P.O. Box 3247
 Melvindale, MI 48122
 Phone: (313) 388-0060
 Fax: (313) 388-6495
 Web: www.ebonex.com
 Black/Brown/Gray Pigments
 Pigment Dispersions (Aqueous)

ECC International
 100 Mansell Court, E., Ste. 300
 Roswell, GA 30076
 Phone: (770) 594-6660
 Fax: (770) 645-3384
 Mark Gillespie, Market Mgr.
 Extender Pigments

Echo Resins and Laboratory
 Rt. 3
 Box 359
 Versailles, MO 65084
 Phone: (573) 378-5565
 Ultraviolet Curing Resins

Eckart America
 72 Corwin Dr.
 Painesville, OH 44077
 Phone: (440) 354-0400
 Fax: (440) 354-6224
 Metallic Flakes and Powdered Pigment

Electro Abrasives Corp.
 701 Willet Rd.
 Buffalo, NY 14218
 Phone: (716) 822-2500
 Fax: (716) 822-2858
 E-Mail: eacorp@fcs-net.com
 Allan Ramming
 Abrasives/Anti-Skid
 Flame and Smoke Retardants

Elf ATOCHEM North America, Inc.
 2000 Market St.
 Philadelphia, PA 19103-3222
 Toll Free: (800) 225-7788
 Phone: (215) 419-7000
 Fax: (215) 419-7930
 Web: www.elf-atochem.com
 Gerry Gimbarski

Adhesion Promoters
 Alcohols
 Amine Neutralizers
 Anti-Rust Agents
 Castor Oil (Dehydrated)
 Catalysts
 Caustics and Caustic Sodas
 Corrosion Inhibitors
 Dispersing Agents & Surfactants
 Flame and Smoke Retardants
 Flattening Agents
 Ink Additives
 Linseed
 Maleic Resins
 Methacrylic Monomers and Polymers
 Monomers
 Polyamide Resins
 Polybutadienes
 Polyester Resins
 Preservatives
 Printing Ink Dispersants & Vehicles
 Reactive Diluents
 Stabilizers
 Styrene Resins
 Texturizers



EM Industries, Inc.
7 Skyline Dr.
Hawthorne, NY 10532
Toll Free: (888) EM-PEARL
Phone: (914) 592-4660
Fax: (914) 592-9469
Aram Terzian, Dir. Sales; Suzanne Bernardi,
Dir. Market Development
Other Pigments

SEE OUR AD ON PAGE 137.

Empire State Varnish Co., Inc.
 38 Varick St.
 Brooklyn, NY 11222
 Phone: (718) 388-5450
 Fax: (718) 388-6385
 Richard Stark, President; Robert Stark, V.P.,
 Sidney J. Rubin, Customer Service &
 Technical Sales
 Alkyd Resins
 Boding Agents
 Epoxy Resins
 Ester Gums
 Hydrocarbon Resins
 Linseed
 Marine
 Oleoresinous Varnishes
 Thickening Agents
 Urethane & Polyurethane Resins
 Varnishes

EMS-American Grilon, Inc.
 Coatings Resins & Additives
 2060 Corporate Way
 P.O. Box 1717
 Sumter, SC 29151-1717
 Phone: (803) 481-6193
 Fax: (803) 481-6191
 Tammy S. Parker, Sales Mgr., N.A.-
 Coatings Resins & Additives
 Misc. Other Additives
 Misc. Other Chemical Specialties

Engelhard Corp.
 Performance Additives
 101 Wood Ave.
 Iselin, NJ 08830-0770
 Phone: (732) 205-5000
 E-Mail: jerry.korte@engelhard.com
 Jerry R. Korte, Sr. Product Specialist
 Extender Pigments

Engelhard Corp.
 Pigments & Additives Group
 101 Wood Ave., CN-770
 Iselin, NJ 08830
 Phone: (732) 205-5000
 Fax: (732) 321-0250
 Web: www.Engelhard.com
 Engelhard Information Center
 Anti-Blocking Agents
 Anti-Floating Agents
 Anti-Sagging Agents
 Anti-Settling Agents
 Black/Brown/Gray Pigments
 Blue Pigments
 Boding Agents
 Catalysts
 Dispersing Agents & Surfactants
 Extender Pigments
 Fillers-Natural, Cellulosic, Polymeric
 Green Pigments

Ink Additives
 Iron Oxide Pigments
 Other Pigments
 Pigment Dispersions (Aqueous)
 Pigment Dispersions (Non-Aqueous)
 Red Pigments
 Stabilizers
 Suspension Agents
 Thickening Agents
 UV Absorbers
 White Pigments
 Yellow and Orange Pigments

Engineered Polymer Solutions, Inc.
 1400 N. State St.
 Marengo, IL 60152
 Toll Free: (800) 654-4242
 Fax: (815) 568-4145
 Steve Lindberg, President; Chuck Piske,
 National Sales Mgr.; Bruce Johnson,
 Technical Dir.; Ken Stewart, Operations
 Mgr.

Acrylic Resins
 Alkyd Resins
 Epoxy Resins
 High-Solid Resins
 Misc. Type Resins
 Oleoresinous Resins
 Polyester Resins
 Styrene Resins
 Vinyl Resins
 Water-Thinned Resins

Estron Chemical, Inc.
 Highway #95
 Calvert City, KY 42029
 Phone: (502) 395-4195
 Fax: (502) 395-5070
 Alexander Skora, V.P. Marketing; Roger
 Luthenauer, Sales Mgr.
 Acrylic Resins
 Adhesion Promoters
 Anti-Foaming Agents
 Catalysts
 Dispersing Agents & Surfactants
 Epoxy Hardeners-Chemicals
 Flattening Agents
 Flow Control Agents
 Ink Additives
 Misc. Viscosity, Suspension and Flow Control
 Agents
 Monomers
 Polyester Resins
 Waxes

Exxon Chemical Co.
 13501 Katy Freeway
 P.O. Box 3272
 Houston, TX 77253
 Technical Support (800) 361-7961; Orders
 (800) 231-6633
 Acids (Non-Fatty)
 Adhesion Promoters
 Alcohols
 Aliphatic Hydrocarbons
 Anti-Foaming Agents
 Anti-Skinning Agents

From Degussa Worldwide...

- AEROSIL® Fumed Silica
 - Hydrophobic Silicas
 - Hydrophilic Silicas
- Carbon Blacks
 - Channel-Type Blacks
 - Furnace Blacks
 - Lamp Blacks
- ACEMATT™ Flattening Agents
- Metallic Oxides
- Precipitated Silicas
 - Hydrophobic Silicas
 - Hydrophilic Silicas
- Silanes

Degussa

Degussa
Corporation

DCPS-0028-R1

65 Challenger Road
 Ridgefield Park, NJ 07660
 (201) 641-6100
 (201) 641-0297 fax
<http://www.degussa.com>

Circle No. 236 on the Reader Service Card

Aromatic Hydrocarbons
Coalescing Agents
Custom Solvent Blending
Dispersing Agents & Surfactants
Esters
Flame and Smoke Retardants
Freeze Thaw Stabilizers
Hydrocarbon Solvents
Ink Additives
Ketones
Masking Agents
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Solvents
Monomers
Plasticizers
Printing Ink Dispersants & Vehicles
Reactive Diluents

F

Farboil Co.
8200 Fischer Rd.
Baltimore, MD 21222-3609
Phone: (410) 477-8200
Fax: (410) 477-8995
Epoxy Resins
Hybrid Resins
Polyester Resins
TGIC Resins
Urethane & Polyurethane Resins

Ferro Corp.
4150 E. 56th St.
P.O. Box 6550
Cleveland, OH 44101
Phone: (216) 641-8580
Fax: (216) 641-8831
E-Mail: sarvish@ferro.com
H.E. Sarvish, Sales & Marketing Mgr.
Black/Brown/Gray Pigments
Blue Pigments
Green Pigments
Red Pigments
Yellow and Orange Pigments

Floridin Company
Div. of ITC Industrials
P.O. Box 410
Quincy, FL 32353
Phone: (850) 875-4161
Fax: (850) 875-8291
E-Mail: floridin@polaris.net
David L. Ruff, Business Mgr.
Anti-Sagging Agents
Anti-Settling Agents
Fillers-Natural, Cellulosic, Polymeric
Misc. Viscosity, Suspension and Flow Control
Agents
Suspension Agents
Texturizers
Thickening Agents

Fillite North America, Inc.
1065 Westwell Run
Alpharetta, GA 30202
Phone: (770) 569-8535
Fax: (770) 569-8565

Focus Chemical Corp.
875 Greenland Rd.
B9 Orchard Park
Portsmouth, NH 03801-4122
Phone: (603) 430-9802
Fax: (603) 431-5390
E-Mail: focuschm@nh.ultranet.com
Donald R. Derby, Sales Mgr.
Hydrocarbon Resins
Phenolic Resins

Polybutadienes
Rosin Esters
Urethane & Polyurethane Resins



Franklin Industrial Minerals
612 10th Ave. N
Nashville, TN 37203
Toll Free: (800) 626-8147
Fax: (615) 726-2693
Heather Heithcock, Adm. Asst.
Extender Pigments

SEE OUR AD ON OPPOSITE PAGE.

Freiborne-Ciarlone, Inc.
15 Silverdome Industrial Park
Pontiac, MI 48342
Phone: (810) 333-2490
Fax: (810) 333-2492
Joseph G. Ciarlone, President
Molten Salts
Surface Conditioners & Lubricants

Fuji Silysia Chemical, Ltd.
121 SW Morrison St., Ste. 865
Portland, OR 97204
Toll Free: (800) 795-9742
Phone: (503) 295-1933
Fax: (800) 295-1933
Tom Brachowski, Technical Rep.; Matt Peterson, Technical Rep.; Brad Schmitt, Technical Rep.
Anti-Blocking Agents
Extender Pigments
Flattening Agents

H.B. Fuller Co.
3530 N. Lexington Ave.
St. Paul, MN 55126
Phone: (612) 481-1835
Fax: (612) 481-1804
Tom Kuzara, Industry Mgr.
Acrylic Resins
Misc. Type Resins
Styrene Resins
Urethane & Polyurethane Resins
Vinyl Resins

G

Garrison Industries, Inc.
214 N. Washington Ave., Ste. 424
El Dorado, AR 71730
Phone: (501) 862-5692
Fax: (501) 881-5010
Jim Hargis, V.P. & Marketing; Jeff Garrison, Marketing
Services/ Western Sales Rep.
UV Absorbers

GCA Corp.
916 13th St., W.
Bradenton, FL 34205
Phone: (941) 748-6090
Fax: (941) 748-0194
Graham W. Wright, President
Epoxy Resins
TGIC Resins

General Carbon Co.
7542 Maie Ave.
Los Angeles, CA 90001-2637
Phone: (213) 588-9291
Fax: (213) 588-0220
Julio Negrete
Black/Brown/Gray Pigments

Genesis Dispersions Inc.
3088 W. 106th St.
Cleveland, OH 44111
Phone: (216) 671-1500
Fax: (216) 671-1510
Timothy T. Polgar, President; David Williams, CPA-Controller
Pigment Dispersions (Aqueous)



Genesee Polymers Corp.
G-5251 Fenton Rd.
P.O. Box 7047
Flint, MI 48507
Phone: (810) 238-4966
Fax: (810) 767-3016
E-Mail: ipiskoit@compuserve.com

Amino Resins
Anti-Foaming Agents
Anti-Rust Agents
Dispersing Agents & Surfactants
Epoxy Resins
Ink Additives
Methacrylic Monomers & Polymers
Misc. Other Chemical Specialties
Misc. Type Resins
Monomers
Printing Ink Dispersants & Vehicles
Silicone Resins
Surface Conditioners & Lubricants
Vinyl Resins
Water Repellents—Silicone, Corrosion Inhibitors
Waxes

SEE OUR AD ON COVER 4.

Georgia Marble Co.
1201 Roberts Blvd., Bldg. 100
Kennesaw, GA 30144-3619
Phone: (770) 421-6500
Fax: (770) 421-6507
Brian Truitt, National Sales Mgr.
Fillers-Natural, Cellulosic, Polymeric

Georgia-Pacific Resins, Inc.
55 Park Place, 19th Floor
Atlanta, GA 30303
Phone: (404) 652-8617
Fax: (404) 230-7478
Rich Stregowski, Marketing Mgr., Coatings; Loren Filion, Customer Service Mgr.; Caryn King, Market Communication Mgr.
Fatty Acids
High-Solid Resins
Phenolic Resins
Rosin Esters
Rosin Salts
Water-Thinned Resins

GFI, Inc.
111 Boston Post Rd.
Sudbury, MA 01776

Improve your coatings with MICA

Your barrier against the elements

Mica-reinforced coatings are tougher, more durable systems with better color retention and longer service life.

A REINFORCING BARRIER

Mica is a unique mineral that can be delaminated into thin sheets that are remarkably resilient, dielectric, and chemically resistant. Tiny mica flakes orient in layers parallel to the substrate mechanically reinforcing paint film and forming a barrier from the elements. This tough mica barrier improves resistance to moisture, heat, light, and chemicals.

IMPROVED PERFORMANCE

Coating formulations that include 1/4 to 1/2 pound of mica per gallon have demonstrated improved weatherability, greater corrosion resistance, reduced cracking and checking, improved film adhesion, and longer film life.

Mica is a hydrophilic additive that is easily mixed and stays uniformly dispersed in aqueous and oleoresinous formulations. By controlling variables like particle size distribution, grinding method, mineral feedstock, and in some cases, surface treatment we can engineer a mica product that exactly meets your coating needs.

THE LEADERS IN MICA

When it comes to mica, no other company comes close. Franklin Industrial Minerals is a market leader that has a reputation for supplying unsurpassed quality products for virtually all mica applications.

Franklin Industrial Minerals offers the broadest line of mica products tailored to meet your specific needs. Over 50 mica products are available for shipment from North Carolina and New Mexico locations. Stocking distributors throughout the US and Canada.

For more information on improving your coatings with mica call 1-800-290-2443.

Franklin Industrial Minerals
P.O. Box 729
1469 South Battleground Avenue
Kings Mountain, NC 28086
Telephone: (704) 734-3550
Fax: (704) 739-7888



FRANKLIN INDUSTRIAL MINERALS

Performance Minerals for Industry

Phone: (508) 443-3674

Fax: (508) 443-5714

Fred George, Business Mgr.

Alcohols
Caustics and Caustic Sodas
Chlorinated Solvents
Dispersing Agents & Surfactants
Glycerine
Glycol Ethers
Glycols
Ketones
Misc. Other Chemical Specialties

BFGoodrich Co.

Coatings Div.

9911 Brecksville Rd.

Cleveland, OH 44141

Phone: (216) 447-5000

Fax: (216) 447-5770

John J. Falsone, Senior Marketing Mgr.; Jim

Papenfuss, Marketing Mgr.

Acrylic Resins
Anti-Foaming Agents
Dispersing Agents & Surfactants
Ink Additives
Misc. Type Resins
Misc. Viscosity, Suspension and Flow Control Agents

Agents

Oleoresinous Varnishes
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Styrene Resins
Surface Conditioners & Lubricants
Thickening Agents
Urethane & Polyurethane Resins
Urethane Lacquers
Vinyl Chloride & Vinylidene Chloride Polymer

Emulsions

Vinyl Resins
Water-Thinned Resins
Waxes

The Goodyear Tire & Rubber Co.

Chemical Div.

1452 E. Archwood Ave.

Akron, OH 44306-3299

Phone: (330) 796-7300

Fax: (330) 796-4910

E-Mail: acallahan@goodyear.com

Amy Callahan, Sales Rep.

Acrylic Resins
Hydrocarbon Resins
Styrene Resins

W.R. Grace, Davison Div.

P.O. Box 2117

Baltimore, MD 21203

Phone: (410) 659-9000

Fax: (410) 659-9213

Flattening Agents

Graden Chemical Co., Inc.

426 Bryan St.

Havertown, PA 19083

Phone: (610) 449-3808

Fax: (610) 449-9595

Anti-Foaming Agents
Dispersing Agents & Surfactants
Flocculants
Stearates

Guthrie Latex, Inc.

7400 N. Oracle Rd., Ste. 330

Tucson, AZ 85704

Phone: (520) 742-3087

Fax: (520) 575-0511

E-Mail: guthrie@primenet.com

Jonathan Wilt, Product Mgr.

Misc. Other Additives

H



Halox

1326 Summer St.

Hammond, IN 46320

Phone: (219) 933-1560

Fax: (219) 933-1570

E-Mail: halox@jorsm.com

Anti-Rust Agents
Corrosion Inhibitors
Corrosion-Inhibiting Pigments

SEE OUR AD ON OPPOSITE PAGE.

Hampshire Chemical Corp.

55 Hayden Ave.

Lexington, MA 02173

Phone: (617) 861-9700

Fax: (617) 861-0135

Frederick Drauschke, Product Technical

Specialist; Ann Schoen, Product Mgr.

Dispersing Agents & Surfactants
Styrene Resins
Vinyl Chloride & Vinylidene Chloride Polymer
Emulsions
Vinyl Resins

Harborlite Corp.

c/o World Minerals, Inc.

P.O. Box 519

Lompoc, CA 93438

Toll Free: (800) 342-8667

Fax: (805) 735-5699

Customer Service Dept.

Extender Pigments

Harcros Pigments Inc.

11 Executive Dr., Ste. 1

Fairview Heights, IL 62208

Phone: (618) 628-2300

Black/Brown/Gray Pigments
Blue Pigments
Extender Pigments
Green Pigments
Iron Oxide Pigments

Hardman, a Div. of the Harcross

Chemical, Inc.

600 Cortlandt St.

Belleville, NJ 07109

Phone: (973) 751-3000

Fax: (973) 751-8407

Epoxy Hardeners-Chemicals
Epoxy Resins
Urethane & Polyurethane Resins

Heatbath Corp.

P.O. Box 2978

Springfield, MA 01102-2978

Phone: (413) 543-3381

Fax: (413) 543-2378

Tom Walen, Marketing Mgr.

Anti-Rust Agents
Corrosion Inhibitors
Misc. Other Chemical Specialties

Henkel

Henkel Corp.

300 Brookside Ave.

Ambler, PA 19002

Phone: (215) 628-1152

Fax: (215) 628-1111

Dave W. Brown, Market Mgr., Architectural Additives, Coatings & Inks Div.

Anti-Blocking Agents
Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Anti-Rust Agents
Anti-Sagging Agents
Anti-Settling Agents
Bodifying Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Epoxy Hardeners-Chemicals
Epoxy Resins
Ester Gums
Fatty Acids
Flow Control Agents
Glycerine
Ink Additives
Misc. Other Additives
Misc. Viscosity, Suspension and Flow Control Agents
Monomers
Photocuring Materials/Photoinitiators
Plasticizers
Preservatives
Printing Ink Dispersants & Vehicles
Reactive Diluents
Stabilizers
Static Preventive
Stearates
Suspension Agents
Thickening Agents
Water Repellents-Silicone, Corrosion Inhibitors

SEE OUR AD ON PAGE 63.

HERCULES



Hercules Incorporated

Aqualon Div.

1313 N. Market St.

Wilmington, DE 19894-0001

Phone: (302) 594-5000

Fax: (302) 594-6660

Claude Lajoie, Sales Mgr., Western Region & Latin America; Jeffrey Wolff, Sales Mgr., Eastern Region

Cellulose Derivatives
Flow Control Agents
Ink Additives
Misc. Viscosity, Suspension and Flow Control Agents
Nitrocellulose
Suspension Agents
Thickening Agents

SEE OUR AD ON PAGE 119.

**DO YOU NEED A DEFOAMER TO FIX
YOUR PAINT AFTER ADDING A FLASH
RUST INHIBITOR?**



COMPETITOR "A"



FLASH-X

NOT WITH HALOX® FLASH-X!

LOW FOAM • LOW ODOR • LIQUID FLASH RUST INHIBITOR

EXCELLENT PERFORMANCE ON VARIETY OF SUBSTRATES

Contact HALOX® today for more information or to find a distributor near you!

HALOX® 1326 Summer Street, Hammond, IN 46320 USA

phone: (219)933-1560 FAX: (219)933-1570

Visit our web page at: <http://www.halox.com> Or e-mail us at: halox@jorsm.com



Heucotech Ltd.
A N.J. Limited Partnership
99 Newbold Rd.
Fairless Hills, PA 19030
Phone: (215) 736-0712
Fax: (215) 736-0652
Donald McBride, V.P. Sales/Marketing;
Herbert Zaborsky, Market Mgr.,
Coatings
 Black/Brown/Gray Pigments
 Blue Pigments
 Corrosion-Inhibiting Pigments
 Green Pigments
 Iron Oxide Pigments
 Pigment Dispersions (Aqueous)
 Red Pigments
 Yellow and Orange Pigments
SEE OUR AD ON PAGES 33-34.

Hilton Davis Co.
 2235 Langdon Farm Rd.
 Cincinnati, OH 45237-4790
 Phone: (513) 841-4000
 Fax: (513) 841-3771

Hi-Mar Specialties, Inc.
 1955 Lake Park Dr., Ste. 250
 Smyrna, GA 30080
 Toll Free: (800) 449-1204
 Fax: (770) 801-1586
 Warren F. Jones, President; Carl H. Talbot,
 V.P. Sales & Marketing
 Anti-Foaming Agents
 Dispersing Agents & Surfactants

Hitox Corp. of America
 P.O. Box 2544
 Corpus Christi, TX 78403-2544
 Phone: (512) 883-5591
 Fax: (512) 883-7619

Roger Padden, National Sales Mgr.;
 Douglas Funk, Sales; Thomas A.
 Landshof, President & CEO
 Black/Brown/Gray Pigments
 Blue Pigments
 Extender Pigments
 Flame and Smoke Retardants
 Green Pigments
 Iron Oxide Pigments
 Other Pigments
 Red Pigments
 White Pigments
 Yellow and Orange Pigments

O. Hommel Co.
 235 Hope St.
 Carnegie, PA 15106
 Phone: (412) 279-0700
 Fax: (412) 279-1213
 Robert Prunchak, Mgr., Engineering/Quality;
 William R. Hoover, Materials Mgr.
 Black/Brown/Gray Pigments
 Blue Pigments
 Green Pigments
 Pigment Dispersions (Non-Aqueous)

Hoover Color Corp.
 P.O. Box 218
 State Highway 693
 Hiwassee, VA 24347
 Phone: (540) 980-7233
 Fax: (540) 980-8781
 Steve Haimann, Technical Sales Mgr.;

Charles Hoover, Jr., Chief Operating
 Officer
 Black/Brown/Gray Pigments
 Dyes
 Green Pigments
 Iron Oxide Pigments
 Yellow and Orange Pigments

Hubbard-Hall, Inc.
 563 S. Leonard St.
 Waterbury, CT 06208
 Phone: (203) 756-5521
 Fax: (203) 596-9544
 Bob Farrell, Technical Dir.; Gerry
 Mastropietro, Sales Mgr.
 Acids (Non-Fatty)
 Alcohols
 Aliphatic Hydrocarbons
 Anti-Rust Agents
 Aromatic Hydrocarbons
 Caustics and Caustic Sodas
 Chlorinated Solvents
 Corrosion Inhibitors
 Custom Solvent Blending
 Denatured Ethyl Alcohols
 Esters
 Fatty Acids
 Glycol Ethers
 Glycols
 Hydrocarbon Solvents
 Misc. Solvents
 Reclaimed Solvents
 Water Treatment Chemicals

J.M. Huber Corp.
 Engineered Minerals Div.
 One Huber Rd.
 Macon, GA 31298
 Phone: (912) 745-4751
 Fax: (912) 750-5485
 E-Mail: hbtaa@huber.com
 Tom Anderskow, Business Dir., Coatings/
 Ink
 Extender Pigments
 Fillers-Natural, Cellulosic, Polymeric
 Flame and Smoke Retardants
 Flattening Agents
 Ink Additives



Hüls America Inc.
220 Davidson Ave.
Somerset, NJ 08873
Phone: (732) 560-6800
Adhesion Promoters
Anti-Floating Agents
Anti-Foaming Agents
Anti-Rust Agents
Anti-Sagging Agents
Anti-Settling Agents
Anti-Skinning Agents
Bodying Agents
Catalysts
Coalescing Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Driers
Epoxy Hardeners-Chemicals
Fillers-Natural, Cellulosic, Polymeric
Flattening Agents
Flocculants
Methacrylic Monomers and Polymers
Misc. Viscosity, Suspension and Flow
Control Agents
Monomers
Other Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

Polyamide Resins
Polyester Resins
Preservatives
Silanes
Thickening Agents
Urethane Crosslinkers
Water Repellents-Silicone, Corrosion
Inhibitors
Waxes
SEE OUR ADS ON COVER 2, PAGES 55 & 106

Huntsman Corp.
 30400 Post Oak Blvd.
 Houston, TX 77056
 Phone: (713) 235-6000
 Fax: (713) 235-6437

ICI Polyurethanes
 6555 Fifteen Mile Rd.
 Sterling Heights, MI 48312
 Phone: (810) 826-7660
 Fax: (810) 826-7733
 Michelle J. Schroeder, Industry Marketing
 Specialist; Bernie DiPietrantonio, Sales Mgr
 Urethane & Polyurethane Resins

ICI Surfactants
 3411 Silverside Rd.
 Bedford-2
 Wilmington, DE 19850
 Phone: (302) 887-1066
 Fax: (302) 887-3525

Industrial Copolymers Ltd.
 Primrose Hill
 London Rd.
 Preston, Lanc. PR1 4LT, England
 Phone: 1772 201 964
 Fax: 1772 883 570
 E-Mail: ljd@incorez.co.uk
 L.J. Daniels

Epoxy Hardeners-Chemicals
 Misc. Other Chemical Specialties
 Reactive Diluents
 Urethane & Polyurethane Resins

Industrial Oil Products
 144 Woodbury Rd.
 Woodbury, NY 11797
 Phone: (516) 692-6862
 Fax: (516) 692-3140
 Blake Hanson, President
 Castor Oil (Dehydrated)
 Citicica Oil
 Tung Oil

Innotech of WI, Inc.
 P.O. Box 085546
 Racine, WI 53408
 Phone: (414) 637-7103
 Fax: (414) 637-8205
 Wayne Dunai, Sales
 Masking Agents

Intercorp., Inc.
 3628 W. Pierce St.
 Milwaukee, WI 53215
 Toll Free: (800) 532-6303
 Fax: (414) 383-2021
 David Wareham, Sales Rep.
 Extender Pigments
 Fillers-Natural, Cellulosic, Polymeric
 Flattening Agents
 White Pigments

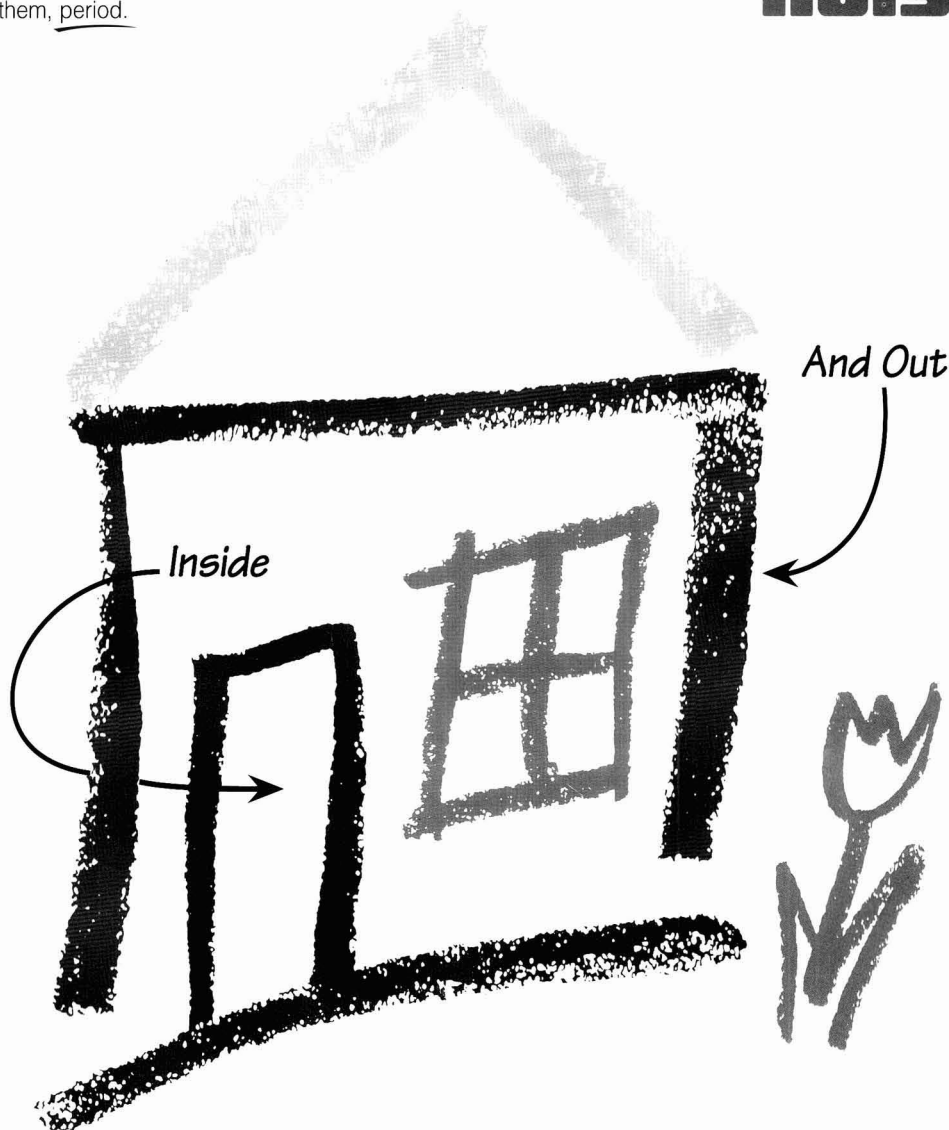
NUOCIDE® FUNGICIDE KEEPS MILDEW OUT OF THE PICTURE.

Hüls' NuoCide fungicide, based on the active ingredient chlorothalonil, protects paint from mildew years longer than any tested competitor. It's virtually insoluble in water and won't leach out of the paint film, even in areas of heavy rainfall and high humidity. Also, it won't degrade in U.V. light, as it doesn't depend on other

pigments or additives to perform. Test fence and industry-wide use prove this non-fugitive, shelf stable biocide provides the most cost effective protection available!

And Hüls can enter the picture long before your paint touches the surface. Our technical service provides complete assistance to biocide customers. After all, instead of having to fix mildew problems, Hüls wants you to prevent them, period.

hüls



HÜLS AMERICA INC. Colorants and Biocides Division
220 Davidson Avenue, Somerset, NJ 08873 (732) 560-6800

Interfibe Corp.
6001 Cochran Rd.
Building A-Ste. 202
Solon, OH 44139
Phone: (216) 248-2266
Fax: (216) 248-2132
Chris Sullivan, V.P. Marketing; Terry Mieczewski, General Mgr.; John Sullivan, V.P. Sales; Rich Karnemaat, Technical Dir.
Fillers-Natural, Cellulosic, Polymeric

International Paper
Arizona Chemical Div.
Two Manhattanville Rd.
Purchase, NY 10577
Phone: (800) 223-1268
Fax: (914) 397-1650
Ester Gums
Esters
Fatty Acids
Maleic Resins
Phenolic Resins
Rosin Esters

International Resources, Inc.
8945 Guilford Rd., Ste. 100
Columbia, MD 21046-2620
Phone: (410) 381-8290
Fax: (410) 381-8295
E-Mail: intresources@worldnet.att.net
David T. Osborne, Technical Dir.
Alkyd Resins
Anti-Blocking Agents
Blue Pigments
Catalysts
Epoxy Hardeners-Chemicals
Flattening Agents
Green Pigments
Light Stabilizers
Misc. Type Resins
Printing Ink Varnishes & Compounds
Stabilizers
Urethane & Polyurethane Resins
UV Absorbers

International Speciality Chemicals
500 International Dr., Ste. 120
Budd Lake, NJ 07828
Phone: (201) 426-0123
Fax: (201) 426-0423
Richard J. Butler
Monomers

International Specialty Products (ISP)
1361 Alps Rd.
Wayne, NJ 07470
Phone: (973) 628-3000
Fax: (973) 628-4111
Sotini Papoulias, Marketing Dir.; Ellen Werner, Marketing Dir.
Adhesion Promoters
Dispersing Agents & Surfactants
Esters
Misc. Solvents
Preservatives
Reclaimed Solvents
Urethane & Polyurethane Resins
Vinyl Resins

Ishihara Corp. (U.S.A.)
600 Montgomery St.
San Francisco, CA 94111
Phone: (415) 421-8207
Fax: (415) 397-5403
David Duenwald, General Mgr.; Keiko Watts, Marketing Mgr.
Misc. Other Chemical Specialties
White Pigments
Yellow and Orange Pigments

J

Jet Wheelblast Equipment
401 Miles Dr.
Adrian, MI 49221
Phone: (517) 263-0502
Fax: (517) 263-0038
Dwight E. Lutsko, General Sales Mgr.
Abrasives/Anti-Skid

SC Johnson Polymer
8310 16th St.
P.O. Box 902
Sturtevant, WI 53177-0902
Toll Free: (800) 231-7888
John Rizzo, Marketing Communications
Acrylic Resins
Styrene Resins

K

K & S Industries Ltd.
73 Redding Rd.
P.O. Box 297
Georgetown, CT 06829
Phone: (203) 544-9887
Fax: (203) 544-9988
Ken E. Dempsy; Robert K. Dempsy
Epoxy Resins
Fatty Acids
Flame and Smoke Retardants
High-Solid Resins
Phenoxy Resins
Polyamide Resins
Rosin Esters
TGIC Resins

Kamin-Cable Corp.
14706 Detroit Ave.
Lakewood, OH 44107
Phone: (216) 221-0550
Fax: (216) 221-0552
Joseph Kemmerling, President; David Washtock, Salesman
Anti-Foaming Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Linseed
Metallic Flakes and Powdered Pigments
Soybean
Sunflower
Thickening Agents
Water Treatment Chemicals

Kelco Industrial Biopolymers
Group of Monsanto Co.
8355 Aero Dr.
San Diego, CA 92123-1718
Phone: (619) 292-4900
Fax: (619) 467-6522
E-Mail: ind.tech.service@kelco.com
Paul Brady, Team Leader
Stabilizers
Suspension Agents
Thickening Agents

Kemira Pigments Inc.
One Kemira Rd.
P.O. Box 368
Savannah, GA 31402
Phone: (912) 652-1000
Fax: (912) 652-1181
G.L. Roberts, III, V.P. Sales/Marketing; Jeff Hyde, National Sales Mgr.; Billy Lee, Product Mgr., Rutile
White Pigments

Kenrich Petrochemicals, Inc.
140 E. 22nd St., P.O. Box 32
Bayonne, NJ 07002-0032
Phone: (201) 823-9000
Fax: (201) 823-0691
Salvatore J. Monte, President
Adhesion Promoters
Anti-Rust Agents
Anti-Settling Agents
Catalysts
Corrosion Inhibitors
Dispersing Agents & Surfactants
Flame and Smoke Retardants
Ink Additives
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Viscosity, Suspension & Flow Control Agents
Plasticizers
Reactive Diluents
Static Preventive



Kerr-McGee Chemical Corp.
P.O. Box 25861
Oklahoma City, OK 73125
Toll Free: (800) 654-3911
White Pigments

SEE OUR AD ON PAGES 58-59.

Keystone Aniline Corp.
2501 W. Fulton St.
Chicago, IL 60612
Phone: (312) 666-2015
Fax: (312) 666-8530
Toll Free: (800) 522-4DYE
L. Bente, Product Mgr.
Black/Brown/Gray Pigments
Blue Pigments
Dyes
Green Pigments
Other Pigments
Red Pigments
Yellow and Orange Pigments
UV Absorbers

Kinetics Corp.
2 Boulder Ave.
Magnolia, MA 01930
Phone: (508) 525-2415
Fax: (508) 525-2417
T. Philip Comenos, President
Hydrocarbon Resins
Maleic Resins
Monomers
Photocuring Materials/Photoinitiators
Rosin Esters
Stabilizers

King Industries, Inc.
Science Rd.
P.O. Box 588
Norwalk, CT 06852
Phone: (203) 866-5551
Fax: (203) 866-1268
Steve Knight, Sales Mgr.; Bob Coughlin, Technical Service Mgr.

Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Catalysts
Corrosion Inhibitors
Dispersing Agents & Surfactants
Flow Control Agents
Ink Additives
Misc. Viscosity, Suspension & Flow Control Agents
Printing Ink Dispersants & Vehicles
Reactive Diluents
Thickening Agents

KLF Hitek Co.
P.O. Box 32983
Phoenix, AZ 85064-2983
Phone: (602) 279-6474
Fax: (602) 277-1148
Fred E. Kallof, President
Black/Brown/Gray Pigments
Corrosion-Inhibiting Pigments
Iron Oxide Pigments
Metallic Flakes and Powdered Pigments
Other Pigments

Kowa American Corp.
342 Madison Ave., Ste. 710
New York, NY 10173
Phone: (800) 221-2076
Fax: (212) 972-4625
Mark K. Smith, Sales Mgr.; Taka
Nagashima, Chemical Dept. Mgr.
Monomers
Other Pigments
Photocuring Materials/Photoinitiators
Plasticizers

Kronos, Inc.
P.O. Box 4272
Houston, TX 77210
Toll Free: (800) 866-5600
Fax: (281) 423-3258
Web: <http://www.nl-ind.com/kronos>
White Pigments

K-T Feldspar Corp.
P.O. Box 309
Spruce Pine, NC 28777
Toll Phone: (800) 291-9691
Fax: (704) 765-6304
Jim Dunn, Customer Service; Jim Gledhill,
Sales Mgr.
Extender Pigments

L

Landers-Segal Color Co., Inc.
90 Dayton Ave.
Passaic, NJ 07055
Phone: (201) 779-5001
Fax: (201) 779-8948
Donald Greenwald, President; Rick
Campbell, V.P. Marketing & Sales;
Michael Smith, V.P. Smithchem Div.
Black/Brown/Gray Pigments
Blue Pigments
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Dispersing Agents & Surfactants
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Flame and Smoke Retardants
Flatting Agents
Green Pigments
Misc. Other Chemical Specialties
Misc. Viscosity, Suspension & Flow Control Agents
Thickening Agents

Laporte Pigments
7101 Muirkirk Rd.
Beltsville, MD 20705-1333
Phone: (301) 210-7800
Fax: (301) 210-4967
Cas Kleczko, V.P. Sales; Dave Murphy, Dir.
Sales; John Kurnas, Applications Chemist
Anti-Rust Agents
Black/Brown/Gray Pigments
Blue Pigments
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Green Pigments
Iron Oxide Pigments
Yellow and Orange Pigments

Laporte/SCP- Laponite Rheological
Additives
1212 Church St.
Gonzales, TX 78629
Toll Free: (888) LAPONITE
Fax: (830) 672-1915
Jeff Koury, Sales & Marketing Mgr.; Fred
Grunewald, Laponite Technical Specialist
Anti-Sagging Agents
Anti-Settling Agents
Bodying Agents
Flow Control Agents
Freeze Thaw Stabilizers
Misc. Viscosity, Suspension and Flow Control
Agents
Suspension Agents
Thickening Agents

Lawter International
8601 95th St., One Terra Way
Kenosha, WI 53142
Phone: (414) 947-7300
Fax: (414) 947-7328
E-Mail: lawter.com
Dana Johansen, GM Coatings Technology;
Henry Brooks, Dir. Ink Sales, North America
Acrylic Resins
Adhesion Promoters
Alkyd Resins
High-Solid Resins
Hydrocarbon Resins
Ink Additives
Linseed
Maleic Resins
Oleoresinous Varnishes
Phenolic Resins
Polyamide Resins
Polyester Resins
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Rosin Esters
Styrene Resins
Surface Conditioners & Lubricants
Thickening Agents
Tung Oil
Varnishes
Waxes

Lonza, Inc. Specialty Anhydride, Additives
17-17 Rte. 208
Fair Lawn, NJ 07410
Phone: (201) 794-2000
Adhesion Promoters
Catalysts
Epoxy Hardeners-Chemicals
Epoxy Resins
Flame and Smoke Retardants
Maleic Resins
Melamine & Melamine Type Resins
Misc. Other Additives
Misc. Other Chemical Specialties
Misc. Type Resins
Misc. Viscosity, Suspension and Flow Control
Agents
Natural Resins
Phenolic Resins
Plasticizers
Polyamide Resins
Water Treatment Chemicals

Lorama Chemicals, Inc.
221 Nipissing Rd.
Milton, Ont., L9T 1R3
Canada
Phone: (905) 878-2833
Fax: (905) 878-7732
E-Mail: lorama@msn.com
Pat Amiel, President; Marga Holtzheimer,
Technical Mgr.; Tony Vacc, V.P. Sales
Misc. Type Resins
Natural Resins
Polysaccharide Resins

LubeCon Systems, Inc.
201 N. Webster St., Box 824
White Cloud, MI 49349-0824
Toll Free: (800) 582-3266
Phone: (616) 689-0002
Fax: (616) 689-0372
Paul Daugherty, Sales & General Mgr.
Surface Conditioners & Lubricants



The Lubrizol Corporation
29400 Lakeland Blvd.
Wickliffe, OH 44092-2298
Phone: (440) 943-4200
Fax: (440) 943-9025
D.S. Stephanadis, Mgr.; Howard E. Burke,
Sales Mgr.

Adhesion Promoters
Anti-Blocking Agents
Anti-Floating Agents
Anti-Flooding Agents
Anti-Sagging Agents
Anti-Settling Agents
Bodying Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Flatting Agents
Flow Control Agents
Misc. Other Additives
Monomers
Printing Ink Dispersants & Vehicles
Surface Conditioners & Lubricants
Thickening Agents
Water Treatment Chemicals
Waxes

SEE OUR AD ON PAGE 115.

Lucas Meyer, Inc.
765 E. Pythian Ave.
P.O. Box 3218
Decatur, IL 62526
Phone: (217) 875-3660
Fax: (217) 875-5046
Mark Metivier, Technochemical Sales
Dispersing Agents & Surfactants

Luzenac America
8985 East Nichols Ave.
Englewood, CO 80112-3410
Phone: (303) 643-0400
Fax: (303) 643-0444
Corrosion Inhibitors
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Flatting Agents
Suspension Agents

M

3M Specialty Additives
3M Center, Bldg. 220-8E-04
St. Paul, MN 55144-1000
Phone: (612) 737-1751
Fax: (612) 737-1764

3M Performance Chemicals & Fluids Div.
3M Center, Bldg. 223-6S-04
St. Paul, MN 55144-1000
Phone: (612) 773-9755
Fax: (612) 733-1659

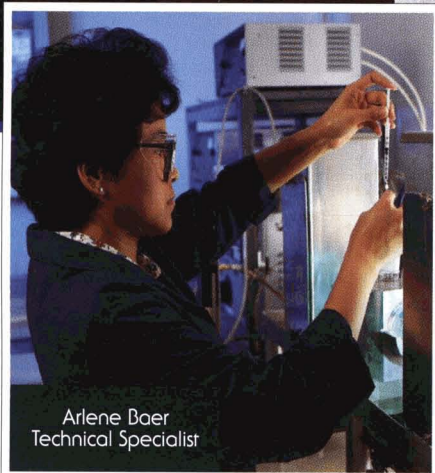


Ben Corona
Vice President Marketing/Sales

Lou Dizikes, Ph.D.
Manager,
Product Development,
the Americas

Tahlee Wallace
Manager, Technical
Service Laboratory

Kelly Green, Ph.D.
Director, Technical Sales and Service

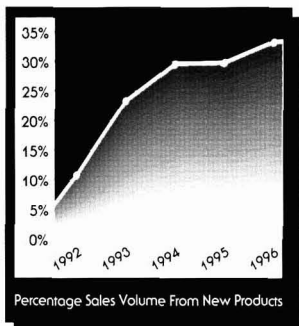


(Above) - Representatives from many Kerr-McGee operations, including research, technical service and marketing, work together to develop new products.
(Inset) - Kerr-McGee's High Sensitivity Photo Catalytic Activity Test quickly and accurately predicts the durability of new TiO₂ grades.

Not Just Technology,
IMAGINATION.

Not Just Performance,
EXCELLENCE.

Not Just Service,
TEAMWORK.



THE TRUEST MEASURE OF A QUALITY PRODUCT IS THE QUALITY OF THE COMPANY THAT MAKES IT.

Kerr-McGee research teams aren't just producing better products for the changing needs of Kerr-McGee customers, they're also generating ways to accelerate new product development. This teamwork is paying off everyday, as Kerr-McGee helps customers streamline production, cut costs, reduce sources and improve efficiency. **A FASTER WAY TO PREDICT PRODUCT PERFORMANCE.** An innovative test process developed by Kerr-McGee quickly and accurately predicts the durability of TiO₂ pigment grades under development, saving months of climatic testing. Consequently, Kerr-McGee customers benefit from new and better TiO₂ grades sooner, not later. In fact, nearly 33% of Kerr-McGee TiO₂ sales volume is from new products commercialized in the last five years. **KERR-McGEE CONTINUES ADVANCING THE MARK.** Meeting the needs of our customers is the key to understanding that quality standards aren't meant to be met; they're meant to be exceeded.

**ISO 9002
CERTIFIED**

Kwinana, Australia
Hamilton, USA
Yanbu, Saudi Arabia
Perth, Australia
Melbourne, Australia
Oklahoma City, USA
Singapore
London, UK



Responsible Care[®]
A Public Commitment



KERR-McGEE CHEMICAL CORPORATION

TECHNOLOGY AND TEAMWORK

FOCUSED FOR YOU

P.O. Box 25861 • Oklahoma City, Oklahoma 73125 • (800) 654-3911
SALES OFFICES: Atlanta, Georgia (770) 934-9781 • West Chicago, Illinois (630) 231-8002 • Dallas, Texas (972) 751-1571

3M/Zeelan Industries
3M Center, Bldg. 220-8E-04
St. Paul, MN 55144-1000
Phone: (612) 737-1751
Fax: (612) 737-1764
W.W. Loomis, Business Mgr.; J.F. Helbling,
Market Development Supervisor
Fillers-Natural, Cellulosic, Polymeric

Mace Adhesives & Coatings Co.
Roberts Rd.
P.O. Box 37
Dudley, MA 01571
Phone: (508) 943-9052
Fax: (508) 943-6527
James F. Gilloran, President; Robert A.
Fitzgerald, V.P. Sales/Marketing
Flame and Smoke Retardants
Hybrid Resins
Ultraviolet Curing Resins
Urethane & Polyurethane Resins
Urethane Crosslinkers
Urethane Lacquers

Mallinckrodt Inc.
Trimet Technical Products Div.
2409 North Cedar Crest Blvd.
Allentown, PA 18104-9733
Toll Free: (800) 289-3015
Fax: (800) 937-1604
Customer Service
Catalysts
Misc. Other Chemical Specialties

Malvern Minerals Co.
220 Runyon
P.O. Box 1238
Hot Springs, AR 71902
Phone: (501) 623-8893
Fax: (501) 623-5113
Sam Bristow, President; Roger Moreland,
Accounts Mgr.
Extender Pigments

Mantrose Bradshaw Zinsser Group
1175 Post Rd., E.
Westport, CT 06880
Toll Free: (800) 344-4229
Phone: (203) 454-1800
Fax: (203) 227-0558
Jeffrey C. Flath, Dir. Sales/Marketing; Steve
Santos, Technical Dir.
Adhesion Promoters
Fillers-Natural, Cellulosic, Polymeric
Natural Resins
Printing Ink Dispersants & Vehicles
Varnishes
Waxes

Mapico Inc.
11116 S. Towne Sq.
St. Louis, MO 63123
Phone: (314) 845-2010
Fax: (314) 845-3570
Joseph Moramarco, Technical Mgr.
Iron Oxide Pigments

McWhorter Technologies
400 E. Cottage Place
Carpentersville, IL 60110
Phone: (847) 428-2657
Fax: (847) 428-2653
Jeff M. Nodland, President and Chief
Operations Officer; Patrick Heffernan, Sr.
V.P. Liquid Coatings Resins
Acrylic Resins
Alkyd Resins
Amino Resins
Epoxy Resins
High-Solid Resins
Melamine & Melamine Type Resins

Misc. Type Resins
Oleo-resinous Varnishes
Pigment Dispersions (Aqueous)
Polyester Resins
Silicone Polyester
Silicone Resins
Ultraviolet Curing Resins
Urethane & Polyurethane Resins
Urethane Crosslinkers

MD-Both Industries
40 Nickerson Rd.
Ashland, MA 01757
Phone: (508) 881-4100
Fax: (508) 881-1656
E-Mail: mdboth@aol.com
Andrew Rink, President; C. Thomas Skeels,
V.P.; Robert M. Owens, Sales; Alan Carey,
Sales; Peter MacDonald, Sales
Black/Brown/Gray Pigments
Metallic Flakes and Powdered Pigments

Meadowbrook Co.
30 Rockefeller Plaza, Ste. 2825
New York, NY 10112
Phone: (212) 582-0420
Fax: (212) 582-3412
Allen S. Perl, V.P.
Anti-Rust Agents
Corrosion-Inhibiting Pigments
Metallic Flakes and Powdered Pigments
Preservatives
White Pigments
Yellow and Orange Pigments

Michelman, Inc.
9080 Shell Rd.
Cincinnati, OH 45236-1299
Phone: (513) 793-7766
Fax: (513) 793-2504
Larry Holt, GM, Marketing & Customer
Service; Howie Brecher, GM Sales
Anti-Blocking Agents
Ink Additives
Surface Conditioners & Lubricants
Waxes

Micro Powders, Inc.
580 White Plains Rd.
Tarrytown, NY 10591
Phone: (914) 793-4058
Fax: (914) 472-7098
E-Mail: micropowders.com
James Strauss, President; Warren Pushaw,
VP, General Mgr.; David Gittleman,
Technical Sales Rep.
Abrasives/Anti-Skid
Anti-Blocking Agents
Flattening Agents
Ink Additives
Surface Conditioners & Lubricants
Texturizers
Water Repellents-Silicone, Corrosion Inhibitors
Waxes

Microcolor Dispersions, Ltd.
333 Horner Ave.
Toronto, Ont. M8W 1Z6
Canada
Phone: (416) 252-5676
Fax: (416) 252-8493
George Broswick, Sales Mgr.
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

Millennium Inorganic Chemicals
Colors and Silica
2701 Broening Highway
Baltimore, MD 21222
Phone: (410) 288-0200
Fax: (410) 288-8878
William Eaton, Dir. Marketing/Sales

Anti-Blocking Agents
Extender Pigments
Red Pigments
Yellow and Orange Pigments

Millennium Inorganic Chemicals
200 International Circle, Ste. 5000
Hunt Valley, MD 21030
Phone: (410) 229-4400
Fax: (410) 229-4488
Gary L. Cianfichi, Marketing Mgr., Coatings
White Pigments

Ming-Zu Chemical Industries
1578 Barclay Blvd.
Buffalo Grove, IL 60089
Phone: (847) 419-1083
Fax: (847) 419-1082
Bob Yang, President
Dyes
Metal Complex Solvent

MiniFIBERS, Inc.
2923 Boones Creek Rd.
Johnson City, TN 37615
Phone: (423) 282-4242
Fax: (423) 282-1450
Ruth Lawson, Sales Mgr.
High Density Polyethylene and Polypropylene

Mississippi Lime Co.
7 Alby Street
P.O. Box 2247
Alton, IL 62002-2247
Toll Free: (800) 437-5463
Fax: (618) 465-7786
Michael R. Ianiro, Sales Mgr., PCC; Mark
DeGenova, Technical Sales Mgr.
Extender Pigments

Mitsubishi Chemical America
1 North Lexington Ave.
White Plains, NY 10601
Phone: (914) 286-3600
Fax: (914) 681-0760
Kozo Hayashi, Mgr. Business Development;
Paul Kreiter, Mgr. Business Development

Acids (Non-Fatty)
Acrylic Resins
Alcohols
Aliphatic Hydrocarbons
Amino Resins
Aromatic Hydrocarbons
Catalysts
Caustics and Caustic Sodas
Custom Solvent Blending
Dispersing Agents & Surfactants
Dyes
Esters
Flocculants
Glycols
Hydrocarbon Solvents
Ink Additives
Ketones
Maleic Resins
Melamine & Melamine Type Resins
Monomers
Phenolic Resins
Plasticizers
Polyamide Resins
Polybutenes
Polyester Resins
Polyethylene Resins
Polypropylene Resins
Styrene Resins
Urethane & Polyurethane Resins
Urethane Crosslinkers
Vinyl Chloride & Vinylidene Chloride Polymer
Emulsions
Vinyl Resins
Water Repellents-Silicone, Corrosion Inhibitors
Water Treatment Chemicals

Mocap Inc.
10964 Lin-Valle Dr.
St. Louis, MO 63123
Phone: (314) 845-3100
Fax: (314) 487-8855
Brian Simpson, Sales Mgr.
High Temperature Masking Products

Mona Industries, Inc.
76 E. 24th St.
P.O. Box 425
Paterson, NJ 07544
Phone: (201) 345-8220
Fax: (201) 345-3527
Glenn Baird

Bodying Agents
Coalescing Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Surface Conditioners & Lubricants
Suspension Agents
Thickening Agents

Morton International, Inc.
Morton Powder Coatings
P.O. Box 15240
Reading, PA 19612-5240
Phone: (610) 775-6619
Fax: (610) 775-6732
James C. Swanson, V.P./G.M.; Thomas P. Frauman, Marketing Mgr.
Powder Coatings



Morton International
100 N. Riverside Plaza
Chicago, IL 60606
Phone: (312) 807-2000
Fax: (312) 807-2010

Acrylic Emulsions
Acrylic Resins
Acrylic-Styrene Emulsions
Dispersing Agents & Surfactants
Dyes
High-Solid Resins
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Polyvinylidene Chloride Emulsions
Preservatives
Printing Ink Dispersants & Vehicles
Printing Ink Varnishes & Compounds
Styrene Resins

SEE OUR AD ON PAGE 129.

N

Nacan Products Ltd.
60 West Dr.
Brampton, Ont. L6T 4W7
Canada
Toll Free: (800) 333-9483
Phone: (905) 454-4466
Fax: (905) 454-3401
Jim Wise, Sales Mgr.; Alan Blackie,
Marketing Mgr.
Acrylic Resins
Vinyl Resins

Nagase America Corp.
500 Fifth Ave., Rm. 840
New York, NY 10110
Phone: (212) 354-3140

Fax: (212) 398-0687
E-Mail: gen@nagase-nam.com
Gen Hirao, Mgr. Chemicals Sales; Rick
Uchida, Mgr. Chemicals Sales

Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Anti-Sagging Agents
Anti-Settling Agents
Anti-Skinning Agents
Dispersing Agents & Surfactants
Epoxy Resins
Flattening Agents
Flow Control Agents
Ink Additives
Misc. Other Additives
Misc. Viscosity, Suspension and Flow Control
Agents
Monomers
Photocuring Materials/Photoinitiators
Plasticizers
Preservations
Reactive Diluents

NICHEM Corp.
600 W. 52nd St.
Chicago, IL 60609
Phone: (773) 924-3700
Fax: (773) 924-7760

Adhesion Promoters
Anti-Blocking Agents
Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Anti-Rust Agents
Blue Pigments
Catalysts
Corrosion-Inhibiting Pigments
Ink Additives
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Yellow and Orange Pigments

Nissan Chemical America Corp.
303 S. Broadway, Ste. 223
Tarrytown, NY 10591
Phone: (914) 332-4745
Fax: (914) 332-4808

Sam Kondo, V.P., Nissan Chemical
Houston, (281) 291-0200
Abrasives (Anti-Skid)
Anti-Blocking Agents
Misc. Other Additives
Misc. Other Chemical Specialties

SEE OUR AD ON PAGE 110.

North American Oxide LLC
480 Arcata Blvd.
Clarksville, TN 37040
Phone: (615) 552-8080
Fax: (615) 552-5588
L.C. Jacobson Jr., Dir. Sales/Marketing

Anti-Rust Agents
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Extender Pigments
Ink Additives
Light Stabilizers
Metallic Flakes and Powdered Pigments
White Pigments

Norton Chemical Process Products Corp.
P.O. Box 350
Akron, OH 44309-0350
Toll Free: (888) NORTON-1
Fax: (330) 677-7245
E-Mail: 75404.446@compuserve.com
Larry Breeding, Sales Mgr., Eastern U.S.;
Kenneth J. Mills, Marketing Mgr., Catalytic
Products; Tom Poole, Sales Mgr., Western
U.S.

Catalysts

NuTech Corp.
649 Ferry St.
Newark, NJ 07105
Phone: (973) 344-6505
Fax: (973) 344-3655
Ronald H. Stroh, Marketing Dir.
Anti-Foaming Agents
Corrosion Inhibitors
Ink Additives
Water Repellents-Silicone, Corrosion Inhibitors

NYCO® Minerals, Inc.
124 Mountain View Dr.
Willsboro, NY 12996
Phone: (518) 963-4262
Fax: (518) 963-4187
Dawn L. Revette, Marketing Communica-
tion Mgr.
Extender Pigments

O

Occidental Chemical Corp.
P.O. Box 809050
Dallas, TX 75380-9050
Phone: (972) 404-4198
Fax: (972) 448-6676
David F. Graham, Business Mgr.
Chlorinated Solvents
High-Solid Resins
Misc. Solvents
Phenolic Resins
Water-Thinned Resins

Ohio Polychemical Co.
1920 Leonard Ave.
P.O. Box 369004
Columbus, OH 43219
Phone: (614) 253-8511
Fax: (614) 253-6327
Richard Olson, V.P., General Mgr.; Arnie
Mohar, Technical Dir.

Alkyd Resins
Epoxy Resins
Misc. Type Resins
Polyester Resins
Styrene Resins
Urethane & Polyurethane Resins
Water-Thinned Resins

Olín Corp.
350 Knotter Dr.
Cheshire, CT 06410-0586
Toll Free: (800) 344-9168
Fax: (203) 271-4060
Douglas Simpson, Marketing Mgr.
Preservatives



ICE '98
International Coatings Expo
and Technology Conference

October 14-16, 1998

Ernest N. Morial Convention
Center, New Orleans, LA



OMG Americas

811 Sharon Dr.
Westlake, OH 44145-1522
Phone: (440) 899-2950
Fax: (440) 808-7114

Tedd Romanez, V.P. Sales & Marketing;
Chris Vidoli, National Sales Mgr.; **Robert**
Strenk, Business Mgr., Metal Carboxy-
lates

- Anti-Skinning Agents
- Catalysts
- Driers
- Ink Additives
- Stabilizers

SEE OUR AD ON PAGE 72.

OMYA, Inc.

61 Main St.
Proctor, VT 05765
Phone: (802) 459-3311
Fax: (802) 459-2125
Extender Pigments

P

Pan Chemical Corp.

1 Washington St.
Hawthorne, NJ 07506
Phone: (973) 427-4300
Fax: (973) 427-0013
Carl S. Curtis

- Flattening Agents
- Pigment Dispersions (Aqueous)
- Pigment Dispersions (Non-Aqueous)

Patco Products

3947 Broadway
Kansas City, MO 64111
Phone: (816) 561-9050
Fax: (816) 561-7778
David Gasvoda, Dir.; Wayne Wright,
Technical Dir.; Nick Dispensa,
Applications Mgr.
Anti-Foaming Agents

PCI Group, Inc.

2153 E. Cedar St., #12
Tempe, AZ 85281
Phone: (602) 303-0557
Fax: (602) 303-0696
Matt J. Thometz, President

- Adhesion Promoters
- Anti-Floating Agents
- Anti-Flooding Agents
- Anti-Foaming Agents
- Anti-Rust Agents
- Anti-Sagging Agents
- Anti-Settling Agents
- Bodying Agents
- Corrosion Inhibitors
- Dispersing Agents & Surfactants
- Flow Control Agents
- Ink Additives
- Misc. Other Additives
- Misc. Viscosity, Suspension and Flow Control

Agents
Thickening Agents

Peer Chemical Corp.

1552 S. Abbott Dr.
Wheeling, IL 60090

Phone: (847) 459-5347
Fax: (847) 459-5340
L.J. Jones, V.P.
Blue Pigments
Green Pigments
Other Pigments
Red Pigments
Yellow and Orange Pigments

Pelmor Laboratories, Inc.

Liquid Products Div.
401 Lafayette St.
P.O. Box 309
Newtown, PA 18940-0309
Phone: (215) 968-3334
Fax: (215) 968-6415
E-Mail: pelmr@aol.com
E. William Ross, Jr., V.P.
Misc. Type Resins

Phenoxy Specialties

800 Cel River Rd.
Rock Hill, SC 29730
Toll Free: (800) 331-7721
Fax: (803) 328-3827
Stephen M. Lustig, General Mgr.; Mark
Huang, Technical Service Mgr.; Chris Digby,
Sales Mgr.
Epoxy Resins
High-Solid Resins
Misc. Type Resins
Phenoxy Resins

Plast-O-Meric, Inc.

W227 N6225 Sussex Rd.
Sussex, WI 53089
Phone: (414) 246-0344
Fax: (414) 246-0391
D.E. Krans, Sales
Urethane & Polyurethane Resins
Vinyl Chloride & Vinylidene Chloride Polymer
Emulsions
Vinyl Resins

Polar Minerals, Inc.

1703 Bluff Rd.
Mount Vernon, IN 47620
Phone: (770) 934-4411
Fax: (770) 934-4376
Shawn Hays
Extender Pigments

Poly-Resyn, Inc.

534 Stevens Court
Sleepy Hollow
Dundee, IL 60118
Phone: (847) 428-4031
Fax: (847) 428-0305
Bob Schreurs; Jeff Schreurs
Anti-Sagging Agents
Anti-Settling Agents

Potters Industries, Inc.

P.O. Box 840
Valley Forge, PA 19482
Phone: (610) 651-4700
Fax: (610) 408-9724
Customer Service
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Metallic Flakes and Powdered Pigments
Other Pigments

PPG Industries, Inc.

Specialty Chemicals/Surfactants
One PPG Pl.
Pittsburgh, PA 15272
Phone: (412) 434-3131
Fax: (412) 434-2137
Barbara Anderson, Product Mgr.

PQ Corp./ Potters Industries

P.O. Box 840
Valley Forge, PA 19482
Phone: (610) 651-4700
Fax: (610) 408-9724
E-Mail: sbecker@pqcorp.com
Susan Beckerman, Marketing Devel. Mgr.
Abrasives/Anti-Skid
Anti-Blocking Agents
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Stabilizers

The PQ Corp.

Specialty Div.
P.O. Box 3720
Chattanooga, TN 37404
Phone: (423) 629-7160
Fax: (423) 698-0614
M.G. Ross, Marketing Devel. Project Mgr.
Fillers-Natural, Cellulosic, Polymeric
Flow Control Agents
Extender Pigments

Protein Technologies Intl. Inc.

Polymer Products Div.
Checkerboard Sq., 5C
St. Louis, MO 63164
Toll Free: (800) 325-7137
Fax: (314) 982-1190
William T. Skaggs, VP & Managing Dir.;
Marc R. Moseley, Dir. New Bus. Dev.; Jane
M. Thompson, Industry Mgr.
Adhesion Promoters
Misc. Viscosity, Suspension and Flow Control
Agents

Purity Zinc Metals

290 Arvin Ave.
Stoney Creek, Ont. L8E 2M1
Canada
Phone: (905) 662-4802
Fax: (905) 664-3944
James E. Desroches, Dir. Sales
Metallic Flakes and Powdered Pigments
White Pigments

Pyosa, S.A. de C.V.

Ave. Industrias No. 1200 Pte.
Col. Bella Vista
Monterrey, NL 64410
Mexico
Phone: (52) 8 331 2600
Fax: (52) 8 331 4632
Alicia A. Lozano, Dir.; Pedro Tuerina, Sales
Mgr., North America
Blue Pigments
Corrosion-Inhibiting Pigments
Dyes
Green Pigments
Pigment Dispersions (Aqueous)
Red Pigments
Yellow and Orange Pigments

Q

K.J. Quinn & Co., Inc.

135 Folly Mill Rd.
Seabrook, NH 03874
Phone: (603) 474-7177
Fax: (603) 474-9170
Jeannine Derba, Customer Service
Administrator; Rick Ackerman, Business
Mgr.
Flattening Agents
Urethane & Polyurethane Resins

Henkel

Coatings and Inks
Division

WATERPOXY® 1400 Series Epoxy Dispersions WATERPOXY® 810 Epoxy Curing Agent

from Henkel Corporation for industrial maintenance and marine coatings

QUALITY NUMBERS

Through Dry and Sandability	1 hour @ 25°C 1.5 Mil dry film
Tack Free	20 minutes @ 25°C 1.5 Mil dry film
Salt Water Immersion	3.5% @ 49°C for 1500 hours (no effect) scribed
ISO certification	9001

Call now toll free

800-445-2207

HAPS Free Available

Henkel

Coatings and Inks Division

R

R.I.T.A. Corp.
1725 Kilkenny Ct.
P.O. Box 1487
Woodstock, IL 60098
Phone: (815) 337-2500
Fax: (815) 337-2522
James W. Cook, V.P. Sales/Marketing

- Acrylic Resins
- Anti-Rust Agents
- Corrosion Inhibitors
- Dispersing Agents & Surfactants
- Fatty Acids
- Polyethylene Resins
- Stearates
- Surface Conditioners & Lubricants
- Suspension Agents
- Thickening Agents

Raabe Corp.
N92 W14701 Anthony Ave.
Menomonee Falls, WI 53051
Phone: (414) 255-9500
Fax: (414) 255-0684
Bob Hanus, Marketing Mgr.; Dave Wacker, Sales Mgr.

- Touch-up Paints

Radiant Color
2800 Radiant Ave.
P.O. Box 4019
Richmond, CA 94804-0019
Phone: (510) 233-9119
Fax: (510) 233-9138
Robert Hess, Dir. of Marketing; Darren Bianchi, Technical Dir.

- Other Pigments
- Pigment Dispersions (Aqueous)
- Pigment Dispersions (Non-Aqueous)



Ranbar Technology, Inc.
1114 Wm. Flinn Hwy.
Glenshaw, PA 15116
Phone: (412) 486-1111
Fax: (412) 487-3313
E-Mail: Ranbar@Ranbar.com
Raymond D. Kushner, V.P., General Mgr.;
Randall L. Russell, Dir. Corporate Serv.

- Alkyd Resins
- Epoxy Resins
- Polyester Resins
- Urethane & Polyurethane Resins

RBH Dispersions, Inc.
L-5 Factory Lane
CN 2006
Bound Brook, NJ 08805-1036
Phone: (908) 356-1800
Fax: (908) 356-8369

John V. Mitzak, V.P.; Dennis H. Rice, Sales Mgr.; Bharat M. Parekh, Technical Mgr.

- Pigment Dispersions (Aqueous)
- Pigment Dispersions (Non-Aqueous)

Reade Advanced Materials
P.O. Drawer 15039
Providence, RI 02915-0039
Phone: (401) 433-7000
Fax: (401) 433-7001

E-Mail: sales@reade.com
Charles Reade, Eastern Regional Sales Mgr.; Bethany Cochran, Western Regional Sales Mgr.

- Abrasives/Anti-Skid
- Black/Brown/Gray Pigments
- Corrosion-Inhibiting Pigments
- Extender Pigments
- Fillers-Natural, Cellulosic, Polymeric
- Flame and Smoke Retardants
- Green Pigments
- Iron Oxide Pigments
- Metallic Flakes and Powdered Pigments
- Misc. Other Additives
- Misc. Other Chemical Specialties
- Red Pigments
- Stabilizers
- White Pigments

Reedy International Corp.
25 E. Front St.
Keyport, NJ 07735
Phone: (732) 264-1777
Fax: (732) 264-1189

- Catalysts
- Fillers-Natural, Cellulosic, Polymeric
- Misc. Other Additives
- UV Absorbers

Reichhold Chemicals, Inc.
2400 Ellis Rd.
P.O. Box 13582
Durham, NC 27709
Phone: (919) 990-7500
Fax: (919) 990-7922
Lisa Oldham, Corporate Marketing & Communications

- Acrylic Resins
- Adhesion Promoters
- Alkyd Resins
- Amino Resins
- Epoxy Resins
- High-Solid Resins
- Hybrid Resins
- Linseed
- Pigment Dispersions (Aqueous)
- Pigment Dispersions (Non-Aqueous)
- Polyester Resins
- Soybean
- Styrene Resins
- Urethane & Polyurethane Resins
- Vinyl Resins
- Water-Thinned Resins

Reilly Industries
300 N. Meridian St., Ste. 1500
Indianapolis, IN 46204-1763
Phone: (317) 638-7531
Fax: (317) 248-6402

- Adhesion Promoters
- Catalysts
- Misc. Solvents

Revelli Chemicals, Inc.
35 Mason St.
Greenwich, CT 06830
Phone: (203) 661-4040
Fax: (203) 661-4332
Robert Revelli, V.P.

- Black/Brown/Gray Pigments
- Blue Pigments
- Corrosion-Inhibiting Pigments
- Green Pigments
- Hydrocarbon Resins
- Iron Oxide Pigments
- Metallic Flakes and Powdered Pigments
- Pigment Dispersions (Aqueous)
- Red Pigments
- White Pigments
- Yellow and Orange Pigments



Reynolds Metals Co.
Aluminum Powder and Paste Div.
4101 Camp Ground Rd.
Louisville, KY 40211-2138
Phone: (502) 775-4240
Fax: (502) 775-4249
Dennis Malloy, Account Mgr.; Larry Pitchford, Technical Mgr.; Gary Wood, Account Mgr.
Metallic Flakes and Powdered Pigments

Rheox, Inc.
P.O. Box 700
Wyckoffs Mill Rd.
Hightstown, NJ 08520
Phone: (609) 443-2500
Fax: (609) 443-2422
Web: <http://www.nl-ind.com/rheox>

- Anti-Blocking Agents
- Anti-Sagging Agents
- Anti-Settling Agents
- Bodying Agents
- Corrosion Inhibitors
- Flow Control Agents
- Ink Additives
- Misc. Viscosity, Suspension and Flow Control Agents
- Suspension Agents
- Thickening Agents
- Waxes

Rhône-Poulenc, Inc.
North American Chemical Coatings and Construction Materials Div.
CN 7500
Prospect Plains Rd.
Cranbury, NJ 08512-7500
Phone: (609) 860-4000
Fax: (609) 860-0795

- Rhone-Poulenc Information Center
- Adhesion Promoters
 - Anti-Foaming Agents
 - Antioxidants
 - Dispersing Agents & Surfactants
 - Flocculants
 - Flow Control Agents
 - Ink Additives
 - Light Stabilizers
 - Misc. Other Additives
 - Misc. Other Chemical Specialties
 - Monomers
 - Plasticizers
 - Polyamide Resins
 - Silicone Resins
 - Stabilizers
 - Static Preventive
 - Surface Conditioners & Lubricants
 - Suspension Agents
 - Thickening Agents
 - UV Absorbers
 - Water Repellents-Silicone, Corrosion Inhibitors
 - Water Treatment Chemicals
 - Water-Thinned Resins
 - Waxes

Rit-Chem Co., Inc.
P.O. Box 435
Pleasantville, NY 10570
Phone: (914) 769-9110
Fax: (914) 769-1408
Wayne J. Ritell, V.P. Sales; Gary S. Ritell, V.P. Marketing Development

- Anti-Foaming Agents
- Extender Pigments

Hydrocarbon Resins
Ink Additives
Photocuring Materials/Photoinitiators
Plasticizers

Rohm and Haas Co.
Independence Mall West
Philadelphia, PA 19106
Phone: (215) 592-3000
Fax: (215) 592-6909
Andrew Crane, Industrial Coatings; Debbie Zimmer, Architectural Coatings

Ross Chem, Inc.
303 Dale Dr.
P.O. Box 458
Fountain Inn, SC 29644
Phone: (864) 862-4474
Fax: (864) 862-2912
Anti-Foaming Agents

Royale Pigments and Chemicals, Inc.
12 Rt. 17 N., Ste. 309
Paramus, NJ 07652
Phone: (201) 845-4666
Fax: (201) 845-0719
Lindsay A. Logue, President; Eric Percy, Sales Consultant
Black/Brown/Gray Pigments
Blue Pigments
Corrosion-Inhibiting Pigments
Dyes
Green Pigments
Iron Oxide Pigments
Metallic Flakes and Powdered Pigments
Other Pigments
Pigment Dispersions (Aqueous)
Red Pigments
White Pigments

Royce Associates
35 Carlton Ave.
East Rutherford, NJ 07073
Phone: (201) 438-5200
Fax: (201) 438-5207
E-Mail: HANAND@Interserv.com
A. Jay Royce, III, President; Wylie Royce, V.P., Harry Anand, President
Catalysts
Dyes
Epoxy Hardeners-Chemicals
Epoxy Resins

Ruco Polymer Corp.
New South Rd.
Hicksville, NY 11802
Phone: (516) 931-8100
Fax: (516) 931-8179
Tony Mazzarella, Sales Dir.; John McLafferty, V.P. Technology
Ink Additives
Misc. Other Chemical Specialties
Polyester Resins
TGIC Resins
Urethane & Polyurethane Resins
Water-Thinned Resins

S

Sachtleben Corp.
520 Madison Ave.
New York, NY 10022
Phone: (212) 715-5236
Fax: (212) 486-2742
Paul Frazier, National Sales Rep.
Extender Pigments
Flame and Smoke Retardants
Ink Additives

Photocuring Materials/Photoinitiators
White Pigments

San Esters Corp.
342 Madison Ave., Ste. 710
New York, NY 10173
Toll Free: (800) 337-8377
Fax: (212) 972-4625
Mark K. Smith, Sales Mgr.; Taka Nagashima, V.P. Marketing
Methacrylic Monomers and Polymers
Misc. Other Chemical Specialties
Monomers
Photocuring Materials/Photoinitiators
Reactive Diluents
Ultraviolet Curing Resins



SARTOMER

Sartomer Co.
502 Thomas Jones Way
Exton, PA 19341
Toll Free: (800) SARTOMER
Fax: (610) 363-4140
Blue Pigments
Green Pigments
Hydrocarbon Resins
Monomers
Photocuring Materials/Photoinitiators
Plasticizers
Reactive Diluents
Red Pigments
Ultraviolet Curing Resins
Yellow and Orange Pigments

SEE OUR ADS ON PAGES 123 & 131.

Scheel Corp.
7 Centre Dr., Ste. 7
P.O. Box 567
Cranbury, NJ 08512
Phone: (609) 395-1100
Fax: (609) 395-5525
Waxes

Schenectady International, Inc.
Polymer Div.
P.O. Box 1046
2750 Balltown Road
Schenectady, NY 12301
Phone: (518) 370-4200
Fax: (518) 382-8129
John Fisher, Product Mgr.
Alkyd Resins
Phenolic Resins

Scott Bader, Inc.
1592 Georgetown Rd.
Hudson, OH 44236
Phone: (216) 650-5000
Fax: (216) 528-0184
Bill Fitzgibbons, President; Erika Seyfried, Technical Sales Associate; Sue Spurlock, Office Mgr.
Acrylic Resins
Dispersing Agents & Surfactants
Styrene Resins
Thickening Agents
Vinyl Chloride & Vinylidene Chloride Polymer Emulsions

Sellers Cleaning Systems
c/o Crane Pumps & Systems

420 E. Third St.
Piqua, OH 45396
Phone: (937) 773-2442
Fax: (937) 778-3521
Mike Kemp, Marketing Mgr.; Lee Lafond, Regional Sales Mgr.
Misc. Solvents

SEMicro Div.
15817 Crabbs Branch Way
Rockville, MD 20855
Phone: (301) 975-9798
Fax: (301) 975-9653
E-Mail: semicro@aol.com
Jon Massey, Laboratory Mgr.; Laura Estok, Asst. to President
Epoxy Resins

Sentry/Custom Services Corp.
RR 5, Box 5491
East Stroudsburg, PA 18301
Phone: (717) 421-2574
Fax: (717) 421-2511
E-Mail: infocia@coatings.org
David W. Crookall, President; Susan Rightmeyer, V.P.

Acids (Non-Fatty)
Anti-Blocking Agents
Anti-Foaming Agents
Anti-Rust Agents
Anti-Skinning Agents
Black/Brown/Gray Pigments
Bodying Agents
Coalescing Agents
Dispersing Agents & Surfactants
Epoxy Resins
Fillers-Natural, Cellulosic, Polymeric
Ink Additives
Iron Oxide Pigments
Masking Agents
Melamine & Melamine Type Resins
Misc. Other Chemical Specialties
Nitrocellulose
Pigment Dispersions (Aqueous)
Plasticizers
Static Preventive
Stearates
Surface Conditioners & Lubricants
Synthetic & Modified Oils
Thickening Agents
Urethane & Polyurethane Resins
Water Repellents-Silicone, Corrosion Inhibitors
Water Treatment Chemicals
Water-Thinned Resins
Waxes

Sequa Chemical, Inc.
One Sequa Dr.
Chester, SC 29706
Phone: (803) 385-5181
Fax: (803) 581-6212
Kim Deacon, Business Unit Dir.; Clarence Huntington, Technical Rep.

Acrylic Resins
Amino Resins
Anti-Blocking Agents
Catalysts
Ink Additives
Melamine & Melamine Type Resins
Polyamide Resins
Printing Ink Dispersants & Vehicles
Stearates
Styrene Resins
Surface Conditioners & Lubricants
Ultraviolet Curing Resins
Vinyl Resins
Water Repellents-Silicone, Corrosion Inhibitors
Water-Thinned Resins

Shamrock Technologies, Inc.
Foot of Pacific St.
Newark, NJ 07114

RAW MATERIAL SUPPLIERS

Phone: (973) 242-2999
Fax: (973) 242-8074
Mike Oliveri; Joe Coffey
Anti-Blocking Agents
Anti-Foaming Agents
Flattening Agents
Flow Control Agents
Surface Conditioners & Lubricants
Texturizers
Water Repellents-Silicone, Corrosion Inhibitors
Waxes

Shell Chemical Co.
910 Louisiana
Houston, TX 77002
Toll Free: (800) USA-SHELL
Fax: (713) 241-1606

Web: www.shellichemical.com
Acrylic Resins
Alcohols
Aliphatic Hydrocarbons
Aromatic Hydrocarbons
Custom Solvent Blending
Denatured Ethyl Alcohols
Dispersing Agents & Surfactants
Epoxy Resins
Glycol Ethers
Glycols
High-Solid Resins
Hydrocarbon Solvents
Ketones
Misc. Solvents
Monomers
Plasticizers
Polyester Resins



The Shepherd Chemical Co.
4900 Beech St.
Cincinnati, OH 45212
Phone: (513) 731-1110
Fax: (513) 731-1532
E-Mail: shepchem@eos.com
Wayde Yeoman, Sales Mgr.; Michael Selby, Technical Sales Rep.
Anti-Skinning Agents
Driers
Stearates

SEE OUR AD ON PAGE 117.



Aquasil® Inhibited Aluminum Pigments For Aluminized Aqueous Coatings

Looking for an aluminum pigment that's compatible with your aqueous coating system, try Aquasil®. Aquasil resists the tendency to react with water, offers ease of incorporation, and cost-effective system compatibility.

Our Technical Support Team can provide information on selecting the proper pigment and formulation procedure. Silberline has also established a variety of starting point formulations based on a wide array of coating vehicles. Call or write Silberline today.

- Starting Point Formulations available for Acrylic, Epoxy, Water Reducible Alkyds, Urethanes, and High Heat Resistant Coatings.

The H₂Othority™



Specialists in Aluminum Pigments
SILBERLINE
MANUFACTURING CO., INC.

Plants in Lansford and Hometown, Pennsylvania; Decatur, Indiana and Laven, Fife, Scotland.
Lincoln Drive, P.O. Box B • Tamaqua, PA 18252-0420
Phone: 800-348-4824 • Fax: 717-668-0197



AQUASIL®

Circle No. 238 on the Reader Service Card

The Shepherd Color Co.
4539 Dues Dr.
P.O. Box 465627
Cincinnati, OH 45246
James White, Technical Marketing Specialist

Black/Brown/Gray Pigments
Blue Pigments
Green Pigments
Yellow and Orange Pigments

Sherwin-Williams Chemicals
101 Prospect Ave., NW
Cleveland, OH 44115
Phone: (216) 566-1294
Fax: (216) 566-3837
Charles Simpson, Mgr., Technical Services

Anti-Foaming Agents
Anti-Rust Agents
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Flame and Smoke Retardants



Silberline Mfg. Co., Inc.
P.O. Box B
Lincoln Dr.
Tamaqua, PA 18252-0420
Phone: (717) 668-6050
Fax: (717) 668-0197

Metallic Flakes and Powdered Pigments

SEE OUR AD ON THIS PAGE.

Silbrico Corp.
6300 River Rd.
Hodgkins, IL 60514
Phone: (708) 354-3350
Fax: (708) 354-6698
Richard Willis, Sales
Extender Pigments

Sino-American Pigment Systems, Inc.
1936 University Ave., Ste. 330
Berkeley, CA 94704-1024
Phone: (510) 848-8890
Fax: (510) 848-8889
Kent Stelling; Dir. Administration; Michael Issel, President
Corrosion-Inhibiting Pigments

Extender Pigments
Green Pigments
Red Pigments
White Pigments
Yellow and Orange Pigments

SKW Chemicals, Inc.
1509 Johnson Ferry Rd., Ste. 150
Marietta, GA 30062
Phone: (770) 971-1317
Fax: (770) 971-4306
Craig Fish, Sr. Sales Rep.
Epoxy Hardeners-Chemicals

Werner G. Smith, Inc.
1730 Train Ave.
Cleveland, OH 44113
Phone: (216) 861-3676
Fax: (216) 861-3680
Waldemar Meckes, Jr.
Marine
Soybean
Sunflower
Waxes

Soluol Chemical Co., Inc.
Green Hill and Market Sts.
P.O. Box 112
West Warwick, RI 02893
Phone: (401) 821-8100
Fax: (401) 823-6673
Warren J. Simmons, President & CEO; Cliff
Tishler, V.P.; J. George Nathanson, V.P.;
John Reisch, Technical Dir.
Urethane & Polyurethane Resins
Urethane Crosslinkers

Solutia Inc.
10300 Olive Blvd.
St. Louis, MO 63141
Justine MacDonald; Steve Zollmann;
Marilyn Grolitzer
Adhesion Promoters
Amino Resins
Dispersing Agents & Surfactants
Flame and Smoke Retardants
Flow Control Agents
High-Solid Resins
Ink Additives
Melamine & Melamine Type Resins
Misc. Viscosity, Suspension and Flow Control
Agents
Plasticizers
Printing Ink Dispersants & Vehicles
Water Treatment Chemicals

Southern Clay Products, Inc.
1212 Church St.
Gonzales, TX 78629
Phone: (830) 672-2891
Fax: (830) 672-1903
Frank Scimecca; Kent Cutler
Fillers-Natural, Cellulosic, Polymeric
Flocculants
Flow Control Agents
Ink Additives
Misc. Other Additives
Misc. Viscosity, Suspension and Flow Control
Agents
Suspension Agents
Thickening Agents

Spartan Flame Retardants, Inc.
345 E. Terra Cotta Ave.
P.O. Box 395
Crystal Lake, IL 60039
Phone: (815) 459-8500
Fax: (815) 459-8560
E-Mail: spartan@mc.net
John C. Kuetemeyer
Flame and Smoke Retardants

Special Masking Co.
5618 Hamlet Ave.
Cleveland, OH 44127
Toll Free: (800) 433-2719
Fax: (216) 441-0715
Thomas Diccilo, General Mgr.
Chlorinated Solvents
Custom Solvent Blending
Esters
Misc. Solvents

Spectra Colors Corp.
25 Rizzolo Rd.
Kearny, NJ 07032
Toll Free: (800) 527-8588
Fax: (800) 635-1811
E-Mail: Spectra.Colors@worldnet.att.net
Vinod Parikh, V.P. Technical Services; Carol
D. Dix, Technical Service Mgr.
Dyes
Pigment Dispersions (Aqueous)

StanChem Inc.
Albi Manufacturing Div.
401 Berlin St.
East Berlin, CT 06023
Phone: (860) 828-0571
Fax: (860) 828-3297
W. Casey West, V.P. Sales/Marketing
Acrylic Resins
Flame and Smoke Retardants
Melamine & Melamine Type Resins
Misc. Type Resins
Printing Ink Varnishes & Compounds
Urethane Lacquers
Varnishes
Vinyl Resins

Startex Chemicals, Inc.
P.O. Box 3087
Conroe, TX 77305
Toll Free: (800) 292-3336
Fax: (409) 756-1083
E-Mail: csdinc@flashdotnet
Rich Brown, President
Alcohols
Aliphatic Hydrocarbons
Aromatic Hydrocarbons
Custom Solvent Blending
Denatured Ethyl Alcohols
Esters
Glycol Ethers
Hydrocarbon Solvents
Ketones
Nitroparaffins
Misc. Solvents

Süd-Chemie Rheologicals
1600 W. Hill St.
P.O. Box 32370
Louisville, KY 40210
Phone: (502) 634-7500
Fax: (502) 634-7727
Janice Hausberger, Sales Mgr.
Anti-Settling Agents
Castor Oil (Dehydrated)
Flow Control Agents
Ink Additives
Misc. Other Additives
Thickening Agents

Summit Precision Polymers
Mountaintop Div.
One Parker Plaza
Fort Lee, NJ 07024
Phone: (201) 585-0080
Fax: (201) 585-9776
Anti-Foaming Agents
Flame and Smoke Retardants
Flattening Agents
Flow Control Agents

Ink Additives
Surface Conditioners & Lubricants
Suspension Agents
Waxes

Sun Chemical Corp.
5020 Spring Grove Ave.
Cincinnati, OH 45232
Phone: (513) 681-5950
Fax: (513) 632-1537
Ed Polaski, Sales Mgr.; Peter A. Lewis,
Coatings Industry Mgr.
Blue Pigments
Green Pigments
Other Pigments
Pigment Dispersions (Aqueous)
Red Pigments
Yellow and Orange Pigments

Surtec Inc.
5907 Murvihill Rd.
Valparaiso, IN 46383
Phone: (219) 531-0066
Fax: (219) 531-9038
E-Mail: surtec@netnitco.net
Anti-Blocking Agents
Ink Additives

T

Technical Industries, Inc.
217 Church St.
P.O. Box 65
Peace Dale, RI 02883-0065
Phone: (401) 783-5887
Fax: (401) 789-2270
A.J. Rose, Jr., President; Eric A. Rose, V.P.;
F. Steven DiMasi, Plant/Quality Mgr.
Antioxidants
Black/Brown/Gray Pigments
Blue Pigments
Corrosion-Inhibiting Pigments
Dispersing Agents & Surfactants
Extender Pigments
Pigment Dispersions (Aqueous)
Thickening Agents
White Pigments

Tego Chemie Service
914 E. Randolph Rd.
P.O. Box 1299
Hopewell, VA 23860
Toll Free: (800) 446-1809
Fax: (804) 541-2783
James P. Yosh, Jr., Business Mgr.; Robin
Reinhardt, Technical Service Mgr.
Anti-Blocking Agents
Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Dispersing Agents & Surfactants
Flow Control Agents
Ink Additives
Misc. Other Chemical Specialties
Photocuring Materials/Photoinitiators
Silicone Polyesters
Silicone Resins
Surface Conditioners & Lubricants
Water Repellents-Silicone, Corrosion Inhibitors

Texas Resin Co.
2728 Empire Central
Dallas, TX 75220
Phone: (214) 353-1678
Fax: (214) 350-7624
Bruce Bridges, Sales Mgr.
Acrylic Resins
Alkyd Resins

High-Solid Resins
Polyester Resins
Urethane & Polyurethane Resins

Thibaut & Walker Co., Inc.
P.O. Box 296
Newark, NJ 07101
Phone: (201) 589-3331
Fax: (201) 589-7231
Steve Holland, Executive V.P.
Acrylic Resins
Alkyd Resins
Silicone Resins
Urethane & Polyurethane Resins

Thomas Scientific
99 High Hill Rd.
Swedesboro, NJ 08085
Phone: (609) 467-2000
Fax: (609) 467-3087
E-Mail: value@thomasci.com
Ed Pierzynski, V.P. Marketing; Mike Garner,
Industrial Marketing Mgr.
Acids (Non-Fatty)
Caustics and Caustic Sodas
Glycerine

P.L. Thomas & Co., Inc.
4 Headquarters Plaza, N. Tower, Ste. 203
Morristown, NJ 07963
Phone: (201) 984-0900
Fax: (201) 984-5666
Judith Przybylski, Product Mgr., Resins
Natural Resins

Tikkurila & McWhorter CPS
7600 State Rd.
Philadelphia, PA 19136
Phone: (215) 335-9777
Fax: (215) 335-7354
E-Mail: mmsantamaria@worldnet.att.net
Miguel Santamaria, Managing Dir.
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)

Tioxide Americas Inc.
2001 Butterfield Rd., Ste. 601
Downers Grove, IL 60515
Phone: (630) 663-4900
Fax: (630) 663-4901
Web: www.ici.com
White Pigments

Toyol America, Inc.
1717 N. Naper Blvd., Ste. 201
Naperville, IL 60563-8838
Phone: (630) 505-2169
Fax: (630) 505-2176
Metallic Flakes and Powdered Pigments

Toyo Ink America, Inc.
910 Sylvan Ave.
Englewood Cliffs, NJ 07632
Phone: (201) 568-8660
Fax: (201) 569-2455
Richard M. Skudera, Senior Sales Mgr.
Blue Pigments
Green Pigments
Pigment Dispersions (Aqueous)
Pigment Dispersions (Non-Aqueous)
Red Pigments
Yellow and Orange Pigments

Tri-Star Chemical Co., Inc.
P.O. Box 38627
Dallas, TX 75238
Phone: (214) 341-0054
Tony Jones, Marketing Mgr.
Anti-Foaming Agents



Troy Corporation
8 Vreeland Rd.
P.O. Box 955
Florham Park, NJ 07932
Phone: (973) 443-4200
Fax: (973) 443-0257
Timothy M. Savage, V.P. Marketing; Eric
Bensaid, V.P. Sales

Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Anti-Sagging Agents
Anti-Settling Agents
Anti-Skinning Agents
Antioxidants
Bodging Agents
Catalysts
Coalescing Agents
Corrosion Inhibitors
Dispersing Agents & Surfactants
Driers
Flocclulants
Flow Control Agents
Ink Additives
Misc. Other Additives
Misc. Viscosity, Suspension and Flow
Control Agents
Preservatives
Printing Ink Dispersants & Vehicles
Surface Conditioners & Lubricants
Suspension Agents
Thickening Agents

SEE OUR AD ON OPPOSITE PAGE.

U



UCB Chemicals Corp.
Radcure Div.
2000 Lake Park Dr.
Smyrna, GA 30080
Phone: (770) 434-6188
Fax: (770) 434-8314
Michel Phillips, Marketing Mgr.; Dennis
Nack, General Sales Mgr.

Adhesion Promoters
Monomers
Photocuring Materials/Photoinitiators
Reactive Diluents
Ultraviolet Curing Resins

SEE OUR AD ON PAGE 139.

Uhlich Color Company
5620 North Kolb Rd.
Tucson, AZ 85750
Phone: (520) 577-7705
Fax: (520) 577-0038
Blue Pigments
Dyes
Green Pigments
Red Pigments
Yellow and Orange Pigments

Ultra Additives, Inc.
460 Straight St.
Paterson, NJ 07501
Phone: (973) 279-1306
Fax: (973) 279-0602
Karl D'Amico, EVP, Sales/Marketing; Tara
Nuszer, Technical Service Mgr.
Anti-Foaming Agents
Ink Additives



Unimin Corp.
258 Elm St.
New Canaan, CT 06840
Phone: (203) 966-8880
Fax: (203) 966-3453
Abrasives/Anti-Skid
Extender Pigments
Fillers-Natural, Cellulosic, Polymeric
Texturizers

SEE OUR AD ON PAGE 141.

Union Carbide Corp.
39 Old Ridgebury Rd.
Danbury, CT 06817-0001
Toll Free: (800) 335-8550
Phone: (203) 794-5300
Fax: (203) 794-3170
Acids (Non-Fatty)
Alcohols
Aliphatic Hydrocarbons
Coalescing Agents
Denatured Ethyl Alcohols
Dispersing Agents & Surfactants
Epoxy Resins
Esters
Flocclulants
Glycol Ethers
Glycols
High-Solid Resins
Ink Additives
Ketones
Misc. Other Additives
Misc. Solvents
Misc. Type Resins
Monomers
Photocuring Materials/Photoinitiators
Plasticizers
Polyethylene Resins
Polypropylene Resins
Reactive Diluents
Thickening Agents
Ultraviolet Curing Resins
Vinyl Chloride & Vinylidene Chloride Polymer
Emulsions
Vinyl Resins
Water Treatment Chemicals
Water-Thinned Resins

United Mineral & Chemical Corp.
1100 Valley Brook Rd.
Lyndhurst, NJ 07071-3608
Phone: (201) 507-3300
Fax: (201) 507-1506
E-Mail: umccorp@sprynet.com

Acrylic Resins
Anti-Rust Agents
Black/Brown/Gray Pigments
Blue Pigments
Caustics and Caustic Sodas
Corrosion-Inhibiting Pigments
Dyes
Epoxy Hardeners-Chemicals
Epoxy Resins
Extender Pigments
Flame and Smoke Retardants
Glycerine



Troysan® Polyphase® 588

Defeats The Algae/Fungi Alliance

The dreaded slime is back! You may recognize it as familiar green, blue-green and brown algae — the ones that used to be knocked out by mercury. They cause problems that most fungicides can't solve. No longer controlled, these damaging organisms gained a new lease on life — on your coatings applied to roofs, wood and other construction materials. That is until the creation of Troysan® Polyphase® 588.

Troysan® Polyphase® 588 is a powerful new biocide developed by Troy, the inventors of Troysan Polyphase technology. It's designed specifically to prevent algal and fungal growth on coatings. Troysan Polyphase 588 provides effective protection against premature film failure caused by biological attack in a variety of waterborne and solvent based coating systems including elastomeric roof coatings, EIFS (synthetic stucco systems), exterior paints & stains, caulks, sealants and adhesives.

U.S. EPA registered and patented, Troysan® Polyphase® 588 is targeted specifically against the broad spectrum of algae and fungi that threaten coatings. Contributing little if any VOC's to your product, this easy to use, low viscosity liquid product meets the environmental concerns of consumers and the workplace.

When you need an ally to defeat the invading horde, call Troy Corporation for the latest technology to protect your coating systems.

TROY CORPORATION

8 Vreeland Road

P.O. Box 955, Florham Park, NJ 07932

973-443-4200 Fax: 973-443-0257



TROY

Performance Products... Worldwide

Green Pigments
Methacrylic Monomers and Polymers
Other Pigments
Red Pigments
Stearates
TGIC Resins
Tung Oil
White Pigments
Yellow and Orange Pigments

United Soybean Board
c/o Omni Tech International
2715 Ashman St.
Midland, MI 48640
Phone: (517) 631-3377
Fax: (517) 631-7360
E-Mail: info@omnitechintl.com
Soybean

U.S. Bronze Powders, Inc.
408 Route 202
P.O. Box 31
Flemington, NJ 08822-0031
Phone: (908) 782-5454
Fax: (908) 782-3489
William J. Cwieka, V.P. Sales; Rhonda G. Kasler, Mgr., Customer Service
Metallic Flakes and Powdered Pigments

U.S. Polymers, Inc.
300 E. Primm St.
St. Louis, MO 63111
Phone: (314) 638-1632
Fax: (314) 638-3100
Roger Heitland, President; Mary Kalbfleisch, Office Mgr.; Robert Gaal, Technical Dir.
Acrylic Resins
Alkyd Resins
Epoxy Resins
High-Solid Resins
Oleo-resinous Varnishes
Polyester Resins

U.S. Silica Company
P.O. Box 187
Highway 522 North
Berkeley Springs, WV 25411
Phone: (304) 258-2500
Fax: (304) 258-8295
Robert B. Calamari, V.P. Sales; John H. Wilson, Distribution Mgr.; Matthew J. Lyman, Product Mgr.
Extender Pigments

U.S. Zinc Corp.
Gulf Reduction Div.
P.O. Box 611
Houston, TX 77001-0611
Phone: (713) 926-1705
Fax: (713) 924-4924
David Leggett, Sales Mgr. Zinc Dust
Corrosion-Inhibiting Pigments
Metallic Flakes and Powdered Pigments
Whit Pigments



The Vandemark Group
One North Transit Rd.
Lockport, NY 14094-1712
Phone: (716) 433-6764
Fax: (716) 433-2850



R.T. Vanderbilt Co., Inc.
Paint & Paper Dept.
30 Winfield St.
P.O. Box 5150
Norwalk, CT 06856-5150
Phone: (203) 853-1400
Fax: (203) 853-1452
E-Mail: paint@rtvanderbilt.com
V. Carlson, Sales Mgr.

Anti-Rust Agents
Anti-Sagging Agents
Anti-Settling Agents
Antioxidants
Corrosion Inhibitors
Dispersing Agents & Surfactants
Driers
Extender Pigments
Flattening Agents
Preservatives
Suspension Agents

SEE OUR AD ON OPPOSITE PAGE.

Vanguard Chemical International Inc.
1325 E. 19th St.
Plano, TX 75074
Phone: (214) 423-1120
Fax: (214) 423-1291
Craig J. Brennan, V.P.
Nitrocellulose
Phenolic Resins
Stearates

Velsicol Chemical Corp.
10400 W. Higgins Rd.
Rosemont, IL 60018
Toll Free: (800) 843-7759
Fax: (847) 298-9014
Coalescing Agents
Photocuring Materials/Photoinitiators

Vianova Resins Inc.
4331 Chesapeake Dr.
Charlotte, NC 28216
Phone: (704) 559-6737
Fax: (704) 559-6699
E-Mail: stockil@ches.hcc.com
A. Stocki, V.P. Technology & Marketing; M. O'Shaughnessy, V.P. Sales

Acrylic Resins
Alkyd Resins
Amino Resins
Anti-Floating Agents
Anti-Flooding Agents
Anti-Foaming Agents
Anti-Sagging Agents
Anti-Settling Agents
Catalysts
Dispersing Agents & Surfactants
Driers
Epoxy Hardeners-Chemicals
Epoxy Resins
Flow Control Agents
High-Solid Resins
Melamine & Melamine Type Resins
Misc. Other Chemical Specialties
Misc. Type Resins
Misc. Viscosity, Suspension and Flow Control Agents
Phenolic Resins
Polyamide Resins
Polyester Resins
Ultraviolet Curing Resins
Urethane & Polyurethane Resins
Urethane Lacquers
Water-Thinned Resins

Vinavil Americas
110 Boulevard East
Maskinonge, QC J0K 1M0
Canada
Toll Free: (800) 717-2564
Fax: (610) 670-7471



Wabash Gilsonite Blends, Inc.
P.O. Box 368
Effingham, IL 62401
Phone: (217) 342-9755
Fax: (217) 342-9827
E-Mail: wabashoil@ccipost.net
John Brendenkamp, President; Clyde Parrish, Quality Control
Hydrocarbon Ink Oils
Hydrocarbon Resins
Misc. Type Resins
Soybean

Wacker Silicones Corp.
3301 Sutton Rd.
Adrian, MI 49221-9397
Phone: (517) 264-8500
Fax: (517) 264-8246
Nick Salchert, Team Leader; Gudrun Windfuhr, Marketing Mgr.
Adhesion Promoters
Flow Control Agents
Ink Additives
Misc. Other Additives
Silicone Resins
Surface Conditioners & Lubricants
Water Repellents-Silicone, Corrosion Inhibitors

Wayne Pigment Corp.
306 N. Milwaukee St.
Milwaukee, WI 53202
Phone: (414) 255-2400
Fax: (414) 225-2410
W. Thomas Pettijohn, President; James B. Boldt, V.P.
Corrosion Inhibitors
Corrosion-Inhibiting Pigments
Misc. Other Chemical Specialties
Other Pigments
Yellow and Orange Pigments

Wilkinson Kaolin Associates, Ltd.
121 Milledgeville Hwy.
Gordon, GA 31031
Phone: (912) 628-5301
Fax: (912) 628-3231
Web: <http://www.minerals.com/wilkinson>
J. Barry Sellers, Managing General Partner; Shay Sellers, Sales/Marketing; Gene Moore, Plant Mgr.; Rader Sellers, Mines Mgr.
Extender Pigments

Witco Corp.
Organic Silicones Group
One American Ln.
Greenwich, CT 06831-2559
Toll Free: (800) 295-2392
Phone: (203) 552-2000
Fax: (203) 552-2010
R.M. Bennett, Marketing Mgr.; Coatings; R. Ruckie, R&D Group Leader, Silicones-Coatings; B. Waldman, Technology Mgr., Organofunctional Silanes
Adhesion Promoters
Anti-Blocking Agents
Anti-Floating Agents
Anti-Flooding Agents

Build quality into your paints and coatings with Vanderbilt ingredients

MINERAL PRODUCTS

Magnesium Silicate Extenders

NYTAL[®] 100
NYTAL 200
NYTAL 300
NYTAL 300H
NYTAL 400
NYTAL 3300
NYTAL 7700
VANTALC[®] 6H
VANTALC F2003
I.T. 3X
I.T. 5X
I.T. 325
I.T. FT

Wollastonite

VANSIL[®] W10
VANSIL W20
VANSIL W30

Pyrophyllite Extenders

PYRAX[®]
VEECOTE[®]

Aluminum Silicate Extenders

PEERLESS[®] Clay
PEERLESS Coating Clay
DIXIE CLAY[®]
BILT PLATES[®]

Inorganic Thixotrope for Aqueous systems

VEEGUM[®]
VAN GEL[®] B

BIOCIDES

Mold Inhibitors

VANCIDE[®] 51Z Dispersion
VANCIDE 89
VANCIDE MZ-96
VANCIDE MZ-96 Dispersion

Preservative

VANCIDE TH

ADDITIVES

Drier Accelerators and Stabilizers

ACTIV-8[®]

1,10-Phenanthroline

Flow Control Agent for Solvent-Thinned Paints

RHEOTOL[®]

Dispersing Agents for Aqueous Systems

DARVAN[®]

Corrosion Inhibitor

VANCOR[®] 073 HF

VANCOR 081 HF

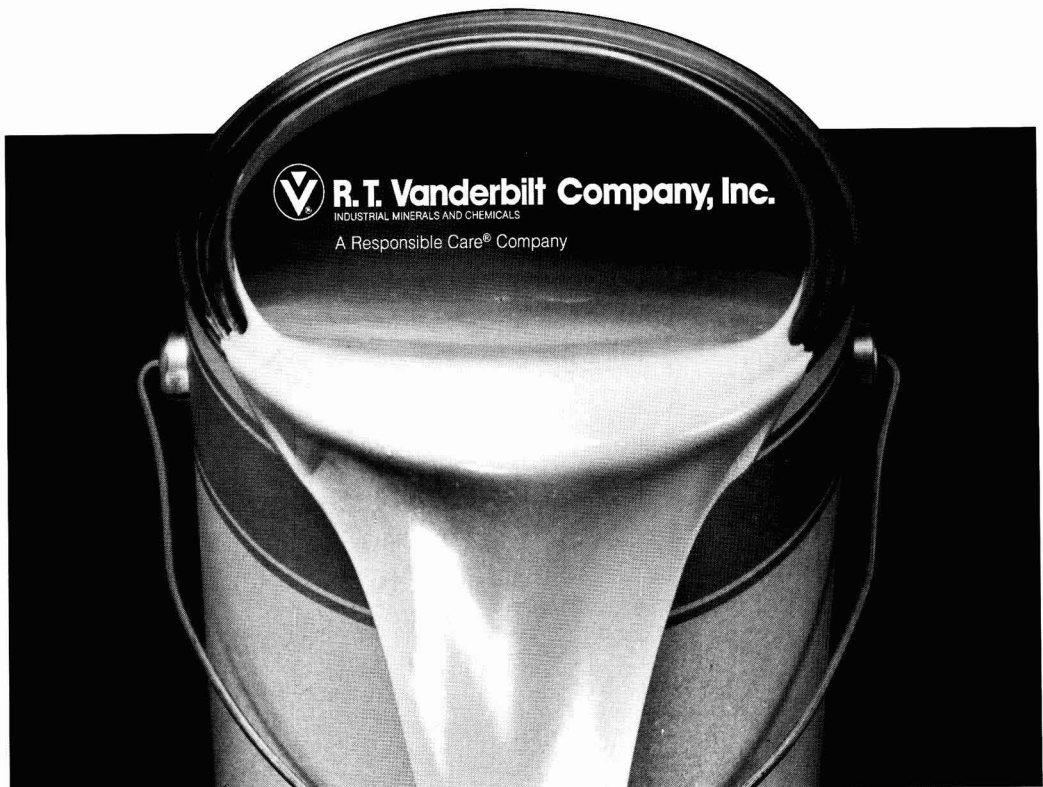
SYNTHETIC RUBBER

Polymers

HYPALON[®]

NEOPRENE

P.O. Box 5150, Norwalk, CT 06856-5150 • Tel: (203) 853-1400 • Fax: (203) 853-1452 • E mail: paint@rtvanderbilt.com
6280 Manchester Blvd. Ste. 204 Buena Park, CA 90621 (714) 670-8084 • Fax: (714) 739-1488
Web Site: www.rtvanderbilt.com



R. T. Vanderbilt Company, Inc.

INDUSTRIAL MINERALS AND CHEMICALS

A Responsible Care[®] Company

Anti-Foaming Agents
 Dispersing Agents & Surfactants
 Flow Control Agents
 Ink Additives
 Misc. Other Additives
 Misc. Other Chemical Specialties
 Misc. Viscosity, Suspension and Flow Control Agents
 Surface Conditioners & Lubricants
 Synthetic & Modified Oils
 Water Repellents-Silicone, Corrosion Inhibitors

Z

Zemex Industrial Minerals
 1040 Crown Pointe Pkwy., Ste. 270
 Atlanta, GA 30338
 Phone: (770) 392-8664
 Fax: (770) 392-8670
 Patrick Carr, V.P. Sales, Specialty Products
 Bodying Agents
 Extender Pigments
 Fillers-Natural, Cellulosic, Polymeric
 Flattening Agents
 Ink Additives

Zeneca Biocides
 1800 Concord Pike
 Wilmington, DE 19850
 Phone: (302) 477-8000
 Fax: (302) 477-8120
 Colin Gouveia, Commercial Mgr.; Mark Kenline, Commercial Mgr.

Zeneca Pigments & Additives
 8720 Red Oak Blvd., Ste. 227
 Charlotte, NC 28217
 Phone: (704) 561-7340
 Fax: (704) 561-7353
 Robin Kinney, Marketing & Sales Mgr.; Jan Weernik, Tech. Mgr.; Monica Girimes, Safety, Health, Environmental

Blue Pigments
 Dispersing Agents & Surfactants
 Dyes
 Green Pigments
 Pigment Dispersions (Aqueous)
 Red Pigments
 Yellow and Orange Pigments

Zeneca Resins
 730 Main St.
 Wilmington, MA 01887
 Phone: (978) 658-6600
 Fax: (978) 657-7978

John Kibbee, Architectural and Graphic Arts Business Mgr.; Bill Otterbein, Industrial and Adhesive & Sealants Business Mgr.

Acrylic Resins
 Alkyd Resins
 Polyester Resins
 Urethane & Polyurethane Resins
 Vinyl Chloride & Vinylidene Chloride Polymer Emulsions

Zinc Corp. of America, Inc.
 300 Frankfort Rd., Rt. 18
 Monaca, PA 15061
 Phone: (412) 774-1020
 Fax: (412) 773-2269

A.C. Hardies, V.P. Sales; S.L. Lewis, Technical Service Eng.

Corrosion Inhibitors
 Corrosion-Inhibiting Pigments
 Metallic Flakes and Powdered Pigments
 Preservatives
 UV Absorbers
 White Pigments

OMG

The First Name In Drier Technology For Today's New Requirements

No matter what your drier requirements, **OMG** has the experience, technology and products to meet your industry's changing needs.

The Driers Used In Paint And Ink Products.

Long a leader in specialty driers and additives, **OMG** has enhanced the performance of solvent borne, waterborne and high solids coatings and printing inks.

The Drier That Works With Your Formula.

As government regulations or industry requirements change, often something has to change in your formula. At **OMG**, we'll custom-design a drier that works with your new formula.

Continuous New Product Development.

For high solids coatings - our new AOC 1020X Aluminum Drier. Eliminates wrinkling.



improves yellowing resistance and offers an alternative drier system for VOC-compliant coatings.

For printing inks - our new Hydro-Cure® P.I. Drier. Water-activated to release the oxygen in ink to give you a faster dry time.

The Right Company For You.

OMG is a global company with unequalled resources, facilities and technological expertise in the field of specialty metal chemicals.

What's more, you'll find a company with total emphasis on technical service - helping you solve problems and develop new products by tailoring our expertise to your new applications.

To meet your manufacturing objectives, look to **OMG**... the world's largest producer of high quality driers and additives for coatings and inks.



811 Sharon Drive • Westlake, OH 44145 • (440) 899-2950 • Fax (440) 808-7114 • Call Toll Free (800) 321-9696

WE HAVE THE RIGHT SOLUTION.

Circle No. 250 on the Reader Service Card



ZOICHEM
 ZINC OXIDE

Zochem, Division of Hudson Bay

P.O. Box 1120
 Brampton, Ont. L6V 2L8
 Canada
 Phone: (905) 453-4100
 Fax: (905) 453-2920

Scott A. Gilliard, Sales Mgr.
 UV Absorbers
 White Pigments

Production Equipment Suppliers

A

A & J Mixing Intl. Inc.
8-2345 Wyecroft Rd.
Oakville, Ont. L6L 6L4
Canada
Toll Free: (800) 668-3470
Fax: (905) 827-5045
E-Mail: ajmixing@globalserve.net
A.B. (Bliss) Flower
Blenders
Mixing and Dispensing

A.P. Dataweigh Systems
325-D Sharon Industrial Way
Suwanee, GA 30024
Phone: (770) 932-5033
Fax: (770) 932-4229
E-Mail: dataweigh@aol.com
Patrick Hetzel, Marketing Dir.
Agitators
Filling/Packaging/Labeling
Ink Production Equipment
Instrumentation and Control
Material Handling & Conveyors
Mixing and Dispensing
Safety/Fire Protection
Test/Measurement

Paul O. Abbe, Inc
139 Center Ave
Little Falls, NJ 07424
Phone: (201) 256-4242
Fax: (201) 256-0041
Charles J. Gero, V.P. Sales & Marketing;
Barry Fuller, Sales Engineer
Blenders
Grinding Media
Grinding/Milling

ABC Dispensing Technologies Inc.
451 Kennedy Rd.
Akron, OH 44305
Phone: (330) 733-2841
Fax: (330) 733-2264
Randy Letsch, V.P. Sales/Marketing

Accu-Rate, Inc.
A Unit of Schenck AccuRate
746 E. Milwaukee St.
Whitewater, WI 53190
Toll Free: (800) 558-0184
Phone: (414) 473-2441
Fax: (414) 473-4383
Web: <http://www.sannco.com>
Instrumentation and Control
Material Handling & Conveyors

Acetex Enterprises
7601 Central Ave.
Detroit, MI 48210
Toll Free: (800) 444-3800
Phone: (313) 834-4000
Fax: (313) 834-2603

Acrison, Inc.
20 Empire Blvd.
Moonachie, NJ 07074
Phone: (201) 440-8300
Fax: (201) 440-4939
E-Mail: informail@acrison.com
Terry Shaw, Dir. Marketing
Blenders

Instrumentation and Control Material Handling & Conveyors

Alar Engineering Corp.
9651 W. 196th St.
Mokena, IL 60448
Phone: (708) 479-6100
Fax: (708) 479-9059
Vickey Hansen, V.P. Sales
Filtering/Straining

All-Flo Pump Co.
9431 Pineneedle Dr.
Mentor, OH 44060
Phone: (440) 354-1700
Fax: (440) 354-9466
E-Mail: email@all-flo.com
Valerie Thomas, V.P. Marketing/Sales
Pumping/Metering

Ambrose Company
6001 192nd St., NE
P.O. Box 3037
Arlington, WA 98223
Phone: (360) 435-1141
Fax: (360) 435-8200
John Bowman, President
Filling/Packaging/Labeling
Material Handling & Conveyors

American Lewa, Inc.
132 Hopping Brook Rd.
Holliston, MA 01746
Phone: (508) 429-7403
Fax: (508) 429-8615
E-Mail: sales@amlewa.com
Ken McQuesten, Sales Mgr.; Don Deveaux,
Mgr. Sales Engineering
Dispensers
Ink Production Equipment
Instrumentation and Control
Pumping/Metering

American Specialty Equipment
Div. of Gregory Industrial Trucks
15 Daniel Rd.
Fairfield, NJ 07004-2506
Phone: (973) 808-8399
Fax: (973) 808-8398
Gregory Russell, President; Robert E.
Doran, Sales Mgr.
Material Handling & Conveyors
Safety/Fire Protection

AMEX[®] Cleaning & Coating
Removal Systems
5 Crescent Ave.
P.O. Box 349
Rocky Hill, NJ 08553
Toll Free: (800) 332-5424
Fax: (609) 497-9308
E-Mail: downede@armex.com
Ken Colbert, General Mgr.; Delia L. Downes,
Marketing Mgr.; Scott Sorrell, National Sales
Mgr.
Cleaning

Analytical Measurements, Inc.
621 Ramsey Ave.
Hillside, NJ 07205-1009
Toll Free: (800) 635-5580
Fax: (908) 964-6622
Raymond H. Thornton, President
Instrumentation and Control
Pumping/Metering

Anchor Chemical Co.
777 Canterbury Rd.
Westlake, OH 44145
Phone: (216) 871-1660
Fax: (216) 871-0665
Michael DiDomenico, President
Containers

Anker Labelers USA Inc.
705 Live Oak St., Ste. E
Tarpon Springs, FL 34689
Phone: (813) 937-0233
Fax: (813) 942-6361
E-Mail: ankerusa@gte.net
Paul Aschebrock, Executive V.P./GM
Filling/Packaging/Labeling

Apex Drum Co., Inc.
6226 Ferguson Dr.
Los Angeles, CA 90022
Phone: (213) 721-8994
Fax: (213) 721-1096
Jerry Flom, Authorized Rep.
Containers
Filling/Packaging/Labeling
Ink Production Equipment
Material Handling & Conveyors
Mixing and Dispensing
Pumping/Metering

Applied Thermal Tech. Inc. Hydro Miser Div.
548 S. Pacific St., Bldg. B-101
San Marcos, CA 92069
Phone: (760) 744-5083
Fax: (760) 744-5031
T.M. Howard, President; M.A. Duke, Marketing
Instrumentation and Control

Aqua-Tec Filter Co.
12410 Clark Ave.
Santa Fe Springs, CA 90670
Phone: (562) 941-1203
Fax: (562) 941-1202
Ed Earl
Filtering/Straining

Atotech USA Inc.
20026 Progress Dr.
Strongsville, OH 44136
Phone: (216) 572-7800
Fax: (216) 572-7820

Automation Products Inc.
3030 Max Roy St.
Houston, TX 77008
Phone: (713) 869-0361
Fax: (713) 869-7332
Sales/Information: Tech. Applications Dept.
Blenders
Distillation
Filling/Packaging/Labeling
Ink Production Equipment
Instrumentation and Control
Material Handling & Conveyors

Dynatrol[®] Level Detection of Bulk Solids
For **POWDERS**
GRANULARS
PELLETS
BULK SOLIDS, etc.



Automation Products, Inc.
3030 Max Roy Street, Houston, Texas 77008-9981 USA
Fax 713-869-7332 Phone 800-231-2062 J076-CL111

Avestin Inc.
P.O. Box 8530
Ottawa, Ont. K1G 3H9
Canada
Phone: (613) 234-7709
Mixing and Dispersing
Pumping/Metering

B

B & P Process Equipment and Systems
1000 Hess St.
Saginaw, MI 48601
Phone: (517) 757-1300
Fax: (517) 757-1301
Greg Burns, Product Mgr.; Pete Giles, Sales Mgr.

Blenders
Mixing and Dispersing

B.A.G. Corp.
11510 Data Dr.
Dallas, TX 75218
Phone: (800) 331-9200
Fax: (214) 340-4598
Joe Clear, Dir. Marketing.; Cindy Finley, Dir. Sales
Containers
Films
Material Handling & Conveyors

Badger Meter, Inc.
4545 W. Brown Deer Rd.
Milwaukee, WI 53223
Phone: (414) 355-0400
Fax: (414) 355-7499
Craig Nissen, Marketing Mgr.
Instrumentation and Control
Pumping/Metering

Anthony Barber Associates Ltd.
1413 Bull Creek Dr.
Libertyville, IL 60048
Phone: (847) 918-8276
Fax: (847) 918-7574
Anthony F. Barber, Owner
Filling/Packaging/Labeling

Barnant Co.
28W092 Commercial Ave.
Barrington, IL 60010
Toll Free: (800) 637-3739
Fax: (847) 381-7053
E-Mail: Barnant@mc.net
Dispensers
Instrumentation and Control
Mixing and Dispersing
Pumping/Metering

Bayer Corporation
100 Bayer Rd.
Pittsburgh, PA 15205-9741
Phone: (412) 777-2000
Fax: (412) 777-4431
E-Mail: www.bayerus.com
Films

T.J. Bell Inc.
1340 Home Ave
Akron, OH 44310
Phone: (330) 633-3644
Fax: (330) 633-1977
Dawn Roth, Sales
Dispensers
Grinding/Milling

Bergen Barrel & Drum Co.
43-45 O'Brien St.
Kearny, NJ 07032
Phone: (201) 998-3500
Fax: (201) 998-0414
Charles Zilbert, President; Lisa Ann Goldstein, Sales Coordinator
Containers
Mixing and Dispersing

Betz Dearborn
Metals Process Group
200A Precision Dr.
Horsham, PA 19044
Phone: (215) 355-3300
Fax: (215) 773-2800
Web: www.betzdearborn.com
Mitch Kassouf, Technical Marketing Dir.; Holly Davis, Marketing Communications
Pumping/Metering

Bilt-Rite Conveyors, Inc.
141 Lanza Ave.
Garfield, NJ 07026
Phone: (973) 546-1000
Fax: (973) 546-2539
Jeffrey Billing, President
Material Handling & Conveyors

Bishop International Co.
P.O. Box 66343
Chicago, IL 60666
Phone: (630) 238-9566
Fax: (630) 238-9567
Kurt Buehrer, Project Mgr.

Agitators
Blenders
Blending Tanks
Containers
Dispenser Blades
Dispensers
Filling/Packaging/Labeling
Filtering/Straining
Grinding/Milling
Mixing and Dispersing

Blacoh Fluid Control, Inc.
1221 Dodson Way
Riverside, CA 92507
Phone: (909) 342-3100
Fax: (909) 342-3101
E-Mail: blacoh@deltanet.com
Gary Cornell, President; Alvin Fischer, Sales & Marketing Mgr.
Filtering/Straining
Instrumentation and Control
Pumping/Metering

The Blade Shop
148 York St.
Auburn, NY 13021
Phone: (315) 253-6720
Fax: (315) 253-3099
E-Mail: bladeshop@relex.com
Mitch Meyer, President
Dispenser Blades
Mixing and Dispersing

Blasdel Enterprises Inc.
495 W. McKee St.
P.O. Box 260
Greensburg, IN 47240
Phone: (812) 663-3213
Fax: (812) 663-4968
E-Mail: jillblas@hsonline.net
Web: www.blasdelent.com
Jill Blasdel, V.P. Sales
Curing Systems
Infrared Curing Equipment

Boss Bulk Systems, Inc.Div.
Steelcraft Industries Ltd.
904 Downie Rd. 112
P.O. Box 339
Statford, Ont. N5A 6T3
Canada
Toll Free: (800) 254-2467
Fax: (519) 272-0911
Chris Wyatt, Sales Mgr.
Containers

Bowers Process Equipment Inc.
Steelcraft Industries Ltd.
904 Downie Rd. 112
P.O. Box 339
Statford, Ont. N5A 6T3
Canada
Toll Free: (800) 567-3223
Fax: (519) 272-0911
Wilf Schalm, Sales Mgr.

Agitators
Blenders
Blending Tanks
Containers
Dispenser Blades
Dispensers
Ink Production Equipment
Mixing and Dispersing
Ram Dischargers

C.W. Brabender Instruments Inc.
50 E. Wesley St.
South Hackensack, NJ 07606
Phone: (201) 343-8425
Fax: (201) 343-0608
E-Mail: CWBI@ix.netcom.com
Kevin R. Van Allen, V.P., Sales & Marketing
Grinding/Milling
Mixing and Dispersing

Brinkmann Instruments Inc.
One Cantiague Rd.
P.O. Box 1019
Westbury, NY 11590-0207
Phone: (516) 334-7500
Fax: (516) 334-7506
Grinding/Milling
Instrumentation and Control
Mixing and Dispersing
Pumping/Metering
Solvent Recovery

Buhler Inc.
1100 Xenium Ln.
P.O. Box 9497
Minneapolis, MN 55441
Phone: (612) 545-1401
Fax: (612) 540-9246
Pius Eigenmann, Sales Mgr., Paint Div.
Agitators
Blenders
Blending Tanks
Dispensers
Grinding/Milling
Ink Production Equipment
Instrumentation and Control
Material Handling & Conveyors
Mixing and Dispersing
Ram Dischargers
Safety/Fire Protection

Bulkcon Systems
1751 E. Major Blvd.
Custer, MI 49405
Phone: (616) 757-2473
Fax: (616) 757-2022
Thomas VanKampen, President
Containers



BYK-Gardner USA
 9104 Guilford Rd.
 Columbia, MD 21046
 Toll Free: (800) 343-7721
 Fax: (301) 483-6555
 E-Mail: custserv@bykgardnerusa.com
Customer Service Dept.

- Dispersers
- Film Applicators
- Grinding/Milling
- Instrumentation and Control
- Mixing and Dispersing
- Pumping/Metering

SEE OUR AD ON PAGE 90.

C

Cambridge Applied Systems, Inc.
 196 Boston Ave.
 Medford, MA 02155
 Phone: (781) 393-6500
 Fax: (781) 393-6515
 Web: www.cambridge-applied.com
 Lori Cerqua, Applications Specialists; Ken Mann, Applications Eng.
 Instrumentation and Control

Casso-Solar Corp.
 230 U.S. Rte. 202
 Pomona, NY 10970
 Toll Free: (800) 988-4455
 Fax: (914) 362-1856
 E-Mail: cassori@mne.net
 D. Connington, Sales Support; D. Weisman, Mgr., Finishing Systems Div.
 Curing Systems
 Infrared Curing Equipment

CB Mills
 1300 Northwestern Ave.
 Gurnee, IL 60031
 Toll Free: (800) 522-7343
 Fax: (847) 662-4003
 E-Mail: cbmills@lx.netcom.com
 David Pagor, Sales Mgr.; J. Denny Stidham, General Mgr.
 Blending Tanks
 Cleaning
 Containers
 Dispersers
 Dispensers
 Distillation
 Filling/Packaging/Labeling
 Grinding Media
 Grinding/Milling
 Ink Production Equipment
 Mixing and Dispersing
 Solvent Recovery

Celite Corp.
 c/o World Minerals, Inc.
 137 West Central Ave.
 P.O. Box 519
 Lompoc, CA 93436
 Toll Free: (800) 342-8667
 Fax: (805) 735-5699
 Customer Service Dept.
 Filtering/Straining

CEM Corp.
 3100 Smith Farm Rd.
 P.O. Box 200
 Matthews, NC 28106
 Phone: (704) 821-7015
 Fax: (704) 821-5185
 Greg LeBlanc, Sales Mgr.
 Instrumentation and Control

Cincinnati Industrial Machinery
 3280 Hageman St.
 P.O. Box 62027
 Cincinnati, OH 45262
 Phone: (513) 769-0700
 Fax: (513) 769-0697
 Tom Shield, Sales & Marketing Mgr.; Ralph Patrick, President
 Cleaning
 Curing Systems
 Infrared Curing Equipment

Cis-Can Industries Ltd.
 5918 Roper Rd.
 Edmonton, AB T6B 3E1
 Canada
 Phone: (403) 466-3178
 Fax: (403) 468-5904
 E-Mail: help@ciscan.com
 Peter Howie, V.P., Sales; Steve Wilcoxon, General Sales Mgr., Industrial Div.
 Curing Systems
 Infrared Curing Equipment

Clawson Container Co.
 4545 Clawson Tank Dr.
 Clarkston, MI 48346
 Phone: (248) 625-8700
 Fax: (248) 625-3066
 Mike Harding, V.P. Sales; Don Anderson, Marketing Mgr.; Dick Harding, General Mgr.
 Containers
 Material Handling & Conveyors

The Cleveland Vibrator Co.
 2828 Clinton Ave.
 Cleveland, OH 44113
 Phone: (800) 221-3298
 Fax: (216) 241-3480
 Jack Steinbush, General Sales Mgr.
 Filtering/Straining
 Material Handling & Conveyors

Columbus Industries Inc
 2938 St. Rt. #752
 Ashville, OH 43103
 Phone: (614) 983-2552
 Fax: (614) 983-4622
 E-Mail: colind@scioto.net
 Filtering/Straining

Composition Materials Co., Inc.
 1375 Kings Hwy., E.
 Fairfield, CT 06430
 Phone: (203) 384-6111
 Fax: (203) 335-9728
 Alan K. Nudelman, President
 Cleaning

- Agitators
- Blenders
- Disperser Blades
- Dispensers

SEE OUR AD ON PAGE 76.

Consolidated Drum Reconditioning Co., Inc.
 P.O. Box 2067
 Montebello, CA 90640
 Phone: (213) 724-8500
 Tony Serge, V.P. Dir. Marketing; Calvin Lee, V.P. Dir. Operations
 Agitators
 Containers
 Filling/Packaging/Labeling
 Safety/Fire Protection

Control Instruments Corp.
 25 Law Dr.
 Fairfield, NJ 07004
 Phone: (973) 575-9114
 Fax: (973) 575-0013
 E-Mail: sales@controlinstruments.com
 Joseph Corsi, Sales Director
 Instrumentation and Control

Coors Wear Products, Inc.
 Div. of Coors Ceramics Co.
 230 Mayview Rd.
 Lawrence, PA 15055
 Phone: (412) 745-9522
 Fax: (412) 746-4294
 Ralph Glenn, Operations Mgr.; Steve Evanovich, Engineering Mgr.
 Containers
 Grinding/Milling

Corob North America Div.
 Taotek North America, Inc.
 13315 G. Carowinds
 Charlotte, NC 28273
 Phone: (704) 588-8408
 Fax: (704) 588-8471
 Carlos M. Salas, President; Marco Amadei, Technical Service Mgr.; Bruce Edstrom, Sales/Marketing Mgr.
 Dispensers

Crandall International, Inc.
 1109 Military Rd.
 P.O. Box 653
 Buffalo, NY 14217
 Phone: (716) 876-0402
 Fax: (716) 876-7137
 Keith A. Crandall, President
 Filling/Packaging/Labeling
 Material Handling & Conveyors

CSC Scientific Co., Inc.
 2810 Old Lee Highway
 Fairfax, VA 22031
 Phone: (703) 876-4030
 Fax: (703) 280-5142
 E-Mail: csc@cscscientific.com
 Barbara Weber, Product Mgr., Moisture; Barbara Abel, Product Mgr., Surface Tension
 Instrumentation and Control

Cuno, Inc.
 400 Research Parkway
 Meriden, CT 06450
 Phone: (203) 237-5541
 Fax: (203) 238-8977
 Web: www.cuno.com
 Drew Willoughby, Market Mgr.
 Filtering/Straining



Conn and Co.
 11 S. Marion St.
 Warren, PA 16365
 Phone: (814) 723-7980
 Fax: (814) 723-8502

Custom Metalcraft Inc
2332 E. Division
Springfield, MO 65803
Phone: (417) 862-0707
Fax: (417) 864-7575
Ron Lancaster, Sales Mgr.; Tom Hughes,
Product Mgr.; Dwayne Holden, President;
Nikki Holden, Advertising Mgr.

Blenders
Blending Tanks
Containers
Material Handling & Conveyors

D

DCE, Inc.
11301 Electron Dr.
Louisville, KY 40299
Toll Free: (800) 767-0702
Phone: (502) 267-0707
Fax: (502) 267-3074
E-Mail: DCEDD@aol.com
Filtering/Straining
Safety/Fire Protection

J. De Vree & Co. N.V.
Toekomstlaan 10
Merksem, Antwerp 2170
Belgium
Phone: 323 645 7690
Fax: 323 646 4815
U.S. Representation, Metco Inc., Troy MI.
Phone: (810) 585-2190
Fax: (810) 585-6632
Filling/Packaging/Labeling

Dedert Corp.
20000 Governors Dr.
Olympia Fields, IL 60461
Phone: (708) 747-7000
Fax: (708) 755-8815
M. John Ruhl, Mgr. Solvent Recovery Div.
Solvent Recovery

Dek-Tron Scientific Instruments
244 E. Third St.
Plainfield, NJ 07060
Phone: (908) 668-1777
Fax: (908) 668-4794
Miguel A. Vargas, Financing; Segundo H.
Vargas, Sales/Marketing; Hector Vargas,
Engineering
Material Handling & Conveyors

Delta Controls Corp.
585 Forston St.
Shreveport, LA 71107
Phone: (318) 424-8471
Fax: (313) 425-2421
E-Mail: delta@deltacont.com
C. Jamison
Instrumentation and Control

DeMarco MAX VAC Corp.
674 S. County Line Rd.
Bensenville, IL 60106
Phone: (630) 766-1119
Fax: (630) 766-1077
E-Mail: maxvac@maxvac.com
Thomas DeMarco, President
Material Handling & Conveyors

Disti-Kleen, Inc.
358 Nye Ave.
Irvington, NJ 07111-4713
Phone: (973) 372-1500
Fax: (973) 372-8311
E-Mail: disti@ibm.net
Michael J. Schmutzer, President
Cleaning
Dispensers
Distillation
Solvent Recovery

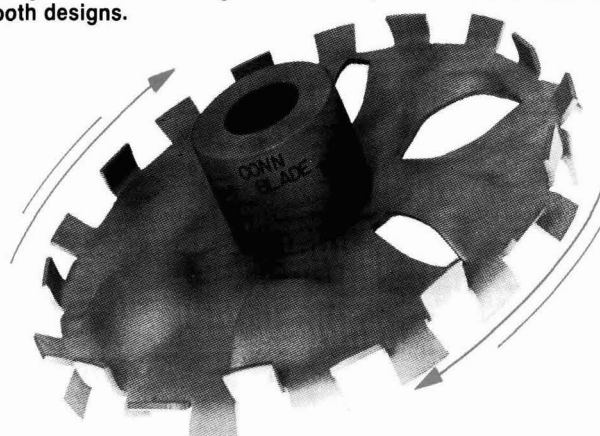
Dixie Poly-Drum Corp.
Highway 68, Hill Rd.
Yesmassee, SC 29945
Phone: (803) 589-6660
Fax: (803) 589-4050

Draiswerke GmbH
North America Div.
P.O. Box 546
South Haven, MI 49090
Phone: (616) 639-2008
Fax: (616) 639-2507
E-Mail: kquality1@cybersol.com
Randolph C. Grieves, Kquality Equip. Co.

Agitators
Blending Tanks
Containers
Dispenser Blades
Grinding Media
Grinding/Milling

THE CONN BLADE®

Patented intensive type blending/dispersing blades with unique design features making a radical improvement over old saw tooth designs.



- ★ **Most efficient and aggressive blending/dispersing blade available.**
- ★ **Provides proper combination of pumping action and shear/dispersion essential for fast and consistent results.**
- ★ **Built in pumping action for material turnover can cut processing time 30 to 40%.**
- ★ **Blades last much longer due to heavier gauge construction and shorter required running time.**
- ★ **Puts less heat into product.**
- ★ **Excellent for high or low speed and high or low viscosity.**
- ★ **Supplied with hubs or mounting holes required to retrofit and upgrade present equipment.**
- ★ **Pumping blades without teeth are available and are excellent for more gentle blending and agitation.**

DESIGNERS AND MANUFACTURERS OF INDUSTRIAL MIXING EQUIPMENT

CONN AND CO.
Since 1948
"We Keep Things Mixed Up"

Stirrers Or Complete Units For:
PAINTS URETHANE FOAMS
ADHESIVES SLURRIES
INKS GROUTS
CEMENTS ETC. . . .

11 SOUTH MARION STREET • WARREN, PENNA. 16365 • PHONE 814/723-7980
FAX (814) 723-8502

Circle No. 142 on the Reader Service Card

Ink Production Equipment
Instrumentation and Control
Mixing and Dispensing

Draiswerke, Inc.
40 Whitney Rd.
Mahwah, NJ 07430
Phone: (201) 847-0600
Fax: (201) 847-0606
Gisbert Schall, President; Edward Casama,
Technical Mgr.

Agitators
Blenders
Blending Tanks
Disperser Blades
Dispensers
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

Drum-Mates, Inc.
Drum Mixers & Pump Div.
P.O. Box 636
Lumberton, NJ 08048
Phone: (609) 261-1033
Fax: (609) 261-1034
David Marcmann, Sales Mgr.

Agitators
Blenders
Mixing and Dispensing
Nozzles
Pumping/Metering
Rotators

High Efficiency Drum Mixer

- > Much shorter blending times
- > Increased batch-mix quality
- > Mixing wide thickness range
- > High liquid turnover all rpms



DRUM-MATES® Drum Mixers & Pumps
Tel: 800-621-3786, Fax: 609-261-1034

E

E.C.D.
4287-A SE International Way
Wilwaukie, OR 97222
Phone: (503) 659-6100
Fax: (503) 659-4422
E-Mail: ecd@ecd.com
Rick Eissingner, V.P. Sales/Marketing
Instrumentation and Control

Easy Lift Equipment Co., Inc.
2 Mill Park Ct.
Newark, DE 19713
Phone: (302) 737-7000
Fax: (302) 737-7333
A. Joseph Irons, Jr., Sales Mgr.; Dennis
Skomorucha, Sales Rep.; Mark Grimes,
Sales Rep.
Material Handling & Conveyors

Eclipse Systems
Div. Technology General Corp.
12 Cork Hill Rd.
Franklin, NJ 07416
Phone: (973) 827-7878
Fax: (973) 827-4613
Agitators
Mixing and Dispensing

ECO Corporation
11300 Electron Dr.
Louisville, KY 40299
Phone: (800) 707-3465
Fax: (502) 267-3047
Stephen L. Pitkin, Sales Mgr.
Filtering/Straining



Eiger Machinery, Inc.
888 E. Belvidere Rd., Ste. 214
Grayslake, IL 60030
Phone: (847) 548-0044
Fax: (847) 548-0099
Dave L. Peterson, V.P.; Beverly
Thornbloom, Office Mgr.; Robert G.
Radcliff, Parts Mgr.

Agitators
Disperser Blades
Dispensers
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

SEE OUR AD ON PAGE 153.

Einstein and Co.
30285 Bruce Industry Pkwy.
Solon, OH 44139
Phone: (440) 498-0500
Fax: (440) 349-5901
Bill Einstein, President & Sales Mgr.
Blenders
Grinding/Milling
Mixing and Dispensing

Electronic Liquid Fillers, Inc.
1535 S. Hwy. #39
La Porte, IN 46350
Phone: (800) 328-0466
Fax: (219) 324-2884
Tom Ake Reed, Executive V.P.
Filling/Packaging/Labeling
Material Handling & Conveyors

Electronic Sensors, Inc.
1611 W. Harry
Wichita, KS 67213
Phone: (316) 267-2807
Fax: (316) 267-2819
E-Mail: sday@leveldevil.com
Scott Day, Sales Mgr.
Instrumentation and Control

Electro-Technic Products, Inc.
4642 N. Ravenswood
Chicago, IL 60640-4510
Phone: (773) 561-2349
Fax: (773) 561-3130
Instrumentation and Control

Empire Abrasive Equipment Co.
2101 W. Cabot Blvd.
Langhorne, PA 19047-1893
Phone: (215) 752-8800
Fax: (215) 752-9373
E-Mail: Airblast@empire.airblast.com
Robert M. Morey, V.P.
Cleaning

Epworth Morehouse-Cowles
1400 Kalamazoo St.
South Haven, MI 49090
Toll Free: (800) 566-9021
Fax: (616) 637-3421
Also Epworth Morehouse-Cowles, 1600 W.
Commonwealth Ave., Fullerton, CA
92833; (800) 625-4819, Fax: (714) 738-
5960; Stewart Rissley; Bret Lewis

Agitators
Blenders
Blending Tanks
Containers
Dispensers
Disperser Blades
Dispensers
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

F

Fabricated Metals, Inc.
12 Union St.
Modena, PA 19358
Phone: (800) 356-9167
Fax: (610) 383-9030
Jim Pry, East Coast Sales Mgr.; Ed
Kaneday, V.P. Marketing

Blenders
Containers
Ink Production Equipment
Instrumentation and Control
Material Handling & Conveyors

Fanuc Robotics North America, Inc.
3900 W. Hamlin Rd.
Rochester Hills, MI 48309-3253
Phone: (248) 377-7000
Fax: (248) 377-7366
Christine Hohnowski, Marketing Associate
Material Handling & Conveyors
Robotics/Automation

Fawcett Co., Inc.
3863 Congress Pkwy.
Richfield, OH 44286
Phone: (330) 659-4187
Fax: (330) 659-6991
Dave LaMaster

Agitators
Blenders
Disperser Blades
Dispensers
Ink Production Equipment

Filter Specialists, Inc.
100 Anchor Rd., P.O. Box 735
Michigan City, IN 46361
Toll Free: (800) 879-3307
Fax: (219) 877-0632
Web: www.fsifilters.com
James Graft, Dir. Sales/Marketing; Doug
Fitzgerald, International Mgr.
Filtering/Straining

Finish Thompson, Inc.
921 Greengarden Rd.
Erie, PA 16501
Phone: (814) 455-4478
Fax: (814) 455-8518
E-Mail: finish@erie.net
Mark W. Bolash, National Sales Mgr., Env.
Products; Louis A. Nichilo, Inside Sales
Mgr., Pumps
Pumping/Metering
Solvent Recovery

Florida Drum Company
3300 N. Hutchinson St.
Pine Bluff, AR 71602
Customer Service: Charlotte, NC (800) 438-2243; Pensacola, FL (800) 874-1425; and Pine Bluff, AR (800) 352-3786
Containers

Fort James Corporation
120 Tredegar St.
P.O. Box 2218
Richmond, VA 23218
Phone: (804) 644-5411
Fax: (804) 649-4428
Corporate Information Center
Containers

Fostoria Industries, Inc.
Process Heat Div.
1200 N. Main St.
Fostoria, OH 44830
Phone: (419) 435-9201
Fax: (419) 435-0842
E-Mail: gpfostor@bright.net
Steve Fruth, Sales Dir.; Greg Alspach,
Marketing Mgr.
Curing Systems
Infrared Curing Equipment

**Electric Infrared
CURING OVENS**



Phone: (419) 435-9201

Fryma Inc.
40 Ethel Rd.
Edison, NJ 08817
Phone: (732) 248-0700
Fax: (732) 248-0705
Dispersers
Grinding/Milling
Ink Production Equipment

Fusion UV Systems, Inc.
910 Clopper Rd.
Gaithersburg, MD 20878
Phone: (301) 527-2660
Fax: (301) 527-2661
Curing Systems

G

Paul N. Gardner Co., Inc.
316 NE First St.
P.O. Box 10688
Pompano Beach, FL 33060
Phone: (954) 946-9454
Fax: (954) 946-9309
E-Mail: gardner@gardco.com
Paul N. Gardner, Jr., President
Blenders
Disperser Blades
Film Applicators
Ink Production Equipment
Mixing and Dispensing

SEE OUR AD ON PAGE 79.

Gasmac, Inc., Finish Div.
509 Clair Rd., W.
Guelph, Ont. N1H 6H9 Canada
Phone: (519) 836-5362
Fax: (519) 836-4242
Samuel Schneider, Mgr.
Curing Systems
Infrared Curing Equipment
Spray Booths

Gilson Co., Inc.
P.O. Box 677
Worthington, OH 43085
Phone: (614) 548-7298
Fax: (614) 548-5314
E-Mail: gilson@coil.com
David W. Ditmars, Marketing Dir.
Compressors
Containers
Curing Systems
Filtering/Straining
Grinding Media
Grinding/Milling
Instrumentation and Control
Mixing and Dispensing
Pumping/Metering

Glas-Col
711 Hulman St.
P.O. Box 2128
Terre Haute, IN 47802
Phone: (812) 235-6167
Fax: (812) 234-6975
Instrumentation and Control
Mixing and Dispensing

Glen Mills, Inc.
395 Allwood Rd.
Clifton, NJ 07012
Phone: (973) 777-0777
Fax: (973) 777-0070
E-Mail: staff@glenmills.com
S. Goldberg, Dir.
Blenders
Grinding Media
Grinding/Milling
Mixing and Dispensing

Gleno Inc.
39 McBride Ave.
Paterson, NJ 07501-1715
Toll Free: (800) 922-0106
Phone: (973) 279-5900
Fax: (973) 279-9103
E-Mail: info@gleno.com
Curing Systems
Infrared Curing Equipment

Gough Econ, Inc.
P.O. Box 668583
Charlotte, NC 28266
Phone: (704) 399-4501
Fax: (704) 392-8706
Mark Gallagher, V.P. Technical Sales; Karl Dearnley, Agency Sales Mgr.
Material Handling & Conveyors

Graco, Inc.
P.O. Box 1441
Minneapolis, MN 55440
Agitators
Ink Production Equipment
Pumping/Metering

Granco Pump Co.
1308 67th St.
Oakland, CA 94608
Phone: (510) 652-8847
Fax: (510) 652-1565
Hank Cloots, General Mgr.
Pumping/Metering

GretagMacbeth
617 Little Britain Rd.
New Windsor, NY 12553
Phone: (914) 565-7660
Fax: (914) 565-0390
Instrumentation and Control

Grieve Corp.
500 Hart Rd.
Round Lake, IL 60073
Phone: (847) 546-8225
Fax: (847) 546-9210
E-Mail: bandc@interaccess.com
Frank Calabrese, National Sales Mgr.
Curing Systems
Infrared Curing Equipment

Gruenberg Oven
4 Quality St.
Williamsport, PA 17701
Phone: (717) 326-1755
Fax: (717) 326-7304
E-Mail: lunadvrt@mail.cslink.net
Jeff Myers, Marketing Mgr.; Dennis Mendler,
Assistant Sales Mgr.
Curing Systems

H

Heisler Industries, Inc.
224 Passaic Ave.
Fairfield, NJ 07004
Phone: (973) 227-6300
Fax: (973) 227-7627
Lori Podesta, Sales Eng.; Rick Hugg, Sales Eng.
Containers
Filling/Packaging/Labeling
Material Handling & Conveyors
Robotics/Automation

Hero Industries, Inc.
2719 Lake City Way
Vancouver, B.C. V5A 2Z6
Canada
Toll Free: (800) 494-4376
Phone: (604) 420-6543
Fax: (604) 420-8725

Hockmeyer Equipment Corp.
P.O. Box 113
Harrison, NJ 07029
Phone: (201) 482-0225
Fax: (201) 484-6114
Cathy D. Strahan, V.P. Marketing

Agitators
Cleaning
Containers
Disperser Blades
Dispersers
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing
Ram Dischargers

Hoover Color Corp.
P.O. Box 218
State Highway 693
Hiwassee, VA 24347
Phone: (540) 980-7233
Fax: (540) 980-8781
Steve Haimann, Technical Sales Mgr.;
Charles Hoover, Jr., Chief Operating Officer
Mixing and Dispensing

Horiba Instruments Inc.
17671 Armstrong Ave.
Irvine, CA 92614
Phone: (714) 250-4811
Fax: (714) 250-0924
Terry Stauffer, General Mgr.
Pumping/Metering

I

Ideal Manufacturing & Sales Corp.
1118 O'Neill Ave.
Madison, WI 53704
Phone: (608) 241-1118
Fax: (608) 241-4448
Robert D. Whetstone, V.P., Sales; Dan Duerner, Sales Eng.
Filling/Packaging/Labeling

Ideal of America
5300 Cedar Chase
Atlanta, GA 30338
Phone: (770) 455-0624
Fax: (770) 454-9567
E-Mail: idealvr@jun.com
Allan Pollock, V.P. Sales
Filling/Packaging/Labeling
Film Applicators

IGT Reptest Inc.
543 W. Golf Rd.
Arlington Heights, IL 60005
Phone: (847) 952-2448
Fax: (847) 952-2449
Jeroen Ronk
Ink Production Equipment

IKA Works, Inc.
2635 N. Chase Pkwy. S.E.
Wilmington, NC 28405-7419
Phone: (910) 452-5059
Fax: (910) 452-7693
Scott Council, Product Mgr., Laboratory Div.; Scott Bitter, Product Mgr.; Process Div.
Agitators
Blenders
Dispersers
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

Indco, Inc.
4040 Earnings Way
P.O. Box 589
New Albany, IN 47150
Phone: (800) 942-4383
Fax: (800) 942-9742
David Dufour, Sales Mgr.; Glenn Huber, Production Mgr.; Tricia Uhl, Customer Service Mgr.
Disperser Blades
Dispersers
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

Industry Tech
188 Scarlet Blvd.
Oldsmar, FL 34677
Phone: (813) 855-5054
Fax: (813) 891-9904
Don MacLeod, President; Bonnie-Jean Creais, Office Mgr.; Pete Millenorr, Plant Mgr.
Film Applicators
Mixing and Dispensing

Infra-Red Technologies, Inc.
1201 Burlington
N. Kansas City, MO 64116
Phone: (816) 421-4422
Fax: (816) 421-4415
Rich White, President; Tom Connors, V.P./General Mgr.
Curing Systems
Infrared Curing Equipment

Infratrol Manufacturing Corp.
646 S. 29th St.
Milwaukee, WI 53215
Phone: (414) 671-7140
Fax: (414) 671-5088
Hank Hemphill, V.P. Sales
Cleaning
Curing Systems
Infrared Curing Equipment

Innes Clips, Inc.
P.O. Box 820
Larchmont, NY 10538
Phone: (914) 834-3304
Fax: (914) 834-3646
Containers

SEE OUR AD ON PAGE 145.

INOUE USA
7018 A.C. Skinner Pkwy. #240
Jacksonville, FL 32256
Jerry Chait
Agitators
Blenders
Blending Tanks

Disperser Blades
Dispersers
Grinding/Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

International Compliance Center Ltd.
2150 Liberty Dr.
Niagara Falls, NY 14304
Phone: (716) 283-0002
Fax: (716) 283-0119

International Reserve Equipment Corp.
Four S. Prospect Ave.
P.O. Box 198
Clarendon Hills, IL 60514-0198
Phone: (630) 325-7040
Fax: (630) 325-7045
Thomas J. Mertz, Partner/Advertising
Blenders
Containers
Filtering/Straining
Grinding/Milling
Heat Boilers
Mixing and Dispensing
Pumping/Metering
Reactor and Recovery Systems

Invincible Airflow Systems
600 N. Ray
P.O. Box 380
Baltic, OH 43804
Phone: (330) 897-3200
Fax: (330) 897-3400
Material Handling & Conveyors



**Free Catalog of Physical & General Purpose
Test Instruments for Lab & Field**

316 NE First Street • Pompano Beach, FL 33060
1-800-762-2478 • (954)946-9454 • FAX (954)946-9309
www.gardco.com • e-mail: gardner@gardco.com

Circle No. 222 on the Reader Service Card

ITT Marlow/ITT A-C Pump
1150 Tennessee Ave.
Cincinnati, OH 45229
Toll Free: (800) 734-PUMP
Phone: (513) 482-2500
Fax: (513) 482-2569
Keith Grgurich, Marketing Mgr.-Industrial
Pumps; Ed Catalano, General Industry
Market Mgr.
Pumping/Metering

J

Jaeco-Stewart Inc.
23 Francis Clark Cir.
Bethel, CT 06801
Phone: (203) 743-3703
Fax: (203) 743-4362
Richard R. Murdy, Sales Mgr.
Pumping/Metering

Jaygo, Inc.
675 Rahway Ave.
Union, NJ 07083
Phone: (908) 688-3600
Fax: (908) 688-6060
John Hayday, President; Al Matt, V.P.
Agitators
Blenders
Dispersers
Filtering/Straining
Grinding Media
Grinding/Milling
Mixing and Dispensing
Pumping/Metering

Jet Edge, Inc.
825 Rhode Island Ave. S.
Minneapolis, MN 55426
Phone: (612) 545-1477
Fax: (612) 545-5670
E-Mail: jetedge@jetedge.com
Tom Luckemeyer, Dir. Sales
Pumping/Metering

Jet Wheelblast Equipment
401 Miles Dr.
Adrian, MI 49221
Phone: (517) 263-0502
Fax: (517) 263-0038
Dwight E. Lutsko, General Sales Mgr.
Cleaning
Safety/Fire Protection

JMG Plastics, Inc.
3000 Dundee Rd., #213
Northbrook, IL 60062
Phone: (847) 291-0127
Fax: (847) 291-0129
Joseph Gottainer, President; Gina
Bucciarelli, Sales Mgr.
Containers

Jordan Composites Inc.
13603-B S. Halsted
Riverdale, IL 60827
Phone: (708) 841-0885
Fax: (708) 841-2191
K.C. Jordan, President; Curtis Jordan, Sales
Mgr.
Cleaning
Containers
Curing Systems
Infrared Curing Equipment
Instrumentation and Control
Material Handling & Conveyors
Pumping/Metering

K

Kady International
127 Pleasant Hill Rd., P.O. Box 847
Scarborough, ME 04070-0847
Toll Free: (800) FOR-KADY
Phone: (207) 883-4141
Fax: (207) 883-8241
Web: www.kadyinternational.com

Agitators
Blenders
Containers
Dispenser Blades
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

Kaeser Compressors, Inc.
P.O. Box 946
Fredericksburg, VA 22404
Phone: (540) 898-5500
Fax: (540) 898-5520
Harold H. Wagner, Marketing Mgr.
Compressors
Filtering/Straining
Instrumentation and Control
Pumping/Metering

Keith Industries, Inc.
248 Astor St.
Newark, NJ 07114
Phone: (973) 642-3332
Fax: (973) 733-9453
Lee Ross, V.P. Sales
Containers

Keller Products, Inc.
P.O. Box 26
Lexington, MA 02173
Toll Free: (800) 352-8422
Fax: (617) 863-2658
Jonathan Strauss, Sales Mgr.
Filtering/Straining

Kemutec, Inc.
130 Wharton Rd.
Bristol, PA 19007
Phone: (215) 788-8013
Fax: (215) 788-5113
Sharon Gallagher, Marketing Coordinator
Blenders
Centrifugal Sifters
Grinding Media
Grinding/Milling
Mixing and Dispensing
Pumping/Metering

Kernco Instruments Co., Inc.
420 Kenazo Ave.
El Paso, TX 79927-7339
Phone: (915) 852-3375
Fax: (915) 852-4084
E-Mail: brkernco@whc.net
John Kelly, General Mgr.; B. Robinson,
Sales Mgr.
Instrumentation and Control
Pumping/Metering

L

Labelette Co.
1237 Circle Ave.
Forest Park, IL 60130
Phone: (708) 366-2010
Fax: (708) 366-0226
James Wesley, President
Filling/Packaging/Labeling

Labelmaster
5724 N. Pulaski Rd.
Chicago, IL 60646
Toll Free: (800) 621-5808
E-Mail: sales@labelmaster.com
Customer Service Dept.
Filling/Packaging/Labeling

Lehmann Mills, Inc.
11000 Rt. 62 N.
P.O. Box 1083
Salem, OH 44460
Phone: (330) 332-9951
Fax: (330) 332-2208
Dave Hrovatic, Operations Mgr.; Mike
Harold, Sales Rep.; Jennifer Metts,
Marketing/Customer Service Mgr.
Grinding/Milling
Ink Production Equipment

Liftomatic, Inc.
2224 Cleveland St.
Evanston, IL 60202
Toll Free: (800) 837-6540
Fax: (847) 328-6559
E. Darren Berg, Sales Mgr.; Marie Gatilad,
Inside Sales Assoc.
Material Handling & Conveyors

Liquid Controls Corp.
105 Albrecht Dr.
Lake Bluff, IL 60044
Phone: (847) 295-1050
Fax: (847) 295-1057
Doug Chapman, Industrial Marketing Mgr.
Filtering/Straining
Instrumentation and Control
Pumping/Metering

Little Joe Industries
Bldg. 6 Unit 15, Ilene Ct.
Belle Mead, NJ 08502
Phone: (908) 526-5320
Fax: (908) 359-5724
Michael Engel, President
Ink Production Equipment

Littleford Day Inc.
7451 Empire Dr.
Florence, KY 41042
Phone: (606) 525-7600
Fax: (606) 525-1446
William R. Barker, Product Mgr.

Blenders
Dispensers
Dispensers
Mixing and Dispensing
Reactor and Recovery Systems
Solvent Recovery

Longview Fibre Co.
Liquiplex®/Drumplex® Div.
6055 E. Washington Blvd., #318
Los Angeles, CA 90040-2424
Phone: (213) 725-6150
Fax: (213) 725-6341
Tom Pugel, Sales Mgr.
Containers
Material Handling & Conveyors

LPI Inc., Div. of LDPI Co.
800 Wisconsin St.
Eau Claire, WI 54703
Toll Free: (800) 657-6956
Phone: (715) 839-8280
Fax: (715) 839-8647
E-Mail: sales@lpi-inc.com
Aaron Wilson; Lee Scheuermann
Material Handling & Conveyors
Safety/Fire Protection

M

MAC Equipment Inc.
10741 Ambassador Dr.
Kansas City, MO 64153
Phone: (816) 891-9300
Fax: (816) 891-8978
Filtering/Straining
Material Handling & Conveyors

Madsen Products Inc.
MEPCO Div.
15321 Connector Ln.
Huntington Beach, CA 92649
Toll Free: (800) 346-3726
Fax: (714) 892-1258
E-Mail: lidoff@34mepco.com
Linda Adkison, V.P. & Mgr.
Filling/Packaging/Labeling

Mardem Manufacturing
1151 Highway 33, Ste. C
Farmingdale, NJ 07727
Phone: (732) 938-2195
Fax: (732) 938-2242
Mark Demmert, President; Christian McOmber, Office Mgr.
Filling/Packaging/Labeling
Material Handling & Conveyors

Meyer & Sons, Inc. Wm. W.
8261 Elmwood Ave.
Skokie, IL 60076-0105
Phone: (847) 673-0312
Fax: (847) 673-5564
E-Mail: wmsales@theramp.net
Kathy Avdis, Marketing Coordinator
Material Handling & Conveyors

Microfluidics International Corp.
30 Ossipee Rd.
Newton, MA 02164
Phone: (617) 969-5452
Fax: (617) 965-1213
E-Mail: info@mfics.com
Mike Lento, President; Robert Bruno, V.P.
Sales/Marketing
Blenders
Dispersers
Grinding/Milling
Mixing and Dispensing

Micromeritics
One Micromeritics Dr.
Norcross, GA 30093-1877
Phone: (770) 662-3633
Fax: (770) 662-3696
Web: <http://www.micromeritics.com>
John Guerin, National Sales Mgr.; Bob Johnson, International Sales Mgr.
Instrumentation and Control

Micromet Instruments
7 Wells Ave.
Newton Centre, MA 02159
Phone: (617) 969-5060
Fax: (617) 969-5040
Nathaniel Smith, National Sales Mgr.
Instrumentation and Control

Mid-States Engineering & Manufacturing
309 N. Main
Milton, IA 52570
Phone: (515) 656-4271
Fax: (515) 656-4225
Lyle E. Moore, Sales Mgr.

Mighty Lube
9569 W. 40th St.
Fremont, MI 49412
Phone: (800) 535-9321
Fax: (616) 924-6810
Rolly Wolford, Sales; Jeff DeLoof, Sales
Material Handling & Conveyors

Mine Safety Appliances
P.O. Box 427
Pittsburgh, PA 15230
Phone: (800) 672-4678
Fax: (412) 776-3280
Len Blatnica, PLM; Gil Zuber, Sales Mgr.
Safety/Fire Protection

Minolta Corporation
101 Williams Dr.
Ramsey, NJ 07446
Toll Free: (888) ISD-COLOR
Phone: (201) 818-3517
Fax: (201) 818-4374
Instrumentation and Control

MixMor
801 Third Ave.
King Of Prussia, PA 19406
Phone: (610) 337-2700
Fax: (610) 354-0937
William J. Preston, V.P., Operations
Agitators
Mixing and Dispensing

Moco Thermal Industries
One Oven Place
Romulus, MI 48174
Phone: (313) 728-6800
Fax: (313) 728-1927
Robert Howard, V.P. Sales; Bill St. Thomas,
Mgr. Direct Sales
Curing Systems

Morse Manufacturing Co., Inc.
P.O. Box 518-JCT
East Syracuse, NY 13057-0518
Phone: (315) 437-8475
Fax: (315) 437-1029
Agitators
Material Handling & Conveyors
Mixing and Dispensing
Pumping/Metering

Myers Engineering
8376 Salt Lake Ave.
Bell, CA 90201
Phone: (213) 560-4723
Fax: (213) 771-7789
Don Brown, Sales Mgr.; Ron Tymins, Sales
Agitators
Dispenser Blades
Dispersers
Ink Production Equipment
Mixing and Dispensing
Ram Dischargers

Fax: (305) 362-5688
Web: <http://ln-p.com>
George Wirtz, Product Mgr.; Joe Soares,
National Sales Mgr.
Powder Application Dry Room

Netzsch Incorporated
119 Pickering Way
Exton, PA 19341
Phone: (610) 363-8010
Fax: (610) 363-0971
Agitators
Filtering/Straining
Grinding Media
Grinding/Milling
Mixing and Dispensing

New Protectaire Systems Co.
8 North 450-A Tamealing Ct.
Bartlett, IL 60103-9550
Phone: (847) 697-3400
Fax: (847) 697-1065
E-Mail: NewProtectaire@MSN.com
Stanley Napadow, President; John Tyrpin,
National Sales Mgr.
Containers
Filtering/Straining
Instrumentation and Control
Material Handling & Conveyors
Spray Booths

New Way Packaging Machinery, Inc.
210 Blettner Ave., P.O. Box 467
Hanover, PA 17331
Phone: (717) 637-2133
Fax: (717) 637-2966
Edward Abendschein, President
Filling/Packaging/Labeling

3680-A Dodd Rd.
St. Paul, MN 55123
Phone: (612) 405-8860
Fax: (612) 405-8865
Nicolas J. Roberts, Technical Sales, Terence P. Roberts, C.E.O.

NLB Corp
29830 Beck Rd.
Wixom, MI 48393
Phone: (248) 624-5555
Fax: (248) 624-0908
E-Mail: nlbwixom@aol.com
A. Magnuson
Cleaning
Pumping/Metering

Norstone, Inc.
P.O. Box 3
Wyncote, PA 19095-0003
Phone: (215) 635-1366
Fax: (215) 635-6355
Danijel S. Firestone, President; Samuel E. Firestone, CEO
Agitators
Dispenser Blades
Grinding Media
Grinding/Milling
Mixing and Dispensing

Norton Chemical Process Products Corp.
P.O. Box 350
Akron, OH 44309-0350
Toll Free: (888) NORTON-1
Fax: (330) 677-7245
E-Mail: 75404.446@compuserve.com
Larry Breeding, Sales Mgr., Eastern U.S.;
Kenneth J. Mills, Marketing Mgr., Catalytic
Products; Tom Poole, Sales Mgr., Western U.S.
Distillation
Instrumentation and Control

N

Nametre Company
101 Liberty St.
Metuchen, NJ 08840
Phone: (732) 494-2422
Fax: (732) 494-8916
Instrumentation and Control

National Partitions
340 W. 78th Rd.
Hialeah, FL 33014
Phone: (305) 822-3721

O



Omnimark Instrument Corp.
 1320 S. Priest Dr., Ste. 104
 Tempe, AZ 85281
 Phone: (602) 784-2200
 Fax: (602) 784-4738
 E-Mail: info@omniwww.com
 Charlene Byers, President; Gary Beeb,
 Marketing Mgr.
 Instrumentation and Control

P

Pacline Conveyors, Inc.
 155 Great Arrow Ave.
 Buffalo, NY 14207
 Phone: (716) 876-9250
 Fax: (716) 876-9287
 Paul Geddes, President
 Material Handling & Conveyors

Pall Filtron Corp.
 Industrial Div.
 50 Bearfoot Rd.
 Northborough, MA 01532
 Toll Free: (800) FILTRON
 Fax: (508) 393-1874
 Web: http://www.pall.com
 Jim Allshouse, Industrial Sales Mgr.
 Filtering/Straining

Paratherm Corp.
 1050 Colwell Rd.
 Conshohocken, PA 19428
 Phone: (610) 941-4900
 Fax: (610) 941-9191
 E-Mail: techinfo@paratherm.com
 George Wilt, Sales Eng.; Andy Andrews,
 Project Mgr.
 Heat Transfer Fluid

**Non-Fouling, Non-Toxic
 Heat Transfer Fluid**

*Precise, Uniform Temperature
 Control in Hot Rolls*

Paratherm NF[®]

- No baked-on carbon deposits
- Thermally stable Service to 600°F
- Safe (FDA/USDA certified)
- Safe, easy disposal



Paratherm Corporation

1050 Colwell Road
 Conshohocken PA 19428
 (610) 941-4900 • Fax (610) 941-9191

Technical Support: (800) 222-3611

Parker Hannifin Corp.
 Process Filtration Div.
 P.O. Box 1300
 Lebanon, IN 46052
 Phone: (317) 482-3900
 Fax: (317) 482-8410
 James E. Schmitz, Market Sales Mgr.; H.R.
 Byrd, Marketing Mgr.

Petts Enterprises
 7 Candlestick Dr.
 Lutherville, MD 21093
 Phone: (410) 321-8686
 Fax: (410) 321-8688
 Omer F. Petts, Jr., Owner; Steve
 Coverstone, Sales
 Agitators
 Blending Tanks
 Dispenser Blades
 Dispensers
 Distillation
 Filling/Packaging/Labeling
 Filtering/Straining
 Grinding Media
 Grinding/Milling
 Ink Production Equipment
 Mixing and Dispensing
 Ram Dischargers
 Solvent Recovery

Pfaudler, Inc.
 1000 West Ave.
 P.O. Box 23600
 Rochester, NY 14692
 Phone: (716) 235-1000
 Fax: (716) 235-3048
 Howard Hartley, Mgr., Engineered Systems;
 Paul Belleisle, Engineering Mgr.; Mike
 Powers, WFE Systems Mgr.

Agitators
 Blenders
 Containers
 Distillation
 Instrumentation and Control
 Reactor and Recovery Systems
 Solvent Recovery

PICO Chemical Corporation
 400 E. 16th St.
 Chicago Heights, IL 60411
 Phone: (708) 757-4910
 Fax: (708) 757-4940
 Ted Meehan, Sales Supervisor; Richard
 Pisarski, Sr., President
 Cleaning

Pioneer Packaging Machinery, Inc.
 P.O. Box 250
 Pickens, SC 29671
 Phone: (864) 878-4999
 Fax: (864) 878-8642
 Hans C. Frist, President
 Filling/Packaging/Labeling

Plast-O-Matic Valves, Inc.
 1384 Pompton Ave.
 Cedar Grove, NJ 07009
 Phone: (201) 256-3000
 Fax: (201) 256-4745
 Bob Sinclair, National Sales Mgr.; Jack
 Leonard, Advertising & Marketing Mgr.
 Instrumentation and Control
 Pumping/Metering

Plast-O-Meric, Inc.
 W227 N6225 Sussex Rd.
 Sussex, WI 53089
 Phone: (414) 246-0344
 Fax: (414) 246-0391
 D.E. Krans, Sales

Blenders
 Dispensers
 Ink Production Equipment
 Mixing and Dispensing

Plastican, Inc.
 196 Industrial Rd.
 Leominster, MA 01453-1662
 Phone: (508) 537-4911
 Fax: (508) 537-6376
 E-Mail: sales@plastican.com
 Mark Keyes, National Sales Mgr.; Thomas
 Dexter, Eastern Region Sales Mgr.; Joe
 Arnett, Central Region Sales Mgr.; Tim
 Bellomy, Western Region Sales Mgr.; Ralph
 Sorrention, Southern Region Sales Mgr.
 Containers

Porous Materials, Inc.
 Advanced Pressure & Products Div.
 83 Brown Rd., Bldg. 4
 Ithaca, NY 14850
 Phone: (607) 257-5544
 Fax: (607) 257-5634
 Krishna Gupta, Dir. Marketing
 Instrumentation and Control
 Pumping/Metering

Potters Industries, Inc.
 P.O. Box 840
 Valley Forge, PA 19482
 Phone: (610) 651-4700
 Fax: (610) 408-9724
 Customer Service
 Grinding Media

Prater Industries, Inc.
 1515 S. 55th Ct.
 Cicero, IL 60804
 Phone: (708) 656-8500
 Fax: (708) 656-8576
 R. Scott Prater, President
 Grinding/Milling

Precision Dispensing, Inc.
 905 Airport Rd.
 West Chester, PA 19380
 Phone: (610) 429-4870
 Fax: (610) 431-3031
 Martin Fallon, President; Michael Dempsey,
 Sales Mgr.
 Dispensers
 Instrumentation and Control
 Tinting

Precision Gage & Tool Co.
 375 Gargrave Rd.
 Dayton, OH 45449
 Phone: (937) 866-9666
 Fax: (937) 866-9661
 E-Mail: pgt@precisiongage-tool.com
 Vicki Waltz
 Film Applicators

Premier Mill Corp.
 One Birchmont Dr.
 Reading, PA 19606-3298
 Phone: (610) 779-9500
 Fax: (610) 779-9666
 Myron Segal, President; Thomas Picone,
 V.P. Sales/Marketing
 Agitators
 Dispenser Blades
 Dispensers
 Grinding Media
 Grinding/Milling
 Ink Production Equipment
 Mixing and Dispensing

Still Using Bag Filters?

DCF-Series Self-Cleaning Filters Are Now the Proven Answer

When we announced DCF-Series filters we promised its permanent wedge wire media would provide more consistent solids removal and eliminate media replacement, while reducing labor and disposal costs. We said the unique traveling cleaning

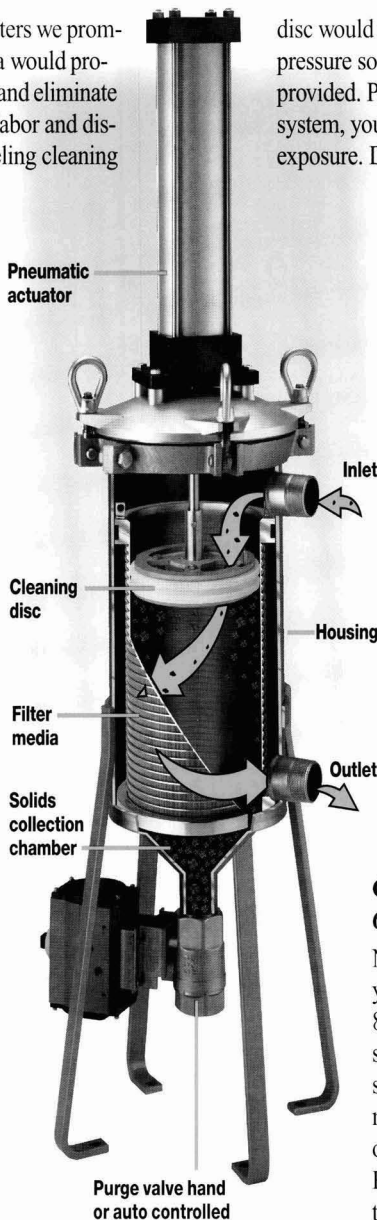
\$250,000 annual filter media replacement and disposal savings. DCF's replace all bag and cartridge filters in ink filling operations. Big media savings along with greatly reduced labor and lost production.

More effective removal of solids improves coating quality. DCF eliminates contamination by unreacted particles in photo-sensitive coating...replaces wire mesh filter that required constant shutdown for manual cleaning...and wasn't getting the job done consistently.

\$600 per barrel waste disposal costs slashed. Frequent bag changeout and high disposal costs led to a DCF in solvent-based acrylic enamel spraying operation. User eliminates bag purchase and disposal costs, minimizes volume by concentrating waste.

Ronningen-Petter
DCF Self-Cleaning Filters.
Your Better Choice
For Fluid Filtration.

- Hard or Semi-Hard Particles
- 15 Microns or Larger
- Reduce Emissions and Waste
- Limit Worker Exposure
- Cut Operating Costs
- Boost Product Quality



disc would maintain a low, constant differential pressure so maximum throughput would be provided. Plus, since the media is in a closed system, you'd minimize worker and workplace exposure. Did DCF's deliver?

400% productivity increase on pigment loading line. DCF replaces vibrating screen filter, reducing filling time from 6 hours to 90 minutes per drum.

800% productivity gain on clear-coat paint filling line. DCF replaces bag filter, reduces filling time from 4 hours to 30 minutes while eliminating bag purchases, disposal costs, and changeout labor.

Worker exposure reduced in urethane filling operation. DCF replaces manually-cleaned 40 mesh in-line strainer. The self-cleaning DCF requires far less frequent inspection and attention.

Call for our collection of 60 more case studies

Now that the proof is in, wouldn't you like all the facts? Call us at 800/656-3344 or use the reader service card for 60 other success stories, complete product information, and the name of your nearby R-P representative.



RONNINGEN-PETTER®
ENGINEERED FILTER SYSTEMS

9151 SHAVER RD • PO BOX 188
PORTAGE, MICHIGAN 49081-0188 • USA
PHONE 616-323-1313 • FAX 616-323-0065

© 1996 Ronningen-Petter
27-8657

PRODUCTION EQUIPMENT SUPPLIERS

Process Systems & Components
1535 Culver Rd.
Rochester, NY 14609
Phone: (716) 654-5150
Fax: (716) 224-0879
Thomas A. Benedict, President
Agitators
Blenders
Blending Tanks
Cleaning
Containers
Dispensers
Dispenser Blades
Dispensers
Filling/Packaging/Labeling
Filtering/Straining
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

Process Thermal Dynamics, Inc.
801 Central Ave., N.
Brandon, MN 56315
Phone: (320) 834-3370
Fax: (320) 834-3374
Robert Beattie, President; Terry Scott,
General Mgr.
Curing Systems
Infrared Curing Equipment

Production Systems, Inc.
850 Mountain Industrial Dr.
Marietta, GA 30060-7908
Phone: (770) 424-9784
Fax: (770) 424-8392
Sharon Phillips, Mgr., Marketing Services;
Mike Anderson, Sales Mgr.
Material Handling & Conveyors
Pail Conveyor

Q

Quackenbush Co., Inc.
500 E. Main St.
Lake Zurich, IL 60047
Phone: (847) 438-5090
Fax: (847) 438-1305
E-Mail: quackco@mc.net
Tom Weiss, V.P.
Filtering/Straining
Grinding Media
Pumping/Metering

R



R-P Products Ronningen-Petter Div.
407 Jefferson St.
Three Rivers, MI 49039
Phone: (616) 273-1512
Fax: (616) 273-1812
Norm Beckwith, Assistant Mgr.
Filter Pressure Vessels-Liquid
Filtering/Straining

SEE OUR AD ON PAGE 83.

Radiant Energy Systems, Inc.
458 Hamburg Tpke.
Wayne, NJ 07470
Phone: (201) 942-7767
Fax: (201) 942-5581
Bob Narang, President
Curing Systems
Infrared Curing Equipment

Ramco Finishing Systems
1390 Dodson Way
Riverside, CA 92507
Phone: (909) 274-0451
Fax: (909) 274-9686
Sandy Slead
Cleaning
Curing Systems
Spray Booths

Readco Manufacturing, Inc.
901 S. Richland Ave.
P.O. Box 15552
York, PA 17405-0552
Phone: (717) 848-2801
Fax: (717) 848-2811
E-Mail: readco@usa.pipeline.com
Blenders
Mixing and Dispensing

Reynolds Industries, Inc.
3601 Foothills Way
Fort Mill, SC 29715
Phone: (803) 548-4301
Fax: (803) 548-1365
Kim Pearce, Marketing Mgr.; Dale Hilliger,
Sales Mgr.
Agitators
Blenders
Blending Tanks
Containers
Dispensers
Ink Production Equipment
Mixing and Dispensing
Reactor and Recovery Systems

Charles Ross & Son Co.
710 Old Willets Path
P.O. Box 12308
Hauppauge, NY 11788
Phone: (516) 234-0500
Fax: (516) 234-0691
Ronald W. Reid, Executive V.P.; Bogard
Lagman, V.P. Sales
Agitators
Blenders
Blending Tanks
Containers
Dispensers
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing
Ram Dischargers

Russell Finex, Inc.
10709 Granite St.
Charlotte, NC 28273
Phone: (704) 588-9808
Fax: (704) 588-0738
Larry Benton, Chief Applications Eng.
Filtering/Straining

S

Safe 2O Systems Inc.
P.O. Box 521505
Longwood, FL 32752
Phone: (407) 331-8854
Fax: (407) 331-8811

E-Mail: sales@safe20.com
Russ Fessenden, President
Cleaning
Curing Systems
Filtering/Straining
Infrared Curing Equipment
Spray Booths

Schlumberger Industries
Measurement Div.
1310 Emerald Rd.
Greenwood, SC 29646
Phone: (864) 223-1212
Fax: (864) 223-0341
E-Mail: flow-meas@slb.com
Mark Birchmore; Andre Noel
Instrumentation and Control

Swarco Industries, Inc.
P.O. Box 89
Columbia, TN 38402-0089
Phone: (615) 388-5900
Fax: (615) 388-4039
E-Mail: 103704.513@compuserve.com
Jon Sproul, General Mgr.
Grinding Media



Schold Machine Co.
10590 Oak St., N.E.
St. Petersburg, FL 33716
Phone: (813) 579-1147
Fax: (813) 579-1806
Jerome P. Tippet, Sr., President/CEO;
Lee Zurman, Sales; Jerome P. Tippet,
Jr., Purchasing/Marketing
Agitators
Dispenser Blades
Dispensers
Grinding Media
Grinding/Milling
Ink Production Equipment
Mixing and Dispensing

SEE OUR AD ON OPPOSITE PAGE.

Schroeder Machines
6743 Kinne St.
East Syracuse, NY 13057
Phone: (315) 438-1200
Fax: (315) 438-4752
E-Mail: mfc@ras.com
David C. Jennings, Sales Mgr.
Filling/Packaging/Labeling
Material Handling & Conveyors

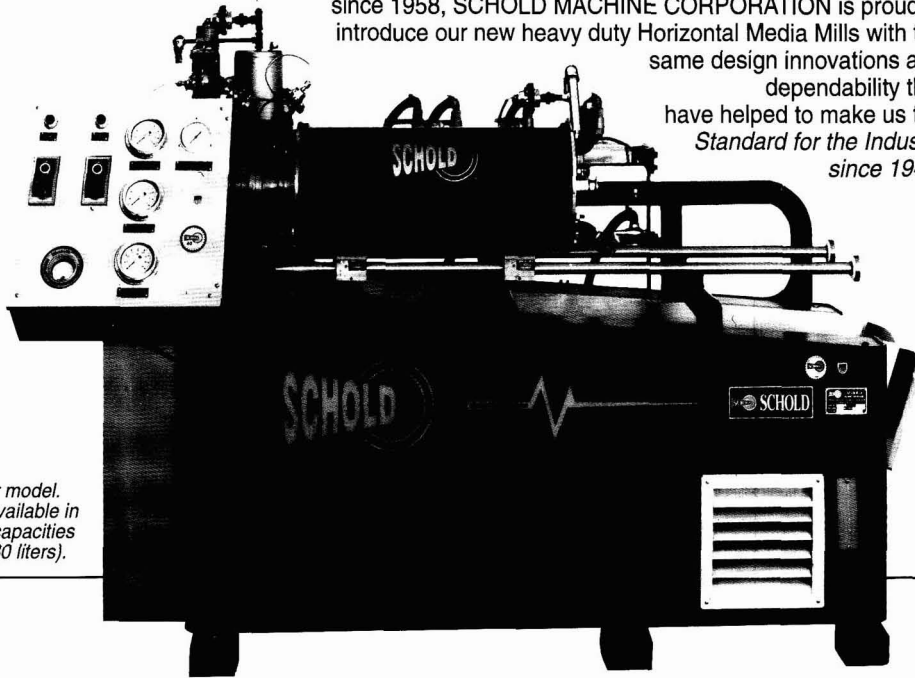
Sellers Cleaning Systems
c/o Crane Pumps & Systems
420 E. Third St.
Piqua, OH 45396
Phone: (937) 773-2442
Fax: (937) 778-3521
Mike Kemp, Marketing Mgr.; Lee Lafond,
Regional Sales Mgr.
Cleaning

SEPR, Ceramic Beads & Powders Div.
1122 Highway 22
Mountainside, NJ 07092
Phone: (908) 654-0660
Fax: (908) 654-0669
Gerald B. Amback, Sales Mgr.
Grinding Media
Grinding/Milling

***NEW* FROM SCHOLD®**

HORIZONTAL MEDIA MILLS

The *originators of the shot mill* and your source for media mills since 1958, SCHOLD MACHINE CORPORATION is proud to introduce our new heavy duty Horizontal Media Mills with the same design innovations and dependability that have helped to make us the *Standard for the Industry since 1949.*



56 liter model.
Also available in
other capacities
(1/2-280 liters).

All Schold Horizontal Media Mills Come Complete With:

- Rotary Screen with Carbide Gap
- SS Alloy Discs
- Pressurized Shaft Seals
- Media Discharge Tray
- Zoned Chamber Cooling
- Sliding Chamber
- 10 Gallon Flushout Funnel Mounted to Variable Speed Gear Feed Pump
- Media Washout Trough
- Tool Kit
- All Safety Features

Safety Features

- Low Barrier Fluid Shutoff
- Low Barrier Fluid Pressure Shutoff
- High Temperature Shutoff
- High Pressure Shutoff
- Motor High Temperature Shutoff

ALL HORIZONTAL MEDIA MILLS ARE *NOT* ALIKE
Experience the Schold Difference



Precision Dispersion Equipment
Since 1949

Two Complete Test Labs For Your Convenience

Southern Facility

10590 Oak Street N.E., St. Petersburg, FL 33716-3327
Tel: 813-576-1147 • Fax: 813-579-1806
Sales, Technical & Safety Hotline: 1-800-RGD-MIXR

Midwest Facility

7201 West 64th Place, Chicago, IL 60638-4692
Tel: 708-458-3788 or 458-3793 • Fax: 708-458-3866
Sales, Technical & Safety Hotline: 1-800-4MIXERS

Schold Research & Development, Inc.
Tel: 813-576-1132 • 708-458-3793

Serfilco, Ltd.
1777 Shermer Rd.
Northbrook, IL 60062
Phone: (847) 559-1777
Fax: (847) 559-1995
E-Mail: sales@serfilco.com
Agitators
Filtering/Straining
Instrumentation and Control
Pumping/Metering

Solartron Transducers
19408 Park Row, Ste. 320
Houston, TX 77084
Phone: (713) 398-7890
Fax: (713) 398-7891
Kevin Bates, Inside Sales
Instrumentation and Control

Sonic Corp.
One Research Dr.
Stratford, CT 06497
Phone: (203) 375-0063
Fax: (203) 378-4079
E-Mail: brakemarr@aol.com
Bill Brakemarr, President; Robert Brakemarr,
General Mgr.; Claire Skidd, V.P.

Agitators
Blenders
Dispensers
Grinding/Milling
Mixing and Dispensing
Pumping/Metering

Sonoco Industrial Container
1850 Parkway Pl., Ste. 820
Marietta, GA 30067
Toll Free: (800) 841-7252
Fax: (770) 423-2509

Special Masking Co.
5618 Hamlet Ave.
Cleveland, OH 44127
Toll Free: (800) 433-2719
Fax: (216) 441-0715
Thomas Diccilo, General Mgr.
Containers
Filling/Packaging/Labeling
Films
Filtering/Straining

Spencer Machine & Tool Co., Inc.
6205 Gheens Mill Rd.
Jeffersonville, IN 47131-0298
Phone: (812) 282-6300
Fax: (812) 282-7272
Brad Spencer
Filtering/Straining

SEE OUR AD ON PAGE 148.

Star Systems Filtration Div.
101 Kershaw St., P.O. Box 518
Timmonsville, SC 29161
Phone: (803) 346-3101
Fax: (803) 346-3736
J. Scott Thomas, Sales Mgr.
Filtering/Straining

Stretch-O-Seal Corp.
201 N. Cuyler Ave.
Oak Park, IL 60304-2301
Phone: (708) 445-1900
Fax: (708) 848-3797
Albert J. Betz, President
Filling/Packaging/Labeling

SWECO
8029 U.S. Highway 25
Florence, KY 41042
Toll Free: (800) 849-3259
Fax: (606) 283-8469
E-Mail: info@sweco.com

Brenda Beers, Business Mgr.; John Altmix,
Marketing Mgr.
Filtering/Straining
Grinding Media
Grinding/Milling

T

Tangent Systems, Inc.
8030-B England St.
Charlotte, NC 28273
Phone: (704) 554-0830
Fax: (704) 554-0820
E-Mail: sales@tangentinfo.com
Jack Rorick, Sales Mgr.
Instrumentation and Control

Tech-Pak
1751 E. Major Blvd.
Custer, MI 49405
Phone: (616) 757-2473
Fax: (616) 757-2022
Thomas VanKampen, President
Containers

TeeMark Corp.
HC7 Box 14-T
Aitkin, MN 56431
Phone: (218) 927-2200
Fax: (218) 927-2333
Paint Can/Pail Crushers

Tenneco Packaging
1603 Orrington Ave.
Evanston, IL 60201-3853
Phone: (847) 492-5713
Fax: (847) 492-4469
Tenneco Packaging Information Center
Containers
Films

Thermovation Engineering
P.O. Box 248110
Cleveland, OH 44124-8110
Phone: (216) 691-1410
Fax: (216) 691-0708
George E. Heath, P.E., President; George
Heath, Jr., Marketing Dir.
Curing Systems
Infrared Curing Equipment

Theysohn America, Inc.
1001 E.W. T. Harris Blvd., Ste. P313
Charlotte, NC 28213
Phone: (704) 455-8829
Fax: (704) 455-8830
E-Mail: info@theysohn.com
Joseph E. Lesnefsky, President
Mixing and Dispensing

Thiele Engineering Co.
7225 Bush Lake Rd.
Minneapolis, MN 55439-2024
Phone: (612) 835-2290
Fax: (612) 835-5032
Dan Jarnagin, Filler Product Mgr.; Steve
Reid, General Marketing Mgr., Fillers



Thomas Scientific
99 High Hill Road
Swedesboro, NJ 08085

Phone: (609) 467-2000
Fax: (609) 467-3087
E-Mail: value@thomassci.com
Ed Pierzynski, V.P. Marketing; Mike
Garner, Industrial Marketing Mgr.

Agitators
Blending Tanks
Containers
Dispenser Blades
Distillation
Filling/Packaging/Labeling
Film Applicators
Filtering/Straining
Grinding/Milling
Instrumentation and Control
Mixing and Dispensing
Pumping/Metering
Solvent Recovery

SEE OUR AD ON PAGE 96.

Titan Tool, Inc.
556 Commerce St.
Franklin Lakes, NJ 07417
Toll Free: (800) 526-5362
Fax: (201) 651-1238
John Plocic, Marketing Dir.
Pumping/Metering

Tri-Clover Inc.
9201 Wilmot Rd.
Kenosha, WI 53141-1413
Phone: (414) 694-5511
Fax: (414) 694-7104

Blenders
Filtering/Straining
Pumping/Metering

Trion Industries Inc.
297 Laird St.
Wilkes Barre, PA 18702-6997
Toll Free: (800) 444-4665
Phone: (717) 824-1000
Fax: (717) 823-4080
Material Handling & Conveyors

U

Uni-Wash/Polaris Indl. Ventilation Group
P.O. Box 287
Harbor Springs, MI 49740
Phone: (616) 526-0200
Fax: (616) 526-8080
E-Mail: staff@unipol.com
K.M. Laporte, President
Filtering/Straining

Union Process Inc.
1925 Akron-Peninsula Rd.
Akron, OH 44313
Phone: (330) 929-3333
Fax: (330) 929-3034
E-Mail: unionprocess@worldnet.att.net
Grinding Media
Grinding/Milling
Ink Production Equipment

United Air Specialists, Inc.
4440 Creek Rd.
Cincinnati, OH 45242
Toll Free: (800) 992-4422
Fax: (513) 891-4882
E-Mail: vasinc.com
Marketing Services Operator
Instrumentation and Control
Safety/Fire Protection

U.S. Best, Inc.
P.O. Box 346
New Albany, IN 47151
Phone: (812) 941-8867
Fax: (812) 941-8982
Dana Dethy, Marketing Mgr.
Containers
Dispenser Blades
Dispensers
Filling/Packaging/Labeling
Material Handling & Conveyors
Mixing and Dispensing
Pumping/Metering

U.S. Stoneware
700 E. Clark St.
East Palestine, OH 44413
Phone: (330) 426-4500
Fax: (330) 426-1859
E-Mail: usgroup@aol.com
David Early, Sales Mgr.
Grinding Media
Grinding/Milling
Pumping/Metering

U.V. Process Supply, Inc.
1229 W. Cortland St.
Chicago, IL 60614-4805
Phone: (773) 248-0099
Fax: (773) 880-6647
E-Mail: info@uvps.com
Kristie Figueiredo, Sales; Stephen Siegel,
President; Tom Heffennan, Marketing
Agitators
Cleaning
Containers
Curing Systems
Dispensers
Filling/Packaging/Labeling
Film Applicators
Filtering/Straining
Ink Production Equipment
Instrumentation and Control
Mixing and Dispensing
Pumping/Metering
Safety/Fire Protection

V

Vac-U-Max
37 Rutgers St.
Belleville, NJ 07109
Phone: (973) 759-4400
Fax: (973) 759-6419
David Kennedy, Sales Mgr.
Cleaning
Material Handling & Conveyors

Van Air Systems, Inc.
2950 Mechanic St.
Lake City, PA 16423
Phone: (814) 774-2631
Fax: (814) 774-3482
W.J. Ulrich, Tech Sales Dir.
Filtering/Straining

Vara International, Div. of Calgon Carbon
1201 19th Pl.
Vero Beach, FL 32960
Phone: (561) 567-1320
Fax: (561) 567-4108
E-Mail: morley@calgoncarbon.com
Michael P. Morley, Sales Dir..
Distillation
Solvent Recovery

Vero Dispersion Machines, Inc.
4380 US Highway 1
Vero Beach, FL 32967

Phone: (561) 978-0265
Fax: (561) 978-4221
John Allen, President; Alan Taylor, V.P.
Grinding/Milling

Victaulic Co. of America
4901 Kesslersville Rd.
Easton, PA 18042
Phone: (610) 559-3300
Fax: (610) 250-8817

Viking Pump, Inc.
406 State ST., P.O. Box 8
Cedar Falls, IA 50613-0008
Phone: (319) 266-1741
Fax: (319) 273-8157
E-Mail: info@vikingpump.com
Rodger Jacoby, Marketing Mgr.
Filtering/Straining
Instrumentation and Control
Pumping/Metering

Vort-Siv Division
MM Industries, Inc.
36135 Salem Grange Rd.
P.O. Box 720
Salem, OH 44460
Phone: (330) 332-4958
Fax: (330) 332-1543
E-Mail: www.vort-siv.com
Filtering/Straining

W

Wagner Systems, Inc.
700 High Grove Blvd.
Glendale Heights, IL 60139
Phone: (630) 924-2400
Fax: (630) 924-2419
Glen Kucera, COO; Zenon Bienduga, V.P.
Operations; Bill Diaz, V.P. Sales/Marketing
Film Applicators
Spray Booths

Warren Rupp, Inc. Unit of IDEX Corp.
800 N. Main St., P.O. Box 1568
Mansfield, OH 44901
Phone: (419) 524-8388
Fax: (419) 522-7867
Bob Brinley, V.P. Sales/Marketing; Doug
Henry, National Sales Mgr.
Pumping/Metering

Weber Marking Systems, Inc.
711 W. Algonquin Rd.
Arlington Heights, IL 60005
Phone: (847) 364-8500
Fax: (847) 364-8575
E-Mail: marcom@webermarking.com
R.J. Stake, Mgr., Marcom
Filling/Packaging/Labeling

Welding Engineers, Inc.
1600 Union Meeting Rd.
Blue Bell, PA 19422
Phone: (215) 643-6900
Fax: (215) 643-6960
James A. Schak, Dir. Marketing/Sales
Mixing and Dispensing

Werner & Pfleiderer Corp.
663 E. Crescent Ave.
Ramsey, NJ 07446
Phone: (201) 327-6300
Fax: (201) 825-6494
Kenneth A. Huber, Business Mgr., Powder
Mixing and Dispensing

Westerlins Maskinfabrik AB
Box 9075
Trehogsgatan 10
Malmö, 200 39
Sweden
Phone: 46 40 210410
Fax: 46 40 220403
Agitators
Cleaning
Containers
Dispenser Blades
Dispensers
Filtering/Straining
Grinding Media
Ink Production Equipment
Mixing and Dispensing



Western Equipment Company
981 66th Ave.
Oakland, CA 94621
Phone: (510) 638-2774
Fax: (510) 632-5928
Don Mazzone, General Mgr.; Irma
Dominguez, Marketing Mgr.

- Agitators
- Blenders
- Blending Tanks
- Compressors
- Containers
- Dispenser Blades
- Dispensers
- Distillation
- Filling/Packaging/Labeling
- Filtering/Straining
- Grinding Media
- Grinding/Milling
- Heat Boilers
- Ink Production Equipment
- Material Handling & Conveyors

SEE OUR AD ON PAGE 147.

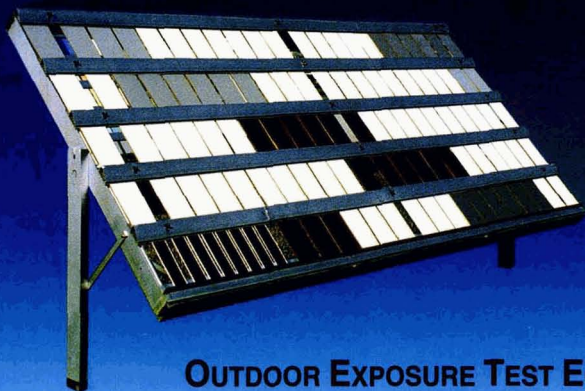
Wilden Pump & Engineering Co.
22069 Van Buren St.
Grand Terrace, CA 92313-5651
Phone: (909) 422-1730
Fax: (909) 783-3440
Pumping/Metering

Wyssmont Co., Inc.
P. O. Box 1397
Fort Lee, NJ 07024
Phone: (201) 947-4600
Fax: (201) 947-0324
J. Bevacqua, V.P. Sales
Grinding/Milling
Material Handling & Conveyors

Y

Yamada America, Inc.
1575 High Point Drive
Elgin, IL 60123
Phone: (847) 697-1878
Fax: (847) 697-2794
E-Mail: sales@yamadapump.com
David Hollen, Inside Sales Mgr.; Steve
Kameyama, President; Paul Waibel,
Marketing & Sales Mgr.
Pumping/Metering

Quality, Time-Tested Equipment, To Meet Your Exposure Testing Needs



OUTDOOR EXPOSURE TEST EQUIPMENT Aluminum Construction

- Thirty-Five Years serving the paint and coatings industry with our durable, long-lasting, and versatile aluminum outdoor exposure test equipment.
- From standard paint panel and siding panel exposure testing, to sophisticated under glass testing, we manufacture the products to satisfy your needs.
- Wherever your exposure site is located—on the ground, on the roof, from a wall, or even on an offshore oil rig—our equipment fits any situation.
- ASTM, SAE, GM, and AATCC are among the standards organizations that reference our apparatuses.
- *Union Carbide, Rohm and Haas Co., Eastman Chemical Co., Troy Chemical Corp., SC Johnson Polymer, Heraeus DSET Laboratories, Inc., Ciba-Geigy Corp., BASF Corp., Dow Chemical, 3M Co., Huls America Inc., Reichhold Chemicals Inc., BFGoodrich Co., The Q-Panel Co., South Florida Test Service, The Sherwin-Williams Co., and PPG Industries, Inc. are just a few from a long list of our valued clients that we have served.*
- Whether your product is paint, coatings, inks, plastics, glass, masonry, or automotive parts, etc., we will custom tailor our fixtures to attain the proper mounting for exposure that your specifications require.

WILLIAM HARRISON CORPORATION

4595 E. 10th Court, Hialeah, FL 33013, U.S.A.
(305) 681-8381 • Fax: (305) 685-0407

Lab Apparatus and Testing Equipment

A

A.P. Dataweigh Systems
325-D Sharon Industrial Way
Suwanee, GA 30024
Phone: (770) 932-5033
Fax: (770) 932-4229
E-Mail: dataweigh@aol.com
Patrick Hetzel, Marketing Dir.
Balances/Scales

Paul O. Abbe, Inc
139 Center Ave
Little Falls, NJ 07424
Phone: (201) 256-4242
Fax: (201) 256-0041
Charles J. Gero, V.P. Sales & Marketing;
Barry Fuller, Sales Engineer
Lab Mills
Misc. Testing Equipment

ACT Laboratories
24901 Northwestern Hwy.
Southfield, MI 48075
Phone: (810) 827-3333
Fax: (810) 827-3338
Ron Swinko, V.P.; Meghan Gierigk, Sales
Eng.
Coating Application

Amherst Process Instruments
7 Pomeroy Ln.
Amherst, MA 01002
Toll Free: (800) 335-5577
Fax: (413) 585-0536
E-Mail: info@api-aeronews.com
Malcolm Bailey, Dir. Sales; Joseph Bohan,
President
Particle Characterization

Analytical Measurement Technology
32355 Howard St.
Madison Heights, MI 48071
Phone: (248) 589-1223
Fax: (248) 589-9135
Lee Prain, Sales, Marketing Mgr.
Color/Optical/Appearance Measurement
Test/Measurement

Analytical Measurements, Inc.
621 Ramsey Ave.
Hillside, NJ 07205-1009
Toll Free: (800) 635-5580
Fax: (908) 964-6622
Raymond H. Thornton, President
pH Meters

Arizona Instrument Corp.
4114 E. Wood St.
Phoenix, AZ 85040-1944
Phone: (602) 470-1414
Fax: (602) 470-1888
Melissa Butch, Mgr., Public Relations
Test/Measurement

Atlas Electric Devices
4114 N. Ravenswood Ave.
Chicago, IL 60613
Phone: (773) 327-4520
Fax: (773) 327-5787
Robert Herling, V.P. Sales/Marketing;
Robert Laltie, National Sales Dir.; Rudolph
Leber, International Sales Dir.
Accelerated Weathering

Color/Optical/Appearance Measurement
Humidity/Condensation/Ultraviolet Chambers
Misc. Testing Equipment
Physical/Mechanical

Automation Products Inc.
3030 Max Roy St.
Houston, TX 77008
Phone: (713) 869-0361
Fax: (713) 869-7332
Sales/Information: Technical Applica-
tions Dept.
Viscosity Meters

Dynatrol® Viscosity Control

- COATINGS
- ADHESIVES
- RESINS
- INKS, etc.



Automation Products, Inc.,
3030 Maxroy Street, Houston, Texas 77008-6294 USA
Fax 713-869-7332 Telephone 800-231-2062 V220-CL111

Automation USA
P.O. Box 563
Westminster, MD 21158
Toll Free: (800) 678-4370
Fax: (410) 857-3818
Paul Lomax, Operations Mgr.
Gages
Test/Measurement

B

Barnart Co.
28W092 Commercial Ave.
Barrington, IL 60010
Toll Free: (800) 637-3739
Fax: (847) 381-7053
E-Mail: Barnart@mc.net
pH Meters
Stirrers
Viscosity Meters

T.J. Bell Inc.
1340 Home Ave
Akron, OH 44310
Phone: (330) 633-3644
Fax: (330) 633-1977
Dawn Roth, Sales
Accelerated Weathering
Coating Application
Color/Optical/Appearance Measurement
Gages
Holiday Detectors
Humidity/Condensation/Ultraviolet Chambers
Lab Mills
Light Booths
Misc. Testing Equipment
Ovens
pH Meters
Reflectometers
Viscosity Meters

Betz Dearborn
Metals Process Group
200A Precision Dr.
Horsham, PA 19044
Phone: (215) 355-3300
Fax: (215) 773-2800

Web: www.betzdearborn.com
Mitch Kassouf, Technical Marketing Dir.;
Holly Davis, Marketing Communications
pH Meters

Bishop International Co.
P.O. Box 66343
Chicago, IL 60666
Phone: (630) 238-9566
Fax: (630) 238-9567
Kurt Buehrer, Project Mgr.
Lab Mills
Stirrers

Bjorksten Research Laboratories, Inc.
P.O. Box 259444
Madison, WI 53725-9444
Phone: (608) 271-6900
Fax: (608) 271-6930
Michael Maloney, President
Misc. Testing Equipment
Physical/Mechanical
Test/Measurement

Blacoh Fluid Control, Inc.
1221 Dodson Way
Riverside, CA 92507
Phone: (909) 342-3100
Fax: (909) 342-3101
E-Mail: blacoh@deltanet.com
Gary Cornell, President; Alvin Fischer, Sales
& Marketing Mgr.
Gages

C.W. Brabender Instruments Inc.
50 E. Wesley St.
South Hackensack, NJ 07606
Phone: (201) 343-8425
Fax: (201) 343-0608
E-Mail: CWBI@ix.netcom.com
Kevin R. Van Allen, V.P., Sales & Marketing
Densitometers
Lab Mills
Rheologicals
Test/Measurement
Viscosity Meters

Brinkmann Instruments Inc.
One Cantiague Rd., P.O. Box 1019
Westbury, NY 11590-0207
Phone: (516) 334-7500
Fax: (516) 334-7506
Lab Mills
Ovens
pH Meters
Stirrers
Surface Tension Instruments
Viscosity Meters

Brookfield Engineering Labs., Inc.
240 Cushing St.
Stoughton, MA 02072
Phone: (617) 344-4310
Fax: (617) 344-7141
William L. Paull, Sales Eng.
Rheologicals
Viscosity Meters

Brookhaven Instruments Co.
750 Blue Point Rd.
Holtsville, NY 11742
Phone: (516) 758-3200
Fax: (516) 758-3255
Sidney Li, Sales Mgr.
Particle Characterization
Test/Measurement



BYK-Gardner USA
 9104 Guilford Rd.
 Columbia, MD 21046
Toll Free: (800) 343-7721
Fax: (301) 483-6555
E-Mail: custserv@bykgardnerusa.com
Customer Service Dept.

- Coating Application
- Color/Optical/Appearance Measurement
- Gages
- Lab Mills
- Light Booths
- Ovens
- pH Meters
- Physical/Mechanical
- Reflectometers
- Spectrophotometers
- Surface Tension Instruments
- Test/Measurement
- Viscosity Meters
- Misc. Testing Equipment

SEE OUR AD ON THIS PAGE.

C



Cahn Instruments
 5225 Verona Rd., Bldg. 1
 Madison, WI 53711
Toll Free: (800) 244-6305
Fax: (608) 273-6827
E-Mail: info@cahn.com
 Surface Tension Instruments

SEE OUR AD ON PAGE 159.

Cambridge Applied Systems, Inc.
 196 Boston Ave.
 Medford, MA 02155
 Phone: (781) 393-6500
 Fax: (781) 393-6515
 Web: www.cambridge-applied.com
 Lori Cerqua, Applications Specialists; Ken
 Mann, Applications Eng.
 Viscosity Meters

Cannon Instrument Co.
 P.O. Box 16
 State College, PA 16804-0016
Toll Free: (800) 676-6232

Phone: (814) 353-8000
 Fax: (814) 353-8007
 E-Mail: cannon@cannon-ins.com
 Rheologicals
 Viscosity Meters

Casso-Solar Corp.
 230 U.S. Rte. 202
 Pomona, NY 10970
Toll Free: (800) 988-4455
 Fax: (914) 362-1856
 E-Mail: cassori@mne.net
 D. Connington, Sales Support; D. Weisman,
 Mgr., Finishing Systems Div.
 Ovens

CB Mills
 1300 Northwestern Ave.
 Gurnee, IL 60031
Toll Free: (800) 522-7343
 Fax: (847) 662-4003
 E-Mail: cbmills@ix.netcom.com
 David Pagor, Sales Mgr.; J. Denny Stidham,
 General Mgr.
 Lab Mills

Celite Corp.
 c/o World Minerals, Inc.
 137 West Central Ave., P.O. Box 519
 Lompoc, CA 93436
Toll Free: (800) 342-8667
 Fax: (805) 735-5699
 Customer Service Dept.
 Gas Chromatographs

CEM Corp.
 3100 Smith Farm Rd., P.O. Box 200
 Matthews, NC 28106
 Phone: (704) 821-7015
 Fax: (704) 821-5185
 Greg LeBlanc, Sales Mgr.
 Misc. Testing Equipment
 Ovens

Chemultants International
 9349 Hamilton Dr.
 Mentor, OH 44060
 Phone: (216) 352-0218
 Fax: (216) 352-8572
 Richard P. Muny, President; Robert L. Frye,
 Dir. Lab. Services
 Misc. Testing Equipment
 Ovens
 Test/Measurement

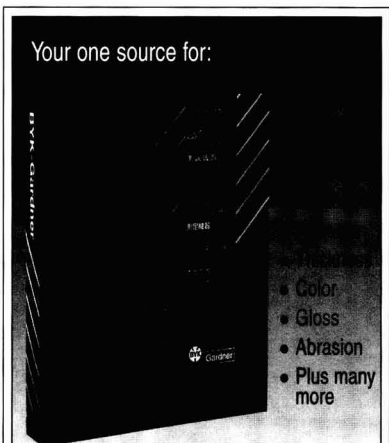
CMI International
 945 Busse Rd.
 Elk Grove Village, IL 60007
Toll Free: (800) 678-1117
 Phone: (847) 439-4404
 Fax: (847) 439-4425
 E-Mail: sales@cmiinternational.com
 Chris Horvath, V.P. Sales
 Gages
 Test/Measurement

Color Communications, Inc.
 4000 W. Fillmore St.
 Chicago, IL 60624
 Phone: (773) 638-1400
 Fax: (773) 638-0887
 Web: www.ccicolor.com
 Color/Optical/Appearance Measurement

Colorcurve Systems
 200 Sixth St.
 Fort Wayne, IN 46808
Toll Free: (800) 272-8783
 Fax: (219) 424-2710
 E-Mail: colorcurve@colwellind.com

**Total Solutions for Paint Testing:
 BYK-GARDNER USA**

Your one source for:



Includes over 2,000 instruments for measuring
 Physical Properties, Color and Appearance.

BYK-GARDNER CATALOG

BYK-Gardner USA - RavensPark II, 9104 Guilford Road - Columbia - MD 21046 - USA - Phone 800-343-7721 or 301-483-6500 - Fax 301-483-6555 - http://www.bykgardner.com



Call 800-343-7721
 today to receive your
FREE copy.

Circle No. 239 on the Reader Service Card

Leah Voors, Sales Service Coordinator;
Christy Findley, Acct. Mgr.
Color/Optical/Appearance Measurement

ColorTec Associates
28 Center St.
Clinton, NJ 08809
Phone: (908) 735-2248
Fax: (908) 236-7865
James T. DeGroff, President; C. Wower,
Technical Dir.; B. Harris, Product Mgr.,
Batchmaster
Color/Optical/Appearance Measurement
Spectrophotometers

Corpo Companies, Inc.
Tennessee Ave. & Beach Thorofare
Ocean City, NJ 08226
Phone: (609) 399-2417
Fax: (609) 399-5233
E-Mail: coatings@corrpro.com
J. Peter Ault, Mgr., Coatings Services;
James A. Ellor, V.P.
Color/Optical/Appearance Measurement
Gages
Holiday Detectors
Misc. Testing Equipment

CSC Scientific Co., Inc.
2810 Old Lee Highway
Fairfax, VA 22031
Phone: (703) 876-4030
Fax: (703) 280-5142
E-Mail: csc@cscscientific.com
Barbara Weber, Product Mgr., Moisture;
Barbara Abel, Product Mgr., Surface
Tension
Balances/Scales
Lab Mills
Misc. Testing Equipment
Particle Characterization
Physical/Mechanical
Spectrophotometers
Surface Tension Instruments
Test/Measurement

D

Datacolor International
3735 Beam Rd.
Charlotte, NC 28217
Phone: (704) 357-0400
Fax: (704) 329-9925
Phil Jannetto, National Sales Mgr.; Carla
Deckelman, Marketing Communications
Color/Optical/Appearance Measurement
Light Booths
Spectrophotometers

DeFelsko Corporation
802 Proctor Ave., P.O. Box 676
Ogdensburg, NY 13669-0676
Phone: (315) 393-4450
Fax: (315) 393-8471
David Beamish, Sales; Frank Koch, Sales
Gages
Test/Measurement

Dek-Tron Scientific Instruments
244 E. Third St.
Plainfield, NJ 07060
Phone: (908) 668-1777
Fax: (908) 668-4794
Miguel A. Vargas, Financing; Segundo H.
Vargas, Sales/Marketing; Hector Vargas,
Engineering
Gages

Misc. Testing Equipment
Rheologicals
Surface Tension Instruments
Test/Measurement

DSA Consulting, Inc.
5555 Suwanee Rd., P.O. Box 1121
Shawnee Mission, KS 66222
Phone: (913) 262-9384
Fax: (913) 262-9384
Donald S. Andrade, President
Color/Optical/Appearance Measurement

E

E.C.D.
4287-A SE International Way
Wilwaukie, OR 97222
Phone: (503) 659-6100
Fax: (503) 659-4422
E-Mail: ecd@ecd.com
Rick Eissing, V.P. Sales/Marketing
Test/Measurement

Eastern-Cleveland Mixers
Heritage Park Rd.
P.O. Box 912
Clinton, CT 06413
Toll Free: (800) 243-1188
Fax: (860) 669-7461
Coating Application
Densitometers
Misc. Testing Equipment
Ovens
Test/Measurement

Eclipse Systems
Div. Technology General Corp.
12 Cork Hill Rd.
Franklin, NJ 07416
Phone: (973) 827-7878
Fax: (973) 827-4613
Stirrers

EIGER

Eiger Machinery, Inc.
888 E. Belvidere Rd., Ste. 214
Grayslake, IL 60030
Phone: (847) 548-0044
Fax: (847) 548-0099
Dave L. Peterson, V.P.; Beverly
Thornbloom, Office Mgr.; Robert G.
Radcliff, Parts Mgr.
Lab Mills

SEE OUR AD ON PAGE 153.

Einstein and Co.
30285 Bruce Industry Pkwy.
Solon, OH 44139
Phone: (440) 498-0500
Fax: (440) 349-5901
Bill Einstein, President & Sales Mgr.
Lab Mills

Electro-Technic Products, Inc.
4642 N. Ravenswood
Chicago, IL 60640-4510
Phone: (773) 561-2349
Fax: (773) 561-3130
Holiday Detectors

Electrotechnology Applications Center
3825 Green Pond Rd.
Bethlehem, PA 18017-7599
Phone: (610) 861-5596
Fax: (610) 861-5060

Elcometer, Inc.
1893 Rochester Industrial Dr.
Rochester Hills, MI 48309
Phone: (248) 650-0500
Fax: (248) 650-0501
E-Mail: inc.@elcometer.com
Joseph J. Walker, Mgr. Sales/Marketing;
Wendy Wortman, Senior Acct. Exec./Sales
Color/Optical/Appearance Measurement
Gages
Holiday Detectors
Misc. Testing Equipment
pH Meters
Test/Measurement

F

Fawcett Co., Inc.
3863 Congress Pkwy.
Richfield, OH 44286
Phone: (330) 659-4187
Fax: (330) 659-6991
Dave LaMaster
Stirrers

Fischer Technology Inc.
750 Marshall Phelps Rd.
Windsor, CT 06095
Phone: (800) 243-8417
Fax: (860) 688-8496
Valerie Arsenault, Inside Sales; Robert
Christensen, V.P., Sales Mgr.
Gages
Misc. Testing Equipment
Test/Measurement

First Ten Ångstroms
465 Dinwiddie St.
Portsmouth, VA 23704
Phone: (757) 393-1584
Fax: (757) 393-3708
Roger Woodward, President; Pat Wood-
ward, Sec.
E-Mail: roger@firsttenangstroms.com
Misc. Testing Equipment
Surface Tension Instruments

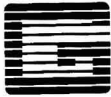
Fostoria Industries, Inc.
Process Heat Div.
1200 N. Main St.
Fostoria, OH 44830
Phone: (419) 435-9201
Fax: (419) 435-0842
E-Mail: gpffostor@bright.net
Steve Fruth, Sales Dir.; Greg Alspach,
Marketing Mgr.
Ovens

**Electric Infrared
CURING OVENS**

fostoria
Process Heat Division

Phone: (419) 435-9201

G



Gamry Instruments, Inc.
 734 Louis Dr.
 Warminster, PA 18974
 Phone: (215) 682-9330
 Fax: (215) 682-9331
 E-Mail: sales@gamry.com
 Brian J. McGrath, Sales & Marketing Mgr.
 Test/Measurement

SEE OUR AD ON THIS PAGE.

Paul N. Gardner Co., Inc.
 316 NE First St.
 P.O. Box 10688
 Pompano Beach, FL 33060
 Phone: (954) 946-9454
 Fax: (954) 946-9309
 E-Mail: gardner@gardco.com
 Paul N. Gardner, Jr., President
 Accelerated Weathering
 Balances/Scales
 Coating Application
 Color/Optical/Appearance Measurement
 Densitometers

Gages
 Holiday Detectors
 Humidity/Condensation/Ultraviolet
Chambers
 Lab Mills
 Light Booths
 Misc. Testing Equipment
 Ovens
 pH Meters
 Physical/Mechanical
 Reflectometers
 Rheologicals
 Spectrophotometers
 Stirrers
 Surface Tension Instruments
 Test Charts/Panels
 Test/Measurement
 Viscosity Meters

SEE OUR AD ON PAGE 00.

Gibney-Bruce, Inc.
 P.O. Box 337
 Watertown, CT 06795
 Phone: (860) 274-2700
 Bob Bruce, Sales
 Gages

Gilson Co., Inc.
 P.O. Box 677
 Worthington, OH 43085
 Phone: (614) 548-7298
 Fax: (614) 548-5314
 E-Mail: gilson@coil.com
 David W. Ditmars, Marketing Dir.
 Balances/Scales
 Gages

Lab Mills
 Misc. Testing Equipment
 Ovens
 Particle Characterization
 pH Meters
 Rheologicals
 Test/Measurement
 Viscosity Meters

Glas-Col
 711 Hulman St., P.O. Box 2128
 Terre Haute, IN 47802
 Phone: (812) 235-6167
 Fax: (812) 234-6975
 Stirrers

Glen Mills, Inc.
 395 Allwood Rd.
 Clifton, NJ 07012
 Phone: (973) 777-0777
 Fax: (973) 777-0070
 E-Mail: staff@glenmills.com
 S. Goldberg, Dir.
 Lab Mills
 Stirrers
 Gages

Glenro Inc.
 39 McBride Ave.
 Paterson, NJ 07501-1715
 Toll Free: (800) 922-0106
 Phone: (973) 279-5900
 Fax: (973) 279-9103
 E-Mail: info@glenro.com
 Ovens

GretagMacbeth
 617 Little Britain Rd.
 New Windsor, NY 12553
 Phone: (914) 565-7660
 Fax: (914) 565-0390
 Color/Optical/Appearance Measurement
 Densitometers
 Light Booths
 Misc. Testing Equipment
 Spectrophotometers
 Test/Measurement

Grieve Corp.
 500 Hart Rd.
 Round Lake, IL 60073
 Phone: (847) 546-8225
 Fax: (847) 546-9210
 E-Mail: bandc@interaccess.com
 Frank Calabrese, National Sales Mgr.
 Ovens

Gruenberg Oven
 4 Quality St.
 Williamsport, PA 17701
 Phone: (717) 326-1755
 Fax: (717) 326-7304
 E-Mail: lunadvrt@mail.csrlink.net
 Jeff Myers, Marketing Mgr.; Dennis Mender,
 Assistant Sales Mgr.
 Ovens

H

Haake
 53 West Century Rd.
 Paramus, NJ 07652
 Phone: (201) 265-7865
 Fax: (201) 265-1977
 Web: www.haake-usa.com
 Randy Byrne, Dir. Sales
 Physical/Mechanical
 Rheologicals
 Test/Measurement

COATEGRITY AFFORDABILITY FRADELITY

COATING PROBLEMS?

COATEGRITY PORTABILITY SIMPLICITY

HOSPITALITY OCTOPLICITY FRADELITY

Eliminate unwanted coating problems before they occur. Gamry Instruments' EIS900 Impedance System can determine a coating's performance characteristics by measuring the properties of the coating itself. Use that information to detect application problems, specification deviations, or potential coating failure before it is visible. Unlike salt spray tests, EIS is repeatable and can be performed under varying conditions to allow you to chose the optimal coating. Think how a longer and more predictable service life can lower your coating costs.

Gamry Instruments, Inc.
 734 Louis Drive
 Warminster, PA 18974
 www.gamry.com
 Tel: 215-682-9330
 Fax: 215-682-9331
 sales@gamry.com

FLEXIBILITY PORTABILITY HOSPITALITY

Circle No. 295 on the Reader Service Card

William Harrison Corp.
4595 E. 10th Ct.
Hialeah, FL 33013
Phone: (305) 681-8381
Fax: (305) 685-0407
Perry Harrison, V.P./General Mgr.
Accelerated Weathering
Misc. Testing Equipment

SEE OUR AD ON PAGE 88.

Hockmeyer Equipment Corp.
P.O. Box 113
Harrison, NJ 07029
Phone: (201) 482-0225
Fax: (201) 484-6114
Cathy D. Strahan, V.P. Marketing
Lab Mills

Hoover Color Corp.
P.O. Box 218
State Highway 693
Hiwassee, VA 24347
Phone: (540) 980-7233
Fax: (540) 980-8781
Steve Haimann, Technical Sales Mgr.;
Charles Hoover, Jr., COO
Lab Mills

Horiba Instruments Inc.
17671 Armstrong Ave.
Irvine, CA 92614
Phone: (714) 250-4811
Fax: (714) 250-0924
Terry Stauffer, General Mgr.
Particle Characterization
pH Meters
Test/Measurement

HunterLab
11491 Sunset Hills Rd.
Reston, VA 20190
Phone: (703) 471-6870
Fax: (703) 471-4237
Sales Department
Color/Optical/Appearance Measurement

I

IKA Works, Inc.
2635 N. Chase Pkwy. S.E.
Wilmington, NC 28405-7419
Phone: (910) 452-7059
Fax: (910) 452-7693
Scott Council, Product Mgr., Laboratory
Div.; Scott Bitter, Product Mgr.; Process Div.
Misc. Testing Equipment
Stirrers
Viscosity Meters

Imass, Inc.
P.O. Box 134
Accord, MA 02018-0134
Phone: (781) 982-8096
Fax: (781) 982-9647

James M. Driscoll, Sales Mgr.
Misc. Testing Equipment
Physical/Mechanical
Test/Measurement

Industry Tech
188 Scarlet Blvd.
Oldsmar, FL 34677
Phone: (813) 855-5054
Fax: (813) 891-9904
Don MacLeod, President; Bonnie-Jean
Creais, Office Mgr.; Pete Millenorr,
Plant Mgr.

Coating Application
Gages
Misc. Testing Equipment

Infra-Red Technologies, Inc.
1201 Burlington
N. Kansas City, MO 64116
Phone: (816) 421-4422
Fax: (816) 421-4415
Rich White, President; Tom Connors, V.P./
G.M.

Ovens

International Light, Inc.
17 Graf Rd.
Newburyport, MA 01950-4092
Phone: (508) 465-9523
Fax: (508) 462-0759
E-Mail: ilsales@intl-light.com
Robert A. Angelo, V.P.
Misc. Testing Equipment
Test/Measurement

K

Kady International
127 Pleasant Hill Rd.
P.O. Box 847
Scarborough, ME 04070-0847
Toll Free: (800) FOR-KADY
Phone: (207) 883-4141
Fax: (207) 883-8241
Web: www.kadyinternational.com
Lab Mills

Kernco Instruments Co., Inc.
420 Kenazo Ave.
El Paso, TX 79927-7339
Phone: (915) 852-3375
Fax: (915) 852-4084
E-Mail: brkernco@whc.net
John Kelly, General Mgr.; B. Robinson,
Sales Mgr.

Balances/Scales
Color/Optical/Appearance Measurement
Gages
Misc. Testing Equipment
Ovens
pH Meters
Stirrers
Surface Tension Instruments
Test/Measurement
Viscosity Meters

Krautkramer Branson
50 Industrial Park Rd.
Lewistown, PA 17044
Phone: (717) 242-0327
Fax: (717) 242-2606
E-Mail: kb-ltn.mhs.compuserve.com
Randy Sell, National Sales Mgr.

Gages
Misc. Testing Equipment
Test/Measurement

KTA-Tator, Inc.
115 Technology Dr.
Pittsburgh, PA 15275-1059
Phone: (412) 788-1300
Fax: (412) 788-1306
E-Mail: info@kta.com
**Dwight Weldon, V.P., Research/Develop-
ment; Scott Rice, Business Development
Mgr.**

Accelerated Weathering
Color/Optical/Appearance Measurement
Gages

SEE OUR AD ON PAGE 161.

L

Labsphere Inc.
P.O. Box 70
Shaker St.
North Sutton, NH 03260
Phone: (603) 927-4266
Fax: (603) 927-4694
E-Mail: labsphere@labsphere.com
Color/Optical/Appearance Measurement
Misc. Testing Equipment
Reflectometers
Spectrophotometers
Test/Measurement

Lasentec
15224 NE 95th St.
Redmond, WA 98052
Phone: (425) 881-7117
Fax: (425) 881-8964
E-Mail: info@lasentec.com
Rich Becker, V.P. Technical Marketing
Particle Characterization
Rheologicals
Viscosity Meters

Lehmann Mills, Inc.
11000 Rt. 62 N., P.O. Box 1083
Salem, OH 44460
Phone: (330) 332-9951
Fax: (330) 332-2208
Dave Hrovatic, Operations Mgr.; Mike
Harold, Sales Rep.; Jennifer Metts,
Marketing/Customer Service Mgr.
Lab Mills

The Leneta Company
15 Whitney Rd.
Mahwah, NJ 07430
Phone: (201) 847-9300
Fax: (201) 848-8833
Gages
Misc. Testing Equipment
Test Charts/Panels

M

Malvern Instruments
10 Southville Rd.
Southborough, MA 01772
Phone: (508) 480-0200
Fax: (508) 460-9692
Alisa Malcolmson, Marketing Communica-
tions Mgr.; Mark Bumiller, V.P. Marketing
Misc. Testing Equipment
Particle Characterization
Test/Measurement

Microcolor Dispersions, Ltd.
333 Horner Ave.
Toronto, Ont. M8W 1Z6
Canada
Phone: (416) 252-5676
Fax: (416) 252-8493
George Broswick, Sales Mgr.
Color/Optical/Appearance Measurement

Micromeritics
One Micromeritics Dr.
Norcross, GA 30093-1877
Phone: (770) 662-3633
Fax: (770) 662-3696
Web: http://www.micromeritics.com
John Guerin, National Sales Mgr.; Bob Johnson,
International Sales Mgr.
Particle Characterization

Micromet Instruments
7 Wells Ave.
Newton Centre, MA 02159
Phone: (617) 969-5060
Fax: (617) 969-5040
Nathaniel Smith, National Sales Mgr.
Misc. Testing Equipment
Test/Measurement
Viscosity Meters

Microview USA Inc., D.I.R.T. Systems Div.
65C N. Dixie Dr., P.O. Box 637
Vandalia, OH 45377
Phone: (937) 264-1050
Fax: (937) 264-1899
Martin P. Shorky, President; Don Blacklack, General Mgr.
Color/Optical/Appearance Measurement
Gages
Particle Characterization
Test/Measurement
Misc. Testing Equipment

Mine Safety Appliances
P.O. Box 427
Pittsburgh, PA 15230
Phone: (800) 672-4678
Fax: (412) 776-3280
Len Blatnica, PLM; Gil Zuber, Sales Mgr.
Gas Chromatographs

Minolta Corporation
101 Williams Dr.
Ramsey, NJ 07446
Toll Free: (888) ISD-COLOR
Phone: (201) 818-3517
Fax: (201) 818-4374
Color/Optical/Appearance Measurement
Light Booths
Misc. Testing Equipment
Spectrophotometers
Test/Measurement

Moco Thermal Industries
One Oven Place
Romulus, MI 48174
Phone: (313) 728-6800
Fax: (313) 728-1927
Robert Howard, V.P. Sales; Bill St. Thomas, Mgr. Direct Sales
Coating Application
Ovens

Muetek Analytic Inc.
2141 Kingston Ct., SE, Ste. 114
Marietta, GA 30067
Phone: (770) 612-0606
Fax: (770) 955-2383
Peter Bischof, Mgr. Engineering
Coating Application
Particle Characterization

N

Nametre Company
101 Liberty St.
Metuchen, NJ 08840
Phone: (732) 494-2422
Fax: (732) 494-8916
Viscosity Meters

Nortech Corp.
265 Greenwood Ave., P.O. Box 87
Midland Park, NJ 07432
Phone: (201) 445-6900
Fax: (201) 444-2653
Cleaning

O

Ocean Optics, Inc.
1237 Lady Marion Ln.
Dunedin, FL 34698
Phone: (813) 733-2447
Fax: (813) 733-3962
Leeward Bean, V.P. Sales/Marketing
Color/Optical/Appearance Measurement
Spectrophotometers



Omnimark Instrument Corp.
1320 S. Priest Dr., Ste. 104
Tempe, AZ 85281
Phone: (602) 784-2200
Fax: (602) 784-4738
E-Mail: info@omniwww.com
Charlene Byers, President; Gary Beeb, Marketing Mgr.
Balances/Scales
Misc. Testing Equipment
Test/Measurement

P

Paar Physica, USA Inc.
1090 King George Post Rd.
Edison, NJ 08837
Phone: (732) 738-6640
Fax: (732) 738-7025
Sean Race, CEO; Abel Gaspar-Rosas, COO
Rheologicals
Viscosity Meters

Particle Sizing Systems, Inc.
75 Aero Camino
Santa Barbara, CA 93117
Phone: (805) 968-1497
Fax: (805) 968-0361
Kerry Hasapidis, V.P.; Patrick O'Hagan, Applications Specialist
Particle Characterization

Particle Sizing Systems

Particle Sizing Instrumentation

0.001 - 2500 microns

Zeta Potential Instrumentation

0.02 - 20 microns

Unique modular instrumentation for Laboratory and Online/Process Facilities. Modules include Autodilution, Dry Powder Sampling, Online/Batch Autosampling, High Power Laser Diode Options, etc.

CALL US SO THAT WE MAY DISCUSS
YOUR APPLICATIONS

TEL: (805) 968-1497

FAX: (805) 968-0361

PE Photovac
761 Main Ave.
Norwalk, CT 06859-0211
Phone: (203) 761-5330
Fax: (203) 761-2677
Shirley Mosby, Sales Administrator
Gas Chromatographs

Plast-O-Matic Valves, Inc.
1384 Pompton Ave.
Cedar Grove, NJ 07009
Phone: (201) 256-3000
Fax: (201) 256-4745
Bob Sinclair, National Sales Mgr.; Jack Leonard, Advertising & Marketing Mgr.
Gages

Plast-O-Meric, Inc.
W227 N6225 Sussex Rd.
Sussex, WI 53089
Phone: (414) 246-0344
Fax: (414) 246-0391
D.E. Krans, Sales
Accelerated Weathering
Color/Optical/Appearance Measurement

Porous Materials, Inc.
Advanced Pressure & Products Div.
83 Brown Rd., Bldg. 4
Ithaca, NY 14850
Phone: (607) 257-5544
Fax: (607) 257-5634
Krishna Gupta, Dir. Marketing
Test/Measurement

Precision Gage & Tool Co.
375 Gargrave Rd.
Dayton, OH 45449
Phone: (937) 866-9666
Fax: (937) 866-9661
E-Mail: pgt@precisiongage-tool.com
Vicki Waltz
Gages

Pro Motorcar Products
36800 Woodward Ave., Ste. 335
Bloomfield Hills, MI 48304-0918
Phone: (248) 646-0666
Fax: (248) 646-2268
Garrett Morelock; George Mueller; Ross Elgood
Gages

Q

Q-Panel Lab Products
26200 First St.
Westlake, OH 44145
Phone: (440) 835-8700
Fax: (440) 835-8738
Accelerated Weathering
Humidity/Condensation/Ultraviolet Chambers
Test Charts/Panels

Quad Group
1815 S. Lewis St.
Spokane, WA 99224
Phone: (509) 458-4558
Fax: (509) 458-4555
E-Mail: quadgroup@spokane.net
Maria Riegert, President; Richard Riegert, Technical Dir.; Mick Barber, Technical Sales Mgr.; Frank Coburn, Sales Mgr.
Misc. Testing Equipment
Physical/Mechanical
Test/Measurement

Quantachrome Corp.
1900 Corporate Dr.
Boynton Beach, FL 33426
Phone: (407) 731-4999
Fax: (407) 732-9888
Densitometers
Particle Characterization

R

Research North America, Inc.
1004 Berlin Rd.
Cherry Hill, NJ 08034
Phone: (609) 428-4334
Fax: (609) 428-6927
Fer deVos, President
Coating Application
Color/Optical/Appearance Measurement
Misc. Testing Equipment
Stirrers

Rhopoint Instrumentation Ltd.
Beeching Rd.
Bexhill-On-Sea
East Sussex, TN39 3LG England
Phone: 01424-214291
Fax: 01424-730600
Graham Sewell
Color/Optical/Appearance Measurement
Densitometers
Misc. Testing Equipment
Reflectometers
Rheologicals
Test/Measurement

Charles Ross & Son Co.
710 Old Willets Path, P.O. Box 12308
Hauppauge, NY 11788
Phone: (516) 234-0500
Fax: (516) 234-0691
Ronald W. Reid, Executive V.P.; Bogard
Lagman, V.P. Sales
Lab Mills
Stirrers

S

S & G Technologies
6155 Tomken Rd., Unit 6
Mississauga, Ont. L5T 1X3 Canada
Phone: (905) 795-0634
Fax: (905) 795-0635
E-Mail: sgtech@interlog.com
Gages

Safe₂O Systems Inc.
P.O. Box 521505
Longwood, FL 32752
Phone: (407) 331-8854
Fax: (407) 331-8811
E-Mail: sales@safe2o.com
Russ Fessenden, President
Ovens



Schold Machine Co.
10590 Oak St., N.E.
St. Petersburg, FL 33716

Phone: (813) 579-1147
Fax: (813) 579-1806
Jerome P. Tippet, Sr., President/CEO;
Lee Zurman, Sales; Jerome P. Tippet,
Jr., Purchasing/Marketing
Lab Mills

SEE OUR AD ON PAGE 85.

SEMico Div.
15817 Crabbs Branch Way
Rockville, MD 20855
Phone: (301) 975-9798
Fax: (301) 975-9653
E-Mail: semicro@aol.com
Jon Massey, Laboratory Mgr.; Laura Estok,
Asst. to President
Coating Application
Misc. Testing Equipment
Test/Measurement

Sensor Products
24 Castle Ridge Park
E. Hanover, NJ 07936
Toll Free: (800) 755-2201
Fax: (973) 884-1699
E-Mail: sensorprod@aol.com
Jeffrey G. Stark, Dir. Marketing
Densitometers
Misc. Testing Equipment
Test/Measurement

Serfilco, Ltd.
1777 Shermer Rd.
Northbrook, IL 60062
Phone: (847) 559-1777
Fax: (847) 559-1995
E-Mail: sales@serfilco.com
pH Meters

Singleton Corp.
3280 W. 67th Place
Cleveland, OH 44102
Phone: (216) 651-7800
Fax: (216) 651-4247
Cynthia Meade, Product Mgr.
Accelerated Weathering
Humidity/Condensation/Ultraviolet Chambers
Misc. Testing Equipment
pH Meters

Solartron Transducers
19408 Park Row, Ste. 320
Houston, TX 77084
Phone: (713) 398-7890
Fax: (713) 398-7891
Kevin Bates, Inside Sales
Densitometers
Viscosity Meters

Spraymation, Inc.
5320 N.W. 35th Ave.
Fort Lauderdale, FL 33309
Phone: (954) 484-9700
Fax: (954) 484-9778
Ronald E. Wilson, Product Mgr.
Misc. Testing Equipment

Stony Brook Scientific Ltd.
51 Hartz Way
Secaucus, NJ 07094
Phone: (201) 863-2212
Fax: (201) 863-1890
Noh A. Park, President
Physical/Mechanical
Rheologicals
Test/Measurement
Viscosity Meters

Structure Probe, Inc.
P.O. Box 656
West Chester, PA 19380
Phone: (610) 436-5400
Fax: (610) 436-5755
E-Mail: spi2spi@2spi.com
Charles A. Garber

Microscopy
Misc. Testing Equipment
Ovens
Particle Characterization
pH Meters
Test/Measurement

Sub-Tropical Testing Service
8290 S.W. 120th St.
Miami, FL 33156
Phone: (305) 233-5341
Fax: (305) 233-5342
E-Mail: STTSMiami@aol.com
Web Site: Sub-Tropical.com
Lon Hicks, V.P./Operations; John Doerpfeld,
Technical Dir.; Mel Mullman, Field &
Evaluation Services Mgr.
Accelerated Weathering
Balances/Scales
Color/Optical/Appearance Measurement
Humidity/Condensation/Ultraviolet Chambers
Light Booths
Ovens
Physical/Mechanical
Spectrophotometers
Misc. Testing Equipment

T

TA Instruments, Inc.
109 Lukens Dr.
New Castle, DE 19720
Phone: (302) 427-4000
Fax: (302) 427-4001
E-Mail: info@tainst.com
Mike Uptmor, Sales Mgr., Thermal Analysis;
Raoul Smith, Sales Mgr., Rheology
Physical/Mechanical
Rheologicals
Test/Measurement
Viscosity Meters

Tangent Systems, Inc.
8030-B England St.
Charlotte, NC 28273
Phone: (704) 554-0830
Fax: (704) 554-0820
E-Mail: sales@tangentinfo.com
Jack Rorick, Sales Mgr.
Misc. Testing Equipment

Testing Machines, Inc.
2916 Expressway Dr., S.
Islandia, NY 11722
Phone: (516) 842-5400
Fax: (516) 842-5220
Balances/Scales
Color/Optical/Appearance Measurement
Gages
Light Booths
Misc. Testing Equipment
Test/Measurement
Viscosity Meters

TherMold Partners, L.P.
Thermal Analysis Div.
652 Glenbrook Rd.
Stamford, CT 06906
Phone: (203) 977-8161
Fax: (203) 977-8237

E-Mail: sales@thermolp.com
 H.L. Brown, President; J.H. Fisk, National Sales Mgr.

Coating Application
 Misc. Testing Equipment
 Physical/Mechanical
 Rheologicals
 Test/Measurement

Thermovation Engineering
 P.O. Box 248110
 Cleveland, OH 44124-8110
 Phone: (216) 691-1410
 Fax: (216) 691-0708
 George E. Heath, P.E., President; George Heath, Jr., Marketing Dir.
 Ovens

Balances/Scales
 Coating Application
 Color/Optical Appearance Measurement
 Gages
 Holiday Detectors
 Humidity/Condensation/Ultraviolet Chambers
 Lab Mills
 Light Booths
 Ovens
 pH Meters
 Physical/Mechanical
 Reflectometers
 Spectrophotometers
 Stirrers
 Surface Tension Instruments
 Test/Measurement
 Viscosity Meters
 Misc. Testing Equipment

SEE OUR AD ON THIS PAGE.

Ovens
 Physical/Mechanical
 Surface Tension Instruments
 Test Measurement

Tricor Systems Inc.
 400 River Ridge Dr.
 Elgin, IL 60123
 Toll Free: (800) 575-0161
 Phone: (847) 742-5542
 Fax: (847) 742-5574
 E-Mail: info@tricor-systems.com
 Timothy P. Allen, VP Business Development; Thomas M. Allen, Marketing/Sales Mgr.
 Color/Optical/Appearance Measurement
 Misc. Testing Equipment
 Physical/Mechanical
 Reflectometers
 Test/Measurement



Thomas Scientific
 99 High Hill Road
 Swedesboro, NJ 08085
 Phone: (609) 467-2000
 Fax: (609) 467-3087
 E-Mail: value@thomassci.com
 Ed Pierzynski, V.P. Marketing; Mike Garner, Industrial Marketing Mgr.
 Accelerated Weathering

Thwing-Albert Instrument Co.
 10960 Dutton Rd.
 Philadelphia, PA 19154
 Phone: (215) 637-0100
 Fax: (215) 632-8370
 E-Mail: thwingPA@aol.com
 Dave Muchorski, Dir. Sales/Marketing
 Balances/Scales
 Coating Application
 Color/Optical/Appearance Measurement
 Gages
 Humidity/Condensation/Ultraviolet Chambers
 Misc. Testing Equipment

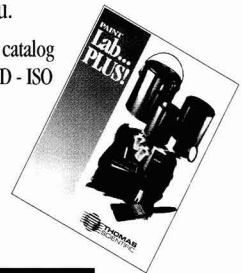
U
 U.S. Best, Inc.
 P.O. Box 346
 New Albany, IN 47151
 Phone: (812) 941-8867
 Fax: (812) 941-8982
 Dana Dethy, Marketing Mgr.
 Stirrers



YOUR ORIGINAL LABORATORY SUPPLIER... & still your BEST CHOICE!

Thomas Scientific has been providing quality products and dependable service to laboratories around the world for almost 100 years. This long term Thomas commitment to our customers means premier service, quality products, competitive prices, and the assurance that we'll be here for you.

- 2000 pages, full color
- New and unique products
- Technical references
- Manufacturer cross reference
- All of our catalogs are printed on recycled paper
- Now available: 84-page Paint & Coatings catalog
- Exclusive distributor for Sheen Instrument LTD - ISO 9002 certified
- 1-year Thomas product warranty



We'll be there when you need us! SINCE



PO Box 99 • Swedesboro • New Jersey • 08085-0099 Phone: 609-467-2000 or 800-345-2100 Fax: 609-467-3087 or 800-345-5232



Visit THOMAS SCIENTific on the Internet <http://www.thomassci.com> email: value@thomassci.com

Circle No. 164 on the Reader Service Card

U.S. Stoneware
700 E. Clark St.
East Palestine, OH 44413
Phone: (330) 426-4500
Fax: (330) 426-1859
E-Mail: usgroup@aol.com
David Early, Sales Mgr.
Lab Mills

U.V. Process Supply, Inc.
1229 W. Cortland St.
Chicago, IL 60614-4805
Phone: (773) 248-0099
Fax: (773) 880-6647
E-Mail: info@uvps.com
Kristie Figueiredo, Sales; Stephen Siegel,
President; Tom Heffennan, Marketing
Balances/Scales
Color/Optical/Appearance Measurement
Densitometers
Gages
Misc. Testing Equipment
pH Meters
Spectrophotometers
Stirrers
Surface Tension Instruments
Test/Measurement
Viscosity Meters

V

Veeco Instruments, Inc.
UPA Technology Div.
Terminal Dr.
Plainview, NY 11803
Phone: (516) 349-8300
Fax: (516) 349-8321
Francis Reilly, Dir. Sales/Marketing
Gages
Test/Measurement

W

Westerlins Maskinfabrik AB
Box 9075
Trehogsgatan 10
Malmo, 200 39
Sweden
Phone: 46 40 210410
Fax: 46 40 220403
Lab Mills
Stirrers

WESTERN
EQUIPMENT COMPANY

Western Equipment Company
981 66th Ave.
Oakland, CA 94621
Phone: (510) 638-2774
Fax: (510) 632-5928
Don Mazzone, General Mgr.; Irma
Dominguez, Marketing Mgr.
Accelerated Weathering
Balances/Scales
Color/Optical/Appearance Measurement
Gages
Gas Chromatographs

Lab Mills
Light Booths
Misc. Testing Equipment
Ovens
pH Meters
Reflectometers
Stirrers
Viscosity Meters

SEE OUR AD ON PAGE 147.

X

X-Rite, Incorporated
3100 44th St., SW
Grandville, MI 49418

Phone: (616) 534-7663
Fax: (616) 534-1466
Color/Optical/Appearance Measurement

Z

Carl Zeiss Inc., Microscope Div.
One Zeiss Div.
Thornwood, NY 10594
Toll Free: (800) 233-2343
Fax: (914) 681-7446

"Tell me, and I forget.
Teach me, and I may remember.
Involve me, and I learn."

— Benjamin Franklin

JCT — Monthly Technical Journal

Coatings Encyclopedic Dictionary

Infrared Spectroscopy Atlas
2 Volume Desk Set

Series — A Collection
of Informative Monographs

Pictorial Standards of
Coatings Defects Manual

Audio/Visual Presentations

Sci-Quest CD-ROM Tutorial
for Coatings Industry

Annual International
Coatings Exposition

International Coatings
Technology Conference



Federation of Societies
for Coatings Technology

492 Norristown Road
Blue Bell, Pennsylvania 19422-2350
(610) 940-0777 Fax (610) 940-0292

FSCT Membership includes special product discounts and invaluable international networking. Become involved and learn...



FSCT Publications Order Form

Buyer Information

YOUR COMPANY: Check the one block which applies most specifically to the company or organization with which you are affiliated:

- A Manufacturers of Paints, Varnishes, Lacquers, Printing Inks, Sealants, etc.
- B Manufacturers of Raw Materials
- C Manufacturers of Equipment and Containers
- D Sales Agents for Raw Materials and Equipment
- E Government Agency
- F Research/Testing/Consulting
- G Educational Institution/Library
- H Paint Consumer/Applicator
- J Other _____
please specify

YOUR POSITION: Check the one block which best describes your position in your company or organization:

- A Management/Administration
- B Manufacturing and Engineering
- C Quality Control
- D Research and Development
- E Technical Sales/Service
- F Sales and Marketing
- G Consultant
- H Educator/Student
- J Other _____
please specify

Billing Address

- FSCT Member Non-Member
- Name _____
- Title _____
- Company _____
- Address _____
- City & State _____
- Country _____ Postal Code _____
- Phone _____ FAX _____

Shipping Address (if different)

- Name _____
- Title _____
- Company _____
- Address _____
- City & State _____
- Country _____ Postal Code _____
- Phone _____ FAX _____

Method of Payment

Please check one:

- Charge to the following card:
 - MC VISA
 - AMEX DISCOVER
- Check # _____
(checks must be payable in U.S. Funds on U.S. Bank)
- P.O. # _____
- Exp. Date: _____
- Credit Card Number: _____

Name _____
(print cardholder's name)
Signature _____

Total Amount Due: _____

Add \$5.00 for shipping and handling. PA residents, please add 6% sales tax.

Orders

Series	Member \$15	Non-Mem. \$25	Quantity Ordered
(Less 10% for Full Series Purchase)			
Film Formation	<input type="checkbox"/>	<input type="checkbox"/>	_____
Introduction to Polymers and Resins	<input type="checkbox"/>	<input type="checkbox"/>	_____
Coil Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Corrosion Protection by Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Mechanical Properties of Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Automotive Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Coating Film Defects	<input type="checkbox"/>	<input type="checkbox"/>	_____
Application of Paints and Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Organic Pigments, Second Edition	<input type="checkbox"/>	<input type="checkbox"/>	_____
Inorganic Primer Pigments	<input type="checkbox"/>	<input type="checkbox"/>	_____
Marine Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Sealants and Caulks	<input type="checkbox"/>	<input type="checkbox"/>	_____
Aerospace and Aircraft Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Introduction to Coatings Technology	<input type="checkbox"/>	<input type="checkbox"/>	_____
Cationic Radiation Curing	<input type="checkbox"/>	<input type="checkbox"/>	_____
Rheology	<input type="checkbox"/>	<input type="checkbox"/>	_____
Powder Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Introduction to Pigments	<input type="checkbox"/>	<input type="checkbox"/>	_____
Painting of Plastics	<input type="checkbox"/>	<input type="checkbox"/>	_____
Metal Surface Characteristics	<input type="checkbox"/>	<input type="checkbox"/>	_____
Affecting Organic Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____
Color and Appearance	<input type="checkbox"/>	<input type="checkbox"/>	_____
White Pigments	<input type="checkbox"/>	<input type="checkbox"/>	_____
Methodologies for Predicting	<input type="checkbox"/>	<input type="checkbox"/>	_____
the Service Lives of Coatings Systems	<input type="checkbox"/>	<input type="checkbox"/>	_____
Silicones	<input type="checkbox"/>	<input type="checkbox"/>	_____
Finishing Exterior Wood	<input type="checkbox"/>	<input type="checkbox"/>	_____
Adhesion Aspects of Polymeric Coatings	<input type="checkbox"/>	<input type="checkbox"/>	_____

JCT: _____ (specify no. of yrs.) (annual subscrp. included w/FSCT membership)

	U.S. & Canada	Europe (Air Mail)	Other Countries
1 Year	<input type="checkbox"/> \$60	<input type="checkbox"/> \$90	<input type="checkbox"/> \$75
2 Years	<input type="checkbox"/> \$110	<input type="checkbox"/> \$170	<input type="checkbox"/> \$140
3 Years	<input type="checkbox"/> \$170	<input type="checkbox"/> \$260	<input type="checkbox"/> \$220

- Coatings Encyclopedic Dictionary*
 - Soft Cover \$80 \$105 _____
 - Hard Cover \$105 \$135 _____
- Glossary of Color Terms \$12 \$20 _____
- Infrared Spectroscopy Atlas \$150 \$200 _____
- Pictorial Standards \$100 (one price) _____
- SciQuest \$750 \$800 _____
- JCT Buyers' Guide \$50 (one price) _____

* Volume discount on five or more.

Federation of Societies for Coatings Technology

492 Norristown Rd., Blue Bell, PA 19422 Phone: (610) 940-0777 Fax: (610) 940-0292

Web Address: <http://www.coatingstech.org>

FSCT Publications are also available from:
Marina Estévez, ANAFAPYT, Gabriel Mancera 309,
Col. Del Valle, 03100 Mexico, D.F., Mexico

10/97

Services

A

AAF International
P.O. Box 35690
Louisville, KY 40232
Phone: (502) 637-0011
Fax: (502) 637-0321
Air Pollution/Effluent Control

ACT Laboratories
24901 Northwestern Hwy.
Southfield, MI 48075
Phone: (810) 827-3333
Fax: (810) 827-3338
Ron Swinko, V.P.; Meghan Gierig, Sales
Eng.
Consulting/Testing

Alar Engineering Corp.
9651 W. 196th St.
Mokena, IL 60448
Phone: (708) 479-6100
Fax: (708) 479-9059
Vickey Hansen, V.P. Sales
Air Pollution/Effluent Control

**American Chemical Society
Chemical & Engineering News**
676 E. Swedesford Rd., Ste. 202
Wayne, PA 19087-1612
Phone: (610) 964-8061
Fax: (610) 964-8071
E-Mail: jones@acs.org
Ben Jones, Executive V.P.; Kenneth Carroll,
Mgr., Chemical Publication Sales
Publishing

American Standards Testing Bureau Inc.
40 Water St.
New York, NY 10004
Phone: (212) 943-3160
Fax: (212) 825-2250

S.W. Taylor, Dir. Technical Services
Consulting/Testing
Engineering Services
Environmental/Regulatory Services
Exposure Testing
Packaging Design-Custom
Research & Development
Safety/Health Services

**AMEX® Cleaning & Coating
Removal Systems**
5 Crescent Ave.
P.O. Box 349
Rocky Hill, NJ 08553
Toll Free: (800) 332-5424
Fax: (609) 497-9308
E-Mail: downede@armex.com
Ken Colbert, General Mgr.; Delia L. Downes,
Marketing Mgr.; Scott Sorrell, National Sales
Mgr.
Surface Preparation/Cleaning Pretreatment

Ashland Chemical Co.
IC & S Div.
P.O. Box 2219
Columbus, OH 43216
Phone: (614) 790-3440
E-mail: csr@ashchem.com
Waste Disposal

Atlas Electric Devices
4114 N. Ravenswood Ave.
Chicago, IL 60613
Phone: (773) 327-4520
Fax: (773) 327-5787
Robert Herling, V.P. Sales/Marketing;
Robert Laltie, National Sales Dir.; Rudolph
Leber, International Sales Dir.
Exposure Testing

Atlas Weathering Services
DSET Laboratories Div.
45601 N. 47th Ave.
Phoenix, AZ 85027-7042
Toll Free: (800) 255-3738
Fax: (602) 465-9409
L.F. Bond, V.P. Sales and Client Services;
R.W. Lane, Site Mgr., DSET
Consulting/Testing
Exposure Testing

Atlas Weathering Services Group
South Florida Test Service Div.
17301 Okeechobee Rd.
Miami, FL 33018
Phone: (305) 824-3900
Fax: (305) 362-6276
L.F. Bond, V.P. Sales and Client Services;
J.L. Martin, Site Mgr., SFTS
Consulting/Testing
Exposure Testing

B

B.A.G. Corp.
11510 Data Dr.
Dallas, TX 75218
Phone: (800) 331-9200
Fax: (214) 340-4598
Joe Clear, Dir. Marketing; Cindy Finley, Dir.
Sales
Waste Disposal

Bjorksten Research Laboratories, Inc.
P.O. Box 259444
Madison, WI 53725-9444
Phone: (608) 271-6900
Fax: (608) 271-6930
Michael Maloney, President
Consulting/Testing
Engineering Services
Research & Development

Bycote Industrial Testing Ltd.
2350 S. Seventh St.
St. Louis, MO 63104
Phone: (314) 771-7111
Fax: (314) 771-9573
Bobby Archibald, President
Consulting/Testing
Engineering Services
Environmental/Regulatory Services
Exposure Testing

British Standards Institution, Inc.
13100 Worldgate Dr., Ste. 245
Herndon, VA 20170
Phone: (703) 437-9000
Fax: (703) 437-9001
Reg Blake, Dir. Sales & Marketing; Kathleen
Moran, Client Administrator; Dianne Wood,

Client Administrator
Consulting/Testing
Environmental/Regulatory Services
Registrar for ISO 9000; ISO 14000; QS-9000
CE Marking
Quality Assurance

C

Cannon Instrument Co.
P.O. Box 16
State College, PA 16804-0016
Toll Free: (800) 676-6232
Phone: (814) 353-8000
Fax: (814) 353-8007
E-Mail: cannon@cannon-ins.com
Consulting/Testing

Captan Associates, Inc.
P.O. Box 504
Brick, NJ 08723
Phone: (732) 840-1244
Fax: (732) 840-1211
Consulting/Testing
Publishing
Research & Development

Cause Engineering L.A., LLC
1216 Glen Arbor Ave.
Los Angeles, CA 90041
Phone: (213) 258-1184
Fax: (213) 258-4729
Charles H. Avery, Owner/Consulting
Engineer
Consulting/Testing
Engineering Services
Research & Development

CB Mills
1300 Northwestern Ave.
Gurnee, IL 60031
Toll Free: (800) 522-7343
Fax: (847) 662-4003
E-Mail: cbmills@ix.netcom.com
David Pagor, Sales Mgr.; J. Denny Stidham,
General Mgr.
Research & Development
Safety/Health Services
Turnkey Processes

Celotex Testing Services
10301 Ninth St., N.
St. Petersburg, FL 33716
Phone: (813) 578-4316
Fax: (813) 578-4280
Phyllis Taylor, Account Mgr.; Ken Espeut,
Coatings Specialist
Consulting/Testing
Engineering Services
Exposure Testing
Research & Development

Chemical Week
888 Seventh Ave., 26th Fl.
New York, NY 10106
Phone: (212) 621-4900
Fax: (212) 621-4949
E-Mail: bpunsalan@chemweek.com
Stephen Schwartz, Associate Publisher;
Michael Silber, Publisher; Betsy Punsalan,
Mgr., Buyers' Guide
Publishing

Chemir/Polytech Laboratories, Inc.
 2672 Metro Blvd.
 Maryland Heights, MO 63043
 Phone: (314) 291-6620
 Fax: (314) 291-6630
 E-Mail: info@chemir.com
Shri Thanedar, Technical Dir.
 Consulting/Testing

Chemical Analysis Services	
▲ Materials ID/Deformation	
▲ Product Defects/Failure Analysis	
 Chemir / Polytech Laboratories, Inc.	
(314) 291-6620 http://www.chemir.com	

Chemsultants International
 9349 Hamilton Dr.
 Mentor, OH 44060
 Phone: (216) 352-0218
 Fax: (216) 352-8572
 Richard P. Muny, President; Robert L. Frye,
 Dir. Lab Services
 Consulting/Testing
 Research & Development

Chem-Tel Inc.
 10770 N. 46th St., #B-100
 Tampa, FL 33617
 Phone: (813) 979-0626
 Fax: (813) 979-4620
 Laurie Davis, Subscription Services Dir.
 Environmental/Regulatory Services
 Safety/Health Services

Cincinnati Industrial Machinery
 3280 Hageman St., P.O. Box 62027
 Cincinnati, OH 45262
 Phone: (513) 769-0700
 Fax: (513) 769-0697
 Tom Shield, Sales & Marketing Mgr.; Ralph
 Patrick, President
 Surface Preparation/Cleaning Pretreatment
 Turnkey Processes

Cleveland Pigment & Color Co.
 1680 E. Market St.
 Akron, OH 44305
 Phone: (330) 794-9977
 Fax: (330) 794-6425
 Kevin I. Hershfield, President; Patrick
 O'Connor, Sales Rep. (Ohio);
 Packaging Design-Custom

The Coatings Laboratory Inc.
 8605 Rayson Rd.
 Houston, TX 77080
 Phone: (713) 939-8853
 Fax: (713) 939-8841
 E-Mail: paintlab@paintlab.com
 Geoff Byrnes, President; Tom Schwerdt,
 Managing Chemist; Melanie Adams,
 Research/Formulations Chemist
 Consulting/Testing
 Exposure Testing
 Research & Development

Coatings Technology Ltd.
 228 C. Patterson Ave.
 Hampton, VA 23669
 Phone: (757) 723-6524
 Fax: (757) 722-3783
 Colin D. Penny, President
 Consulting/Testing
 Research & Development

Color Communications, Inc.
 4000 W. Fillmore St.
 Chicago, IL 60624
 Phone: (773) 638-1400
 Fax: (773) 638-0887
 Web: www.cccolor.com
 Consulting/Testing

Consolidated Color Corp.
 12316 E. Carson St.
 Hawaiian Gardens, CA 90716
 Phone: (562) 420-7714
 Fax: (562) 425-2460
 E-Mail: polychrome2@earthlink.net
 Dana Harding, President; Glenn Wool,
 Sales Mgr.
 Research & Development

Consolidated Research Inc.
 P.O. Box 2190
 Kingsford, MI 49802
 Phone: (906) 779-9498
 Fax: (906) 779-9787
 Darlene Brezinski, President
 Consulting/Testing

Container Testing Laboratory, Inc.
 607 Fayette Ave.
 Mamaroneck, NY 10543
 Phone: (914) 381-2600
 Fax: (914) 381-0143
 E-Mail: pugbrooks@aol.com
 S. Brooks, Laboratory Dir.
 Consulting/Testing
 Engineering Services
 Environmental/Regulatory Services
 Exposure Testing
 Packaging Design-Custom
 Research & Development
 Safety/Health Services

Corbus, Div. of CMS, Inc.
 206 Line Rd.
 Kennett Square, PA 19348
 Phone: (610) 444-5691
 Fax: (610) 444-6461
 E-Mail: sales@corbus.com
 Diane Walls, Marketing Rep.; Don Cowles,
 President; Jim Haag, V.P.
 Environmental/Regulatory Services

Corrosion Control Consultants & Labs, Inc.
 4403 Donker Ct., SE
 Kentwood, MI 49512-4054
 Phone: (616) 940-3112
 Fax: (616) 940-8139
 Gary L. Tinklenberg, President; Lloyd M.
 Smith, Corp. V.P.; Jerry D. Byrd, V.P.
 Consulting/Testing
 Educational
 Exposure Testing
 Research & Development

Corpro Companies, Inc.
 Tennessee Ave. & Beach Thorofare
 Ocean City, NJ 08226
 Phone: (609) 399-2417
 Fax: (609) 399-5233
 E-Mail: coatings@corrpro.com
 J. Peter Ault, Mgr., Coatings Services;
 James A. Ellor, V.P.
 Consulting/Testing
 Engineering Services
 Research & Development

Cuno, Inc.
 400 Research Parkway
 Meriden, CT 06450
 Phone: (203) 237-5541
 Fax: (203) 238-8977
 Web: www.cuno.com

Drew Willoughby, Market Mgr.
 Consulting/Testing
 Engineering Services
 Research & Development

Custom Aerosol Packaging
 543 Staunton St.
 P.O. Box 1411
 Piqua, OH 45356
 Phone: (937) 773-1824
 Fax: (937) 773-6009
 Daniel J. Henthorn, Dir. Sales/Marketing
 Turnkey Processes

D

D/L Laboratories
 116 E. 16th St.
 New York, NY 10003
 Phone: (212) 777-4445
 Fax: (212) 505-8419
 Saul Spindel, President; Thomas J. Sliva,
 Asst. Technical Dir.
 Consulting/Testing
 Environmental/Regulatory Services
 Exposure Testing
 Research & Development

Datacolor International
 3735 Beam Rd.
 Charlotte, NC 28217
 Phone: (704) 357-0400
 Fax: (704) 329-9925
 Phil Jannetto, National Sales Mgr.; Carla
 Deckelman, Marketing Communications
 Educational

DCE, Inc.
 11301 Electron Dr.
 Louisville, KY 40299
 Toll Free: (800) 767-0702
 Phone: (502) 267-0707
 Fax: (502) 267-3074
 E-Mail: DCEDD@aol.com
 Air Pollution/Effluent Control

Dek-Tron Scientific Instruments
 244 E. Third St.
 Plainfield, NJ 07060
 Phone: (908) 668-1777
 Fax: (908) 668-4794
 Miguel A. Vargas, Financing; Segundo H.
 Vargas, Sales/Marketing; Hector Vargas,
 Engineering
 Research & Development

Detroit Testing Laboratory, Inc.
 7111 E. Eleven Mile Rd.
 Warren, MI 48092-2709
 Phone: (810) 754-9000
 Fax: (810) 754-9045
 E-Mail: www.detest.com
 Mark Smith, Sales Mgr.; Julia Ellwanger,
 Marketing Coordinator
 Consulting/Testing
 Exposure Testing

Draiswerke GmbH, North America Div.
 P.O. Box 546
 South Haven, MI 49090
 Phone: (616) 639-2008
 Fax: (616) 639-2507
 E-Mail: Kwalitey1@cybersol.com
 Randolph C. Grieves, Kwalitey Equip. Co.
 Consulting/Testing
 Engineering Services
 Turnkey Processes

DSA Consulting, Inc.
5555 Suwanee Rd.
P.O. Box 1121
Shawnee Mission, KS 66222
Phone: (913) 262-9384
Fax: (913) 262-9384
Donald S. Andrade, President
Consulting/Testing

E

Eastern-Cleveland Mixers
Heritage Park Rd.
P.O. Box 912
Clinton, CT 06413
Toll Free: (800) 243-1188
Fax: (860) 669-7461
Consulting/Testing
Research & Development

Electronic Sensors, Inc.
1611 W. Harry
Wichita, KS 67213
Phone: (316) 267-2807
Fax: (316) 267-2819
E-Mail: sday@leveldevil.com
Scott Day, Sales Mgr.
Engineering Services

Electrotechnology Applications Center
3825 Green Pond Rd.
Bethlehem, PA 18017-7599
Phone: (610) 861-5596
Fax: (610) 861-5060

F

Fanuc Robotics North America, Inc.
3900 W. Hamlin Rd.
Rochester Hills, MI 48309-3253
Phone: (248) 377-7000
Fax: (248) 377-7366
Christine Hojnowski, Marketing Associate
Turnkey Processes



**FEDERATION OF SOCIETIES FOR
COATINGS TECHNOLOGY**
492 Norristown Rd.
Blue Bell, PA 19422-2350
Phone: (610) 940-0777
Fax: (610) 940-0292
Web: <http://coatingstech.org>
Robert F. Ziegler, Executive V.P.; Michael
G. Bell, Dir. Educational Services; Tori
Graves, Dir. Membership Services;
Patricia D. Ziegler, Dir. Publications; Lyn
Pollock, Dir. Marketing
Educational
Publishing

SEE OUR AD ON PAGE 1.

Fort James Corp.
120 Tredgar St., P.O. Box 2218
Richmond, VA 23218
Phone: (804) 644-5411
Fax: (804) 649-4428
Corporate Information Center
Packaging Design-Custom

Fry Consultants Inc.
2100 Powers Ferry Rd., Ste. 125
Atlanta, GA 30339
Phone: (770) 226-8888
Fax: (770) 226-8899
E-Mail: lynesmith@mindspring.com
Lyne Smith, Managing Principal; Mark
Towney, Managing Director
Consulting/Testing

G

Gasmac, Inc., Finish Div.
509 Clair Rd., W.
Guelph, Ont. N1H 6H9 Canada
Phone: (519) 836-5362
Fax: (519) 836-4242
Samuel Schneider, Mgr.
Air Pollution/Effluent Control
Surface Preparation/Cleaning Pretreatment

Global Solutions
P.O. Box 23209
Charlotte, NC 28227
Phone: (704) 821-4433
Fax: (704) 821-9599
Cherri Strome, Dir. Marketing
Consulting/Testing
Graphic Arts

GretagMacbeth
617 Little Britain Rd.
New Windsor, NY 12553
Phone: (914) 565-7660
Fax: (914) 565-0390
Educational

H

William Harrison Corp.
4595 E. 10th Ct.
Hialeah, FL 33013
Phone: (305) 681-8381
Fax: (305) 685-0407
Perry Harrison, V.P./G.M.
Exposure Testing

SEE OUR AD ON PAGE 00.

Heisler Industries, Inc.
224 Passaic Ave.
Fairfield, NJ 07004
Phone: (973) 227-6300
Fax: (973) 227-7627
Lori Podesta, Sales Eng.; Rick Hugg, Sales
Eng.
Turnkey Processes

Hockmeyer Equipment Corp.
P.O. Box 113
Harrison, NJ 07029
Phone: (201) 482-0225
Fax: (201) 484-6114
Cathy D. Strahan, V.P. Marketing
Air Pollution/Effluent Control
Consulting/Testing
Engineering Services

Hubbard-Hall, Inc.
563 S. Leonard St.
Waterbury, CT 06208
Phone: (203) 756-5521
Fax: (203) 596-9544
Bob Farrell, Technical Dir.; Gerry
Mastropietro, Sales Mgr.
Consulting/Testing
Safety/Health Services
Surface Preparation/Cleaning Pretreatment

I

ICI Paints/Glidden
Research Center
16651 Sprague Rd.
Strongsville, OH 44136
Phone: (440) 826-5449
Fax: (440) 826-5233
E-Mail: cj-debr@compuserve.com
Charles J. DeBrosse, Technical Mgr., Resin
Process Technology
Research & Development

ICIS-LOR
3730 Kirby Dr., Ste. 1030
Houston, TX 77098
Phone: (713) 525-2600
Fax: (713) 525-2659
E-Mail: sales.us@icislor.com
Melisa Billingsley, Account Mgr.; Frances
Moore-Jones, Sales & Marketing Mgr.
Publishing

Imation Enterprising Corp.
Manufacturing Div.
8124 Pacific Ave.
White City, OR 97503
Toll Free: (800) 234-8069
Fax: (541) 826-3226
E-Mail: snewkirk@imation.com
Steve Newkirk, Commercialization Mgr.;
Dave Dobrew, Product Mgr.; Mo Glover,
Customer Resource/QA Coordinator
Consulting/Testing
Contact Web Coating
Research & Development

Independent Capital Corp.
1170 Route 22 E.
Bridgewater, NJ 08807
Phone: (908) 722-1992
Fax: (908) 722-2289
E-Mail: rbaccaro@nac.net
Richard A. Baccaro, CEO
Equipment Financing/Leasing

Industrial Paint & Powder
191 S. Gary Ave.
Carol Stream, IL 60188
Phone: (630) 665-1000
Fax: (630) 462-2225
Ed McCallum; Associate Publisher; Jane
Bailey, Editor
Publishing

Infracol Manufacturing Corp.
646 S. 29th St.
Milwaukee, WI 53215
Phone: (414) 671-7140
Fax: (414) 671-5088
Hank Hemphill, V.P. Sales
Surface Preparation/Cleaning Pretreatment
Turnkey Processes

INOUE USA
7018 A.C. Skinner Pkwy. #240
Jacksonville, FL 32256
Jerry Chait
Consulting/Testing
Engineering Services
Turnkey Processes

International Reserve Equipment Corp.
Four S. Prospect Ave.
P.O. Box 198
Clarendon Hills, IL 60514-0198
Phone: (630) 325-7040
Fax: (630) 325-7045
Thomas J. Mertz, Partner/Advertising
Air Pollution/Effluent Control

J

Jet Wheelblast Equipment
401 Miles Dr.
Adrian, MI 49221
Phone: (517) 263-0502
Fax: (517) 263-0038
Dwight E. Lutsko, General Sales Mgr.
Air Pollution/Effluent Control

Jevic Transportation Inc.
600 Creek Rd.
P.O. Box 5157
Delanco, NJ 08075
Toll Free: (800) 257-0427
Fax: (609) 764-7224
Peter Robinson, Dir. Corporate Communica-
tions
Motor Carrier

Johnson Matthey Environmental
Products Div.
640 E. Swedesford Rd.
Wayne, PA 19087-1880
Phone: (610) 971-3100
Fax: (610) 971-3124
Ben Tiley, Sales Engineer
Air Pollution/Effluent Control

Jordan Composites Inc.
13603-B S. Halsted
Riverdale, IL 60827
Phone: (708) 841-0885
Fax: (708) 841-2191
K.C. Jordan, President; Curtis Jordan, Sales
Mgr.
Surface Preparation/Cleaning Pretreatment
Turnkey Processes

JCT
JOURNAL OF COATINGS TECHNOLOGY

JOURNAL OF COATINGS TECHNOLOGY
492 Norristown Rd.
Blue Bell, PA 19422-2350
Phone: (610) 940-0777
Fax: (610) 940-0292
Web: <http://coatingstech.org>
Patricia D. Ziegler, Editor; Kathleen M.
Wikiera, Managing Editor; Jonna
Coachman, Associate Editor/Advertising
Services; Audrey Boozer, Subscription
Mgr.
Publishing

K

Kady International
127 Pleasant Hill Rd.
P.O. Box 847
Scarborough, ME 04070-0847
Toll Free: (800) FOR-KADY
Phone: (207) 883-4141
Fax: (207) 883-8241
Web: www.kadyinternational.com
Consulting/Testing
Engineering Services

M.P. Kenes, Inc.
15638 S. 70th Ct.
Orland Park, IL 60462
Phone: (708) 429-5933
Fax: (708) 429-6062
E-Mail: mpkenes.com
M.P. Kenes, President; A.R. Duda, Dir.
Engineering Development
Consulting
Engineering Services

Kline & Company, Inc.
165 Passaic Ave.
Fairfield, NJ 07004
Phone: (201) 227-6262
Fax: (201) 227-6291
Bardia Mesbah, Business Mgr.
Consulting/Testing

Krautkramer Branson
50 Industrial Park Rd.
Lewistown, PA 17044
Phone: (717) 242-0327
Fax: (717) 242-2606
E-Mail: kb-ltn.mhs.compuserve.com
Randy Sell, National Sales Mgr.
Educational

KTA-Tator, Inc.
115 Technology Dr.
Pittsburgh, PA 15275
Phone: (412) 788-1300
Fax: (412) 788-1306
E-Mail: info@kta.com
**Dwight Weldon, V.P., Research/Develop-
ment; Scott Rice, Business Development
Mgr.**
Consulting/Testing
Educational
Engineering Services
Environmental/Regulatory Services
Research & Development
Safety/Health Services

SEE OUR AD ON PAGE 161.

L

Labelmaster
5724 N. Pulaski Rd.
Chicago, IL 60646
Toll Free: (800) 621-5808
E-Mail: sales@labelmaster.com
Customer Service Dept.
Packaging Design-Custom

LaQue Corrosion Services
702 Causeway Dr.
P.O. Box 656
Wrightsville Beach, NC 28480
Phone: (910) 256-2271
Fax: (910) 256-9816

E-Mail: info@laque.com
S. Darden, Program Coord.
Consulting/Testing
Educational
Engineering Services
Exposure Testing
Research & Development

Arthur D. Little
Technology Consulting & Product
Development Div.
Acorn Park
Cambridge, MA 02140-2390
Phone: (617) 498-6492
Fax: (617) 498-7250
Web: www.arthurdittle.com
Masha Markusova, Consultant; John Martin,
Senior Consultant
Consulting/Testing
Exposure Testing
Graphic Arts
Packaging Design-Custom
Research & Development

Lonza, Inc. Specialty Anhydride, Additives
17-17 Rte. 208
Fair Lawn, NJ 07410
Phone: (201) 794-2000
Consulting/Testing
Research & Development

M

MAC Equipment Inc.
10741 Ambassador Dr.
Kansas City, MO 64153
Phone: (816) 891-9300
Fax: (816) 891-8978
Air Pollution/Effluent Control
Environmental/Regulatory Services

McCorquodale Color Card
30 Tempo Ave.
Willowdale, Ont. M2H 2N8
Canada
Phone: (416) 499-1946
Fax: (416) 499-9365
Gerry Johnson, President; Grant Hutchison,
Dir. Sales/Marketing
Graphic Arts

Micromeritics
One Micromeritics Dr.
Norcross, GA 30093-1877
Phone: (770) 662-3633
Fax: (770) 662-3696
Web: <http://www.micromeritics.com>
John Guerin, National Sales Mgr.; Bob
Johnson, International Sales Mgr.
Consulting/Testing

University of Missouri-Rolla
UMR Coatings Institute
1870 Miner Cir.
236 Schrenk Hall
Rolla, MO 65409-0010
Phone: (573) 341-4419
Fax: (573) 341-4881
E-Mail: coatings@umr.edu
Michael R. Van De Mark, Dir.; James O.
Stoffer, Institute Instructor; Harvest Collier,
Institute Instructor
Consulting/Testing
Educational
Research & Development

Moco Thermal Industries
One Oven Place
Romulus, MI 48174
Phone: (313) 728-6800
Fax: (313) 728-1927
Robert Howard, V.P. Sales; Bill St. Thomas,
Mgr. Direct Sales
Engineering Services

N

NACE International
1440 South Creek Dr., P.O. Box 218340
Houston, TX 77084-8340
Phone: (713) 492-0535
Fax: (713) 492-8254
Gerald Shancel, Executive Dir.
Educational
Publishing
Research & Development

New Protectaire Systems Co.
8 North 450-A Taming Ct.
Bartlett, IL 60103-9550
Phone: (847) 697-3400
Fax: (847) 697-1065
E-Mail: New Protectaire@MSN.COM
Stanley Napadow, President; John Tyrpin,
National Sales Mgr.
Engineering Services
Waste Disposal

Norman International
4501 S. Santa Fe Ave.
Los Angeles, CA 90058
Phone: (213) 582-7132
Fax: (213) 582-3464
Norman Levine, President; Scott Paris,
General Mgr.
Packaging Design-custom

North Dakota State University
Dept. of Polymers & Coatings
1301 12th Ave. North, 54 Dunbar Hall
Fargo, ND 58105
Phone: (701) 231-7633
Fax: (701) 231-8439
E-Mail: nupoly@plains.nodak.edu
M.W. Urban, Chair; Debbie M. Shasky, Adm.
Assistant
Educational
Research & Development

O

Orr & Boss
13600 Otterson Ct.
Livonia, MI 48150
Toll Free: (800) 869-9401
Fax: (888) 869-9401
Charles Rooney, President; Kevin Reid, V.P.
Consulting/Testing

P

Paint Research Associates
430 West Forest Ave.
Ypsilanti, MI 48197
Phone: (313) 483-3401
Fax: (313) 483-0085

Mark Hedstrom, Executive Dir.
Consulting/Testing
Research & Development

Paint Research Association
8 Waldegrave Road
Teddington
Middlesex, TW11 8LD
England
Phone: 44 181 977 4427
Fax: 44 181 943 4705
John Bernie, Managing Dir.; Chris Carr,
Special Projects Group
Consulting/Testing
Publishing
Research & Development

Parasol Systems, Inc.
1851 Craig Rd.
St. Louis, MO 63146
Phone: (314) 434-8300
Fax: (314) 434-3547
E-Mail: info@psichem.com
Robert B. Kramer, Dir. Sales/Marketing
Turnkey Processes

Pfaudler, Inc.
1000 West Ave.
P.O. Box 23600
Rochester, NY 14692
Phone: (716) 235-1000
Fax: (716) 235-3048
Howard Hartley, Mgr., Engineered Systems;
Paul Belleisle, Engineering Mgr.; Mike
Powers, WFE Systems Mgr.
Engineering Services
Turnkey Processes

Phoenix Chemical Laboratory, Inc.
3953 W. Shakespeare Ave.
Chicago, IL 60647-3497
Phone: (773) 772-3577
Fax: (847) 864-7556
E-Mail: pclin@xnet.com
Arthur A. Krawetz, President

Consulting/Testing
Engineering Services
Exposure Testing
Research & Development

Porous Materials, Inc.
Advanced Pressure & Products Div.
83 Brown Rd., Bldg. 4
Ithaca, NY 14850
Phone: (607) 257-5544
Fax: (607) 257-5634
Krishna Gupta, Dir. Marketing
Consulting/Testing

Precision Dispensing, Inc.
905 Airport Rd.
West Chester, PA 19380
Phone: (610) 429-4870
Fax: (610) 431-3031
Martin Fallon, President; Michael Dempsey,
Sales Mgr.
Consulting/Testing
Engineering Services
Turnkey Processes

Premier Mill Corp.
One Birchmont Dr.
Reading, PA 19606-3298
Phone: (610) 779-9500
Fax: (610) 779-9666
Myron Segal, President; Thomas Picone,
V.P. Sales/Marketing
Engineering Services
Turnkey Processes

Progressive Recovery, Inc.
700 Industrial Dr.
Dupo, IL 62239
Phone: (618) 286-5000
Fax: (618) 286-5009
Dan Marks, President
Waste Disposal

Promation, Inc. Div. of M.P. Kenes, Inc.
15638 S. 70th Ct.
Orland Park, IL 60462
Phone: (708) 429-5977
Fax: (708) 429-6062
M.P. Kenes, President; Mark Winkler, V.P.;
A.R. Duda, Dir. Engineering Development
Consulting/Testing
Engineering Services
Turnkey Processes

Q

Quad Group
1815 S. Lewis St.
Spokane, WA 99224
Phone: (509) 458-4558
Fax: (509) 458-4555
E-Mail: quadgroup@spokane.net
Maria Riegert, President; Richard Riegert,
Technical Dir.; Mick Barber, Technical Sales
Mgr.; Frank Coburn, Sales Mgr.
Consulting/Testing

Quantachrome Corp.
1900 Corporate Dr.
Boynton Beach, FL 33426
Phone: (407) 731-4999
Fax: (407) 732-9888
Consulting/Testing

R

R-Tech Manufacturing, Inc.
P.O. Box 71267
Marietta, GA 30007
Phone: (770) 423-1942
Fax: (770) 423-0056
K.L. Rice, V.P. Operations
Waste Disposal

Radtech International North America
60 Revere Dr., Ste. 500
Northbrook, IL 60062
Phone: (847) 480-9576
Fax: (847) 480-9282
E-Mail: uveb@radtech.com
Christine Dionne, Executive Dir.
Educational

Ramco Finishing Systems
1390 Dodson Way
Riverside, CA 92507
Phone: (909) 274-0451
Fax: (909) 274-9686
Turnkey Processes

Rexam Mulox Inc.
7592 N.E. Industrial Blvd.
Macon, GA 31206
Phone: (912) 784-9040
Fax: (912) 784-1179
William R. Hodgins, New Markets Develop-
ment Mgr.; Bruce A. Boyd, V.P. Sales/
Marketing
Packaging Design-custom

SERVICES

Reynolds Industries, Inc.
3601 Foothills Way
Fort Mill, SC 29715
Phone: (803) 548-4301
Fax: (803) 548-1365
Kim Pearce, Marketing Mgr.; Dale Hilliger,
Sales Mgr.
Turnkey Processes

S

Sandvik Process Systems Inc.
21 Campus Rd.
Totowa, NJ 07512
Phone: (973) 790-1600
Fax: (973) 790-3377
Greg Burnham, Sales Mgr.
Turnkey Processes

SEMico Div.
15817 Crabbs Branch Way
Rockville, MD 20855
Phone: (301) 975-9798
Fax: (301) 975-9653
E-Mail: semicro@aol.com
Jon Massey, Laboratory Mgr.; Laura Estok,
Asst. to President
Consulting/Testing

Sentry/Custom Services Corp.
RR 5, Box 5491
East Stroudsburg, PA 18301
Phone: (717) 421-2574
Fax: (717) 421-2511
E-Mail: infocia@coatings.org
David W. Crookall, President; Susan
Rightmeyer, V.P.
Surface Preparation/Cleaning Pretreatment

Skeist, Inc.
375 Rte. 10
Whippany, NJ 07981
Phone: (973) 515-2020
Fax: (973) 515-0022
Arnold Brief, V.P.
Consulting/Testing

Sonic Corp.
One Research Dr.
Stratford, CT 06497
Phone: (203) 375-0063
Fax: (203) 378-4079
E-Mail: brakemarr@aol.com
Bill Brakemar, President; Robert Brakemar,
General Mgr.; Claire Skidd,
V.P.
Turnkey Processes

The University of Southern Mississippi
Polymer Science Dept.
Box 10037
Hattiesburg, MS 39406-0037
Phone: (601) 266-4080
Fax: (601) 266-5880
E-Mail: Shelby.F.Thames@usm.edu
Shelby F. Thames, Distinguished University
Research Professor
Consulting/Testing
Educational
Exposure Testing
Research & Development
Surface Preparation/Cleaning Pretreatment

Spiegel & Associates
P.O. Box 1538
Morristown, NJ 07960
Phone: (973) 538-8242
Fax: (973) 829-1383
Mort Spiegel, President
Consulting/Testing
Graphic Arts

Stat-Ease Corp.
2021 E. Hennepin Ave., Ste. 191
Minneapolis, MN 55413
Phone: (612) 378-9449
Fax: (612) 378-2152
E-Mail: info@statease.com
Mark Anderson, V.P., General Mgr.
Educational

Structure Probe, Inc.
P.O. Box 656
West Chester, PA 19380
Phone: (610) 436-5400
Fax: (610) 436-5755
E-Mail: spi2spi@2spi.com
Charles A. Garber
Consulting/Testing
Research & Development
Surface Preparation/Cleaning Pretreatment

Sub-Tropical Testing Service
8290 S.W. 120th St.
Miami, FL 33156
Phone: (305) 233-5341
Fax: (305) 233-5342
E-Mail: STTSMiami@aol.com
Web Site: Sub-Tropical.com
Lon Hicks, V.P./Operations; John Doerpfeld,
Technical Dir.; Mel Mullman, Field &
Evaluation Services Mgr.
Exposure Testing

Surco Products, Inc.
RIDC Industrial Park
292 Alpha Dr.
Pittsburgh, PA 15238
Phone: (412) 252-7000
Fax: (412) 252-1003
E-Mail: odorstop@earthlink.net
Arnold Howard, V.P.
Air Pollution/Effluent Control

Systech Environmental Corporation
245 N. Valley Rd.
Xenia, OH 45385
Phone: (973) 372-8077
Fax: (937) 372-8099
E-Mail: systech@erinet.com
Erica Hawk, Marketing Communications
Waste Disposal

T

Tangent Systems, Inc.
8030-B England St.
Charlotte, NC 28273
Phone: (704) 554-0830
Fax: (704) 554-0820
E-Mail: sales@tangentinco.com
Jack Rorick, Sales Mgr.
Consulting/Testing

Tenneco Packaging
1603 Orrington Ave.
Evanston, IL 60201-3853
Toll Free: (800) 456-4725

Phone: (847) 492-5713
Fax: (847) 492-4469
Tenneco Packaging Information Center
Packaging Design-Custom

Thermold Partners, L.P.
Thermal Analysis Div.
652 Glenbrook Rd.
Stamford, CT 06906
Phone: (203) 977-8161
Fax: (203) 977-8237
E-Mail: sales@thermoldlp.com
H.L. Brown, President; J.H. Fisk, National
Sales Mgr.
Consulting/Testing

Tricor Systems Inc.
400 River Ridge Dr.
Elgin, IL 60123
Toll Free: (800) 575-0161
Phone: (847) 742-5542
Fax: (847) 742-5574
E-Mail: info@tricor-systems.com
Timothy P. Allen, VP Business Develop-
ment; Thomas M. Allen, Marketing/Sales
Mgr.
Engineering Services
Research & Development

U

Uni-Wash/Polaris Indl. Ventilation Group
P.O. Box 287
Harbor Springs, MI 49740
Phone: (616) 526-0200
Fax: (616) 526-8080
E-Mail: staff@unipol.com
K.M. Laporte, President
Air Pollution/Effluent Control
Engineering Services
Environmental/Regulatory Services

United Air Specialists, Inc.
4440 Creek Rd.
Cincinnati, OH 45242
Toll Free: (800) 992-4422
Fax: (513) 891-4882
E-Mail: vasinc.com
Marketing Services Operator
Air Pollution/Effluent Control

U.V. Process Supply, Inc.
1229 W. Cortland St.
Chicago, IL 60614-4805
Phone: (773) 248-0099
Fax: (773) 880-6647
E-Mail: info@uvps.com
Kristie Figueiredo, Sales; Stephen Siegel,
President; Tom Heffennan, Marketing
Consulting/Testing

V

Van Technologies, Inc.
5791 Bergquist Rd.
Deluth, MN 55804
Phone: (218) 525-9424
Fax: (218) 525-5594
Consulting/Testing
Educational
Research & Development

Vara International
 Div. of Calgon Carbon
 1201 19th Pl.
 Vero Beach, FL 32960
 Phone: (561) 567-1320
 Fax: (561) 567-4108
 E-Mail: morley@calgoncarbon.com
 Michael P. Morley, Sales Dir.
 Air Pollution/Effluent Control
 Engineering Services
 Environmental/Regulatory Services
 Waste Disposal

Vincenz Verlag
 Schiffgraben 43
 30175 Hannover, Germany
 Phone: 49 511 9910215
 Fax: 49 511 9910299
 Web: <http://www.coatings.de>
 Jürgen Nowak, Editor; Frauke Haentsch,
 Advertising Sales Mgr.; Michael Kuhn,
 Events Mgr.
 Educational
 Publishing

W

Werner & Pfleiderer Corp.
 663 E. Crescent Ave.
 Ramsey, NJ 07446
 Phone: (201) 327-6300
 Fax: (201) 825-6494
 Kenneth A. Huber, Business Mgr., Powder
 Coatings
 Engineering Services
 Turnkey Processes

Westerlins Maskinfabrik AB
 Box 9075
 Trehogsgatan 10
 Malmö, 200 39
 Sweden
 Phone: 46 40 210410
 Fax: 46 40 220403
 Waste Disposal



Reading This Ad Can Improve Your Career

The Federation's Series on Coatings Technology Has the Facts to Make You Succeed

The Federation of Societies for Coatings Technology gives you the tools you need to enhance your career with its Series on Coatings Technology, an innovative series of booklets on various phases of coatings technology and manufacturing. Each booklet is authored by a coatings expert, and thousands of copies have been sold to coatings manufacturers, chemists, suppliers, and students worldwide.

From the Introduction to Coatings Technology and Film Formation to Corrosion Protection and Coatings Film Defects, each booklet in the ever-expanding series provides an authoritative and comprehensive insight into an important industry subject—information vital to you in today's changing environment.

A Must for Every Reference Library, Perfect for Educating Sales Representatives

Complete sets of the Series can be used as reference tools for any laboratory or library. Many are also useful for sales representatives—teaching them more about various aspects of the industry and its products.

Make Your Move — Start Building Your Career One Volume at a Time

To order single booklets or the complete set, call today to place your order.

(610) 940-0777

All Federation Members receive special discount pricing!

Federation of Societies for Coatings Technology
 492 Norristown Rd., Blue Bell, PA 19422
 (610)040-0777, Fax (610) 940-0292

Circle No. 10 on the Reader Service Card

Computer Software

A

Advanced Software Designs
1350 Elbridge Payne Rd., Ste. 150
Chesterfield, MO 63017
Phone: (314) 532-6021
Fax: (314) 532-2935
E-Mail: info@asdsoftware.com
Ted Pliakos, Account Executive; Nancy
Whatley, Marketing Mgr.; Ray Cook,
President

B

Batchmaster Software Corp.
13001 Seal Beach Blvd.
Seal Beach, CA 90740
Phone: (562) 799-8888
Fax: (562) 799-8833
E-Mail: info@batchmaster.com
Joey Reyes, Sales Administrator

C.W. Brabender Instruments Inc.
50 E. Wesley St.
South Hackensack, NJ 07606
Phone: (201) 343-8425
Fax: (201) 343-0608
E-Mail: CWBI@ix.netcom.com
Kevin R. Van Allen, V.P., Sales & Marketing

British Standards Institution, Inc.
13100 Worldgate Dr., Ste. 245
Herndon, VA 20170
Phone: (703) 437-9000
Fax: (703) 437-9001
Reg Blake, Dir. Sales & Marketing; Kathleen
Moran, Client Administrator; Dianne Wood,
Client Administrator

Brookfield Engineering Labs., Inc.
240 Cushing St.
Stoughton, MA 02072
Phone: (617) 344-4310
Fax: (617) 344-7141
William L. Paull, Sales Eng.

C



Chemidex Inc.
3558 Lynnfield Rd.
Cleveland, OH 44122
Phone: (216) 283-1695
Fax: (216) 283-4378
Web: www.chemdex.com

ColorTec Associates
28 Center St.
Clinton, NJ 08809
Phone: (908) 735-2248
Fax: (908) 236-7865
James T. DeGroff, President; C. Wower,
Technical Dir.; B. Harris, Product Mgr.,
Batchmaster

Corbus
Div. of CMS, Inc.
206 Line Rd.
Kennett Square, PA 19348
Phone: (610) 444-5691
Fax: (610) 444-6461
E-Mail: sales@corbus.com
Diane Walls, Marketing Rep.; Don Cowles,
President; Jim Haag, V.P.

D

Datacolor International
3735 Beam Rd.
Charlotte, NC 28217
Phone: (704) 357-0400
Fax: (704) 329-9925
Phil Jannetto, National Sales Mgr.; Carla
Deckelman, Marketing Communications

DSA Consulting, Inc.
5555 Suwanee Rd.
P.O. Box 1121
Shawnee Mission, KS 66222
Phone: (913) 262-9384
Fax: (913) 262-9384
Donald S. Andrade, President

F

Exxon Chemical Co.
13501 Katy Freeway
P.O. Box 3272
Houston, TX 77253
Technical Support (800) 361-7961; Orders
(800) 231-6633

F

Formation Systems, Inc.
70 Walnut St.
Wellesley, MA 02181
Phone: (617) 239-8044
Fax: (617) 239-7584
Peter Shields, President & CEO; Marti
Colwell, V.P. Marketing

G



Gamry Instruments, Inc.
734 Louis Dr.
Warminster, PA 18974
Phone: (215) 682-9330
Fax: (215) 682-9331
E-Mail: sales@gamry.com
Brian J. McGrath, Sales & Marketing Mgr.

SEE OUR AD ON PAGE 92.

Paul N. Gardner Co., Inc.
316 NE First St.
P.O. Box 10688
Pompano Beach, FL 33060
Phone: (954) 946-9454
Fax: (954) 946-9309
E-Mail: gardner@gardco.com
Paul N. Gardner, Jr., President

Gilson Co., Inc.
P.O. Box 677
Worthington, OH 43085
Phone: (614) 548-7298
Fax: (614) 548-5314
E-Mail: gilson@coil.com
David W. Ditmars, Marketing Dir.

GretagMacbeth
617 Little Britain Rd.
New Windsor, NY 12553
Phone: (914) 565-7660
Fax: (914) 565-0390

Guthrie Latex, Inc.
7400 N. Oracle Rd., Ste. 330
Tucson, AZ 85704
Phone: (520) 742-3087
Fax: (520) 575-0511
E-Mail: guthrie@primenet.com
Jonathan Wilt, Product Mgr.

H

HunterLab
11491 Sunset Hills Rd.
Reston, VA 20190
Phone: (703) 471-6870
Fax: (703) 471-4237
Sales Department

I

IKA Works, Inc.
2635 N. Chase Pkwy. S.E.
Wilmington, NC 28405-7419
Phone: (910) 452-7059
Fax: (910) 452-7693
Scott Council, Product Mgr., Laboratory
Div.; Scott Bitter, Product Mgr.; Process Div.

Infinium Software
25 Communications Way
Drawer 6000
Hyannis, MA 02601
Phone: (508) 778-2000
Fax: (508) 775-3764
E-Mail: jackie.thomasson@infinium.com
Jackie Thomasson, Lead Specialist

INOUE USA
7018 A.C. Skinner Pkwy. #240
Jacksonville, FL 32256
Jerry Chait

K

Krautkramer Branson
50 Industrial Park Rd.
Lewistown, PA 17044
Phone: (717) 242-0327
Fax: (717) 242-2606
E-Mail: kb-ltn.mhs.compuserve.com
Randy Sell, National Sales Mgr.

KTA-Tator, Inc.
115 Technology Dr.
Pittsburgh, PA 15275
Phone: (412) 788-1300
Fax: (412) 788-1306
E-Mail: info@kta.com
Dwight Weldon, V.P., Research/Develop-
ment; Scott Rice, Business Development
Mgr.

SEE OUR AD ON PAGE 161.

L

Labelmaster
5724 N. Pulaski Rd.
Chicago, IL 60646
Toll Free: (800) 621-5808
E-Mail: sales@labelmaster.com
Customer Service Dept.

M

Minolta Corporation
101 Williams Dr.
Ramsey, NJ 07446
Toll Free: (888) ISD-COLOR
Phone: (201) 818-3517
Fax: (201) 818-4374

P

Parasol Systems, Inc.
1851 Craig Rd.
St. Louis, MO 63146
Phone: (314) 434-8300
Fax: (314) 434-3547
E-Mail: info@psichem.com
Robert B. Kramer, Dir. Sales & Marketing

Precision Dispensing, Inc.
905 Airport Rd.
West Chester, PA 19380
Phone: (610) 429-4870
Fax: (610) 431-3031
Martin Fallon, President; Michael Dempsey,
Sales Mgr.

Promation, Inc. Div. of M.P. Kenes, Inc.
15638 S. 70th Ct.
Orland Park, IL 60462
Phone: (708) 429-5977
Fax: (708) 429-6062

M.P. Kenes, President; Mark Winkler, V.P.;
A.R. Duda, Dir. Engineering Development

S

Stat-Ease Corp.
2021 E. Hennepin Ave., Ste. 191
Minneapolis, MN 55413
Phone: (612) 378-9449
Fax: (612) 378-2152
E-Mail: info@statease.com
Mark Anderson, V.P./G.M.

T

Tricor Systems Inc.
400 River Ridge Dr.
Elgin, IL 60123
Toll Free: (800) 575-0161
Phone: (847) 742-5542
Fax: (847) 742-5574
E-Mail: info@tricor-systems.com
Timothy P. Allen, V.P. Business Develop-
ment; Thomas M. Allen, Marketing/Sales
Mgr.

X

X-Rite, Incorporated
3100 44th St., SW
Grandville, MI 49418
Phone: (616) 534-7663
Fax: (616) 534-1466



RETURN OF THE ALGAE

**NUOCIDE® 1071 helps
paint manufacturers and
formulators turn back the
tide of algae and slime.**



With the outlawing of mercury in the USA, wild strains of algae began to run rampant in mildew and slime. Many fungicides simply were not designed to handle them. And couldn't.

Hüls America Inc. worked closely with Ciba Specialty Chemicals and developed a new algaecide, NUOCIDE 1071, for use by paint manufacturers and formulators of exterior paints, caulks, stucco and other coatings.

This powdered, low-toxicity, non-metallic, organic algaecide is highly effective against a wide spectrum of algae in mildew and slime. Yet, it doesn't affect color or other paint and caulking properties. What's more, combining NUOCIDE 1071 algaecide with our fungicides gives paint manufacturers and formulators a one-two punch for virtually complete dry-film protection.

NUOCIDE 1071 is safe to use. It has federal EPA registration and regulatory approval in all fifty states. It's the effortless way to knock out algae slime even before they get started.

For detailed information on NUOCIDE 1071 algaecide and our family of fungicides, contact Hüls America Inc. at (732) 560-6724, 220 Davidson Avenue, Somerset, NJ 08873.


HÜLS AMERICA INC.

Circle No. 204 on the Reader Service Card

Product Listings

Raw Materials	109
Production Equipment.....	144
Lab Apparatus and Testing Equipment	157
Services	161
Computer Software	163

Advertisers appear in bold.

RAW MATERIALS

Chemical Specialties

Abrasives/Anti-Skid

A.M.S.
 Composite Particles, Inc.
 Composition Materials Co., Inc.
 Electro Abrasives Corp.
 Jet Wheelblast Equipment
MICRO POWDERS, INC.
NISSAN CHEMICAL AMERICA CORP.
 PQ Corporation/ Potters Industries
 Reade Advanced Materials
UNIMIN CORP.

Acids (Non-Fatty)

Amoco Chemicals
BAYER CORPORATION
 Browning Chemical Corp.
 Eastman Chemical Co.
 Exxon Chemical Co.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Sentry/Custom Services Corp.
THOMAS SCIENTIFIC
 Union Carbide Corp.

Adhesion Promoters

Aceto Corporation
 ADM Tronics, Inc.
AIR PRODUCTS & CHEMICALS, INC.
 AlliedSignal Inc., Specialty Chemicals
 American Casein Co., Div. of Protein
 Polymer Group
 Ashland Chemical Co., IC&S Div.
 Baker Petrolite, Polymers Div.
 Chemicals Incorporated
 Cytec Industries, Inc.

Dover Chemical Corp.
 Dow Corning Corp.
 Eastman Chemical Co.
 Elf ATOCHEM North America, Inc.
 Estron Chemical, Inc.
 Exxon Chemical Co.
HÜLS AMERICA INC.
 International Specialty Products (ISP)
 Kenrich Petrochemicals, Inc.
 Lawter International
 Lonza, Inc. Specialty Anhydride-Additives
THE LUBRIZOL CORPORATION
 Mantrose Bradshaw Zinsser Group
 NICHEM Corp.
 PCI Group, Inc.
 Protein Technologies Intl. Inc., Polymer
 Products Div.
 Reichhold Chemicals, Inc.
 Reilly Industries
 Rhône-Poulenc, Inc.
 Solutia Inc.
UCB CHEMICALS CORP., RADCURE DIV.
 Wacker Silicones Corp.
 Witco Corp.

Amine Neutralizers

ANGUS CHEMICAL CO.
 Elf ATOCHEM North America, Inc.

Anti-Blocking Agents

BORDEN INC.
 BYK-Chemie USA
 Carroll Scientific, Inc.
 Celite Corp. - c/o World Minerals, Inc.
 Chemcor
 Crosfield Company
DEGUSSA CORP.
 Dow Corning Corp.
DUPONT, SPECIALTY CHEMICALS

Engelhard Corp., Pigments & Additives
 Fuji Silysia Chemical, Ltd.
HENKEL CORP.
 International Resources, Inc.
THE LUBRIZOL CORPORATION
 Michelman, Inc.
MICRO POWDERS, INC.
 Millennium Inorganic Chemicals
 NICHEM Corp.
NISSAN CHEMICAL AMERICA CORP.
 PQ Corporation/ Potters Industries
 Rheox, Inc.
 Sentry/Custom Services Corp.
 Sequa Chemical, Inc.
 Shamrock Technologies, Inc.
 Surtec Inc.
 Tego Chemie Service
 Witco Corp.

Anti-Floating Agents

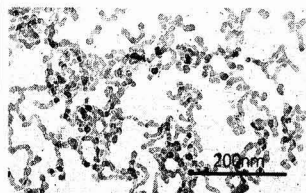
BYK-Chemie USA
 Dow Corning Corp.
 Engelhard Corp., Pigments & Additives
HENKEL CORP.
HÜLS AMERICA INC.
 King Industries, Inc.
THE LUBRIZOL CORPORATION
 Nagase America Corp.
 NICHEM Corp.
 PCI Group, Inc.
 Tego Chemie Service
TROY CORPORATION
 Vianova Resins Inc.
 Witco Corp.

Anti-Flooding Agents

BYK-Chemie USA
HENKEL CORP.

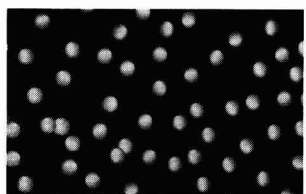
for Binder ?
Micro Filler ? or ?

Magic with Silica sol!



ST-UP chain molecules of silica.
5-20nm in width
40-300nm in length

ST-O negatively charged small
particle sol (ca. 12nm), not
including anion and cation
without stabilizing ion



Colloidal Silica dispersed in
organic solvent.

Type	SiO ₂ %	Dispersant
MT-ST	30	Methanol
IPA-ST	30	Isopropanol
EG-ST	20	Ethylene glycol
MEK-ST	30	Methyl Ethyl Ketone
NPC-ST	20	Ethylene glycol- mono-n-propylether

Particle Diameter 10-20nm.
Available product is much more.

 **NISSAN CHEMICAL INDUSTRIES, LTD.**
— Chemicals Division —

Tokyo Head Office
Phone: 03-3296-8065 Telefax: 03-3296-8360
New York Office: Contact person: M. Matsumura
Phone: 914-332-4745 Telefax: 914-332-4808
<http://www.snowtex.com>
Circle No. 169 on Reader Service Card

King Industries, Inc.
THE LUBRIZOL CORPORATION
Nagase America Corp.
NICHEM Corp.
PCI Group, Inc.
Tego Chemie Service
TROY CORPORATION
Vianova Resins Inc.
Witco Corp.

Anti-Foaming Agents

ADM Tronics, Inc.
AIR PRODUCTS & CHEMICALS, INC.
Allied Colloids, Inc.
Ashland Chemical Co., IC&S Div.
Buckman Laboratories, Inc.
BYK-Chemie USA
CABOT CORP., CAB-O-SIL
Daniel Products Co., Inc.
DEGUSSA CORP.
Dow Corning Corp.
Eastman Chemical Co.
Estron Chemical, Inc.
Exxon Chemical Co.
GENESEE POLYMERS CORP.
BFGoodrich Co. - Coatings Div.
Graden Chemical Co., Inc.
HENKEL CORP.
HÜLS AMERICA INC.
Kamin-Cable Corp.
King Industries, Inc.
Nagase America Corp.
NICHEM Corp.
NuTech Corp.
Patco Products
PCI Group, Inc.
Rhône-Poulenc, Inc.
Rit-Chem Co., Inc.
Ross Chem, Inc.
Sentry/Custom Services Corp.
Shamrock Technologies, Inc.
Sherwin-Williams Chemicals
Summit Precision Polymers, Mountaintop
Tego Chemie Service
Tri-Star Chemical Co., Inc.
TROY CORPORATION
Ultra Additives, Inc.
Vianova Resins Inc.
Witco Corp.

Miscellaneous

ADM Tronics, Inc.
AIR PRODUCTS & CHEMICALS, INC.
Buckman Laboratories, Inc.
BYK-Chemie USA
GENESEE POLYMERS CORP.
HENKEL CORP.
HÜLS AMERICA INC.
Kamin-Cable Corp.
Nagase America Corp.
NuTech Corp.
PCI Group, Inc.
Rhône-Poulenc, Inc.
Ross Chem, Inc.
Sentry/Custom Services Corp.
Summit Precision Polymers, Mountaintop
Tri-Star Chemical Co., Inc.
TROY CORPORATION
Ultra Additives, Inc.
Vianova Resins Inc.

Nonsilicone

ADM Tronics, Inc.
AIR PRODUCTS & CHEMICALS, INC.
Buckman Laboratories, Inc.
BYK-Chemie USA

Eastman Chemical Co.
Estron Chemical, Inc.
Exxon Chemical Co.
GENESEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
Graden Chemical Co., Inc.
HENKEL CORP.
HÜLS AMERICA INC.
Kamin-Cable Corp.
King Industries, Inc.
NuTech Corp.
PCI Group, Inc.
Rhône-Poulenc, Inc.
Rit-Chem Co., Inc.
Ross Chem, Inc.
Sentry/Custom Services Corp.
Shamrock Technologies, Inc.
Sherwin-Williams Chemicals
Tri-Star Chemical Co., Inc.
TROY CORPORATION
Ultra Additives, Inc.
Vianova Resins Inc.
Witco Organic Silicones Group

Silicone

Allied Colloids, Inc.
Ashland Chemical Co., IC&S Div.
Buckman Laboratories, Inc.
BYK-Chemie USA
Dow Corning Corp.
GENESEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
HENKEL CORP.
Kamin-Cable Corp.
King Industries, Inc.
NuTech Corp.
PCI Group, Inc.
Rhône-Poulenc, Inc.
Ross Chem, Inc.
Sentry/Custom Services Corp.
Tego Chemie Service
Ultra Additives, Inc.
Witco Corp.

Antioxidants

Aceto Corporation
Ashland Chemical Co., IC&S Div.
Atomergic Chemetals Corp.
Browning Chemical Corp.
Burlington Bio-Medical & Scientific Corp.
Chemicals Incorporated
**CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES**
Clariant Corp.
Cytec Industries, Inc.
Dover Chemical Corp.
Eastman Chemical Co.
Rhône-Poulenc, Inc.
Technical Industries, Inc.
TROY CORPORATION
R.T. VANDERBILT CO., INC.

Anti-Rust Agents

A.M.S.
American Casein Co., Div. of Protein
Polymer Group
Buckman Laboratories, Inc.
CasChem, Inc.
**CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES**
Dexter Chemical Corp.
Dow Corning Corp.
Eagle Zinc Company
Elf ATOCHEM North America, Inc.
GENESEE POLYMERS CORP.
HALOX

Heatbath Corp.
HENKEL CORP.
 Hubbard-Hall, Inc.
HÜLS AMERICA INC.
 Kenrich Petrochemicals, Inc.
 Laporte Pigments
 Meadowbrook Co.
 NICHEM Corp.
 North American Oxide LLC
 PCI Group, Inc.
 R.I.T.A. Corp.
 Sentry/Custom Services Corp.
 Sherwin-Williams Chemicals
 United Mineral & Chemical Corp.
R.T. VANDERBILT CO., INC.

Anti-Sagging Agents

ADM Co. ADM Lecithin Div.
 BYK-Chemie USA
CABOT CORP., CAB-O-SIL
 CCP
 Composition Materials Co., Inc.
 Consolidated Color Corp.
 DUR-O-Lite: CBC Paints and Coatings
 Eastman Chemical Co.
 Engelhard Corp., Pigments & Additives
 Floridin Company, Div. of ITC Industrials
HENKEL CORP.
HÜLS AMERICA INC.
 Laporte/SCP, Laponite Rheological Additives
THE LUBRIZOL CORPORATION
 Nagase America Corp.
 PCI Group, Inc.
 Poly-Resyn, Inc.
 Rheox, Inc.
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Vianova Resins Inc.

Anti-Settling Agents

ADM Co. ADM Lecithin Div.
 BYK-Chemie USA
CABOT CORP., CAB-O-SIL
 Consolidated Color Corp.
 Daniel Products Co., Inc.
DEGUSSA CORP.
 Engelhard Corp., Pigments & Additives
 Floridin Company, Div. of ITC Industrials
HENKEL CORP.
HÜLS AMERICA INC.
 Kenrich Petrochemicals, Inc.
 Laporte/SCP, Laponite Rheological Additives
THE LUBRIZOL CORPORATION
 Nagase America Corp.
 PCI Group, Inc.
 Poly-Resyn, Inc.
 Rheox, Inc.
 Süd-Chemie Rheologicals
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Vianova Resins Inc.

Anti-Skinning Agents

Exxon Chemical Co.
HÜLS AMERICA INC.
 Nagase America Corp.
OMG AMERICAS
 Sentry/Custom Services Corp.
THE SHEPHERD CHEMICAL CO.
TROY CORPORATION

Bodying Agents

ABITEC Corp.
 Chatterm Chemicals, Inc.

Daniel Products Co., Inc.
 Empire State Varnish Co., Inc.
 Engelhard Corp. - Pigments & Additives
HENKEL CORP.
HÜLS AMERICA INC.
 Laporte/SCP, Laponite Rheological Additives
THE LUBRIZOL CORPORATION
 Mona Industries, Inc.
 PCI Group, Inc.
 Rheox, Inc.
 Sentry/Custom Services Corp.
TROY CORPORATION
 Zemex Industrial Minerals

Catalysts

AIR PRODUCTS & CHEMICALS, INC.
 AlliedSignal Inc., Specialty Chemicals
 Ashland Chemical Co., IC&S Div.
 Aztec Peroxides, Inc.
BORDEN INC.
 Buckman Laboratories, Inc.
 BYK-Chemie USA
 CasChem, Inc.
 Celite Corp. - c/o World Minerals, Inc.
 Chatterm Chemicals, Inc.
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
 Cytec Industries, Inc.
DEGUSSA CORP.
 Dow Corning Corp.
 Elf ATOCHEM North America, Inc.
 Engelhard Corp. - Pigments & Additives
 Estron Chemical, Inc.
HÜLS AMERICA INC.
 International Resources, Inc.
 Kenrich Petrochemicals, Inc.
 King Industries, Inc.
 Lonza, Inc. Specialty Anhydride-Additives
 Mallinckrodt Inc., Trimet Technical Products
 Mitsubishi Chemical America
 NICHEM Corp.
 Norton Chemical Process Products Corp.
OMG AMERICAS
 Reedy International Corp.
 Reilly Industries
 Royce Associates
 Sequa Chemical, Inc.
TROY CORPORATION
 Vianova Resins Inc.

Caustics and Caustic Sodas

Browning Chemical Corp.
 Elf ATOCHEM North America, Inc.
 GFI, Inc.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
THOMAS SCIENTIFIC
 United Mineral & Chemical Corp.

Coalescing Agents

Aceto Corporation
 Eastman Chemical Co.
 Exxon Chemical Co.
HÜLS AMERICA INC.
 Mona Industries, Inc.
 Sentry/Custom Services Corp.
TROY CORPORATION
 Union Carbide Corp.
 Velsicol Chemical Corp.

Corrosion Inhibitors

A.M.S.
 Aerocote Corp.
AIR PRODUCTS & CHEMICALS, INC.

Albright & Wilson UK Ltd., Surface Technologies Div.
 AlliedSignal Inc., Specialty Chemicals
ANGUS CHEMICAL CO.
 Ashland Chemical Co., IC&S Div.
 Atomergic Chemetals Corp.
 Betz Dearborn, Metals Process Group
 Buckman Laboratories, Inc.
 CasChem, Inc.
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
CORTEC CORP.
 Cytec Industries, Inc.
 Dover Chemical Corp.
 Elf ATOCHEM North America, Inc.
HALOX
 Heatbath Corp.
HENKEL CORP.
 Hubbard-Hall, Inc.
HÜLS AMERICA INC.
 Kamin-Cable Corp.
 Kenrich Petrochemicals, Inc.
 King Industries, Inc.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
THE LUBRIZOL CORPORATION
 Luzenac America
 Mona Industries, Inc.
 North American Oxide LLC
 NuTech Corp.
 PCI Group, Inc.
 R.I.T.A. Corp.
 Rheox, Inc.
 Sherwin-Williams Chemicals
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Wayne Pigment Corp.
 Zinc Corp. of America, Inc.

Dispersing Agents & Surfactants

ABITEC Corp.
 ADM Co. ADM Lecithin Div.
AIR PRODUCTS & CHEMICALS, INC.
 Allied Colloids, Inc.
 American Casein Co., Div. of Protein Polymer Group
 American Lecithin Co.
ANGUS CHEMICAL CO.
 Ashland Chemical Co., IC&S Div.
 Baker Petrolite, Polymers Div.
BORDEN INC.
 Browning Chemical Corp.
 Buckman Laboratories, Inc.
 BYK-Chemie USA
CABOT CORP., CAB-O-SIL
 Central Soya Co., Inc.
 Condea Vista Company
 Cytec Industries, Inc.
 Daniel Products Co., Inc.
 Dexter Chemical Corp.
 Dow Corning Corp.
DUPONT, SPECIALTY CHEMICALS
 Eastman Chemical Co.
 Elf ATOCHEM North America, Inc.
 Engelhard Corp., Pigments & Additives
 Estron Chemical, Inc.
 Exxon Chemical Co.
GENESEE POLYMERS CORP.
 GFI, Inc.
 BFGoodrich Co., Coatings Div.
 Graden Chemical Co., Inc.
 Hampshire Chemical Corp.
HENKEL CORP.
HÜLS AMERICA INC.
 International Specialty Products (ISP)
 Kamin-Cable Corp.
 Kenrich Petrochemicals, Inc.

King Industries, Inc.
 Landers-Segal Color Co., Inc.
THE LUBRIZOL CORPORATION
 Lucas Meyer, Inc.
 Mitsubishi Chemical America
 Mona Industries, Inc.
MORTON INTERNATIONAL
 Nagase America Corp.
 PCI Group, Inc.
 R.I.T.A. Corp.
 Rhône-Poulenc, Inc.
 Scott Bader, Inc.
 Sentry/Custom Services Corp.
 Shell Chemical Co.
 Solutia Inc.
 Technical Industries, Inc.
 Tego Chemie Service
TROY CORPORATION
 Union Carbide Corp.
R.T. VANDERBILT CO., INC.
 Vianova Resins Inc.
 Witco Corp.
 Zeneca Pigments & Additives

Detergents

Condea Vista Company
 Dexter Chemical Corp.
 Graden Chemical Co., Inc.
HENKEL CORP.
 International Specialty Products (ISP)
 Mona Industries, Inc.
 Rhône-Poulenc, Inc.
 Shell Chemical Co.
 Union Carbide Corp.

Dispersing Agents

ABITEC Corp.
 ADM Co. ADM Lecithin Div.
AIR PRODUCTS & CHEMICALS, INC.
 Allied Colloids, Inc.
 American Casein Co., Div. of Protein
 Polymer Group
 American Lecithin Co.
ANGUS CHEMICAL CO.
 Ashland Chemical Co., IC&S Div.
 Baker Petrolite, Polymers Div.
 Buckman Laboratories, Inc.
 BYK-Chemie USA
 Central Soya Co., Inc.
 Cytec Industries, Inc.
 Dexter Chemical Corp.
 Eastman Chemical Co.
 Elf ATOCHEM North America, Inc.
GENESEE POLYMERS CORP.
 Graden Chemical Co., Inc.
 Hampshire Chemical Corp.
HENKEL CORP.
HÜLS AMERICA INC.
 International Specialty Products (ISP)
 Kamin-Cable Corp.
 King Industries, Inc.
 Lucas Meyer, Inc.
 Mona Industries, Inc.
 Nagase America Corp.
 PCI Group, Inc.
 Rhône-Poulenc, Inc.
 Sentry/Custom Services Corp.
 Solutia Inc.
 Tego Chemie Service

TROY CORPORATION
 Union Carbide Corp.
R.T. VANDERBILT CO., INC.
 Vianova Resins Inc.
 Witco Corp.
 Zeneca Pigments & Additives

Emulsifying Agents

ABITEC Corp.
 ADM Co. ADM Lecithin Div.
 American Casein Co., Div. of Protein
 Polymer Group
 American Lecithin Co.
 Ashland Chemical Co., IC&S Div.
 Central Soya Co., Inc.
 Cytec Industries, Inc.
 Dexter Chemical Corp.
 Eastman Chemical Co.
 Graden Chemical Co., Inc.
HENKEL CORP.
 Kamin-Cable Corp.
 Lucas Meyer, Inc.
 Mitsubishi Chemical America
 Mona Industries, Inc.
 Rhône-Poulenc, Inc.
 Sentry/Custom Services Corp.
 Union Carbide Corp.
 Witco Corp.

Wetting Agents

ABITEC Corp.
 ADM Co. ADM Lecithin Div.
AIR PRODUCTS & CHEMICALS, INC.
 American Lecithin Co.
 Ashland Chemical Co., IC&S Div.
 Baker Petrolite, Polymers Div.
BORDEN INC.
 Buckman Laboratories, Inc.
 BYK-Chemie USA
 Central Soya Co., Inc.
 Condea Vista Company
 Cytec Industries, Inc.
 Estron Chemical, Inc.
 Dexter Chemical Corp.
 Dow Corning Corp.
DUPONT, SPECIALTY CHEMICALS
GENESEE POLYMERS CORP.
 Graden Chemical Co., Inc.
HENKEL CORP.
HÜLS AMERICA INC.
 Kamin-Cable Corp.
 Kenrich Petrochemicals, Inc.
 Lucas Meyer, Inc.
 Nagase America Corp.
 PCI Group, Inc.
 Rhône-Poulenc, Inc.
 Sentry/Custom Services Corp.
 Tego Chemie Service
TROY CORPORATION
 Union Carbide Corp.
 Vianova Resins Inc.
 Witco Organic Silicones Group

Misc. Dispersing Agents/Surfactants

ADM Co. ADM Lecithin Div.
AIR PRODUCTS & CHEMICALS, INC.
ANGUS CHEMICAL CO.
 BYK-Chemie USA
 Central Soya Co., Inc.
 Cytec Industries, Inc.
 Dexter Chemical Corp.
 Elf ATOCHEM North America, Inc.
 Exxon Chemical Co.
GENESEE POLYMERS CORP.
HENKEL CORP.

AMP-95®
Multifunctional Paint Additive

- Eliminates Need for Ammonia
- Optimizes Pigment Dispersion
- Provides Excellent pH Stability
- Improves Gloss
- Effective in Low Odor Systems
- Enhances Associative Thickener Performance
- Lowers Paint Cost by Optimizing Other Additives

There's Much More - Just Ask.
 800-362-2580

AMP-95 - An Investment in Quality.

ANGUS®
 CHEMICAL COMPANY

1500 East Lake Cook Road, Buffalo Grove, IL 60089
 847-215-8600

Circle No. 241 on Reader Service Card

International Specialty Products (ISP)
 Mona Industries, Inc.
 Nagase America Corp.
 PCI Group, Inc.
 Rhône-Poulenc, Inc.
 Scott Bader, Inc.
 Sentry/Custom Services Corp.
TROY CORPORATION
 Union Carbide Corp.
 Witco Corp.

Driers

ABITEC Corp.
 Chatterm Chemicals, Inc.
 Chemicals Incorporated
 Cookson Matthey Pigments & Dispersions
 Daniel Products Co., Inc.
HÜLS AMERICA INC.
OMG AMERICAS
 The Shepherd Chemical Co.
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Vianova Resins Inc.

Drying Salts

OMG AMERICAS
 The Shepherd Chemical Co.

Linoleates

ABITEC Corp.
OMG AMERICAS
 The Shepherd Chemical Co.

Naphthenates

Chemicals Incorporated
HÜLS AMERICA INC.
OMG AMERICAS
 The Shepherd Chemical Co.
TROY CORPORATION

Neodecanoates

OMG AMERICAS
 The Shepherd Chemical Co.

Octoates

Chemicals Incorporated
HÜLS AMERICA INC.
OMG AMERICAS
 The Shepherd Chemical Co.
TROY CORPORATION

Tallates

ABITEC Corp.
OMG AMERICAS
 The Shepherd Chemical Co.

**Water Soluble or
 Water Dispersible**

ABITEC Corp.
HÜLS AMERICA INC.
OMG AMERICAS
 The Shepherd Chemical Co.
TROY CORPORATION
 Vianova Resins Inc.

Misc. Driers

Chatterm Chemicals, Inc.
 Cookson Matthey Pigments & Dispersions
 Daniel Products Co., Inc.
HÜLS AMERICA INC.
OMG AMERICAS
 The Shepherd Chemical Co.

TROY CORPORATION
R.T. VANDERBILT CO., INC.

**Fillers-Natural, Cellulosic,
 Polymeric**

Cellulose Filler Factory
 Cimbar Performance Minerals
 Composite Particles, Inc.
 Composition Materials Co., Inc.
 DUR-O-Lite: CBC Paints and Coatings
 Engelhard Corp., Pigments & Additives
 Floridin Company, Div. of ITC Industrials
 Georgia Marble Co.
HÜLS AMERICA INC.
 Intercomp., Inc.
 Interfibe Corp.
 J.M. Huber Corp., Engineered Minerals Div.
 Landers-Segal Color Co., Inc.
 Luzenac America
 3M/Zeelan Industries
 Mantrose Bradshaw Zinsser Group
 Potters Industries, Inc.
 The PQ Corp., Specialty Div.
 PQ Corporation/ Potters Industries
 Reade Advanced Materials
 Reedy International Corp.
 Sentry/Custom Services Corp.
 Southern Clay Products, Inc.
UNIMIN CORP.
 Zemex Industrial Minerals

Flame and Smoke Retardants

A.M.S.
 Alcoa Industrial Chemicals
 AlliedSignal Inc., Specialty Chemicals
 Asbury Carbons, Inc.
 Ashland Chemical Co., IC&S Div.
 Buckman Laboratories, Inc.
 The Chemical Co.
 Clariant Corp., Additives Div.
 Cytec Industries, Inc.
 Dover Chemical Corp.
 DUR-O-Lite: CBC Paints and Coatings
 Electro Abrasives Corp.
 Elf ATOCHEM North America, Inc.
 Exxon Chemical Co.
 Hitox Corp. of America
 J.M. Huber Corp., Engineered Minerals Div.
 K & S Industries Ltd.
 Kenrich Petrochemicals, Inc.
 Landers-Segal Color Co., Inc.
 Lonza, Inc. Specialty Anhydride-Additives
 Mace Adhesives & Coatings Co.
 Reade Advanced Materials
 Sachtleben Corp.
 Sherwin-Williams Chemicals
 Solutia Inc.
 Spartan Flame Retardants, Inc.
 StanChem Inc.
 Summit Precision Polymers, Mountaintop
 United Mineral & Chemical Corp.

Flattig Agents

Anderson Development Co.
CABOT CORP., CAB-O-SIL
 Carroll Scientific, Inc.
 Celite Corp., c/o World Minerals, Inc.
 Crosfield Company
 Daniel Products Co., Inc.
DEGUSSA CORP.
 DUR-O-Lite: CBC Paints and Coatings
 Elf ATOCHEM North America, Inc.
 Estron Chemical, Inc.
 Fuji Silysia Chemical, Ltd.
 W.R. Grace, Davison Div.

J.M. Huber Corp., Engineered Minerals Div.
HÜLS AMERICA INC.
 Intercomp., Inc.
 International Resources, Inc.
 Landers-Segal Color Co., Inc.
THE LUBRIZOL CORPORATION
 Luzenac America
MICRO POWDERS, INC.
 Nagase America Corp.
 Pan Chemical Corp.
 K.J. Quinn & Co., Inc.
 Shamrock Technologies, Inc.
 Summit Precision Polymers, Mountaintop
R.T. VANDERBILT CO., INC.
 Zemex Industrial Minerals

Dispersed

Daniel Products Co., Inc.
HÜLS AMERICA INC.
 International Resources, Inc.
 Nagase America Corp.
 Pan Chemical Corp.

Nonmetallic

Celite Corp., c/o World Minerals, Inc.
 Elf ATOCHEM North America, Inc.
HÜLS AMERICA INC.
 International Resources, Inc.
 Nagase America Corp.

Flocculants

Allied Colloids, Inc.
 Ashland Chemical Co., IC&S Div.
 CPS Chemical Company, Inc.
 Cytec Industries, Inc.
 Graden Chemical Co., Inc.
HÜLS AMERICA INC.
 Mitsubishi Chemical America
 Rhône-Poulenc, Inc.
 Southern Clay Products, Inc.
TROY CORPORATION
 Union Carbide Corp.

Flow Control Agents

AIR PRODUCTS & CHEMICALS, INC.
 Allied Colloids, Inc.
 Ashland Chemical Co., IC&S Div.
 CCP
CABOT CORP., CAB-O-SIL
 Carroll Scientific, Inc.
 Clarence Resins & Chemicals, Inc.
 Cytec Industries, Inc.
 Daniel Products Co., Inc.
DEGUSSA CORP.
 Eastman Chemical Co.
 Estron Chemical, Inc.
HENKEL CORP.
**HERCULES INCORPORATED, AQUALON
 DIV.**
 King Industries, Inc.
 Laporte/SCP, Laponite Rheological
 Additives
THE LUBRIZOL CORPORATION
 Nagase America Corp.
 PCI Group, Inc.
 The PQ Corp., Specialty Div.
 Rheox, Inc.
 Rhône-Poulenc, Inc.
 Shamrock Technologies, Inc.
 Solutia Inc.
 Southern Clay Products, Inc.
 Süd-Chemie Rheologicals
 Summit Precision Polymers, Mountaintop
 Tego Chemie Service
TROY CORPORATION

Vianova Resins Inc.
Wacker Silicones Corp.
Witco Organic Silicones Group

Freeze Thaw Stabilizers

Exxon Chemical Co.
Laporte/SCP, Laponite Rheological Additives

Glycerine

ALNOR OIL CO.
Browning Chemical Corp.
GFI, Inc.

HENKEL CORP.
THOMAS SCIENTIFIC
United Mineral & Chemical Corp.

Homogenizers

DUR-O-Lite: CBC Paints and Coatings

Ink Additives

ADM Co. ADM Lecithin Div.
ADM Tronics, Inc.

AIR PRODUCTS & CHEMICALS, INC.
AlliedSignal Inc., Specialty Chemicals
American Casein Co., Div. of Protein Polymer Group

American Gilsonite Co.
ANGUS CHEMICAL CO.
Arakawa Chemical (USA) Inc.
Asbury Carbons, Inc.
Baker Petrolite, Polymers Div.
Burlington Bio-Medical & Scientific Corp.

BYK-Chemie USA
CABOT CORP., CAB-O-SIL
Captan Associates, Inc.
Carroll Scientific, Inc.
Chattem Chemicals, Inc.
Clarence Resins & Chemicals, Inc.
Cookson Matthey Pigments & Dispersions
Cytec Industries, Inc.
Daniel Products Co., Inc.
Degen Oil and Chemical
Dover Chemical Corp.
Dow Corning Corp.

DUPONT, SPECIALTY CHEMICALS
Eastman Chemical Co.
Elf ATOCHEM North America, Inc.
Engelhard Corp., Pigments & Additives
Estron Chemical, Inc.
Exxon Chemical Co.

GENESEE POLYMERS CORP.
BFGoodrich Co. - Coatings Div.

HENKEL CORP.
HERCULES INCORPORATED, AQUALON DIV.

J.M. Huber Corp., Engineered Minerals Div.
Kenrich Petrochemicals, Inc.
King Industries, Inc.
Lawter International
Michelman, Inc.
MICRO POWDERS, INC.
Mitsubishi Chemical America
Nagase America Corp.
NICHEM Corp.
North American Oxide LLC
NuTech Corp.

OMG AMERICAS
PCI Group, Inc.
Rheox, Inc.
Rhône-Poulenc, Inc.
Rit-Chem Co., Inc.
Ruco Polymer Corp.
Sachtleben Corp.
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
Solutia Inc.
Southern Clay Products, Inc.
Süd-Chemie Rheologicals
Summit Precision Polymers, Mountaintop
Surtec Inc.
Tego Chemie Service
TROY CORPORATION
Ultra Additives, Inc.
Union Carbide Corp.
Wacker Silicones Corp.
Witco Organic Silicones Group
Zemex Industrial Minerals

Light Stabilizers

AlliedSignal Inc., Specialty Chemicals
BASF CORP.
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
Clariant Corp., Additives Div.
Consolidated Color Corp.
Cytec Industries, Inc.
International Resources, Inc.
North American Oxide LLC
Rhône-Poulenc, Inc.

Masking Agents

A.M.S.
Exxon Chemical Co.
Innotec of WI, Inc.
Sentry/Custom Services Corp.

Misc. Other Additives

ADM Tronics, Inc.
A.M.S.
AIR PRODUCTS & CHEMICALS, INC.
American Casein Co.
ANGUS CHEMICAL CO.
Ashland Chemical Co., IC&S Div.
Burlington Bio-Medical & Scientific Corp.
Chemcor
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
Composite Particles, Inc.
Consolidated Color Corp.
CPS Chemical Company, Inc.
Cytec Industries, Inc.
Daniel Products Co., Inc.
Elf ATOCHEM North America, Inc.
EMS-American Grilon, Inc.
Exxon Chemical Co.
Guthrie Latex, Inc.
HENKEL CORP.
Kenrich Petrochemicals, Inc.
Lonza, Inc. Specialty Anhydride-Additives
THE LUBRIZOL CORPORATION
Nagase America Corp.
NISSAN CHEMICAL AMERICA CORP.
PCI Group, Inc.
Reade Advanced Materials
Reedy International Corp.
Rhône-Poulenc, Inc.
Southern Clay Products, Inc.
Süd-Chemie Rheologicals
TROY CORPORATION
Union Carbide Corp.
Wacker Silicones Corp.
Witco Corp.

Reduce
Tension!

Surface tension, that is...
with DuPont Zonyl® Fluorosurfactants

We offer a full line of fluorinated surfactants to reduce tension in applications that call for improved wetting, leveling, foaming or dispersion in demanding environments. Cleaning, Coatings. Films. You name it.

For more information on our product line and supply capability, call us at 1-800-441-7515.


DuPont Specialty Chemicals

Circle No. 242 on Reader Service Card

LANCO™ Surface Modifiers Solve the Toughest Problems

Antiscratch

Metal
Mark
Resistance

Antimar

Meat
Release

Gloss
Control

Scuff Resistance

Not just a micronized wax, LANCO Surface Modifiers are high-performance additives that work to solve tough problems in waterborne, solvent-based and powder coating technologies. Recommended for wood finishes and coatings for coil, metal furniture, appliances, cans and containers. Sorry, offers no protection against fleas.

Call Lubrizol Coating Additives at 216/943-4200 for our LANCO Product Summary. Or visit us at <http://www.lubrizol.com>

Paint Industries'
Toughest Problems



 The Lubrizol Corporation, 29400 Lakeland Boulevard, Wickliffe, Ohio 44092

Misc. Other Chemical Specialties

ADM Tronics, Inc.
A.M.S.
Anderson Development Co.
Ashland Chemical Co., IC&S Div.
Betz Dearborn, Metals Process Group
Burlington Bio-Medical & Scientific Corp.
Chemicals Incorporated
Consolidated Color Corp.
CPS Chemical Company, Inc.
DEGUSSA CORP.
Dover Chemical Corp.
Eastman Chemical Co.
Elf ATOCHEM North America, Inc.
EMS-American Grilon, Inc.
Exxon Chemical Co.
GENESEE POLYMERS CORP.
GFI, Inc.
Heatbath Corp.
Industrial Copolymers Ltd.
Ishihara Corp. (U.S.A.)
Kenrich Petrochemicals, Inc.
Landers-Segal Color Co., Inc.
Lonza, Inc. Specialty Anhydride—Additives
Mallinckrodt Inc., Trimet Technical Products Div.
NISSAN CHEMICAL AMERICA CORP.
Reade Advanced Materials
Rhône-Poulenc, Inc.
Ruco Polymer Corp.
San Esters Corp.
Sentry/Custom Services Corp.
Tego Chemie Service
Vianova Resins Inc.
Wayne Pigment Corp.
Witco Corp.

Misc. Viscosity, Suspension and Flow Control Agents

ADM Co. ADM Lecithin Div.
ADM Tronics, Inc.
Allied Colloids, Inc.
American Casein Co., Div. of Protein Polymer Group
Automation Products Inc.
CCP
Cellulose Filler Factory
Clarence Resins & Chemicals, Inc.
CPS Chemical Company, Inc.
Daniel Products Co., Inc.
DEGUSSA CORP.
DUR-O-Lite: CBC Paints and Coatings
Estron Chemical, Inc.
Floridin Company, Div. of ITC Industrials
BFGoodrich Co., Coatings Div.
HENKEL CORP.
HERCULES INCORPORATED, AQUALON DIV.
HÜLS AMERICA INC.
Kenrich Petrochemicals, Inc.
King Industries, Inc.
Landers-Segal Color Co., Inc.
Laporte/SCP, Laponite Rheological Additives
Lonza, Inc. Specialty Anhydride—Additives
Nagase America Corp.
PCI Group, Inc.
Protein Technologies Intl. Inc., Polymer Products Div.
Rheox, Inc.
Solutia Inc.
Southern Clay Products, Inc.
TROY CORPORATION
Vianova Resins Inc.
Witco Corp.

Monomers

Amoco Chemicals
BAYER CORPORATION
CPS Chemical Company, Inc.
Cytac Industries, Inc.
DEGUSSA CORP.
Elf ATOCHEM North America, Inc.
Estron Chemical, Inc.
Exxon Chemical Co.
GENESEE POLYMERS CORP.
HENKEL CORP.
HÜLS AMERICA INC.
International Speciality Chemicals
Kinetics Corp.
Kowa American Corp.
THE LUBRIZOL CORPORATION
Mitsubishi Chemical America
Nagase America Corp.
Rhône-Poulenc, Inc.
San Esters Corp.
SARTOMER CO.
Shell Chemical Co.
UCB CHEMICALS CORP., RADCURE DIV.
Union Carbide Corp.

Photocuring Materials/ Photoinitiators

A.M.S.
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
CPS Chemical Company, Inc.
HENKEL CORP.
Kinetics Corp.
Kowa American Corp.
Nagase America Corp.
Rit-Chem Co., Inc.
Sachtleben Corp.
San Esters Corp.
SARTOMER CO.
Tego Chemie Service
UCB CHEMICALS CORP., RADCURE DIV.
Union Carbide Corp.
Velsicol Chemical Corp.

Plasticizers

Arakawa Chemical (USA) Inc.
Ashland Chemical Co., IC&S Div.
Aristech Chemical Corp.
BAYER CORPORATION
BORDEN INC.
Cardolite Corp.
CasChem, Inc.
Chemcor
Clarence Resins & Chemicals, Inc.
Degen Oil and Chemical
Eastman Chemical Co.
Exxon Chemical Co.
HENKEL CORP.
Kenrich Petrochemicals, Inc.
Kowa American Corp.
Lonza, Inc. Specialty Anhydride—Additives
Mitsubishi Chemical America
Nagase America Corp.
Rhône-Poulenc, Inc.
Rit-Chem Co., Inc.
Sentry/Custom Services Corp.
Shell Chemical Co.
Solutia Inc.
Union Carbide Corp.

Adipates

Aristech Chemical Corp.
Eastman Chemical Co.
SARTOMER CO.
Sentry/Custom Services Corp.
Solutia Inc.

Benzoates

Solutia Inc.

Castor Oil (Polymerized/Oxidized)

CasChem, Inc.
Degen Oil and Chemical
Elf ATOCHEM North America, Inc.
Sentry/Custom Services Corp.

Castor Oil (Raw/Refined)

CasChem, Inc.
Degen Oil and Chemical

Epoxidized

Cardolite Corp.
Elf ATOCHEM North America, Inc.
HENKEL CORP.
Union Carbide Corp.

Phosphates

Chemcor
Rhône-Poulenc, Inc.
Solutia Inc.

Polymeric

Ashland Chemical Co., IC&S Div.
BAYER CORPORATION
Union Carbide Corp.

Phthalates

Aristech Chemical Corp.
Ashland Chemical Co., IC&S Div.
Eastman Chemical Co.
Exxon Chemical Co.
Solutia Inc.

Sulfonamides

Rit-Chem Co., Inc.

Misc. Plasticizers

Arakawa Chemical (USA) Inc.
Aristech Chemical Corp.
Ashland Chemical Co., IC&S Div.
Cardolite Corp.
Elf ATOCHEM North America, Inc.
Kenrich Petrochemicals, Inc.
Kowa American Corp.
Lonza, Inc. Specialty Anhydride—Additives
Rit-Chem Co., Inc.
Union Carbide Corp.

Preservatives

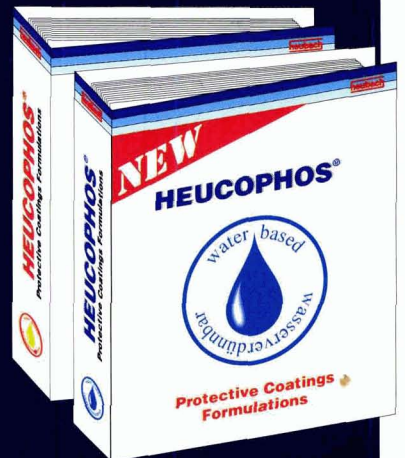
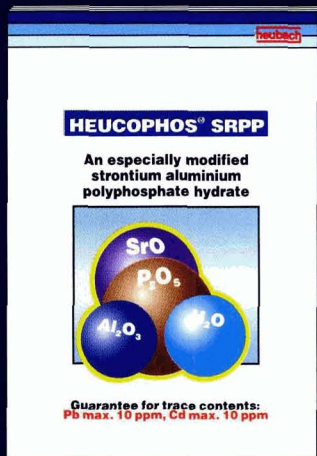
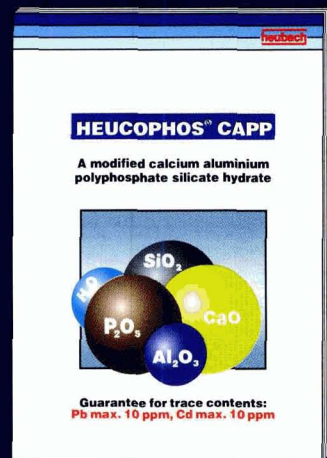
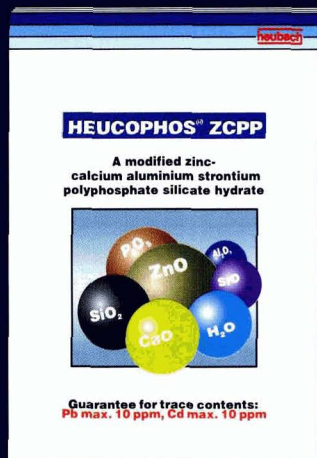
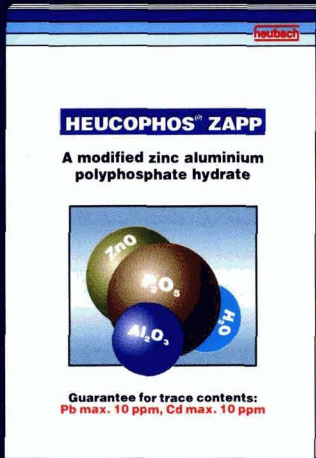
Aceto Corporation
ACTI-Chem
Aerocote Corp.
AlliedSignal Inc., Specialty Chemicals
ANGUS CHEMICAL CO.
Ashland Chemical Co., IC&S Div.
Atomergic Chemetals Corp.
Buckman Laboratories, Inc.
Burlington Bio-Medical & Scientific Corp.
CIBA SPECIALTY CHEMICALS CORP., ADDITIVES
Eagle Zinc Company
Elf ATOCHEM North America, Inc.
HENKEL CORP.
HÜLS AMERICA INC.
International Speciality Products (ISP)
Meadowbrook Co.
MORTON INTERNATIONAL
Nagase America Corp.
Olin Corp.

Anticorrosive Pigments

The newly developed pigments of this polyphosphate series provide an altered chemical basis in comparison with the modified zinc orthophosphates and therefore a different electrochemical efficiency. These changes open new fields of application.

3rd Generation

The following product brochures explain the technical properties and application options in detail:



COPY & FAX - COPY & FAX - COPY & FAX

To **heubach** Fax-No. (1) 215-736-2249
 99 Newbold Road, Fairless Hills, PA 19030, USA

2nd Generation

Sample Literature

NEW

- | | | |
|-------------------------|--------------------------|--------------------------|
| 1. HEUCOPHOS ZPA | <input type="checkbox"/> | <input type="checkbox"/> |
| 2. HEUCOPHOS ZPO | <input type="checkbox"/> | <input type="checkbox"/> |
| 3. HEUCOPHOS ZMP | <input type="checkbox"/> | <input type="checkbox"/> |
| 4. HEUCOPHOS ZCP | <input type="checkbox"/> | <input type="checkbox"/> |
| 5. HEUCOPHOS ZPZ | <input type="checkbox"/> | <input type="checkbox"/> |
| 6. HEUCOPHOS ZBZ | <input type="checkbox"/> | <input type="checkbox"/> |

3rd Generation

**NEW
NEW**

- | | | |
|---------------------------------|---|--------------------------|
| 7. HEUCOPHOS ZAPP | <input type="checkbox"/> | <input type="checkbox"/> |
| 8. HEUCOPHOS ZCPP | <input type="checkbox"/> | <input type="checkbox"/> |
| 9. HEUCOPHOS SAPP | <input type="checkbox"/> | <input type="checkbox"/> |
| 10. HEUCOPHOS SRPP | <input type="checkbox"/> | <input type="checkbox"/> |
| 11. HEUCOPHOS CAPP | <input type="checkbox"/> | <input type="checkbox"/> |
| 12. Formulations Part I |  | <input type="checkbox"/> |
| 13. Formulations Part II |  | <input type="checkbox"/> |
| 14. Product overview | | <input type="checkbox"/> |

from Name

Company

Address

Phone

Fax

.....

COPY & FAX - COPY & FAX - COPY & FAX

ZPA
ZPO
ZMP
ZCP
ZPZ
ZBZ

HEUCOPHOS®

The cutting edge for
Protective Coatings

ZAPP
ZCPP
SAPP
SRPP
CAPP

for solvent based
coatings

ZPA	ZPO	ZMP	ZCP	ZPZ/ZBZ		ZAPP	ZCPP	SAPP	SRPP	CAPP
↑	↑	↻	↑	↑	Alkyd resins	↑	↑	↻	↻	↻
↻	↻	↻	↻	↻	Polyesters	↻	↻	↑	↑	↻
↑	↻	↻	↻	↑	Epoxy resins	↑	↻	↑	↻	↻
↑	↻	↻	↻	↻	Polyurethanes	↑	↻	↑	↻	↻
↑	↻	↻	↑	↻	Chlorinated polymers	↻	↻	↻	↻	↻
↻	↑	↻	↻	↻	Silicone resins	↻	↻	↻	↻	↻
↻	↻	↻	↑	↻	Polyvinyl butyrale / Phenolic resins	↑	↑	↻	↻	↻

for water based
coatings

ZPA	ZPO	ZMP	ZCP	ZPZ/ZBZ		ZAPP	ZCPP	SAPP	CAPP
↑	↻	↻	↑	↻	Alkyd resins	↑	↻	↻	↻
↻	↻	↑	↑	↻	Alkyd emulsions	↻	↑	↻	↻
↑	↻	↑	↻	↑	Epoxy emulsions	↻	↻	↻	↻
↻	↻	↻	↻	↻	Epoxy dispersions	↻	↻	↑	↻
↑	↻	↻	↻	↻	Polyurethane dispersions	↻	↻	↑	↻
↑	↻	↻	↻	↻	Silicone emulsions	↑	↻	↻	↻
↻	↻	↻	↑	↑	Acrylate dispersions	↻	↑	↻	↻
↻	↻	↻	↑	↑	Butadiene dispersions	↻	↑	↻	↻

↑ very frequent application
 ↻ frequent application
 ↻ less frequent application

HEUCOPHOS[®] - Active

2nd Generation

HEUCOPHOS ZPA, ZPO, ZMP, ZCP, ZPZ and ZBZ are active multi-level anticorrosive pigments. They differ from conventional zinc phosphate such as Zinkphosphat ZP 10 from Heubach by a modified chemical composition and optimized particle size, structure and distribution.

The following product brochures explain the technical properties and application options in detail:

NEW

HEUCOPHOS[®] ZCP

A modified zinc calcium strontium orthophosphate silicate hydrate

Guarantee for trace contents:
Pb max. 10 ppm
Cd max. 10 ppm

Four cylindrical product containers are shown, with the fourth one being a larger sphere labeled ZCP.

HEUCOPHOS[®] ZPA

A modified zinc aluminium orthophosphate hydrate

Guarantee for trace contents:
Pb max. 10 ppm
Cd max. 10 ppm

Four cylindrical product containers are shown, with the first one being a larger sphere labeled ZPA.

HEUCOPHOS[®] ZPO

A organically treated basic zinc orthophosphate hydrate

Guarantee for trace contents:
Pb max. 10 ppm
Cd max. 10 ppm

Four cylindrical product containers are shown, with the second one being a larger sphere labeled ZPO.

HEUCOPHOS[®] ZMP

A modified basic zinc molybdenum orthophosphate hydrate

Guarantee for trace contents:
Pb max. 10 ppm
Cd max. 10 ppm

Four cylindrical product containers are shown, with the third one being a larger sphere labeled ZMP.

HEUCOPHOS[®] ZPZ

An organo/inorganic modified basic zinc orthophosphate hydrate

Four cylindrical product containers are shown, with the fourth one being a larger sphere labeled ZPZ.

HEUCOPHOS[®] ZBZ

An organic/inorganic modified basic zinc phosphate silicate hydrate

Four cylindrical product containers are shown, with the fourth one being a larger sphere labeled ZBZ.

OMG AMERICAS
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Zinc Corp. of America, Inc.

Biocides

Aceto Corporation
 ACTI-Chem
 AlliedSignal Inc., Specialty Chemicals
ANGUS CHEMICAL CO.
 Ashland Chemical Co., IC&S Div.
 Atomergic Chemetals Corp.
 Buckman Laboratories, Inc.
 Burlington Bio-Medical & Scientific Corp.
CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES
 Elf ATOCHEM North America, Inc.
HÜLS AMERICA INC.
 International Specialty Products (ISP)
MORTON INTERNATIONAL
 Olin Corp.
TROY CORPORATION
R.T. VANDERBILT CO., INC.

Fungicides

Aceto Corporation
 ACTI-Chem
ANGUS CHEMICAL CO.
 Buckman Laboratories, Inc.
 Burlington Bio-Medical & Scientific Corp.
 Eagle Zinc Company
 Elf ATOCHEM North America, Inc.
HENKEL CORP.
HÜLS AMERICA INC.
 Meadowbrook Co.
 Olin Corp.
TROY CORPORATION
R.T. VANDERBILT CO., INC.
 Zinc Corp. of America, Inc.

Non-Mercurial

ACTI-Chem
ANGUS CHEMICAL CO.
 Buckman Laboratories, Inc.
CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES
HENKEL CORP.
HÜLS AMERICA INC.
 Olin Corp.
TROY CORPORATION
R.T. VANDERBILT CO., INC.

Misc. Preservatives

ACTI-Chem
 Aerocote Corp.
 AlliedSignal Inc., Specialty Chemicals
 Ashland Chemical Co., IC&S Div.
 Buckman Laboratories, Inc.
HÜLS AMERICA INC.
 Olin Corp.
TROY CORPORATION

Printing Ink Dispersants & Vehicles

ADM Co. ADM Lecithin Div.
 ADM Tronics, Inc.
AIR PRODUCTS & CHEMICALS, INC.
 Allied Colloids, Inc.
 American Casein Co., Div. of Protein
 Polymer Group
 American Gilsonite Co.
 American Lecithin Co.
 Ashland Chemical Co., IC&S Div.
 Carroll Scientific, Inc.
 Composition Materials Co., Inc.

Cytec Industries, Inc.
 Daniel Products Co., Inc.
 Day-Glo Color Corp.
 Degen Oil and Chemical
 Dock Resins Corp.
 Elf ATOCHEM North America, Inc.
 Exxon Chemical Co.
GENESEE POLYMERS CORP.
 BFGoodrich Co., Coatings Div.
HENKEL CORP.
 King Industries, Inc.
 Lawter International
THE LUBRIZOL CORPORATION
 Mantrose Bradshaw Zinsser Group
MORTON INTERNATIONAL
 Sequa Chemical, Inc.
 Solutia Inc.
TROY CORPORATION

Printing Ink Varnishes & Compounds

ADM Tronics, Inc.
 A.M.S.
AIR PRODUCTS & CHEMICALS, INC.
 American Gilsonite Co.
 Ashland Chemical Co., IC&S Div.
 Carroll Scientific, Inc.
 Day-Glo Color Corp.
 Degen Oil and Chemical
 BFGoodrich Co., Coatings Div.
 International Resources, Inc.
 Lawter International
MORTON INTERNATIONAL
 StanChem Inc.

Reactive Diluents

AIR PRODUCTS & CHEMICALS, INC.
 Amoco Chemicals
 Cardolite Corp.
 CasChem, Inc.
 CPS Chemical Company, Inc.
 CVC Specialty Chemicals, Inc.
 Elf ATOCHEM North America, Inc.
 Exxon Chemical Co.
HENKEL CORP.
 Industrial Copolymers Ltd.
 Kenrich Petrochemicals, Inc.
 King Industries, Inc.
 Nagase America Corp.
 San Esters Corp.
SARTOMER CO.
UCB CHEMICALS CORP., RADCURE DIV.
 Union Carbide Corp.

Stabilizers

AlliedSignal Inc., Specialty Chemicals
CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES
 Cytec Industries, Inc.
 Elf ATOCHEM North America, Inc.
 Engelhard Corp., Pigments & Additives
 Group
HENKEL CORP.
 International Resources, Inc.
 Kelco Industrial Biopolymers, Group of
 Monsanto Co.
 Kinetics Corp.
OMG AMERICAS



Lasting Color for a Demanding World

Complex Inorganic Pigments For Coil Coating

- Copper Chromite Blacks**
- Cobalt Blues**
- Cobalt Chrome Blues**
- Cobalt Titanate Greens**
- Chrome Titanate Yellows**
- Iron Titanate Browns**
- Nickel Titanate Yellows**
- Other colors available**

Serving the Coil Coating Industry and a Member of the National Coil Coating Association (NCCA) for Over 33 Years

The Shepherd Color Company
 4539 Dues Drive, P.O. Box 485827, Cincinnati, Ohio 45246
 Phone (513) 874-0714 • Fax (513) 874-5061

Circle No. 243 on Reader Service Card

PQ Corporation/ Potters Industries
Reade Advanced Materials
Rhône-Poulenc, Inc.

Metallic

Elf ATOCHEM North America, Inc.
International Resources, Inc.
Reade Advanced Materials

Nonmetallic

AlliedSignal Inc., Specialty Chemicals
Reade Advanced Materials

Vinyl

Elf ATOCHEM North America, Inc.
International Resources, Inc.
PQ Corporation/ Potters Industries

Misc. Stabilizers

Cytec Industries, Inc.
Elf ATOCHEM North America, Inc.
HENKEL CORP.
Kelco Industrial Biopolymers, Group of
Monsanto Co.
OMG AMERICAS
Rhône-Poulenc, Inc.

Static Preventive

Aceto Corporation
ADM Tronics, Inc.
Composition Materials Co., Inc.
Cytec Industries, Inc.
Dow Corning Corp.
HENKEL CORP.
Kenrich Petrochemicals, Inc.
Rhône-Poulenc, Inc.
Sentry/Custom Services Corp.
U.V. Process Supply

Stearates

ABITEC Corp.
Browning Chemical Corp.
Clarence Resins & Chemicals, Inc.
Graden Chemical Co., Inc.
HENKEL CORP.
R.I.T.A. Corp.
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
The Shepherd Chemical Co.
United Mineral & Chemical Corp.
Vanguard Chemical International Inc.

Surface Conditioners & Lubricants

A.M.S.
ABITEC Corp.
AIR PRODUCTS & CHEMICALS, INC.
AlliedSignal Inc., Specialty Chemicals
BYK-Chemie USA
Carroll Scientific, Inc.
Chemcor
Composite Particles, Inc.
Daniel Products Co., Inc.
Dow Corning Corp.
Eastman Chemical Co.
Freiborne-Ciarlone, Inc.
GENESEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
Lawter International
LubeCon Systems, Inc.
THE LUBRIZOL CORPORATION
Michelman, Inc.
MICRO POWDERS, INC.

Mona Industries, Inc.
R.I.T.A. Corp.
Rhône-Poulenc, Inc.
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
Shamrock Technologies, Inc.
Summit Precision Polymers, Mountaintop
Tego Chemie Service
TROY CORPORATION
Wacker Silicones Corp.
Witco Corp.

Anti-Marring Agents

AIR PRODUCTS & CHEMICALS, INC.
BYK-Chemie USA
Carroll Scientific, Inc.
Chemcor
Daniel Products Co., Inc.
Dow Corning Corp.
Eastman Chemical Co.
GENESEE POLYMERS CORP.
BFGoodrich Co. - Coatings Div.
Lawter International
THE LUBRIZOL CORPORATION
Michelman, Inc.
MICRO POWDERS, INC.
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
Shamrock Technologies, Inc.
Summit Precision Polymers, Mountaintop
Tego Chemie Service
TROY CORPORATION
Witco Corp.

Slip Sides

AIR PRODUCTS & CHEMICALS, INC.
BYK-Chemie USA
Carroll Scientific, Inc.
Lawter International
Michelman, Inc.
Summit Precision Polymers, Mountaintop
TROY CORPORATION
Witco Corp.

Nonmetallic

Lawter International
Summit Precision Polymers, Mountaintop
Witco Corp.

Suspension Agents

ABITEC Corp.
ADM Co. ADM Lecithin Div.
Ashland Chemical Co., IC&S Div.
Cimbar Performance Minerals
DUR-O-Lite: CBC Paints and Coatings
Engelhard Corp., Pigments & Additives
Floridin Company, Div. of ITC Industrials
HENKEL CORP.
HERCULES INCORPORATED, AQUALON DIV.
Kelco Industrial Biopolymers, Group of
Monsanto Co.
Laporte/SCP, Laponite Rheological Additives
Luzenac America
Mona Industries, Inc.
R.I.T.A. Corp.
R.T. VANDERBILT CO., INC.
Rheox, Inc.
Rhône-Poulenc, Inc.
Southern Clay Products, Inc.
Summit Precision Polymers, Mountaintop Div.
TROY CORPORATION

Texturizers

Ashland Chemical Co., IC&S Div.
Composite Particles, Inc.
DUR-O-Lite: CBC Paints and Coatings
Elf ATOCHEM North America, Inc.
Floridin Company - Div. of ITC Industrials
MICRO POWDERS, INC.
Shamrock Technologies, Inc.
UNIMIN CORP.

Thickening Agents

ABITEC Corp.
Aceto Corporation
Allied Colloids, Inc.
American Casein Co., Div. of Protein Polymer Group
Ashland Chemical Co., IC&S Div.
BYK-Chemie USA
CABOT CORP., CAB-O-SIL
Cellulose Filler Factory
Chattem Chemicals, Inc.
Cimbar Performance Minerals
Clarence Resins & Chemicals, Inc.
Condea Vista Company
Daniel Products Co., Inc.
DEGUSSA CORP.
DUR-O-Lite: CBC Paints and Coatings
Eastman Chemical Co.
Empire State Varnish Co., Inc.
Engelhard Corp., Pigments & Additives
Floridin Company, Div. of ITC Industrials
BFGoodrich Co., Coatings Div.
HENKEL CORP.
HERCULES INCORPORATED, AQUALON DIV.
HÜLS AMERICA INC.
Kamin-Cable Corp.
Kelco Industrial Biopolymers, Group of
Monsanto Co.
King Industries, Inc.
Landers-Segal Color Co., Inc.
Laporte/SCP, Laponite Rheological Additives
Lawter International
THE LUBRIZOL CORPORATION
Mona Industries, Inc.
PCI Group, Inc.
R.I.T.A. Corp.
Rheox, Inc.
Rhône-Poulenc, Inc.
Scott Bader, Inc.
Sentry/Custom Services Corp.
Southern Clay Products, Inc.
Süd-Chemie Rheologicals
Technical Industries, Inc.
TROY CORPORATION
Union Carbide Corp.

Solvent

Aceto Corporation
Ashland Chemical Co., IC&S Div.
BYK-Chemie USA
Chattem Chemicals, Inc.
Daniel Products Co., Inc.
Eastman Chemical Co.
Empire State Varnish Co., Inc.
Engelhard Corp., Pigments & Additives
Floridin Company, Div. of ITC Industrials
HENKEL CORP.
HERCULES INCORPORATED, AQUALON DIV.
HÜLS AMERICA INC.
Lawter International
PCI Group, Inc.
Rheox, Inc.
Sentry/Custom Services Corp.



For Color That Hits the Mark, Every Time

Let's get straight to the point. . . Natrosol® Plus HEC is the standard of the paint and coatings industry for rheology modifiers. This unique cellulosic associative thickener offers proven performance in latex paints, with color properties that are markedly superior to synthetic associatives. The paint formulator's dream, Natrosol Plus targets the best of both technologies:

- Bioresistant
- Virtually Spatter-Free
- Superior Viscosity Retention on Tinting
- Excellent Sag, pH Tolerance, and Color Float
- Scrubability and Exterior Durability
- Higher Efficiency Grades Available
- Powder or Liquid Forms

Add to this, Aqualon's expanded product capacity, direct sales force, global supply capacity, and sales and technical leadership—enabling you to score competitively.

When your game plan includes proven performance, innovative technologies, and dedicated customer service and support, aim for the best. Ask for your latex paint thickener by name. . .

NATROSOL® PLUS

MODIFIED HYDROXYETHYLCELLULOSE

Hercules. . .the industry standard.

HERCULES

Hercules Incorporated
Aqualon Division
Hercules Plaza
1313 North Market Street
Wilmington, DE 19894-0001
(302) 594-5000

Southern Clay Products, Inc.
Süd-Chemie Rheologicals
TROY CORPORATION
Union Carbide Corp.

Water

Aceto Corporation
Allied Colloids, Inc.
American Casein Co., Div. of Protein
Polymer Group
Ashland Chemical Co., IC&S Div.
DUR-O-Lite: CBC Paints and Coatings
Engelhard Corp., Pigments & Additives
Floridin Company, Div. of ITC Industrials
BFGoodrich Co., Coatings Div.

HENKEL CORP.

**HERCULES INCORPORATED, AQUALON
DIV.**

HÜLS AMERICA INC.

Kamin-Cable Corp.
Kelco Industrial Biopolymers, Group of
Monsanto Co.
Landers-Segal Color Co., Inc.
Laporte/SCP, Laponite Rheological
Additives
Rheox, Inc.
Sentry/Custom Services Corp.
Southern Clay Products, Inc.
Süd-Chemie Rheologicals
Union Carbide Corp.

Misc. Thickeners

American Casein Co.

Ashland Chemical Co., IC&S Div.
Cellulose Filler Factory
Chatterm Chemicals, Inc.
Engelhard Corp., Pigments & Additives
HENKEL CORP.
HÜLS AMERICA INC.
Kamin-Cable Corp.
King Industries, Inc.
Mona Industries, Inc.
Rheox, Inc.
Scott Bader, Inc.
Southern Clay Products, Inc.
Süd-Chemie Rheologicals
Union Carbide Corp.

UV Absorbers

AlliedSignal Inc., Specialty Chemicals
Ashland Chemical Co., IC&S Div.

BASF CORP.

**CIBA SPECIALTY CHEMICALS CORP.,
ADDITIVES**

Clariant Corp., Additives Div.
Consolidated Color Corp.
Cookson Matthey Pigments & Dispersions
Cytec Industries, Inc.
Daniel Products Co., Inc.
DEGUSSA CORP.
DUR-O-Lite: CBC Paints and Coatings
Eastman Chemical Co.
Engelhard Corp., Pigments & Additives
Garrison Industries, Inc.
International Resources, Inc.
Keystone Aniline Corp.

Reedy International Corp.
Rhône-Poulenc, Inc.
Zinc Corp. of America, Inc.
ZOCHEM, DIVISION OF HUDSON BAY

Varnishes

ADM Tronics, Inc.
A.M.S.
Ashland Chemical Co., IC&S Div.
Day-Glo Color Corp.
Dow Corning Corp.
Empire State Varnish Co., Inc.
Lawter International
Mantrose Bradshaw Zinsser Group
StanChem Inc.

**Water Repellents-Silicone,
Corrosion Inhibitors**

A.M.S.
Ashland Chemical Co., IC&S Div.
DEGUSSA CORP.
Dow Corning Corp.
GENESEE POLYMERS CORP.
HENKEL CORP.
HÜLS AMERICA INC.
MICRO POWDERS, INC.
Mitsubishi Chemical America
NuTech Corp.
Rhône-Poulenc, Inc.
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
Shamrock Technologies, Inc.
Tego Chemie Service
Wacker Silicones Corp.
Witco Corp.

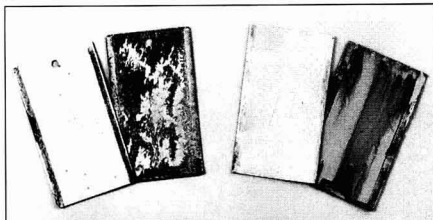
Water Treatment Chemicals

AlliedSignal Inc., Specialty Chemicals
ANGUS CHEMICAL CO.
Ashland Chemical Co., IC&S Div.
Browning Chemical Corp.
Chatterm Chemicals, Inc.
CORTEC CORP.
CPS Chemical Company, Inc.
Cytec Industries, Inc.
Hubbard-Hall, Inc.
Kamin-Cable Corp.
Lonza, Inc. Specialty Anhydride-Additives
THE LUBRIZOL CORPORATION
Mitsubishi Chemical America
Rhône-Poulenc, Inc.
Sentry/Custom Services Corp.
Solutia Inc.
Union Carbide Corp.

Waxes

Baker Petrolite, Polymers Div.
BASF CORP.
Carroll Scientific, Inc.
CasChem, Inc.
Chemcor
Clariant Corp., Additives Div.
Cookson Matthey Pigments & Dispersions
Daniel Products Co., Inc.
Eastman Chemical Co.
Estron Chemical, Inc.
GENESEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
HÜLS AMERICA INC.
Lawter International
THE LUBRIZOL CORPORATION
Mantrose Bradshaw Zinsser Group
Michelman, Inc.
MICRO POWDERS, INC.
Rheox, Inc.
Rhône-Poulenc, Inc.

**The Added Advantage...
For Your Coatings.**



When formulated with your coatings and paints, Cortec VCI corrosion inhibitor additives offer unprecedented protection for both outdoor and indoor formulations. Cortec additives are environmentally friendly and free of chromates and other heavy metals.

Whether it's a permanent or temporary coating, water- or solvent-based formulation, flash-rust additives for paints or in-can corrosion inhibitors, Cortec additives can improve performance and add value to your products. So when you need premier product performance, rely on Cortec to customize a corrosion inhibitor package to meet your needs. Cortec, the added advantage.



4119 White Bear Parkway, St. Paul, MN 55110 USA
Phone (612) 429-1100, Fax (612) 429-1122
Email info@cortecvci.com

**CALL
1-800
4-CORTEC**

Internet <http://www.cortecvci.com>

Circle No. 179 on Reader Service Card

Scheel Corp.
Sentry/Custom Services Corp.
Shamrock Technologies, Inc.
Summit Precision Polymers, Mountaintop
Werner G. Smith, Inc.

Oils/Fatty Acids

Castor Oil (Dehydrated)

ALNOR OIL CO.
CasChem, Inc.
Elf ATOCHEM North America, Inc.
Industrial Oil Products
Sud-Chemie Rheologicals

Coconut Oil

ABITEC Corp.
ALNOR OIL CO.

Fatty Acids

ALNOR OIL CO.
Arakawa Chemical (USA) Inc.
Baker Petrolite, Polymers Div.
Browning Chemical Corp.
Georgia-Pacific Resins, Inc.
HENKEL CORP.
Hubbard-Hall, Inc.
International Paper, Arizona Chemical Div.
K & S Industries Ltd.
R.I.T.A. Corp.

Hydrocarbon Ink Oils

Wabash Gilsonite Blends, Inc.

Linseed

ALNOR OIL CO.
Cargill, Inc.
Degen Oil and Chemical
Elf ATOCHEM North America, Inc.
Empire State Varnish Co., Inc.
Kamin-Cable Corp.
Lawter International
Reichhold Chemicals, Inc.

Blown

ALNOR OIL CO.
Cargill, Inc.
Degen Oil and Chemical
Kamin-Cable Corp.

Boiled

ALNOR OIL CO.
Cargill, Inc.
Degen Oil and Chemical
Kamin-Cable Corp.

Heat Bodied

ALNOR OIL CO.
Cargill, Inc.
Degen Oil and Chemical
Empire State Varnish Co., Inc.
Kamin-Cable Corp.

Raw

ALNOR OIL CO.
Cargill, Inc.
Degen Oil and Chemical
Kamin-Cable Corp.

Refined

ALNOR OIL CO.
Cargill, Inc.

Degen Oil and Chemical
Kamin-Cable Corp.
Lawter International

Special

Cargill, Inc.
Degen Oil and Chemical
Kamin-Cable Corp.

Misc. Linseed Oils

Cargill, Inc.
Degen Oil and Chemical
Kamin-Cable Corp.

Marine

Degen Oil and Chemical
Empire State Varnish Co., Inc.
Werner G. Smith, Inc.

Oiticica Oil

ALNOR OIL CO.
Industrial Oil Products

Soybean

ABITEC Corp.
ALNOR OIL CO.
Cargill, Inc.
Central Soya Co., Inc.
Degen Oil and Chemical
Kamin-Cable Corp.
Reichhold Chemicals, Inc.
Werner G. Smith, Inc.
United Soybean Board
Wabash Gilsonite Blends, Inc.

Sunflower

ABITEC Corp.
ALNOR OIL CO.
Cargill, Inc.
Kamin-Cable Corp.
Werner G. Smith, Inc.

Synthetic & Modified Oils

ABITEC Corp.
Degen Oil and Chemical
Sentry/Custom Services Corp.
Witco Corp.

Tung Oil

ALNOR OIL CO.
Degen Oil and Chemical
Industrial Oil Products
Lawter International
United Mineral & Chemical Corp.

Pigments

Black/Brown/Gray Pigments

ABCO Enterprises, Inc.
A.M.S.
Alex Color Co.
Asbury Carbons, Inc.
BASF CORP.
BAYER CORPORATION
Cabot Corp. - Special Blacks Div.
Cerdec Corp.
Clarence Resins & Chemicals, Inc.
Cleveland Pigment & Color Co.
Columbian Chemicals Co.
Continental Dispersions, Inc.
Cookson Matthey Pigments & Dispersions
Daicolor-Pope, Inc.

DEGUSSA CORP.
Ebonex Corporation
Engelhard Corp., Pigments & Additives
Ferro Corp.
General Carbon Co.
Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
Hitox Corp. of America
O. Hommel Co.
Hoover Color Corp.
Keystone Aniline Corp.
KLF Hitek Co.
Landers-Segal Color Co., Inc.
Laporte Pigments
MD-Both Industries
Reade Advanced Materials
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.
THE SHEPHERD COLOR CO.
Technical Industries, Inc.
United Mineral & Chemical Corp.

Brown and Gray Pigments

Cleveland Pigment & Color Co.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Hitox Corp. of America
Hoover Color Corp.
KLF Hitek Co.
Royale Pigments and Chemicals, Inc.

Carbon Black

ABCO Enterprises, Inc.
Alex Color Co.
Asbury Carbons, Inc.
BAYER CORPORATION
Cabot Corp., Special Blacks Div.
Clarence Resins & Chemicals, Inc.
Columbian Chemicals Co.
Continental Dispersions, Inc.
DEGUSSA CORP.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Keystone Aniline Corp.
Landers-Segal Color Co., Inc.
Laporte Pigments
MD-Both Industries
Reade Advanced Materials
Technical Industries, Inc.

Complex Inorganic Color Pigments

Cerdec Corp.
Clarence Resins & Chemicals, Inc.
Cookson Matthey Pigments & Dispersions
Daicolor-Pope, Inc.
DEGUSSA CORP.
Engelhard Corp., Pigments & Additives
Ferro Corp.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
O. Hommel Co.
Hoover Color Corp.
KLF Hitek Co.
Royale Pigments and Chemicals, Inc.
THE SHEPHERD COLOR CO.
United Mineral & Chemical Corp.

Drop and Bone Blacks

ABCO Enterprises, Inc.
Cleveland Pigment & Color Co.
Ebonex Corporation
Hoover Color Corp.

Lampblack

Columbian Chemicals Co.
DEGUSSA CORP.
 Engelhard Corp., Pigments & Additives
 General Carbon Co.
 Hoover Color Corp.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 Reade Advanced Materials

Misc. Black Pigments

BASF CORP.
BAYER CORPORATION
 Cleveland Pigment & Color Co.
 Columbian Chemicals Co.
 Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
 Hoover Color Corp.

Blue Pigments

A.M.S.
 Aarbor International Corp.
 Alex Color Co.
 Apollo Colors, Inc.
 Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION
 Browning Chemical Corp.
 Cerdec Corp.
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
 Clarence Resins & Chemicals, Inc.
 Cleveland Pigment & Color Co.
 Cookson Matthey Pigments & Dispersions
 Daicolor-Pope, Inc.
DEGUSSA CORP.
 Delta Colours
 Engelhard Corp., Pigments & Additives
 Ferro Corp.
 Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
 Hitox Corp. of America
 O. Hommel Co.
 International Resources, Inc.
 Keystone Aniline Corp.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 NICHEM Corp.
 Peer Chemical Corp.
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
SARTOMER CO.
 Sun Chemical Corp.
 Technical Industries, Inc.
THE SHEPHERD COLOR CO.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.
 Zeneca Pigments & Additives

Blue, Purple and Violet PMA & PTA Toners/Lakes

Engelhard Corp., Pigments & Additives
 Keystone Aniline Corp.
 Peer Chemical Corp.
 Royale Pigments and Chemicals, Inc.
 Sun Chemical Corp.

Complex Inorganic Color Pigments

BAYER CORPORATION
 Cerdec Corp.

Cookson Matthey Pigments & Dispersions
 Daicolor-Pope, Inc.
DEGUSSA CORP.
 Ferro Corp.
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
 O. Hommel Co.
 Landers-Segal Color Co., Inc.
 NICHEM Corp.
 Royale Pigments and Chemicals, Inc.
THE SHEPHERD COLOR CO.
 United Mineral & Chemical Corp.

Indanthrone Blue

BASF CORP.
 Keystone Aniline Corp.
 Toyo Ink America, Inc.
 Zeneca Pigments & Additives

Iron Blue

Aarbor International Corp.
 Daicolor-Pope, Inc.
DEGUSSA CORP.
 Delta Colours
 Keystone Aniline Corp.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.

Phthalocyanine Blue

Aarbor International Corp.
 Alex Color Co.
 Apollo Colors, Inc.
 Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION
 Browning Chemical Corp.
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
 Clarence Resins & Chemicals, Inc.
 Cleveland Pigment & Color Co.
 Daicolor-Pope, Inc.
 Delta Colours
 Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
 International Resources, Inc.
 Keystone Aniline Corp.
 Landers-Segal Color Co., Inc.
 NICHEM Corp.
 Peer Chemical Corp.
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
SARTOMER CO.
 Sun Chemical Corp.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.

Ultramarine Blue

Alex Color Co.
 Atomergic Chemetals Corp.
 Browning Chemical Corp.
 Cleveland Pigment & Color Co.
 Delta Colours
 Ferro Corp.
 Landers-Segal Color Co., Inc.
 Royale Pigments and Chemicals, Inc.

Misc. Blue, Purple and Violet

Clarence Resins & Chemicals, Inc.
 Engelhard Corp., Pigments & Additives

Harcros Pigments Inc.
 Hitox Corp. of America
 Landers-Segal Color Co., Inc.
 Peer Chemical Corp.
THE SHEPHERD COLOR CO.
 Sun Chemical Corp.
 Uhlich Color Company

Corrosion-Inhibiting Pigments

A.M.S.
 Albright & Wilson UK Ltd., Surface Technologies Div.
BASF CORP.
BAYER CORPORATION
 Buckman Laboratories, Inc.
 CasChem, Inc.
 Cerdec Corp.
 Delta Colours
 Eagle Zinc Company
HALOX
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
 KLF Hitek Co.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 Meadowbrook Co.
 NICHEM Corp.
 North American Oxide LLC
 Pyosa, S.A. de C.V.
 Reade Advanced Materials
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
 Sherwin-Williams Chemicals
 Sino-American Pigment Systems, Inc.
 Technical Industries, Inc.
 U.S. Zinc, Gulf Reduction Div.
 United Minerals & Chemical Corp.
 Wayne Pigment Corp.
 Zinc Corp. of America, Inc.

Red Lead/Litharge/Blue Lead

NICHEM Corp.

Zinc Dust and Flakes

Eagle Zinc Company
 Meadowbrook Co.
 North American Oxide LLC
 Reade Advanced Materials
 U.S. Zinc, Gulf Reduction Div.
 Zinc Corp. of America, Inc.

Zinc Yellow Pigments

Delta Colours
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 NICHEM Corp.
 Pyosa, S.A. DE C.V.
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
 Wayne Pigment Corp.

Misc. Corrosion-Inhibiting Pigments

Albright & Wilson UK Ltd., Surface Technologies Div.
BASF CORP.
BAYER CORPORATION
 Buckman Laboratories, Inc.
 CasChem, Inc.
 Cerdec Corp.
 Delta Colours
 Eagle Zinc Company
HALOX
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP



Crosslinked cures for the common coating

So, you've got a coating that's under the weather. Or need a cure for low temperatures. You want a stronger grip on metal, plastic, wood, glass, rubber, or concrete substrates. Or abrasion resistance has got you down. If so, we've got the new cure technologies for the broadest formulation latitude.

Our low-VOC two-part epoxy/amine, peroxide and UV/EB cure technologies allow you to enhance coatings for a wide range of substrates and conditions.

Explore our world of problem-solving crosslinkable products and additives—from acrylic monomers and oligomers to hydrocarbon resins and UV photoinitiators. For instance, have you considered thermal cure crosslinked coatings? Or low-temperature, two-part epoxy/amine cures? Or fast peroxide cures? Or instant UV/EB cures?

You can use our products in these new low-VOC technologies to cure coating problems where waterborne and solvent-based systems

fail. So, call for technical information or assistance.

Sartomer and Cray Valley (our European-based sister company) can support you worldwide.

Yours FREE
*"New Technologies
 That Reduce VOCs"*



Call 1-800-SARTOMER
 502 Thomas Jones Way
 Exton, PA 19341

<http://www.sartomer.com>

SARTOMER
Our name means tailor-made



Responsible Care:[®]
 A Public Commitment
 Sartomer Co., Inc. - Member, Chemical Manufacturers Association

Responsible Care and hands logo are registered trademarks of the Chemical Manufacturers Association

©1997 Sartomer Company, Inc., a member of Total group

KLF Hitek Co.
Landers-Segal Color Co., Inc.
Laporte Pigments
Meadowbrook Co.
NICHEM Corp.
Revelli Chemicals, Inc.
Sherwin-Williams Chemicals
Sino-American Pigment Systems, Inc.
United Mineral & Chemical Corp.
Wayne Pigment Corp.

Dyes

A.M.S.
BASF CORP.
BAYER CORPORATION
Captan Associates, Inc.
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Clarence Resins & Chemicals, Inc.
Consolidated Color Corp.
Daicolor-Pope, Inc.
Day-Glo Color Corp.
Hoover Color Corp.
Keystone Aniline Corp.
Ming-Zu Chemical Industries
Mitsubishi Chemical America
MORTON INTERNATIONAL
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
Royce Associates
Spectra Colors Corp.
Uhlich Color Company
United Mineral & Chemical Corp.
Zeneca Pigments & Additives

Organic

BASF CORP.
BAYER CORPORATION
Consolidated Color Corp.
Keystone Aniline Corp.
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
United Mineral & Chemical Corp.

Solvent-Soluble

BASF CORP.
BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Consolidated Color Corp.
Keystone Aniline Corp.
Ming-Zu Chemical Industries
MORTON INTERNATIONAL
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
Royce Associates
Spectra Colors Corp.
United Mineral & Chemical Corp.
Zeneca Pigments & Additives

Water-Soluble

BASF CORP.
Consolidated Color Corp.
Hoover Color Corp.
Keystone Aniline Corp.
Ming-Zu Chemical Industries
MORTON INTERNATIONAL
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
Spectra Colors Corp.
United Mineral & Chemical Corp.

Misc. Dyes

BASF CORP.
BAYER CORPORATION

Captan Associates, Inc.
Consolidated Color Corp.
Daicolor-Pope, Inc.
Day-Glo Color Corp.
Keystone Aniline Corp.
Ming-Zu Chemical Industries
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
Royce Associates
Spectra Colors Corp.
Uhlich Color Company
United Mineral & Chemical Corp.

Extender Pigments

A.M.S.
Alcoa Industrial Chemicals
Asbury Carbons, Inc.
Atomergic Chemetals Corp.
Burgess Pigment Co.
CABOT CORP., CAB-O-SIL
Celite Corp., c/o World Minerals, Inc.
Cellulose Filler Factory
Clarence Resins & Chemicals, Inc.
Cleveland Pigment & Color Co.
CR Minerals Corp.
Dry Branch Kaolin Company
DUR-O-Lite: CBC Paints and Coatings
ECC International
Engelhard Corp., Pigments & Additives
Engelhard Corp., Performance Additives
FRANKLIN INDUSTRIAL MINERALS
Fuji Silysia Chemical, Ltd.
Harborlite Corp., c/o World Minerals, Inc.
Harcros Pigments Inc.
Hitox Corp. of America
Intercorp., Inc.
J.M. Huber Corp., Engineered Minerals
K-T FELDSPAR CORP.
Landers-Segal Color Co., Inc.
Luzenac America
Malvern Minerals Co.
Millennium Inorganic Chemicals
Mississippi Lime Co.
North American Oxide LLC
NYCO® Minerals, Inc.
OMYA, Inc.
Polar Minerals, Inc.
Potters Industries, Inc.
The PQ Corp., Specialty Div.
PQ Corporation/ Potters Industries
Reade Advanced Materials
Rit-Chem Co., Inc.
Sachtleben Corp.
Silbrico Corp.
Sino-American Pigment Systems, Inc.
Technical Industries, Inc.
U.S. Silica Company
UNIMIN CORP.
United Mineral & Chemical Corp.
R.T. VANDERBILT CO., INC.
Wilkinson Kaolin Associates, Ltd.
Zemex Industrial Minerals

Aluminum Trihydrate

Alcoa Industrial Chemicals
Clarence Resins & Chemicals, Inc.
FRANKLIN INDUSTRIAL MINERALS
Hitox Corp. of America
J.M. Huber Corp., Engineered Minerals
Landers-Segal Color Co., Inc.

Barium Sulfate
(Barytes, Blanc Fixe)

Harcros Pigments Inc.
Hitox Corp. of America
J.M. Huber Corp., Engineered Minerals

Landers-Segal Color Co., Inc.
Polar Minerals, Inc.
Rit-Chem Co., Inc.
Sachtleben Corp.
Sino-American Pigment Systems, Inc.
Zemex Industrial Minerals

Barium Sulfate

Atomergic Chemetals Corp.
Cleveland Pigment & Color Co.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Hitox Corp. of America
J.M. Huber Corp., Engineered Minerals
Landers-Segal Color Co., Inc.
Polar Minerals, Inc.

Bentonite

Asbury Carbons, Inc.
Landers-Segal Color Co., Inc.

Calcium Carbonate

ECC International
FRANKLIN INDUSTRIAL MINERALS
J.M. Huber Corp., Engineered Minerals
Landers-Segal Color Co., Inc.
Mississippi Lime Co.
Olinger Co., Inc.
OMYA, Inc.
Polar Minerals, Inc.
United Mineral & Chemical Corp.

China Clay & Aluminum Silicate

Burgess Pigment Co.
Dry Branch Kaolin Company
ECC International
Engelhard Corp., Pigments & Additives
J.M. Huber Corp., Engineered Minerals
K-T FELDSPAR CORP.
Landers-Segal Color Co., Inc.
U.S. Silica Company
Wilkinson Kaolin Associates, Ltd.

Feldspar

K-T FELDSPAR CORP.
UNIMIN CORP.

Fillers

Burgess Pigment Co.
CR Minerals Corp.
Dry Branch Kaolin Company
DUR-O-Lite: CBC Paints and Coatings
ECC International
Engelhard Corp., Pigments & Additives
Harborlite Corp., c/o World Minerals, Inc.
Intercorp., Inc.
J.M. Huber Corp., Engineered Minerals
K-T FELDSPAR CORP.
Landers-Segal Color Co., Inc.
NYCO® Minerals, Inc.
Polar Minerals, Inc.
The PQ Corp., Specialty Div.
PQ Corporation/ Potters Industries
Reade Advanced Materials
Silbrico Corp.
U.S. Silica Company
UNIMIN CORP.
Zemex Industrial Minerals

Mica

Asbury Carbons, Inc.
Engelhard Corp., Performance Additives
Engelhard Corp., Pigments & Additives
FRANKLIN INDUSTRIAL MINERALS

Intercorp., Inc.
K-T FELDSPAR CORP.
 Landers-Segal Color Co., Inc.
 Polar Minerals, Inc.
 Zemex Industrial Minerals

Nepheline Syenite

Intercorp., Inc.
UNIMIN CORP.

Silica-Amorphous-Naturally Occurring

Clarence Resins & Chemicals, Inc.
 CR Minerals Corp.
 Landers-Segal Color Co., Inc.
UNIMIN CORP.

Silica-Amorphous-Synthetic

Celite Corp., c/o World Minerals, Inc.
 Fuji Silysia Chemical, Ltd.
 Millennium Inorganic Chemicals

Silica-Quartz and Diatomaceous

Celite Corp., c/o World Minerals, Inc.
 CR Minerals Corp.
 DUR-O-Lite: CBC Paints and Coatings
 Landers-Segal Color Co., Inc.
 Malvern Minerals Co.
 U.S. Silica Company
UNIMIN CORP.

Talc or Magnesium Silicate

Asbury Carbons, Inc.
 Celite Corp., c/o World Minerals, Inc.
 Engelhard Corp., Pigments & Additives
 Landers-Segal Color Co., Inc.
 Luzenac America
 Polar Minerals, Inc.
R.T. VANDERBILT CO., INC.
 Zemex Industrial Minerals

Misc. Extenders

Alcoa Industrial Chemicals
 Burgess Pigment Co.
 Cellulose Filler Factory
 Engelhard Corp., Pigments & Additives
 Intercorp., Inc.
 J.M. Huber Corp., Engineered Minerals
 Landers-Segal Color Co., Inc.
 Luzenac America
 North American Oxide LLC
 NYCO® Minerals, Inc.
 Polar Minerals, Inc.
 Potters Industries, Inc.
 The PQ Corp., Specialty Div.
 PQ Corporation/ Potters Industries
UNIMIN CORP.
R.T. VANDERBILT CO., INC.

Green Pigments

A.M.S.
 Aarbor International Corp.
 Alex Color Co.
 Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION
 Browning Chemical Corp.
 Cerdec Corp.
CIBA SPECIALTY CHEMICALS CORP., PIGMENTS
 Cleveland Pigment & Color Co.
 Cookson Matthey Pigments & Dispersions
 Daicolor-Pope, Inc.

Delta Colours
 Engelhard Corp., Pigments & Additives
 Ferro Corp.
 Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 Hitox Corp. of America
 O. Hommel Co.
 Hoover Color Corp.
 International Resources, Inc.
 Keystone Aniline Corp.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 Peer Chemical Corp.
 Pyosa, S.A. de C.V.
 Reade Advanced Materials
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
SARTOMER CO.
THE SHEPHERD COLOR CO.
 Sino-American Pigment Systems, Inc.
 Sun Chemical Corp.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.
 Zeneca Pigments & Additives

Chrome Green

Delta Colours
 Engelhard Corp., Pigments & Additives
 Landers-Segal Color Co., Inc.
 Pyosa, S.A. de C.V.
 Royale Pigments and Chemicals, Inc.

Chromium Oxide

Atomergic Chemetals Corp.
BAYER CORPORATION
 Cleveland Pigment & Color Co.
 Delta Colours
 Harcros Pigments Inc.
 Hoover Color Corp.
 Landers-Segal Color Co., Inc.
 Laporte Pigments
 Pyosa, S.A. DE C.V.
 Reade Advanced Materials
 Revelli Chemicals, Inc.

Complex Inorganic Color Pigments

BAYER CORPORATION
 Cerdec Corp.
 Cookson Matthey Pigments & Dispersions
 Ferro Corp.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 O. Hommel Co.
 Hoover Color Corp.
 Landers-Segal Color Co., Inc.
 Royale Pigments and Chemicals, Inc.
THE SHEPHERD COLOR CO.

Green PMA & PTA Toners/Lakes

Peer Chemical Corp.
 Royale Pigments and Chemicals, Inc.

Hydrated Chromium Oxide

United Mineral & Chemical Corp.

Phthalocyanine Green

Aarbor International Corp.
 Alex Color Co.
 Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION

Browning Chemical Corp.
CIBA SPECIALTY CHEMICALS CORP., PIGMENTS
 Cleveland Pigment & Color Co.
 Daicolor-Pope, Inc.
 Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 International Resources, Inc.
 Keystone Aniline Corp.
 Peer Chemical Corp.
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
SARTOMER CO.
 Sun Chemical Corp.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.
 Zeneca Pigments & Additives

Misc. Green Pigments

Delta Colours
 Engelhard Corp., Pigments & Additives
 Hitox Corp. of America
 Peer Chemical Corp.
 Sino-American Pigment Systems, Inc.
 Toyo Ink America, Inc.

Iron Oxide Pigments

A.M.S.
 Alex Color Co.
 Arizona Oxides L.L.C.
BASF CORP.
BAYER CORPORATION
 Clarence Resins & Chemicals, Inc.
 Cleveland Pigment & Color Co.
 Cookson Matthey Pigments & Dispersions
 Delta Colours
 Dynamic Color Solutions, Inc.
 Engelhard Corp., Pigments & Additives
 Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 Hitox Corp. of America
 Hoover Color Corp.
 KLF Hitek Co.
 Laporte Pigments
 Mapico Inc.
 Reade Advanced Materials
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.
 Sentry/Custom Services Corp.

Black Iron Oxide

Alex Color Co.
BAYER CORPORATION
 Cleveland Pigment & Color Co.
 Delta Colours
 Dynamic Color Solutions, Inc.
 Engelhard Corp., Pigments & Additives
 Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 Hoover Color Corp.
 KLF Hitek Co.
 Laporte Pigments
 Mapico Inc.
 Reade Advanced Materials
 Revelli Chemicals, Inc.
 Royale Pigments and Chemicals, Inc.

Burnt Sienna

Cleveland Pigment & Color Co.
 Engelhard Corp., Pigments & Additives

Hoover Color Corp.
Laporte Pigments
Sentry/Custom Services Corp.

Burnt Umber

BAYER CORPORATION
Cleveland Pigment & Color Co.
Dynamic Color Solutions, Inc.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Hoover Color Corp.
Laporte Pigments
Sentry/Custom Services Corp.

Indian Red

Hoover Color Corp.
KLF Hitek Co.
Laporte Pigments

Metallic Brown

BAYER CORPORATION
Harcros Pigments Inc.
Hoover Color Corp.
Laporte Pigments

Mineral Black

Hoover Color Corp.
KLF Hitek Co.

Ochre

BAYER CORPORATION
Cleveland Pigment & Color Co.
Delta Colours
Dynamic Color Solutions, Inc.
Engelhard Corp., Pigments & Additives
Hoover Color Corp.
Laporte Pigments
Sentry/Custom Services Corp.

Raw Sienna

Engelhard Corp., Pigments & Additives
Hoover Color Corp.
Laporte Pigments
Sentry/Custom Services Corp.

Raw Umber

Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Hoover Color Corp.
Laporte Pigments
Sentry/Custom Services Corp.

Red and Brown Iron Oxide-Natural

Alex Color Co.
BAYER CORPORATION
Cleveland Pigment & Color Co.
Delta Colours
Dynamic Color Solutions, Inc.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
Hitox Corp. of America
Hoover Color Corp.
KLF Hitek Co.
Laporte Pigments
Reade Advanced Materials
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.

Red and Brown Iron Oxide-Synthetic

Alex Color Co.
BASF CORP.

BAYER CORPORATION
Cleveland Pigment & Color Co.
Delta Colours
Dynamic Color Solutions, Inc.
Engelhard Corp., Pigments & Additives
Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
Hitox Corp. of America
Hoover Color Corp.
Laporte Pigments
Reade Advanced Materials
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.

Spanish Type Oxide

BAYER CORPORATION
Cleveland Pigment & Color Co.
Delta Colours
Harcros Pigments Inc.
Hoover Color Corp.
KLF Hitek Co.
Laporte Pigments

Van Dyke Brown

BAYER CORPORATION
Hoover Color Corp.
Laporte Pigments

Yellow Iron Oxide-Synthetic

BASF CORP.
BAYER CORPORATION
Cleveland Pigment & Color Co.
Delta Colours
Dynamic Color Solutions, Inc.
Harcros Pigments Inc.
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
Hoover Color Corp.
Laporte Pigments
Mapico Inc.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.

Misc. Iron Oxide Pigments

BAYER CORPORATION
Cookson Matthey Pigments & Dispersions
Delta Colours
Dynamic Color Solutions, Inc.
Harcros Pigments Inc.
Hoover Color Corp.
Laporte Pigments
Mapico Inc.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.

Metallic Flakes and Powdered Pigments

A.M.S.
Aarbor International Corp.
BASF CORP.
Crescent Bronze Powder Co., Inc.
DEGUSSA CORP.
Eagle Zinc Company
Eckart America
Kamin-Cable Corp.
KLF Hitek Co.
MD-Both Industries
Meadowbrook Co.
North American Oxide LLC
Potters Industries, Inc.
Purity Zinc Metals

Reade Advanced Materials
Revelli Chemicals, Inc.
REYNOLDS METALS CO., ALUMINUM POWDER AND PASTE DIV.
Royale Pigments and Chemicals, Inc.
SILBERLINE MFG. CO., INC.
Toyol America, Inc.
U.S. Bronze Powders, Inc.
U.S. Zinc, Gulf Reduction Div.
Zinc Corp. of America, Inc.

Aluminum Pastes-Leafling

Aarbor International Corp.
Crescent Bronze Powder Co., Inc.
Eckart America
Kamin-Cable Corp.
MD-Both Industries
Revelli Chemicals, Inc.
REYNOLDS METALS CO., ALUMINUM POWDER AND PASTE DIV.
Royale Pigments and Chemicals, Inc.
SILBERLINE MFG. CO., INC.
Toyol America, Inc.
U.S. Bronze Powders, Inc.

Aluminum Pastes-Nonleafing

Crescent Bronze Powder Co., Inc.
Eckart America
Kamin-Cable Corp.
MD-Both Industries
REYNOLDS METALS CO., ALUMINUM POWDER AND PASTE DIV.
Royale Pigments and Chemicals, Inc.
SILBERLINE MFG. CO., INC.
Toyol America, Inc.
U.S. Bronze Powders, Inc.

Aluminum Powders-Leafling

Crescent Bronze Powder Co., Inc.
Eckart America
Kamin-Cable Corp.
MD-Both Industries
Reade Advanced Materials
REYNOLDS METALS CO., ALUMINUM POWDER AND PASTE DIV.
Toyol America, Inc.
U.S. Bronze Powders, Inc.

Aluminum Powders-Nonleafing

Crescent Bronze Powder Co., Inc.
Eckart America
Kamin-Cable Corp.
MD-Both Industries
Reade Advanced Materials
REYNOLDS METALS CO., ALUMINUM POWDER AND PASTE DIV.
Toyol America, Inc.
U.S. Bronze Powders, Inc.

Gold Bronze Powders

Crescent Bronze Powder Co., Inc.
DEGUSSA CORP.
Eckart America
Kamin-Cable Corp.
MD-Both Industries
U.S. Bronze Powders, Inc.

Zinc Dust and Flakes

Eagle Zinc Company
Eckart America
Kamin-Cable Corp.
Meadowbrook Co.
North American Oxide LLC
Purity Zinc Metals
Reade Advanced Materials

U.S. Zinc, Gulf Reduction Div.
Zinc Corp. of America, Inc.

Misc. Metallic Flakes

BASF CORP.

Crescent Bronze Powder Co., Inc.
Eagle Zinc Company
Eckart America
Kamin-Cable Corp.
KLF Hitek Co.
MD-Both Industries
Meadowbrook Co.
Potters Industries, Inc.
Reade Advanced Materials
SILBERLINE MFG. CO., INC.
U.S. Bronze Powders, Inc.

Other Pigments

A.M.S.
AlliedSignal Inc., Specialty Chemicals
BASF CORP.
Cleveland Pigment & Color Co.
Consolidated Color Corp.
Crescent Bronze Powder Co., Inc.
Daicolor-Pope, Inc.
Day-Glo Color Corp.
EM INDUSTRIES, INC.
Engelhard Corp., Pigments & Additives
Hitox Corp. of America
HÜLS AMERICA INC.
Keystone Aniline Corp.
KLF Hitek Co.
Kowa American Corp.
Peer Chemical Corp.
Potters Industries, Inc.
Radiant Color
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
United Mineral & Chemical Corp.
Wayne Pigment Corp.

Iridescent

Crescent Bronze Powder Co., Inc.
Engelhard Corp., Pigments & Additives
Kowa American Corp.

Luminescent and Fluorescent

AlliedSignal Inc., Specialty Chemicals
Cleveland Pigment & Color Co.
Consolidated Color Corp.
Crescent Bronze Powder Co., Inc.
Daicolor-Pope, Inc.
Day-Glo Color Corp.
Engelhard Corp., Pigments & Additives
Keystone Aniline Corp.
Radiant Color
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
United Mineral & Chemical Corp.

Pearlescent

BASF CORP.
Crescent Bronze Powder Co., Inc.
EM INDUSTRIES, INC.
Engelhard Corp., Pigments & Additives
HÜLS AMERICA INC.
Kowa American Corp.
Royale Pigments and Chemicals, Inc.

Misc. Other Pigments

BASF CORP.
Crescent Bronze Powder Co., Inc.
Engelhard Corp., Pigments & Additives
Hitox Corp. of America
Keystone Aniline Corp.

KLF Hitek Co.
Peer Chemical Corp.
Potters Industries, Inc.
United Mineral & Chemical Corp.
Wayne Pigment Corp.

Pigment Dispersions (Aqueous)

ABCO Enterprises, Inc.
Alex Color Co.
Allo Colouring Co.
American Casein Co., Div. of Protein
Polymer Group
American Colors, Inc.
Apollo Colors, Inc.
BASF CORP.
BAYER CORPORATION
Cardinal Color & Chemical Inc.
CDI Dispersions
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Color Corporation of America
Consolidated Color Corp.
Cookson Matthey Pigments & Dispersions
Daicolor-Pope, Inc.
Daniel Products Co., Inc.
Day-Glo Color Corp.
DOMINION COLOUR CORPORATION
Ebonex Corporation
Engelhard Corp., Pigments & Additives
Genesis Dispersions Inc.
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
HÜLS AMERICA INC.
McWhorter Technologies
Microcolor Dispersions, Ltd.
MORTON INTERNATIONAL
NICHEM Corp.
Pan Chemical Corp.
Pyosa, S.A. DE C.V.
Radiant Color
RBH Dispersions, Inc.
Reichhold Chemicals, Inc.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sentry/Custom Services Corp.
Spectra Colors Corp.
Sun Chemical Corp.
Technical Industries, Inc.
Tikkurila & McWhorter CPS
Toyo Ink America, Inc.
Zeneca Pigments & Additives

Color Concentrates

Alex Color Co.
Allo Colouring Co.
BASF CORP.
Cardinal Color & Chemical Inc.
CDI Dispersions
Color Corporation of America
Consolidated Color Corp.
Daniel Products Co., Inc.
Ebonex Corporation
Engelhard Corp., Pigments & Additives
Genesis Dispersions Inc.
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
McWhorter Technologies
Microcolor Dispersions, Ltd.
NICHEM Corp.
Pan Chemical Corp.
Radiant Color
RBH Dispersions, Inc.
Sentry/Custom Services Corp.
Sun Chemical Corp.
Technical Industries, Inc.

Machine Colorants

Color Corporation of America
Daniel Products Co., Inc.
Engelhard Corp., Pigments & Additives
Genesis Dispersions Inc.
HÜLS AMERICA INC.
McWhorter Technologies
Microcolor Dispersions, Ltd.
Sentry/Custom Services Corp.

Press Cakes

Apollo Colors, Inc.
BASF CORP.
BAYER CORPORATION
Daicolor-Pope, Inc.
DOMINION COLOUR CORPORATION
Engelhard Corp. - Pigments & Additives
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
NICHEM Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Toyo Ink America, Inc.

Solvent-Soluble Dyes

NICHEM Corp.
Sentry/Custom Services Corp.
Spectra Colors Corp.

Tube Colorants

Color Corporation of America
Engelhard Corp., Pigments & Additives
Genesis Dispersions Inc.
HÜLS AMERICA INC.

Water Soluble

Alex Color Co.
Allo Colouring Co.
American Casein Co., Div. of Protein
Polymer Group
BAYER CORPORATION
Cardinal Color & Chemical Inc.
CDI Dispersions
Engelhard Corp., Pigments & Additives
Microcolor Dispersions, Ltd.
MORTON INTERNATIONAL
NICHEM Corp.
RBH Dispersions, Inc.
Sentry/Custom Services Corp.
Spectra Colors Corp.

Misc. Pigment Dispersions (Aqueous)

ABCO Enterprises, Inc.
Alex Color Co.
Allo Colouring Co.
American Colors, Inc.
BAYER CORPORATION
Cardinal Color & Chemical Inc.
CDI Dispersions
Color Corporation of America
Consolidated Color Corp.
Cookson Matthey Pigments & Dispersions
Day-Glo Color Corp.
Engelhard Corp., Pigments & Additives
Genesis Dispersions Inc.
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
MORTON INTERNATIONAL
NICHEM Corp.
Pan Chemical Corp.

Sentry/Custom Services Corp.
Sun Chemical Corp.
Technical Industries, Inc.

**Pigment Dispersions
(Non-Aqueous)**

Allo Colouring Co.
American Colors, Inc.
BAYER CORPORATION
Cardinal Color & Chemical Inc.
CDI Dispersions
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Color Corporation of America
Consolidated Color Corp.
Continental Dispersions, Inc.
Cookson Matthey Pigments & Dispersions
Daniel Products Co., Inc.
Day-Glo Color Corp.
Engelhard Corp., Pigments & Additives
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
**MORTON INTERNATIONAL
NICHEM Corp.**
O. Hommel Co.
Pan Chemical Corp.
Radiant Color
RBH Dispersions, Inc.
Reichhold Chemicals, Inc.
Tikkurila & McWhorter CPS
Toyo Ink America, Inc.

**Acrylic Vehicle
Pigment Dispersion**

American Colors, Inc.
Cardinal Color & Chemical Inc.
CDI Dispersions
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Consolidated Color Corp.
Daniel Products Co., Inc.
Day-Glo Color Corp.
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
**MORTON INTERNATIONAL
NICHEM Corp.**
Pan Chemical Corp.
Radiant Color
RBH Dispersions, Inc.
Toyo Ink America, Inc.

**Alkyd Vehicle
Pigment Dispersion**

American Colors, Inc.
Cardinal Color & Chemical Inc.
CDI Dispersions
Color Corporation of America
Consolidated Color Corp.
Continental Dispersions, Inc.
Cookson Matthey Pigments & Dispersions
Daniel Products Co., Inc.
Day-Glo Color Corp.
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
NICHEM Corp.
Pan Chemical Corp.
Radiant Color
RBH Dispersions, Inc.
Toyo Ink America, Inc.

**Nitrocellulose Vehicle
Pigment Dispersion**

Consolidated Color Corp.
Cookson Matthey Pigments & Dispersions
NICHEM Corp.

Pan Chemical Corp.
RBH Dispersions, Inc.
Toyo Ink America, Inc.

**Polyester Vehicle
Pigment Dispersion**

American Colors, Inc.
Cardinal Color & Chemical Inc.
CDI Dispersions
Consolidated Color Corp.
**MORTON INTERNATIONAL
NICHEM Corp.**
Pan Chemical Corp.
RBH Dispersions, Inc.
Toyo Ink America, Inc.

**Universal Solvent
Vehicle Dispersion**

American Colors, Inc.
Cardinal Color & Chemical Inc.
CDI Dispersions
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Color Corporation of America
Consolidated Color Corp.
Cookson Matthey Pigments & Dispersions
Engelhard Corp., Pigments & Additives
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
**MORTON INTERNATIONAL
NICHEM Corp.**
Pan Chemical Corp.
RBH Dispersions, Inc.

**Misc. Pigments
Dispersions (Non-Aqueous)**

Allo Colouring Co.
American Colors, Inc.
BAYER CORPORATION
Cardinal Color & Chemical Inc.
CDI Dispersions
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Color Corporation of America
Consolidated Color Corp.
Continental Dispersions, Inc.
Cookson Matthey Pigments & Dispersions
Day-Glo Color Corp.
Engelhard Corp., Pigments & Additives
O. Hommel Co.
HÜLS AMERICA INC.
Microcolor Dispersions, Ltd.
NICHEM Corp.
Pan Chemical Corp.
RBH Dispersions, Inc.
Toyo Ink America, Inc.

Red Pigments

A.M.S.
Aarbor International Corp.
Alex Color Co.
American Chemet Corp.
Apollo Colors, Inc.
Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION
Cerdec Corp.
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Cleveland Pigment & Color Co.
Cookson Matthey Pigments & Dispersions
Daicolor-Pope, Inc.
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives

Ferro Corp.
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
Hitox Corp. of America
Keystone Aniline Corp.
Millennium Inorganic Chemicals
Peer Chemical Corp.
Pyosa, S.A. DE C.V.
Reade Advanced Materials
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
SARTOMER CO.
Sino-American Pigment Systems, Inc.
Sun Chemical Corp.
Toyo Ink America, Inc.
Ulrich Color Company
United Mineral & Chemical Corp.
Zeneca Pigments & Additives

Alizarine or Madder Lake

Ulrich Color Company

Arylide Red and Maroon

DOMINION COLOUR CORPORATION
Pyosa, S.A. de C.V.

BON Red and Maroon

BASF CORP.
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Ulrich Color Company
United Mineral & Chemical Corp.

Cadmium Red

Atomergic Chemetals Corp.
Cerdec Corp.
Cookson Matthey Pigments & Dispersions
Engelhard Corp., Pigments & Additives
Millennium Inorganic Chemicals
SARTOMER CO.
United Mineral & Chemical Corp.

**Cadmium-Mercury Red, Maroon
& Orange**

Atomergic Chemetals Corp.
Cookson Matthey Pigments & Dispersions
Engelhard Corp., Pigments & Additives

Cuprous Oxide

American Chemet Corp.
Reade Advanced Materials
Revelli Chemicals, Inc.

Lithol Rubine

Aarbor International Corp.
Apollo Colors, Inc.
BAYER CORPORATION
Cleveland Pigment & Color Co.
Daicolor-Pope, Inc.
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
Keystone Aniline Corp.
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.

We're not playing around!

Morton takes its commitment to the Paint and Coatings industry seriously.

Our *pool* of products include 100% acrylics, styrene acrylics, acrylic urethanes and acrylic polyesters. Morton's unique formulations provide:

- Solid Resins with Narrow Molecular Weight Distribution
- Emulsions with Outstanding Gloss, Adhesion Flow & Leveling
- Polymers with Superior Pigment Dispersing Capabilities

Morton's R&D team always has its *ducks* in a row when developing waterborne polymers to meet challenging industry requirements.

So *dive* in and put our waterborne polymer team to work for you. We guarantee you'll find the water great!

Call us at 1-800-FOR-RESN, or contact us by fax at 312/807-3435.



100 N. Riverside Plaza, Chicago, IL 60606-1598

Stop and see us
at Booth #708
at the ICE show!



Circle No. 225 on the Reader Service Card

© 1997 Morton International, Inc.

Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Toyo Ink America, Inc.
Uhlich Color Company
United Mineral & Chemical Corp.
Zeneca Pigments & Additives

Metalized Azo Red

DOMINION COLOUR CORPORATION
Keystone Aniline Corp.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.

Naphthol Red

Aarbor International Corp.
Alex Color Co.
BASF CORP.
BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Cleveland Pigment & Color Co.
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
Keystone Aniline Corp.
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Toyo Ink America, Inc.
Uhlich Color Company
United Mineral & Chemical Corp.

***Para Red, Chlorinated
Paranitraniline Toner***

Alex Color Co.
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Engelhard Corp., Pigments & Additives
United Mineral & Chemical Corp.

Perylene Maroon

BASF CORP.
BAYER CORPORATION
Sun Chemical Corp.

Perylene Red

BAYER CORPORATION

Perylene Violet

BAYER CORPORATION
Sun Chemical Corp.

Pigment Scarlet

BAYER CORPORATION
Engelhard Corp., Pigments & Additives
Keystone Aniline Corp.
Sun Chemical Corp.
United Mineral & Chemical Corp.

Pyrazolone Red and Maroon

Engelhard Corp., Pigments & Additives
Keystone Aniline Corp.
Sun Chemical Corp.

Quinacridone Maroon

BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Engelhard Corp., Pigments & Additives

Sun Chemical Corp.
Uhlich Color Company

Quinacridone Red

BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Daicolor-Pope, Inc.
Engelhard Corp., Pigments & Additives

Quinacridone Violet

BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Daicolor-Pope, Inc.
Engelhard Corp., Pigments & Additives
Keystone Aniline Corp.

Red Lake C

Aarbor International Corp.
Alex Color Co.
Apollo Colors, Inc.
CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS
Cleveland Pigment & Color Co.
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP
Keystone Aniline Corp.
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Uhlich Color Company
United Mineral & Chemical Corp.

Rhodamine

Alex Color Co.
Engelhard Corp., Pigments & Additives
Keystone Aniline Corp.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
United Mineral & Chemical Corp.

***Sodium Lithol, Calcium Lithol,
and Barium Lithol Toner***

DOMINION COLOUR CORPORATION
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Sun Chemical Corp.
Toyo Ink America, Inc.
United Mineral & Chemical Corp.

Toluidine Red

Aarbor International Corp.
Alex Color Co.
Atomergic Chemetals Corp.
BASF CORP.
Cleveland Pigment & Color Co.
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sun Chemical Corp.
Uhlich Color Company

***Misc. Red & Maroon
Toners/Lakes***

Alex Color Co.

**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**

Cleveland Pigment & Color Co.
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
Hitox Corp. of America
Sino-American Pigment Systems, Inc.
Toyo Ink America, Inc.
Uhlich Color Company
United Mineral & Chemical Corp.

White Pigments

A.M.S.
American Chemet Corp.
BAYER CORPORATION
Browning Chemical Corp.
Clarence Resins & Chemicals, Inc.
Daicolor-Pope, Inc.
Delta Colours
DUR-O-Lite: CBC Paints and Coatings
Eagle Zinc Company
Engelhard Corp. - Pigments & Additives
Hitox Corp. of America
Intercorp., Inc.
Ishihara Corp. (U.S.A.)
Kemira Pigments Inc.
KERR-MCGEE CHEMICAL CORP.
Kronos, Inc.
Meadowbrook Co.
Millennium Inorganic Chemicals
North American Oxide LLC
Purity Zinc Metals
Reade Advanced Materials
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Sachtleben Corp.
Sino-American Pigment Systems, Inc.
Technical Industries, Inc.
Tiocide Americas Inc.
U.S. Zinc, Gulf Reduction Div.
United Mineral & Chemical Corp.
Zinc Corp. of America, Inc.
ZOCHEM, DIVISION OF HUDSON BAY

Antimony Oxide

Reade Advanced Materials
Revelli Chemicals, Inc.
United Mineral & Chemical Corp.

Titanium Dioxide-Anatase

Browning Chemical Corp.
Clarence Resins & Chemicals, Inc.
Engelhard Corp., Pigments & Additives
Ishihara Corp. (U.S.A.)
Kemira Pigments Inc.
Kronos, Inc.
Millennium Inorganic Chemicals
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Technical Industries, Inc.
Tiocide Americas Inc.
United Mineral & Chemical Corp.

Titanium Dioxide-Rutile

Clarence Resins & Chemicals, Inc.
Delta Colours
Engelhard Corp., Pigments & Additives
Hitox Corp. of America
Ishihara Corp. (U.S.A.)
Kemira Pigments Inc.
Kronos, Inc.
Millennium Inorganic Chemicals
Revelli Chemicals, Inc.
Royale Pigments and Chemicals, Inc.
Technical Industries, Inc.

Tioxide Americas Inc.
United Mineral & Chemical Corp.

Zinc Oxide

American Chemet Corp.
BAYER CORPORATION
Eagle Zinc Company
Meadowbrook Co.
North American Oxide LLC
Purity Zinc Metals
Reade Advanced Materials
Revelli Chemicals, Inc.
Technical Industries, Inc.
U.S. Zinc, Gulf Reduction Div.
United Mineral & Chemical Corp.
Zinc Corp. of America, Inc.
ZOCHEM, DIVISION OF HUDSON BAY

Zinc Sulfide

Sachtleben Corp.
Sino-American Pigment Systems, Inc.

Misc. White Pigments

Daicolor-Pope, Inc.
DUR-O-Lite: CBC Paints and Coatings
Engelhard Corp., Pigments & Additives
Intercorp., Inc.
Revelli Chemicals, Inc.
Sino-American Pigment Systems, Inc.

Yellow and Orange Pigments

A.M.S.
Aarbor International Corp.
Apollo Colors, Inc.
Atomergic Chemetals Corp.
BASF CORP.
BAYER CORPORATION
Cerdec Corp.
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Clarence Resins & Chemicals, Inc.
Cleveland Pigment & Color Co.
Cookson Matthey Pigments & Dispersions
Daicolor-Pope, Inc.
Delta Colours
DOMINION COLOUR CORPORATION
Eagle Zinc Company
Engelhard Corp., Pigments & Additives
Ferro Corp.
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
Hitox Corp. of America
Hoover Color Corp.
Ishihara Corp. (U.S.A.)
Keystone Aniline Corp.
Laporte Pigments
Meadowbrook Co.
Millennium Inorganic Chemicals
NICHEM Corp.
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
SARTOMER CO.
THE SHEPHERD COLOR CO.
Sino-American Pigment Systems, Inc.
Sun Chemical Corp.
Toyo Ink America, Inc.
Uhlich Color Company
United Mineral & Chemical Corp.
Wayne Pigment Corp.
Zeneca Pigments & Additives

Cadmium Yellow and Orange

Atomergic Chemetals Corp.
Cerdec Corp.

Cookson Matthey Pigments & Dispersions
Engelhard Corp., Pigments & Additives
Millennium Inorganic Chemicals
SARTOMER CO.
United Mineral & Chemical Corp.

Chrome Orange

Delta Colours
Engelhard Corp., Pigments & Additives
NICHEM Corp.
Pyosa, S.A. de C.V.
Wayne Pigment Corp.

Chrome Yellow

Clarence Resins & Chemicals, Inc.
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
Ishihara Corp. (U.S.A.)
Laporte Pigments
NICHEM Corp.
Pyosa, S.A. de C.V.
Revelli Chemicals, Inc.
Wayne Pigment Corp.

**Complex Inorganic
Color Pigments**

BAYER CORPORATION
Cerdec Corp.
Cookson Matthey Pigments & Dispersions
Engelhard Corp., Pigments & Additives
Ferro Corp.

**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
Hoover Color Corp.
NICHEM Corp.
THE SHEPHERD COLOR CO.
Sino-American Pigment Systems, Inc.
United Mineral & Chemical Corp.

Diarylide Orange Toner

Aarbor International Corp.
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
NICHEM Corp.
Peer Chemical Corp.
Pyosa, S.A. de C.V.
Sino-American Pigment Systems, Inc.
Sun Chemical Corp.
United Mineral & Chemical Corp.


Diarylide Yellow Toner

Aarbor International Corp.
Apollo Colors, Inc.
BASF CORP.
**CIBA SPECIALTY CHEMICALS CORP.,
PIGMENTS**
Daicolor-Pope, Inc.
Delta Colours
DOMINION COLOUR CORPORATION
Engelhard Corp., Pigments & Additives
**HEUCOTECH LTD. A N.J. LIMITED
PARTNERSHIP**
NICHEM Corp.
Peer Chemical Corp.

NEW TOOLS
from Sartomer

M-Cure® Resins

Upgrade the performance properties of
two-part Adhesives, Sealants, and Coatings



SARTOMER

M-Cure resins are acrylate-based monomers which are used as both reactive diluents and modifiers for two-part amine-cured coatings, adhesives, and sealants. Conventional amine curatives react with the acrylate monomers via Michael addition to afford tough, cross-linked thermoset polymers. When M-Cure resins are blended with conventional epoxy resins such as Diglycidyl Ether of Bisphenol A, the following properties are obtained:

- Viscosity reduction without a loss in reactivity
- Low temperature curing with reduced amine blush
- Improved wetting and rapid tack-free cure of thin films

Try M-Cure resins in your application.

Call for samples or technical assistance.
1-800-SARTOMER (1-800-727-8663)

© 1997 SARTOMER Company, Inc., a member of Total group

Circle No. 153 on Reader Service Card

Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Sun Chemical Corp.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.
 Zeneca Pigments & Additives

Hansa Yellow

Aarbor International Corp.
BASF CORP.
 Cleveland Pigment & Color Co.
 Delta Colours
DOMINION COLOUR CORPORATION
 Engelhard Corp., Pigments & Additives
HEUCOTECH LTD. A N.J. LIMITED PARTNERSHIP
 NICHEM Corp.
 Peer Chemical Corp.
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Sino-American Pigment Systems, Inc.
 Sun Chemical Corp.
 United Mineral & Chemical Corp.

Metallized Azo Yellow

BAYER CORPORATION
DOMINION COLOUR CORPORATION
 Engelhard Corp., Pigments & Additives
 Keystone Aniline Corp.
 Sino-American Pigment Systems, Inc.

Molybdate Orange

Delta Colours
DOMINION COLOUR CORPORATION
 Engelhard Corp., Pigments & Additives
 Keystone Aniline Corp.
 NICHEM Corp.
 Pyosa, S.A. de C.V.
 Revelli Chemicals, Inc.
 Wayne Pigment Corp.

Orthonitraniline Orange, Dinitraniline Orange

Aarbor International Corp.
 Eagle Zinc Company
 Engelhard Corp., Pigments & Additives
 Meadowbrook Co.
 NICHEM Corp.
 Pyosa, S.A. de C.V.
 United Mineral & Chemical Corp.

Misc. Yellow and Orange Toners/Lakes

BASF CORP.
DOMINION COLOUR CORPORATION
 Engelhard Corp., Pigments & Additives
 Peer Chemical Corp.
 United Mineral & Chemical Corp.

Misc. Yellow Pigments

BASF CORP.
BAYER CORPORATION
CIBA SPECIALTY CHEMICALS CORP., PIGMENTS
 Cleveland Pigment & Color Co.
 Delta Colours
DOMINION COLOUR CORPORATION
 Engelhard Corp., Pigments & Additives
 Hitox Corp. of America
 Ishihara Corp. (U.S.A.)
 Keystone Aniline Corp.
 Peer Chemical Corp.
 Revelli Chemicals, Inc.

Sino-American Pigment Systems, Inc.
 Sun Chemical Corp.
 Toyo Ink America, Inc.
 Uhlich Color Company
 United Mineral & Chemical Corp.
 Zeneca Pigments & Additives

Resins

Acrylic Resins

Accurez Corp.
 ADM Tronics, Inc.
AKZO NOBEL RESINS
 Allied Colloids, Inc.
 Anderson Development Co.
 Ashland Chemical Co., IC&S Div.
BASF CORP., COATINGS RAW MATERIALS DIV.
BAYER CORPORATION
 Chemicals Incorporated
 CCP
 CPS Chemical Company, Inc.
 CYRO, Inc.
 Dianal America Inc.
 Dock Resins Corp.
 The Dow Chemical Co., Emulsions Polymers Div.
 Engineered Polymer Solutions, Inc.
 Estron Chemical, Inc.
 H.B. Fuller Co.
 BFGoodrich Co., Coatings Div.
 The Goodyear Tire & Rubber Co.
 SC Johnson Polymer
 Lawter International
 McWhorter Technologies
 Mitsubishi Chemical America
MORTON INTERNATIONAL
 Nacan Products Ltd.
 R.I.T.A. Corp.
 Reichhold Chemicals, Inc.
 Scott Bader, Inc.
 Sequa Chemical, Inc.
 Shell Chemical Co.
 StanChem Inc.
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 U.S. Polymers, Inc.
 United Mineral & Chemical Corp.
 Vianova Resins Inc.
 Zeneca Resins

Polymer Emulsion

ADM Tronics, Inc.
AKZO NOBEL RESINS
 Allied Colloids, Inc.
BASF CORP., COATINGS RAW MATERIALS DIV.
 Dock Resins Corp.
 The Dow Chemical Co., Emulsions Polymers Div.
 Engineered Polymer Solutions, Inc.
 H.B. Fuller Co.
 BFGoodrich Co., Coatings Div.
 SC Johnson Polymer
 McWhorter Technologies
 Nacan Products Ltd.
 Scott Bader, Inc.
 Sequa Chemical, Inc.
 StanChem Inc.
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 Zeneca Resins

Solid

Allied Colloids, Inc.
 Anderson Development Co.

CPS Chemical Company, Inc.
 Dianal America Inc.
 Estron Chemical, Inc.
 BFGoodrich Co., Coatings Div.
 SC Johnson Polymer
 Lawter International
 Zeneca Resins

Solution

Accurez Corp.
AKZO NOBEL RESINS
 Allied Colloids, Inc.
 Anderson Development Co.
BAYER CORPORATION
 CCP
 CPS Chemical Company, Inc.
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 BFGoodrich Co., Coatings Div.
 SC Johnson Polymer
 Lawter International
 McWhorter Technologies
MORTON INTERNATIONAL
 Scott Bader, Inc.
 Sequa Chemical, Inc.
 Shell Chemical Co.
 Texas Resin Co.
 U.S. Polymers, Inc.
 Vianova Resins Inc.
 Zeneca Resins

Water-Reducible

ADM Tronics, Inc.
AKZO NOBEL RESINS
 Allied Colloids, Inc.
 CCP
 Dianal America Inc.
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 BFGoodrich Co., Coatings Div.
 The Goodyear Tire & Rubber Co.
 Lawter International
 McWhorter Technologies
 Shell Chemical Co.
 Texas Resin Co.
 Vianova Resins Inc.
 Zeneca Resins

Misc. Acrylic Resins

ADM Tronics, Inc.
AKZO NOBEL RESINS
 Anderson Development Co.
 CPS Chemical Company, Inc.
 CYRO, Inc.
 Dianal America Inc.
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 BFGoodrich Co., Coatings Div.
 The Goodyear Tire & Rubber Co.
 McWhorter Technologies
MORTON INTERNATIONAL
 Nacan Products Ltd.
 Scott Bader, Inc.
 Sequa Chemical, Inc.
 Shell Chemical Co.
 StanChem Inc.
 Texas Resin Co.
 United Mineral & Chemical Corp.
 Zeneca Resins

Alkyd Resins

Accurez Corp.
AKZO NOBEL RESINS
 Arakawa Chemical (USA) Inc.
 Ashland Chemical Co., IC&S Div.
 CCP

The Chemical Co.
 Clarence Resins & Chemicals, Inc.
 Cytec Industries, Inc.
 Degen Oil and Chemical
 Dock Resins Corp.
 Empire State Varnish Co., Inc.
 Engineered Polymer Solutions, Inc.
 International Resources, Inc.
 Lawter International
 McWhorter Technologies
 Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
 Reichhold Chemicals, Inc.
 Schenectady International, Inc., Polymer
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 U.S. Polymers, Inc.
 Vianova Resins Inc.
 Zeneca Resins

Alkyd & Oil Copolymers

Accurez Corp.
AKZO NOBEL RESINS
 CCP
 Degen Oil and Chemical
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 McWhorter Technologies
 Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
 Schenectady International, Inc., Polymer
 Texas Resin Co.
 U.S. Polymers, Inc.
 Vianova Resins Inc.

Drying Oil-Modified

Accurez Corp.
AKZO NOBEL RESINS
 CCP
 Degen Oil and Chemical
 Empire State Varnish Co., Inc.
 Engineered Polymer Solutions, Inc.
 Lawter International
 McWhorter Technologies
 Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
 Schenectady International, Inc., Polymer
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 U.S. Polymers, Inc.

Modified with Other Resins

Accurez Corp.
AKZO NOBEL RESINS
 CCP
 Degen Oil and Chemical
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 McWhorter Technologies
 Ohio Polychemical Co.
 Schenectady International, Inc., Polymer
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 U.S. Polymers, Inc.
 Vianova Resins Inc.

**Nondrying & Semi-Oxidizing,
 Oil-Modified**

Accurez Corp.
AKZO NOBEL RESINS
 CCP
 Degen Oil and Chemical
 Engineered Polymer Solutions, Inc.
 McWhorter Technologies
RANBAR TECHNOLOGY, INC.

Texas Resin Co.
 U.S. Polymers, Inc.

Thixotropic

Accurez Corp.
AKZO NOBEL RESINS
 Clarence Resins & Chemicals, Inc.
 McWhorter Technologies
 U.S. Polymers, Inc.
 Vianova Resins Inc.

Water-Reducible

Accurez Corp.
AKZO NOBEL RESINS
 CCP
 Dock Resins Corp.
 Engineered Polymer Solutions, Inc.
 Lawter International
 McWhorter Technologies
 Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
 Schenectady International, Inc., Polymer
 Texas Resin Co.
 U.S. Polymers, Inc.
 Vianova Resins Inc.
 Zeneca Resins

Misc. Alkyd Resins

Accurez Corp.
AKZO NOBEL RESINS
 The Chemical Co.
 Dock Resins Corp.

Engineered Polymer Solutions, Inc.
 International Resources, Inc.
 Lawter International
 McWhorter Technologies
 Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
 Texas Resin Co.
 Thibaut & Walker Co., Inc.
 U.S. Polymers, Inc.
 Vianova Resins Inc.

Amino Resins


AKZO NOBEL RESINS
 American Casein Co., Div. of Protein
 Polymer Group
BORDEN INC.
 Cytec Industries, Inc.
 Dock Resins Corp.
 DSM Resins U.S., Inc.
GENESEE POLYMERS CORP.
 McWhorter Technologies
 Mitsubishi Chemical America
 Reichhold Chemicals, Inc.
 Sequa Chemical, Inc.
 Solutia Inc.
 Vianova Resins Inc.

Bitumens

Clarence Resins & Chemicals, Inc.

Cellulose Derivatives

Aceto Corporation



BORDEN CHEMICAL INC.
 114 Industrial Blvd.
 Morganton, North Carolina 28655
 Phone: (704) 584-3800
 Fax: (704) 584-3885

TO IMPROVE:

- CURE RESPONSE
- ABRASION RESISTANCE
- SOLVENT RESISTANCE

Borden's Amino Crosslinkers

Alkylated Melamine Resins

Alkylated Urea Resins

Cyclic Urea Resins

For Your Industrial Coating Needs!

Circle No. 194 on Reader Service Card

Atomergic Chemetals Corp.
Eastman Chemical Co.
HERCULES INCORPORATED, AQUALON DIV.

Epoxy Hardeners-Chemicals

Cardolite Corp.
Dock Resins Corp.
Estron Chemical, Inc.
Hardman, a Div. of the Harcross Chemical, Inc.

HENKEL CORP.
HÜLS AMERICA INC.

Industrial Copolymers Ltd.
International Resources, Inc.
Lonza, Inc. Specialty Anhydride—Additives
Royce Associates
Royce International
SKW Chemicals, Inc.
United Mineral & Chemical Corp.
Vianova Resins Inc.

Epoxy Resins

Accurez Corp.
AIR PRODUCTS & CHEMICALS, INC.
AKZO NOBEL RESINS

Ashland Chemical Co., IC&S Div.
Cardolite Corp.
Clarence Resins & Chemicals, Inc.
CCP

CPS Chemical Company, Inc.
CVC Specialty Chemicals, Inc.
Cytec Industries, Inc.
Daubert Chemical Co., Inc.
DSM Resins U.S., Inc.
Empire State Varnish Co., Inc.
Engineered Polymer Solutions, Inc.

Farboil Co.
GCA Corp.

GENESEE POLYMERS CORP.
Hardman, a Div. of the Harcross Chemical, Inc.

HENKEL CORP.
K & S Industries Ltd.
Lonza, Inc. Specialty Anhydride—Additives
McWhorter Technologies
Nagase America Corp.
Ohio Polychemical Co.
Phenoxy Specialties

RANBAR TECHNOLOGY, INC.

Reichhold Chemicals, Inc.
Royce Associates
Royce International
SEMico Corp.
Sentry/Custom Services Corp.
Shell Chemical Co.
U.S. Polymers, Inc.
Union Carbide Corp.
United Mineral & Chemical Corp.
Vianova Resins Inc.

Ester

Accurez Corp.
AKZO NOBEL RESINS
CCP
CPS Chemical Company, Inc.
DSM Resins U.S., Inc.
Empire State Varnish Co., Inc.
Engineered Polymer Solutions, Inc.
K & S Industries Ltd.

McWhorter Technologies
Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.

Royce Associates
Royce International
U.S. Polymers, Inc.

Union Carbide Corp.
United Mineral & Chemical Corp.

Liquid

CVC Specialty Chemicals, Inc.
Daubert Chemical Co., Inc.
K & S Industries Ltd.
Nagase America Corp.
Royce Associates
Royce International
Shell Chemical Co.
Union Carbide Corp.
United Mineral & Chemical Corp.
Vianova Resins Inc.

Solid

GCA Corp.
K & S Industries Ltd.
Phenoxy Specialties
Royce Associates
Royce International
Shell Chemical Co.
United Mineral & Chemical Corp.

Solution

CVC Specialty Chemicals, Inc.
Daubert Chemical Co., Inc.
Engineered Polymer Solutions, Inc.
K & S Industries Ltd.
McWhorter Technologies
Royce Associates
Royce International
Shell Chemical Co.
Union Carbide Corp.
United Mineral & Chemical Corp.
Vianova Resins Inc.

Water-Based

AKZO NOBEL RESINS

Cardolite Corp.
Daubert Chemical Co., Inc.
HENKEL CORP.
K & S Industries Ltd.
Nagase America Corp.
Royce Associates
Royce International
Shell Chemical Co.
Union Carbide Corp.
Vianova Resins Inc.

Misc. Epoxy Resins

Clarence Resins & Chemicals, Inc.
CPS Chemical Company, Inc.
CVC Specialty Chemicals, Inc.
Cytec Industries, Inc.
Daubert Chemical Co., Inc.
GENESEE POLYMERS CORP.
K & S Industries Ltd.
Lonza, Inc. Specialty Anhydride—Additives
McWhorter Technologies
Nagase America Corp.
Royce Associates
Royce International
SEMico Corp.
Shell Chemical Co.
United Mineral & Chemical Corp.

Ester Gums

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
Empire State Varnish Co., Inc.
HENKEL CORP.
International Paper Arizona Chemical Div.

Solid

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
International Paper Arizona Chemical Div.

Solution

Arakawa Chemical (USA) Inc.
Empire State Varnish Co., Inc.
HENKEL CORP.

High-Solid Resins

Accurez Corp.
AKZO NOBEL RESINS
BAYER CORPORATION
CCP
Cytec Industries, Inc.
Dock Resins Corp.
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
Georgia-Pacific Resins, Inc.
K & S Industries Ltd.
Lawter International
McWhorter Technologies
MORTON INTERNATIONAL
Occidental Chemical Corp.
Phenoxy Specialties
Reichhold Chemicals, Inc.
Shell Chemical Co.
Solutia Inc.
Texas Resin Co.
U.S. Polymers, Inc.
Union Carbide Corp.
Vianova Resins Inc.

Hybrid Resins

Anderson Development Co.
Dock Resins Corp.
Farboil Co.
Mace Adhesives & Coatings Co.
Reichhold Chemicals, Inc.

Hydrocarbon Resins

American Gilsonite Co.
Arakawa Chemical (USA) Inc.
Clarence Resins & Chemicals, Inc.
Empire State Varnish Co., Inc.
Focus Chemical Corp.
The Goodyear Tire & Rubber Co.
Kinetics Corp.
Lawter International
Revelli Chemicals, Inc.
Rit-Chem Co., Inc.
SARTOMER CO.
Wabash Gilsonite Blends, Inc.

Emulsion

Arakawa Chemical (USA) Inc.

Liquid/Solution

Arakawa Chemical (USA) Inc.
Empire State Varnish Co., Inc.
Lawter International
Wabash Gilsonite Blends, Inc.

Solid

American Gilsonite Co.
Arakawa Chemical (USA) Inc.
Lawter International
Revelli Chemicals, Inc.
SARTOMER CO.

Terpene

Aerocote Corp.

Arakawa Chemical (USA) Inc.
Clarence Resins & Chemicals, Inc.

Misc. Hydrocarbon Resins

American Gilsonite Co.
Arakawa Chemical (USA) Inc.
Clarence Resins & Chemicals, Inc.
Focus Chemical Corp.
The Goodyear Tire & Rubber Co.
Lawter International
Revelli Chemicals, Inc.
Rit-Chem Co., Inc.

Maleic Resins

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
Ashland Chemical Co., IC&S Div.
Baker Petrolite, Polymers Div.
BAYER CORPORATION
The Chemical Co.
Clarence Resins & Chemicals, Inc.
Elf ATOCHEM North America, Inc.
International Paper, Arizona Chemical Div.
Kinetics Corp.
Lawter International
Lonza, Inc. Specialty Anhydride-Additives
Mitsubishi Chemical America

Solid

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
Baker Petrolite, Polymers Div.
BAYER CORPORATION
Clarence Resins & Chemicals, Inc.
International Paper, Arizona Chemical Div.
Kinetics Corp.
Lawter International

Solution

Baker Petrolite, Polymers Div.
International Paper, Arizona Chemical Div.
Kinetics Corp.

Melamine & Melamine Type Resins

AKZO NOBEL RESINS
BORDEN INC.
The Chemical Co.
Cytec Industries, Inc.
GENESEEE POLYMERS CORP.
Lonza, Inc. Specialty Anhydride-Additives
McWhorter Technologies
Mitsubishi Chemical America
Sentry/Custom Services Corp.
Sequa Chemical, Inc.
Solutia Inc.
StanChem Inc.
Vianova Resins Inc.

Methacrylic Monomers & Polymers

Elf ATOCHEM North America, Inc.
GENESEEE POLYMERS CORP.
HÜLS AMERICA INC.
San Esters Corp.
United Mineral & Chemical Corp.

Misc. Type Resins

AKZO NOBEL INC., RESIN DIV.
American Casein Co., Div. of Protein
Polymer Group
BAYER CORPORATION
Chemcor
Clarence Resins & Chemicals, Inc.

Condea Vista Co.
Dock Resins Corp.
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
GENESEEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
International Resources, Inc.
Lonza, Inc. Specialty Anhydride-Additives
Lorama Chemicals, Inc.
McWhorter Technologies
Ohio Polychemical Co.
Pelmor Laboratories, Inc., Liquid Products
Phenoxy Specialties
StanChem Inc.
Union Carbide Corp.
Vianova Resins Inc.
Wabash Gilsonite Blends, Inc.

Solid

DSM Resins U.S., Inc.
International Resources, Inc.
Phenoxy Specialties

Liquid & Solution

DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
Lorama Chemicals, Inc.
McWhorter Technologies
Phenoxy Specialties
Union Carbide Corp.
Wabash Gilsonite Blends, Inc.

Emulsion

Chemcor
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
GENESEEE POLYMERS CORP.
McWhorter Technologies
Phenoxy Specialties
StanChem Inc.
Union Carbide Corp.
Vianova Resins Inc.

Water-Reducible

AKZO NOBEL INC., RESIN DIV.
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
GENESEEE POLYMERS CORP.
Lorama Chemicals, Inc.
McWhorter Technologies
Ohio Polychemical Co.
Union Carbide Corp.
Vianova Resins Inc.

Waterborne Vinyl Chloride Acetate Copolymer Dispersion

Union Carbide Corp.

Natural Resins

AKZO NOBEL INC., RESIN DIV.
American Casein Co., Div. of Protein
Polymer Group
American Gilsonite Co.

THE SOURCE

FOR VEGETABLE OIL

CASTOR OIL PRODUCTS

Castor oil #1 • Pale pressed castor • Blown castors
Hydro castor wax • 12 hydroxy stearic • Ricinoleic acid

DRYING OILS

Tung oil • Linseed oils • Oiticica oil • Dehydrated castor
Dehydrated castor fatty acids

COCONUT OILS

Crude coconut • Cochin coconut
Refined 76° coconut • Hydrogenated coconut

SOY AND PALM OILS

Soy salad oil • RB soy oil • Hydrogenated soybean oil
RBD Palm oil • Palm kernel



ALNOR OIL

COMPANY, INC.

70 East Sunrise Highway, Suite 418, Valley Stream, New York 11581
(516) 561-6146 Fax (516) 561-6123 Telex RCA 221512

CALL OR SEND FOR OUR FREE FULL-LINE BROCHURE

Circle No. 129 on Reader Service Card

Arakawa Chemical (USA) Inc.
Clarence Resins & Chemicals, Inc.
Lonza, Inc. Specialty Anhydride—Additives
Lorama Chemicals, Inc.
Mantrose Bradshaw Zinsser Group
P.L. Thomas & Co., Inc.

Nitrocellulose

HERCULES INCORPORATED - AQUALON

Sentry/Custom Services Corp.
Vanguard Chemical International Inc.

Nylon Resins

BAYER CORPORATION

Oleo-resinous Varnishes

Accurez Corp.
Arakawa Chemical (USA) Inc.
CCP
The Chemical Co.
Chemicals Incorporated
Degen Oil and Chemical
Empire State Varnish Co., Inc.
Engineered Polymer Solutions, Inc.
BFGoodrich Co., Coatings Div.
Lawter International
McWhorter Technologies
U.S. Polymers, Inc.

Modified Phenolic

Accurez Corp.
Arakawa Chemical (USA) Inc.
The Chemical Co.
Chemicals Incorporated
Degen Oil and Chemical
Empire State Varnish Co., Inc.
Engineered Polymer Solutions, Inc.
Lawter International
McWhorter Technologies
U.S. Polymers, Inc.

Phenolic

Accurez Corp.
Arakawa Chemical (USA) Inc.
The Chemical Co.
Chemicals Incorporated
Degen Oil and Chemical
Empire State Varnish Co., Inc.
Engineered Polymer Solutions, Inc.
Lawter International
U.S. Polymers, Inc.

Phenolic Free

Accurez Corp.
Degen Oil and Chemical
Empire State Varnish Co., Inc.
Lawter International
U.S. Polymers, Inc.

Phenolic Resins

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
Ashland Chemical Co., IC&S Div.
The Chemical Co.
Chemicals Incorporated
Clarence Resins & Chemicals, Inc.
Cytec Industries, Inc.
DSM Resins U.S., Inc.
Focus Chemical Corp.
Georgia-Pacific Resins, Inc.
International Paper, Arizona Chemical Div.
Lawter International
Lonza, Inc. Specialty Anhydride—Additives

Mitsubishi Chemical America
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vanguard Chemical International Inc.
Vianova Resins Inc.

Modified for Powder Coatings

The Chemical Co.
Chemicals Incorporated
Lawter International
Lonza, Inc. Specialty Anhydride—Additives
Occidental Chemical Corp.

Polyamide

Chemicals Incorporated
Lonza, Inc. Specialty Anhydride—Additives

Solid

Arakawa Chemical (USA) Inc.
The Chemical Co.
Chemicals Incorporated
Clarence Resins & Chemicals, Inc.
Georgia-Pacific Resins, Inc.
International Paper, Arizona Chemical Div.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer

Solution

The Chemical Co.
Georgia-Pacific Resins, Inc.
International Paper, Arizona Chemical Div.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vianova Resins Inc.

Pure

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
The Chemical Co.
Clarence Resins & Chemicals, Inc.
Focus Chemical Corp.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vanguard Chemical International Inc.
Vianova Resins Inc.

Heat Hardening-Solid

Arakawa Chemical (USA) Inc.
The Chemical Co.
Clarence Resins & Chemicals, Inc.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vianova Resins Inc.

Heat Hardening-Solution & Dispersion

The Chemical Co.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vianova Resins Inc.

Heat Reactive-Solid

Arakawa Chemical (USA) Inc.
The Chemical Co.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer
Vianova Resins Inc.

Nonheat Hardening-Solid

The Chemical Co.

Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer

Nonheat Hardening-Solution

The Chemical Co.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Schenectady International, Inc., Polymer

Misc. Phenolic Resins

AKZO NOBEL INC., RESIN DIV.
The Chemical Co.
Clarence Resins & Chemicals, Inc.
Cytec Industries, Inc.
Focus Chemical Corp.
Georgia-Pacific Resins, Inc.
Occidental Chemical Corp.
Vanguard Chemical International Inc.
Vianova Resins Inc.

Phenoxy Resins

K & S Industries Ltd.
Phenoxy Specialties

Polyamide Resins

BAYER CORPORATION
Cytec Industries, Inc.
Elf ATOCHEM North America, Inc.
HÜLS AMERICA INC.
K & S Industries Ltd.
Lawter International
Lonza, Inc. Specialty Anhydride—Additives
Mitsubishi Chemical America
Rhône-Poulenc, Inc.
Sequa Chemical, Inc.
Vianova Resins Inc.

Polybutenes

Elf ATOCHEM North America, Inc.
Focus Chemical Corp.
Mitsubishi Chemical America

Polyester Resins

Accurez Corp.
AKZO NOBEL RESINS
Ashland Chemical Co., IC&S Div.
BAYER CORPORATION
CCP
The Chemical Co.
DSM Resins U.S., Inc.
Elf ATOCHEM North America, Inc.
Engineered Polymer Solutions, Inc.
Estron Chemical, Inc.
Farboil Co.
HÜLS AMERICA INC.
Lawter International
McWhorter Technologies
Mitsubishi Chemical America
Ohio Polychemical Co.
RANBAR TECHNOLOGY, INC.
Reichhold Chemicals, Inc.
Ruco Polymer Corp.
Shell Chemical Co.
Texas Resin Co.
U.S. Polymers, Inc.
Vianova Resins Inc.
Zeneca Resins

Drying

Engineered Polymer Solutions, Inc.
Lawter International

AFFLAIR LUSTRE PIGMENTS

Guilty On All Counts!

- Metallic effects in water based systems
- Adding new luster to powder coatings
- Enhancing product appearance
- Non-toxic
- Heat stable
- Light fast
- Non-reactive
- Non-arcing
- Weather resistant
- Laboratory tested
- Easy to use



For most coatings applications: water based, powder, coil and others, AFFLAIR® Lustre Pigments give you beautiful metallic effects without the problems associated with metallic-flake pigments. Here is the fundamental ingredient to make finishes glow with an iridescent mystique. From satin sheens to radiant sparkles, in a panorama of colors, the evidence proves that AFFLAIR® Lustre Pigments add the essential difference to your surface coatings. Call our Pigments Division at (914) 592-4660 for the facts.

EM INDUSTRIES, INC.



5 Skyline Drive
Hawthorne, NY 10532
(914) 592-4660
FAX: (914) 592-9469

AFFLAIR® is a registered name of EM Industries, Inc.
An Associate of E. Merck, Darmstadt, West Germany. © 1989 EM Industries, Inc.

Circle No. 148 on the Reader Service Card

Non-Drying

AKZO NOBEL RESINS
BAYER CORPORATION
Engineered Polymer Solutions, Inc.
Lawter International
Vianova Resins Inc.

Oil-Free

AKZO NOBEL RESINS
BAYER CORPORATION
CCP
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
Lawter International
McWhorter Technologies
Ohio Polychemical Co.
Texas Resin Co.
Vianova Resins Inc.

Saturated

Accurez Corp.
AKZO NOBEL RESINS
BAYER CORPORATION
CCP
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
HÜLS AMERICA INC.
Lawter International
McWhorter Technologies
RANBAR TECHNOLOGY, INC.
Ruco Polymer Corp.
Shell Chemical Co.
Texas Resin Co.
U.S. Polymers, Inc.
Vianova Resins Inc.

Solid

DSM Resins U.S., Inc.
Lawter International

Unsaturated

BAYER CORPORATION
CCP
The Chemical Co.
HÜLS AMERICA INC.
McWhorter Technologies

Water-Reducible

AKZO NOBEL RESINS
BAYER CORPORATION
CCP
DSM Resins U.S., Inc.
Engineered Polymer Solutions, Inc.
Lawter International
McWhorter Technologies
RANBAR TECHNOLOGY, INC.
Ruco Polymer Corp.
Texas Resin Co.
Vianova Resins Inc.

Misc. Polyester Resins

The Chemical Co.
DSM Resins U.S., Inc.
Elf ATOCHEM North America, Inc.
Engineered Polymer Solutions, Inc.
Estron Chemical, Inc.
HÜLS AMERICA INC.
Lawter International
McWhorter Technologies
Ruco Polymer Corp.
Shell Chemical Co.
Texas Resin Co.
Vianova Resins Inc.

Polyethylene Resins

Ashland Chemical Co., IC&S Div.
Mitsubishi Chemical America
R.I.T.A. Corp.
Union Carbide Corp.

Polypropylene Resins

Aristech Chemical Corp.
Mitsubishi Chemical America
Union Carbide Corp.

Polysaccharide Resins

Lorama Chemicals, Inc.

Rosin Esters

AKZO NOBEL INC., RESIN DIV.
Arakawa Chemical (USA) Inc.
The Chemical Co.
Clarence Resins & Chemicals, Inc.
Focus Chemical Corp.
Georgia-Pacific Resins, Inc.
International Paper, Arizona Chemical Div.
K & S Industries Ltd.
Kinetics Corp.
Lawter International

Rosin Salts

Arakawa Chemical (USA) Inc.
Georgia-Pacific Resins, Inc.

Silanes

Dow Corning Corp.
HÜLS AMERICA INC.

Silicone Polyesters

Ashland Chemical Co., IC&S Div.
CCP
McWhorter Technologies
Tego Chemie Service

Silicone Resins

Ashland Chemical Co., IC&S Div.
BAYER CORPORATION
Dow Corning Corp.
GENESEE POLYMERS CORP.
McWhorter Technologies
Rhône-Poulenc, Inc.
Tego Chemie Service
Thibaut & Walker Co., Inc.
Wacker Silicones Corp.

Styrene Resins

AKZO NOBEL RESINS
Anderson Development Co.
ARCO CHEMICAL CO.
Ashland Chemical Co., IC&S Div.
BASF CORP., COATINGS RAW MATERIALS DIV.
CCP
The Chemical Co.
Chemicals Incorporated
Clarence Resins & Chemicals, Inc.
Dock Resins Corp.
The Dow Chemical Co., Emulsions Polymers Div.
Elf ATOCHEM North America, Inc.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
BFGoodrich Co., Coatings Div.
The Goodyear Tire & Rubber Co.
Hampshire Chemical Corp.
SC Johnson Polymer
Lawter International

Mitsubishi Chemical America
MORTON INTERNATIONAL
Ohio Polychemical Co.
Reichhold Chemicals, Inc.
Scott Bader, Inc.
Sequa Chemical, Inc.

Styrene & Vinyl Toluene Polymer & Copolymer-Solid

The Goodyear Tire & Rubber Co.

Styrene & Vinyl Toluene Polymer & Copolymer-Solution

AKZO NOBEL RESINS
CCP
Dock Resins Corp.
Engineered Polymer Solutions, Inc.
The Goodyear Tire & Rubber Co.
McWhorter Technologies
Ohio Polychemical Co.

Styrene-Butadiene Emulsions

Anderson Development Co.
BASF CORP., COATINGS RAW MATERIALS DIV.
The Dow Chemical Co., Emulsions Polymers Div.
BFGoodrich Co., Coatings Div.
The Goodyear Tire & Rubber Co.
Hampshire Chemical Corp.

Urea Resins

The Chemical Co.
McWhorter Technologies

Misc. Styrene Resins

Anderson Development Co.
ARCO CHEMICAL CO.
Clarence Resins & Chemicals, Inc.
Elf ATOCHEM North America, Inc.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
SC Johnson Polymer
Lawter International
MORTON INTERNATIONAL
Scott Bader, Inc.

Terpenes

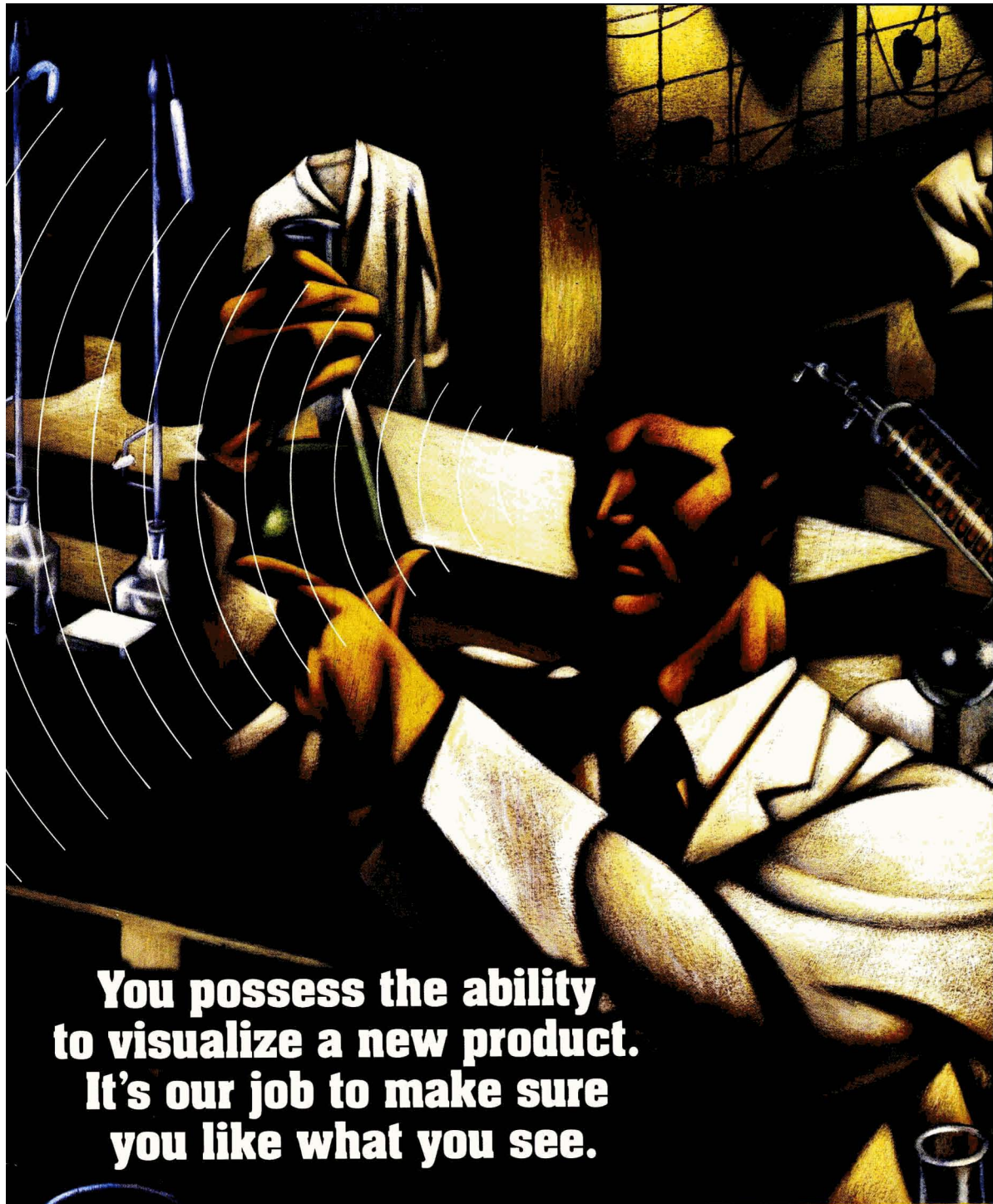
Aerocote Corp.
Arakawa Chemical (USA) Inc.

TGIC Resins

Aceto Corporation
DSM Resins U.S., Inc.
Farboil Co.
GCA Corp.
K & S Industries Ltd.
Ruco Polymer Corp.
United Mineral & Chemical Corp.

Ultraviolet Curing Resins

BASF CORP., COATINGS RAW MATERIALS DIV.
BAYER CORPORATION
CPS Chemical Company, Inc.
DSM Resins U.S., Inc.
Echo Resins and Laboratory
Mace Adhesives & Coatings Co.
McWhorter Technologies
San Esters Corp.
SARTOMER CO.
Sequa Chemical, Inc.
UCB CHEMICALS CORP., RADCURE DIV.



**You possess the ability
to visualize a new product.
It's our job to make sure
you like what you see.**

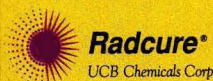
WHEN YOU'RE CREATING A NEW PRODUCT, YOU SEE WHAT NO ONE ELSE CAN. OPPORTUNITIES AS WELL AS PROBLEMS.

RADCURE SPECIALIZES IN FINDING SOLUTIONS TO THE BARRIERS YOU OFTEN ENCOUNTER IN THE DEVELOPMENTAL STAGE. SOLUTIONS WHICH ENHANCE THE DURABILITY AND AESTHETIC APPEAL OF YOUR PRODUCT THROUGH ULTRAVIOLET AND ELECTRON BEAM CURING.

LOOK BEYOND THE SURFACE, AND YOU'LL FIND SOMETHING EVEN MORE ATTRACTIVE: SERVICE. FOR EXAMPLE, IF YOU HAVE A QUESTION

ABOUT A PRODUCT YOU'RE CREATING, SIMPLY GIVE US A CALL AT 888 RADCURE (723-2873) AND WE'LL WORK WITH YOU TO FIND AN ANSWER.

BECAUSE OF OUR TECHNOLOGICAL STRIDES AND THE SOLID COMMITMENTS WE'VE MADE TO OUR CLIENTS, THE FUTURE LOOKS PROMISING. OF COURSE, BEING A VISIONARY, YOU PROBABLY ALREADY KNEW THAT.



©1998 UCB CHEMICALS CORPORATION

Circle No. 161 on the Reader Service Card

Union Carbide Corp.
Vianova Resins Inc.

Urethane Crosslinkers

BAYER CORPORATION
HÜLS AMERICA INC.
Mace Adhesives & Coatings Co.
McWhorter Technologies
Mitsubishi Chemical America
Soluol Chemical Co., Inc.

Urethane Lacquers

BAYER CORPORATION
BFGoodrich Co., Coatings Div.
Mace Adhesives & Coatings Co.
StanChem Inc.
Vianova Resins Inc.

Urethane & Polyurethane Resins

AIR PRODUCTS & CHEMICALS, INC.
AKZO NOBEL RESINS
Amoco Chemicals
Anderson Development Co.
ARCO CHEMICAL CO.
BAYER CORPORATION
CasChem, Inc.
CCP
Cytac Industries, Inc.
Dock Resins Corp.
Empire State Varnish Co., Inc.
Farboil Co.
Focus Chemical Corp.
H.B. Fuller Co.
BFGoodrich Co., Coatings Div.
Hardman, a Div. of the Harcross Chemical, Inc.
ICI Polyurethanes
Industrial Copolymers Ltd.
International Resources, Inc.
International Specialty Products (ISP)
Mace Adhesives & Coatings Co.
McWhorter Technologies
Mitsubishi Chemical America
Ohio Polychemical Co.
Plast-O-Meric, Inc.
K.J. Quinn & Co., Inc.
RANBAR TECHNOLOGY, INC.
Reichhold Chemicals, Inc.
Ruco Polymer Corp.
Sentry/Custom Services Corp.
Soluol Chemical Co., Inc.
Texas Resin Co.
Thibaut & Walker Co., Inc.
Vianova Resins Inc.
Zeneca Resins

***ASTM Type I-One-Package
Precured***

AKZO NOBEL RESINS
BAYER CORPORATION
Empire State Varnish Co., Inc.
McWhorter Technologies
Ohio Polychemical Co.
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Soluol Chemical Co., Inc.
Thibaut & Walker Co., Inc.
Vianova Resins Inc.

***ASTM Type II-One-Package
Moisture Cured***

AIR PRODUCTS & CHEMICALS, INC.
BAYER CORPORATION

ICI Polyurethanes
Industrial Copolymers Ltd.
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Soluol Chemical Co., Inc.
Texas Resin Co.

***ASTM Type III-One-Package
Heat Cured***

BAYER CORPORATION
McWhorter Technologies
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Vianova Resins Inc.

***ASTM Type IV-Two-Package
Catalyst***

BAYER CORPORATION
CasChem, Inc.
Empire State Varnish Co., Inc.
Plast-O-Meric, Inc.
K.J. Quinn & Co., Inc.
Vianova Resins Inc.

***ASTM Type V-Two-Package
Polyol***

Anderson Development Co.
BAYER CORPORATION
CasChem, Inc.
CCP
Empire State Varnish Co., Inc.
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Soluol Chemical Co., Inc.
Vianova Resins Inc.

Waterborne

AIR PRODUCTS & CHEMICALS, INC.
BAYER CORPORATION
Cytac Industries, Inc.
H.B. Fuller Co.
BFGoodrich Co., Coatings Div.
Industrial Copolymers Ltd.
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Soluol Chemical Co., Inc.
Thibaut & Walker Co., Inc.
Vianova Resins Inc.

***Misc. Urethane and
Polyurethane Resins***

AIR PRODUCTS & CHEMICALS, INC.
Anderson Development Co.
BAYER CORPORATION
K.J. Quinn & Co., Inc.
Ruco Polymer Corp.
Soluol Chemical Co., Inc.
Thibaut & Walker Co., Inc.
Vianova Resins Inc.

Vinyl Resins

AIR PRODUCTS & CHEMICALS, INC.
Ashland Chemical Co., IC&S Div.
Condea Vista Co.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
GENESEE POLYMERS CORP.
BFGoodrich Co., Coatings Div.
Hampshire Chemical Corp.
International Specialty Products (ISP)
Mitsubishi Chemical America
Nacan Products Ltd.
Plast-O-Meric, Inc.
Reichhold Chemicals, Inc.

Sequa Chemical, Inc.
StanChem Inc.
Union Carbide Corp.

Polyvinyl Acetate

AIR PRODUCTS & CHEMICALS, INC.
H.B. Fuller Co.
Sequa Chemical, Inc.
Stanchem Inc.
Union Carbide Corp.

***Polyvinyl Alcohol,
Formal and Butyral***

StanChem Inc.
Union Carbide Corp.

***Polyvinyl Chloride &
Polyvinylidene Chloride***

Condea Vista Co.
BFGoodrich Co., Coatings Div.
Union Carbide Corp.

Solid

Plast-O-Meric, Inc.

Solution

Plast-O-Meric, Inc.
Union Carbide Corp.

Vinyl Acetate Polymer Emulsions

AIR PRODUCTS & CHEMICALS, INC.
Engineered Polymer Solutions, Inc.
H.B. Fuller Co.
BFGoodrich Co., Coatings Div.
Hampshire Chemical Corp.
Nacan Products Ltd.
Sequa Chemical, Inc.
StanChem Inc.
Union Carbide Corp.

Vinyl Copolymers

H.B. Fuller Co.
GENESEE POLYMERS CORP.
Hampshire Chemical Corp.
International Specialty Products (ISP)
Nacan Products Ltd.
Sequa Chemical, Inc.
StanChem Inc.
Texas Resin Co.
Union Carbide Corp.

Misc. Vinyl Resins

Condea Vista Co.
BFGoodrich Co., Coatings Div.
Hampshire Chemical Corp.
Nacan Products Ltd.

***Vinyl Chloride & Vinylidene
Chloride Polymer Emulsions***

BFGoodrich Co., Coatings Div.
Hampshire Chemical Corp.
Mitsubishi Chemical America
Plast-O-Meric, Inc.
Scott Bader, Inc.
Union Carbide Corp.
Zeneca Resins

Water-Thinned Resins

AKZO NOBEL RESINS
BAYER CORPORATION
DSM Resins U.S., Inc.

Brilliant Additions for Paint.

Our mineral fillers and extenders do more than just take up space. They are proven performance and color enhancers.

When incorporated in your formulation, these premium reinforcing silicates add strength, durability and integrity. And with a wide range of alternatives, chemists can increase loading while improving critical performance properties like color development, tint retention and weatherability.

Discover the advantages of **MINEX**® Nepheline Syenite, **Imsil**® and **Tamsil**® Microcrystalline Silicas, **SilverBond**® Ground Crystalline Silica, and **Unispar**® Micronized Feldspar. For more information on these unique and versatile fillers, contact your nearest distributor or call us directly.

UNIMIN

Unimin Corporation

258 Elm Street, New Canaan, CT 06840 USA

North America: 618-747-2311 Fax: 618-747-9318

Worldwide: 203-966-1306 Fax: 203-972-1378

Engineered Polymer Solutions, Inc.
 Georgia-Pacific Resins, Inc.
 BFGoodrich Co. - Coatings Div.
 Occidental Chemical Corp.
 Ohio Polychemical Co.
 Reichhold Chemicals, Inc.
 Rhône-Poulenc, Inc.
 Ruco Polymer Corp.
 Sentry/Custom Services Corp.
 Sequa Chemical, Inc.
 Union Carbide Corp.
 Vianova Resins Inc.

Solvents

Alcohols

Amoco Chemicals
ARCO CHEMICAL CO.
 Aristech Chemical Corp.
 Ashland Chemical Co., IC&S Div.
 Browning Chemical Corp.
 The Chemical Co.
 Condea Vista Company
 Eastman Chemical Co.
 Elf ATOCHEM North America, Inc.
 Exxon Chemical Co.
 GFI, Inc.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Aliphatic Hydrocarbons

Aerocote Corp.
 Exxon Chemical Co.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Aromatic Hydrocarbons

Exxon Chemical Co.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Startex Chemical, Inc.

Chlorinated Solvents

Browning Chemical Corp.
 GFI, Inc.
 Hubbard-Hall, Inc.
 Occidental Chemical Corp.
 Special Masking Co.

Custom Solvent Blending

Exxon Chemical Co.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Special Masking Co.
 Startex Chemical, Inc.

Denatured Ethyl Alcohols

Eastman Chemical Co.
 Hubbard-Hall, Inc.
 Shell Chemical Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Esters

ABITEC Corp.
 Aceto Corporation
 Browning Chemical Corp.
 Eastman Chemical Co.
 Exxon Chemical Co.
 Hubbard-Hall, Inc.
 International Paper, Arizona Chemical Div.
 International Specialty Products (ISP)
 Mitsubishi Chemical America
 Special Masking Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Glycol Ethers

Amoco Chemicals
ARCO CHEMICAL CO.
 Browning Chemical Corp.
 Clarence Resins & Chemicals, Inc.
 Eastman Chemical Co.
 GFI, Inc.
 Hubbard-Hall, Inc.
 Shell Chemical Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Glycols

Amoco Chemicals
ARCO CHEMICAL CO.
 Browning Chemical Corp.
 The Chemical Co.
 Eastman Chemical Co.

GFI, Inc.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Union Carbide Corp.

Hydrocarbon Solvents

Exxon Chemical Co.
 Hubbard-Hall, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Startex Chemical, Inc.

Ketones

Aristech Chemical Corp.
 Browning Chemical Corp.
 Eastman Chemical Co.
 Exxon Chemical Co.
 GFI, Inc.
 Mitsubishi Chemical America
 Shell Chemical Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

Nitroparaffins

ANGUS CHEMICAL CO.
 Startex Chemical, Inc.

Reclaimed Solvents

Clarence Resins & Chemicals, Inc.
 Hubbard-Hall, Inc.
 International Specialty Products (ISP)

Misc. Solvents

A.M.S.
 Aerocote Corp.
 Condea Vista Co.
 Exxon Chemical Co.
 Hubbard-Hall, Inc.
 International Specialty Products (ISP)
 Occidental Chemical Corp.
 Reilly Industries
 Sellers Cleaning Systems c/o Crane Pump
 & Systems
 Shell Chemical Co.
 Special Masking Co.
 Startex Chemical, Inc.
 Union Carbide Corp.

World Scale Production Worldwide Distribution

QUALITY CONTROL &
TECHNICAL SUPPORT



For over 50 years, Dominion Colour Corporation has been supplying the global market with a specialized range of premium quality pigments.



MODERN FACILITIES

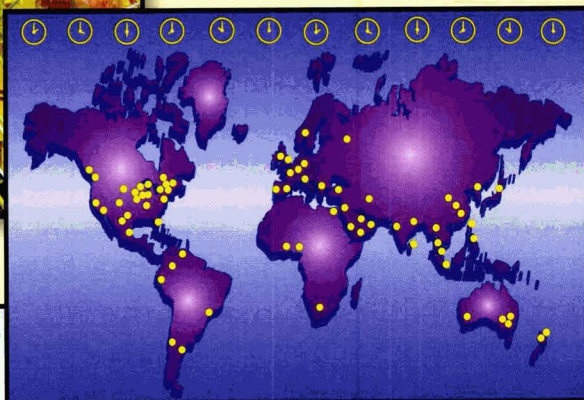


MANUFACTURING EFFICIENCY

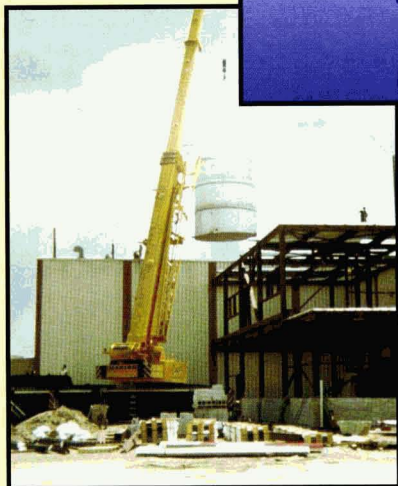
DCC has earned a reputation as an industry leader:

- constant pigment innovation
- consistent quality
- responsive to customer needs
- worldwide service

Choose Dominion Colour Corporation as your source of coloured pigments.



WORLDWIDE DISTRIBUTION



EXPANDING CAPACITY



Dominion Colour Corporation
Working Together For Quality

Pickering, Ontario Canada
(905) 837-4000

ISO 9001

Production Equipment

Agitators

A.P. Dataweigh Systems
Bishop International Co.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Buhler Inc.
CONN AND CO.
Consolidated Drum Reconditioning Co., Inc.
Draiswerke GmbH, North America Div.
Draiswerke, Inc.
**DRUM-MATES, INC. - DRUM MIXERS
PUMP**
Eclipse Systems
EIGER MACHINERY, INC.
Epworth Morehouse-Cowles
Fawcett Co., Inc.
Graco, Inc.
Hockmeyer Equipment Corp.
IKA Works, Inc.
INOUE USA
Jaygo, Inc.
Kady International
MixMor
Morse Manufacturing Co., Inc.
Myers Engineering
Netzsch Incorporated
Norstone, Inc.
Petts Enterprises
Pfaudler, Inc.
Premier Mill Corp.
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
SCHOLD MACHINE CO.
Serfilco, Ltd.
Sonic Corp.
THOMAS SCIENTIFIC
U.V. Process Supply, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Blenders

A & J Mixing Intl. Inc.
Paul O. Abbe, Inc.
Acricon, Inc.
AUTOMATION PRODUCTS INC.
B & P Process Equipment and Systems
Bishop International Co.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries LTD.
Buhler Inc.
CONN AND CO.
Custom Metalcraft Inc.
Draiswerke, Inc.
**DRUM-MATES, INC., DRUM MIXERS
PUMP**
Einstein and Co.
Epworth Morehouse-Cowles
Fabricated Metals, Inc.
Fawcett Co., Inc.
PAUL N. GARDNER CO., INC.
Glen Mills, Inc.
IKA Works, Inc.
INOUE USA
International Reserve Equipment Corp.
Jaygo, Inc.
Kady International
Kemutec, Inc.
Littleford Day Inc.
Microfluidics International Corp.
Pfaudler, Inc.

Plast-O-Meric, Inc.
Process Systems & Components
Readco Manufacturing, Inc.
Reynolds Industries, Inc.
Charles Ross & Son Co.
Sonic Corp.
Tri-Clover Inc.
WESTERN EQUIPMENT COMPANY

Conical

Bishop International Co.
Custom Metalcraft Inc.
Epworth Morehouse-Cowles
International Reserve Equipment Corp.
Jaygo, Inc.
Kemutec, Inc.
Littleford Day Inc.
Pfaudler, Inc.
Plast-O-Meric, Inc.
Charles Ross & Son Co.

Cylinder

Bishop International Co.
Custom Metalcraft Inc.
Draiswerke, Inc.
Einstein and Co.
Epworth Morehouse-Cowles
Glen Mills, Inc.
International Reserve Equipment Corp.
Jaygo, Inc.
Kemutec, Inc.
Littleford Day Inc.
Plast-O-Meric, Inc.
Readco Manufacturing, Inc.
Charles Ross & Son Co.

Blending Tanks

Bishop International Co.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Buhler Inc.
CB Mills
Custom Metalcraft Inc.
Draiswerke GmbH, North America Div.
Draiswerke, Inc.
Epworth Morehouse-Cowles
INOUE USA
Petts Enterprises
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
THOMAS SCIENTIFIC
WESTERN EQUIPMENT COMPANY

Cleaning

Amex® Cleaning & Coating Removal
Systems
CB Mills
Cincinnati Industrial Machinery
Composition Materials Co., Inc.
Disti-Kleen, Inc.
Empire Abrasive Equipment Co.
Hockmeyer Equipment Corp.
Infracol Manufacturing Corp.
Jet Wheelblast Equipment
Jordan Composites Inc.
NLB Corp
Nortech Corp.
Norton Corp.
PICO Chemical Corporation

Process Systems & Components
Ramco Finishing Systems
Safe_O Systems Inc.
Sellers Cleaning Systems c/o Crane Pumps
& Systems
U.V. Process Supply, Inc.
Vac-U-Max
Westerlins Maskinfabrik AB

Compressors

Gilson Co., Inc.
Kaeser Compressors, Inc.
WESTERN EQUIPMENT COMPANY

Containers

Anchor Chemical Co.
Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Bishop International Co.
Boss Bulk Systems, Inc., Div. of Steelcraft
Industries Ltd.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Bulkcon Systems
CB Mills
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Coors Wear Products, Inc., Div. of Coors
Ceramics Co.
Custom Metalcraft Inc.
Draiswerke GmbH, North America Div.
Epworth Morehouse-Cowles
Fabricated Metals, Inc.
Florida Drum Company
Fort James Corporation
Gilson Co., Inc.
Heisler Industries, Inc.
Hockmeyer Equipment Corp.
INNES CLIPS, INC.
International Reserve Equipment Corp.
JMG Plastics, Inc.
Jordan Composites Inc.
Kady International
Keith Industries, Inc.
Longview Fibre Co., Liquiplex®/Drumplex®
Div.
New Protectaire Systems Co.
Pfaudler, Inc.
Plastican, Inc.
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
Special Masking Co.
Tech-Pak
Tenneco Packaging
THOMAS SCIENTIFIC
U.S. Best, Inc.
U.V. Process Supply, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Bags

B.A.G. Corp.
Bulkcon Systems
Fort James Corporation
Gilson Co., Inc.
New Protectaire Systems Co.
Tech-Pak
Tenneco Packaging
THOMAS SCIENTIFIC

Cans and Pail Closers

Apex Drum Co., Inc.
Heisler Industries, Inc.
Keith Industries, Inc.
U.S. Best, Inc.

Can Clips

Anchor Chemical Co.
INNES CLIPS, INC.

Containers

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Boss Bulk Systems Inc., Div. of Steelcraft Industries Ltd.
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Custom Metalcraft Inc.
Gilson Co., Inc.
JMG Plastics, Inc.
Keith Industries, Inc.
Plastican, Inc.
Tenneco Packaging
THOMAS SCIENTIFIC
U.S. Best, Inc.
U.V. Process Supply, Inc.

Aluminum

Custom Metalcraft Inc.

Cans

Gilson Co., Inc.
JMG Plastics, Inc.
Keith Industries, Inc.
THOMAS SCIENTIFIC
U.S. Best, Inc.

Composite

Clawson Container Company
Tenneco Packaging

Plastic

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Gilson Co., Inc.
JMG Plastics, Inc.
Keith Industries, Inc.
Plastican, Inc.
Tenneco Packaging
THOMAS SCIENTIFIC
U.S. Best, Inc.
U.V. Process Supply, Inc.

Stainless Steel

Apex Drum Co., Inc.
Boss Bulk Systems Inc., Div. of Steelcraft Industries Ltd.
Clawson Container Company
Custom Metalcraft Inc.
Keith Industries, Inc.
THOMAS SCIENTIFIC
U.S. Best, Inc.

Steel

Apex Drum Co., Inc.
Boss Bulk Systems Inc., Div. of Steelcraft Industries Ltd.
Clawson Container Company
Custom Metalcraft Inc.
Keith Industries, Inc.

THOMAS SCIENTIFIC
U.S. Best, Inc.

Tin

Keith Industries, Inc.

Drums

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Florida Drum Company
Keith Industries, Inc.
Longview Fibre Co., Liqueplex®/Drumplex® Div.

THOMAS SCIENTIFIC
U.S. Best, Inc.

Fiber

Consolidated Drum Reconditioning Co., Inc.
Keith Industries, Inc.
Longview Fibre Co., Liqueplex®/Drumplex® Div

Interior Lining

Apex Drum Co., Inc.
Consolidated Drum Reconditioning Co., Inc.
Florida Drum Company
Keith Industries, Inc.
Longview Fibre Co., Liqueplex®/Drumplex® Div.
U.S. Best, Inc.

Plastic

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Consolidated Drum Reconditioning Co., Inc.
Florida Drum Company
Keith Industries, Inc.
THOMAS SCIENTIFIC
U.S. Best, Inc.

Reconditioned

Apex Drum Co., Inc.
Consolidated Drum Reconditioning Co., Inc.
Keith Industries, Inc.

Steel

Apex Drum Co., Inc.
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Florida Drum Company
Keith Industries, Inc.
U.S. Best, Inc.

Tanks

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Bishop International Co.
Boss Bulk Systems Inc., Div. of Steelcraft Industries Ltd.
Bowers Process Equipment Inc., Div. of Steelcraft Industries Ltd.
CB Mills
Coors Wear Products, Inc., Div. of Coors Ceramics Co.
Clawson Container Company
Custom Metalcraft Inc.
Draiswerke GmbH, North America Div.
Epworth Morehouse-Cowles
Fabricated Metals, Inc.

Hockmeyer Equipment Corp.
International Reserve Equipment Corp.
Jordan Composites Inc.
Kady International
Keith Industries, Inc.
Longview Fibre Co., Liqueplex®/Drumplex® Div.
New Protectaire Systems Co.
Pfaudler, Inc.
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
Special Masking Co.
THOMAS SCIENTIFIC
U.S. Best, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Ceramic

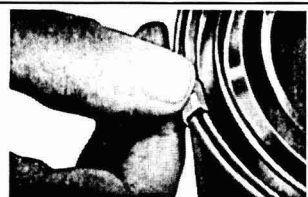
Coors Wear Products, Inc., Div. of Coors Ceramics Co.
Pfaudler, Inc.

Fiberglass

Jordan Composites Inc.
Process Systems & Components
WESTERN EQUIPMENT COMPANY

Metal

Apex Drum Co., Inc.
Bishop International Co.
Boss Bulk Systems Inc., Div. of Steelcraft Industries Ltd.



Can Top Securing Clips

QUICK, SIMPLE, SAFE, REUSABLE
Easily snapped or tapped into place and easily removed. Meet all postal requirements. Will stand rough usage. Bifurcated. Patented. Available in 4 sizes to fit any standard can.

Write for further details.

INNES CLIPS INC.
P.O. Box 820, Larchmont, NY 10538
Phone: 914-834-3304 FAX: 914-834-3646
Available on the west coast from
TAVCO CHEMICALS, INC.
25401 Cabot Road, Suite 121
Laguna Hills, CA 92653 • (714) 770-7666

Circle No. 244 on Reader Service Card

Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
CB Mills
Clawson Container Company
Custom Metalcraft Inc.
Draiswerke GmbH, North America Div.
Epworth Morehouse-Cowles
Hockmeyer Equipment Corp.
New Protectaire Systems Co.
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Plastic

Apex Drum Co., Inc.
B.A.G. Corp.
Bergen Barrel & Drum Co.
Clawson Container Company
Fabricated Metals, Inc.
Process Systems & Components
THOMAS SCIENTIFIC
U.S. Best, Inc.

Polyurethane

Clawson Container Co.
Process Systems & Components

Portable

Apex Drum Co., Inc.
B.A.G. Corp.
Boss Bulk Systems Inc., Div. of Steelcraft
Industries Ltd.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
CB Mills
Clawson Container Company
Custom Metalcraft Inc.
Fabricated Metals, Inc.
Longview Fibre Co., Liqueplex®/Drumplex®
Div.
Process Systems & Components
Charles Ross & Son Co.
U.S. Best, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Process

Apex Drum Co., Inc.
Bishop International Co.
Bowers Process Equipment Inc.
CB Mills
Clawson Container Company
Custom Metalcraft Inc.
Draiswerke GmbH, North America Div.
Fabricated Metals, Inc.
International Reserve Equipment Corp.
Process Systems & Components
Charles Ross & Son Co.
WESTERN EQUIPMENT COMPANY

Shipping

Apex Drum Co., Inc.
Bergen Barrel & Drum Co.
Boss Bulk Systems Inc., Div. of Steelcraft
Industries Ltd.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Clawson Container Company
Custom Metalcraft Inc.
Fabricated Metals, Inc.
Longview Fibre Co., Liqueplex®/Drumplex®
Div.

Process Systems & Components
WESTERN EQUIPMENT COMPANY

Storage

Apex Drum Co., Inc.
Bergen Barrel & Drum Co.
Boss Bulk Systems Inc., Div. of Steelcraft
Industries Ltd.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
CB Mills
Clawson Container Company
Custom Metalcraft Inc.
Fabricated Metals, Inc.
Pfaudler, Inc.
Process Systems & Components
Charles Ross & Son Co.
U.S. Best, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Tote

Apex Drum Co., Inc.
Bergen Barrel & Drum Co.
Boss Bulk Systems Inc., Div. of Steelcraft
Industries Ltd.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Clawson Container Company
Custom Metalcraft Inc.
Fabricated Metals, Inc.
Keith Industries, Inc.
Longview Fibre Co., Liqueplex®/Drumplex®
Div.
Process Systems & Components
Special Masking Co.
WESTERN EQUIPMENT COMPANY

Misc. Containers

Apex Drum Co., Inc.
CB Mills
Clawson Container Company
Consolidated Drum Reconditioning Co., Inc.
Fabricated Metals, Inc.
Fort James Corporation
Longview Fibre Co., Liqueplex®/Drumplex®
Div.
Process Systems & Components
Tenneco Packaging
U.S. Best, Inc.

Curing Systems

Blasdel Enterprises Inc.
Casso-Solar Corp.
Cincinnati Industrial Machinery
Cis-Can Industries Ltd.
**FOSTORIA INDUSTRIES, INC., PROCESS
HEAT DIV.**
Fusion UV Systems, Inc.
Gasmac, Inc., Finish Div.
Gilson Co., Inc.
Glenro Inc.
Grieve Corp.
Gruenberg Oven
Infra-Red Technologies, Inc.
Infracol Manufacturing Corp.
Jordan Composites Inc.
Moco Thermal Industries
Process Thermal Dynamics, Inc.
Radiant Energy Systems, Inc.
Ramco Finishing Systems
Safe,O Systems Inc.
Thermovation Engineering
U.V. Process Supply, Inc.

Dispensers

American Lewa, Inc.
Barnant Co.
CB Mills
Corob North America Div. Toatek North
America Inc.
Disti-Kleen, Inc.
Epworth Morehouse-Cowles
Littleford Day Inc.
Precision Dispensing, Inc.
Process Systems & Components
U.V. Process Supply, Inc.

Colorant

American Lewa, Inc.
CB Mills
Corob North America Div. Taotek North
America Inc.
Disti-Kleen, Inc.
Epworth Morehouse-Cowles
Littleford Day Inc.
Precision Dispensing, Inc.
U.V. Process Supply, Inc.

Computerized

American Lewa, Inc.
Barnant Co.
CB Mills
Corob North America Div. Taotek North
America Inc.
Disti-Kleen, Inc.
Precision Dispensing, Inc.

Dispenser Blades

Bishop International Co.
The Blade Shop
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
**BYK-GARDNER USA
CONN AND CO.**
Draiswerke GmbH, North America Div.
Draiswerke, Inc.
EIGER MACHINERY, INC.
Epworth Morehouse-Cowles
Fawcett Co., Inc.
PAUL N. GARDNER CO., INC.
Hockmeyer Equipment Corp.
Indco, Inc.
INOUE USA
Kady International
Myers Engineering
Norstone, Inc.
Petts Enterprises
Premier Mill Corp.
Process Systems & Components
SCHOLD MACHINE CO.
THOMAS SCIENTIFIC
U.S. Best, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Dispensers

T.J. Bell Inc.
Bishop International Co.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Buhler Inc.
BYK-GARDNER USA
CB Mills
CONN AND CO.
Draiswerke, Inc.
EIGER MACHINERY, INC.
Epworth Morehouse-Cowles
Fawcett Co., Inc.

Fryma Inc.
 Hockmeyer Equipment Corp.
 IKA Works, Inc.
 Indco, Inc.
 INOUE USA
 Jaygo, Inc.
 Littleford Day Inc.
 Microfluidics International Corp.
 Myers Engineering
 Petts Enterprises
 Plast-O-Meric, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Reynolds Industries, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
 Sonic Corp.
 U.S. Best, Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Distillation

AUTOMATION PRODUCTS INC.
 CB Mills
 Disti-Kleen, Inc.
 Norton Chemical Process Products Corp.
 Petts Enterprises
 Pfaudler, Inc.
THOMAS SCIENTIFIC
 Vara International, Div. of Calgon Carbon
WESTERN EQUIPMENT COMPANY

Filling/Packaging/Labeling

A.P. Dataweigh Systems
 Ambrose Company
 Anker Labelers USA Inc.
 Anthony Barber Associates Ltd.
 Apex Drum Co., Inc.
AUTOMATION PRODUCTS INC.
 Bishop International Co.
 CB Mills
 Consolidated Drum Reconditioning Co., Inc.
 Crandall International, Inc.
 J. De Vree & Co. N.V.
 Electronic Liquid Fillers, Inc.
 Heisler Industries, Inc.
 Ideal Manufacturing & Sales Corp.
 Ideal of America
 Labelette Co.
 Labelmaster
 Madsen Products Inc., MEPCO Div.
 Mardem Manufacturing
 New Way Packaging Machinery, Inc.
 Petts Enterprises
 Pioneer Packaging Machinery, Inc.
 Process Systems & Components
 Schroeder Machines
 Special Masking Co.
 Stretch-O-Seal Corp.
THOMAS SCIENTIFIC
 U.S. Best, Inc.
 U.V. Process Supply, Inc.
 Weber Marking Systems
WESTERN EQUIPMENT COMPANY

Can Casing Machines

J. De Vree & Co. N.V.
 Heisler Industries, Inc.
 Schroeder Machines
WESTERN EQUIPMENT COMPANY

Coding Machines

Electronic Liquid Fillers, Inc.
 Ideal Manufacturing & Sales Corp.
WESTERN EQUIPMENT COMPANY

Fillers

Ambrose Company
 Anthony Barber Associates Ltd.
 Bishop International Co.
 J. De Vree & Co. N.V.
 Electronic Liquid Fillers, Inc.
 Ideal Manufacturing & Sales Corp.
 Mardem Manufacturing
 Petts Enterprises
 Process Systems & Components
THOMAS SCIENTIFIC
WESTERN EQUIPMENT COMPANY

Labels

Labelmaster
 Process Systems & Components
 Special Masking Co.
THOMAS SCIENTIFIC
 Weber Marking Systems
WESTERN EQUIPMENT COMPANY

Label Machines

Anker Labelers USA Inc.
 Electronic Liquid Fillers, Inc.
 Labelmaster
 New Way Packaging Machinery, Inc.
 Petts Enterprises
 Pioneer Packaging Machinery, Inc.
THOMAS SCIENTIFIC
 Weber Marking Systems
WESTERN EQUIPMENT COMPANY

Label Printing

Labelmaster
 Weber Marking Systems
WESTERN EQUIPMENT COMPANY

Lid Openers

Consolidated Drum Reconditioning Co., Inc.
 Madsen Products Inc., MEPCO Div.
 U.S. Best, Inc.
 U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Misc. Filling/Packaging/Labeling

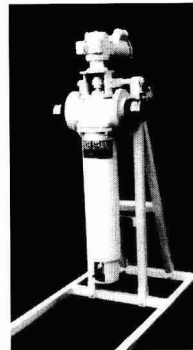
Ambrose Company
 Apex Drum Co., Inc.
 J. De Vree & Co. N.V.
 Electronic Liquid Fillers, Inc.
 Ideal Manufacturing & Sales Corp.
 Ideal of America
 Mardem Manufacturing
 Petts Enterprises
 Schroeder Machines
 Stretch-O-Seal Corp.
WESTERN EQUIPMENT COMPANY

Material Handling & Conveyors

A.P. Dataweigh Systems
 Accu-Rate, Inc., A Unit of Schenck
 AccuRate
 Arison, Inc.
 Ambrose Company

It's Time to Come Clean With The
SPENCER STRAINER SYSTEM

A revolutionary stainless steel, self-cleaning filtration system that effectively eliminates the use of traditional disposal type filters. Guaranteed to reduce costs, filter disposal and product loss.



Ideal for manufacturers of: Latex, Ink, Oils, Baby Food, Peanut Butter, Catalyst, Pharmaceuticals, Caulking, Pickles, Chocolate, Detergents, Silicone, Emulsions, Toothpaste, Waste Oil, Waste Water, Whiskey, Milk and more.

Call Today for a 30 Day Free Trial

Spencer Machine & Tool Co.

PO Box 298, 6201 Gheens Mill Rd.
 Jeffersonville In. 47131
1-800-801-4977

Circle No. 278 on Reader Service Card

American Specialty Equipment
Apex Drum Co., Inc.
AUTOMATION PRODUCTS INC.

B.A.G. Corp.
Bilt-Rite Conveyors, Inc.
Buhler Inc.
Clawson Container Company
The Cleveland Vibrator Co.
Crandall International, Inc.
Custom Metalcraft Inc.
Dek-Tron Scientific Instruments
DeMarco MAX VAC Corp.
Easy Lift Equipment Co., Inc.
Electronic Liquid Fillers, Inc.
Fabricated Metals, Inc.
Fanuc Robotics North America, Inc.
Gough Econ, Inc.
Heisler Industries, Inc.
Invincible Airflow Systems
Jordan Composites Inc.
Liftomatic, Inc.
Longview Fibre Co., Liquiplex®/Drumplex®
Div.
LPI Inc., Div. of LDPI Co.
MAC Equipment Inc.
Mardem Manufacturing
Meyer & Sons, Inc. Wm. W.
Mighty Lube
Morse Manufacturing Co., Inc.
New Protectaire Systems Co.
Pacline Conveyors, Inc.
Production Systems, Inc.
Schroeder Machines

Trion Industries Inc.
U.S. Best, Inc.
Vac-U-Max
WESTERN EQUIPMENT COMPANY
Wyssmont Co., Inc.

Depalletizers

Ambrose Company
Fanuc Robotics North America, Inc.
Liftomatic, Inc.
Production Systems, Inc.

Drum Conveyors

A.P. Dataweigh Systems
Ambrose Company
Bilt-Rite Conveyors, Inc.
Crandall International, Inc.
Custom Metalcraft Inc.
Easy Lift Equipment Co., Inc.
Pacline Conveyors, Inc.
Production Systems, Inc.
WESTERN EQUIPMENT COMPANY

Feeders

Accu-Rate, Inc., A Unit of Schenck
Acron, Inc.
The Cleveland Vibrator Co.
Dek-Tron Scientific Instruments
Fabricated Metals, Inc.
Meyer & Sons, Inc., Wm. W.
Vac-U-Max
Wyssmont Co., Inc.

Fork Lifts

American Specialty Equipment
Easy Lift Equipment Co., Inc.
WESTERN EQUIPMENT COMPANY

Mechanical Conveyors

Bilt-Rite Conveyors, Inc.
Buhler Inc.
Custom Metalcraft Inc.
Electronic Liquid Fillers, Inc.
Fabricated Metals, Inc.
Gough Econ, Inc.
LPI Inc., Div. of LDPI Co.
Mardem Manufacturing
New Protectaire Systems Co.
Pacline Conveyors, Inc.
Production Systems, Inc.
Vac-U-Max

Pallet Conveyors

Ambrose Company
Bilt-Rite Conveyors, Inc.
Custom Metalcraft Inc.
Heisler Industries, Inc.
Pacline Conveyors, Inc.
Production Systems, Inc.
WESTERN EQUIPMENT COMPANY

Pallet Dispensers

B.A.G. Corp.
Production Systems, Inc.

Palletizers

A.P. Dataweigh Systems
Ambrose Company
Fanuc Robotics North America, Inc.
Heisler Industries, Inc.
Production Systems, Inc.
WESTERN EQUIPMENT COMPANY

Pneumatic Conveyors

Buhler Inc.
Custom Metalcraft Inc.
DeMarco MAX VAC Corp.
Invincible Airflow Systems
LPI Inc. - Div. of LDPI Co.
MAC Equipment Inc.
Meyer & Sons, Inc., Wm. W.
Vac-U-Max

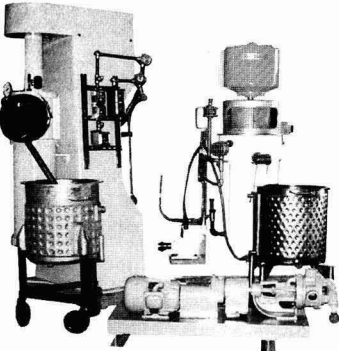
Tubular Conveyors

Gough Econ, Inc.
Pacline Conveyors, Inc.
Vac-U-Max

Misc. Material Handling and Storage Equipment

A.P. Dataweigh Systems
Acron, Inc.
Ambrose Company
Apex Drum Co., Inc.
AUTOMATION PRODUCTS INC.
B.A.G. Corp.
Buhler Inc.
Clawson Container Company
The Cleveland Vibrator Co.
Custom Metalcraft Inc.
DeMarco MAX VAC Corp.
Easy Lift Equipment Co., Inc.
Fabricated Metals, Inc.
Heisler Industries, Inc.
Kemutec, Inc.
Liftomatic, Inc.

WESTERN
EQUIPMENT COMPANY



*Used Process Equipment for the Coatings Industry
We Also Purchase Surplus Equipment*

Call or Visit our Web Site for Current Inventory

Oakland, CA
(510) 638-2774 • Fax (510) 632-5928
New Web Site: www.westernequipco.com

Circle No. 245 on Reader Service Card

Longview Fibre Co., Liquiplex®/Drumplex® Div.
 LPI Inc., Div. of LDPI Co.
 MAC Equipment Inc.
 Mighty Lube
 Morse Manufacturing Co., Inc.
 Pacline Conveyors, Inc.
 Trion Industries Inc.
 U.S. Best, Inc.
 Vac-U-Max

Film Applicators

BYK-GARDNER USA
PAUL N. GARDNER CO., INC.
 Ideal of America
 Industry Tech
 Precision Gage & Tool Co.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.
 Wagner Systems, Inc.

Films

B.A.G. Corp.
BAYER CORPORATION
 Special Masking Co.
 Tenneco Packaging

Filtering/Straining

Alar Engineering Corp.
 Aqua-Tec Filter Co.
 Bishop International Co.
 Blacoh Fluid Control, Inc.
 Celite Corp., c/o World Minerals, Inc.
 The Cleveland Vibrator Co.
 Columbus Industries Inc
 Cuno, Inc., Filter Systems Div.
 DCE, Inc.
 ECO Corporation
 Filter Specialists, Inc.
 Gilson Co., Inc.
 International Reserve Equipment Corp.
 Jaygo, Inc.
 Kaeser Compressors, Inc.
 Keller Products, Inc.
 Liquid Controls Corp.
 MAC Equipment Inc.
 Netzsch Incorporated
 New Protectaire Systems Co.
 Pall Filtron Corp., Industrial Div.
 Petts Enterprises
 Process Systems & Components
 Quackenbush Co., Inc.
R-P PRODUCTS RONNINGEN-PETTER DIV.
 Russell Finex, Inc.
 Safe,O Systems Inc.
 Serfilco, Ltd.
 Special Masking Co.
SPENCER MACHINE & TOOL CO., INC.
 Star Systems Filtration Div.
 SWECO
THOMAS SCIENTIFIC
 Tri-Clover Inc.
 U.V. Process Supply, Inc.
 Uni-Wash/Polaris Indl. Ventilation Group
 Van Air Systems, Inc.
 Viking Pump, Inc.
 Vorti-Siv Division, MM Industries, Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Filter Presses

Aqua-Tec Filter Co.
 Bishop International Co.
 International Reserve Equipment Corp.

Netzsch Incorporated
 Serfilco, Ltd.
 Star Systems Filtration Div.

Filter/Pressure Vessels

Aqua-Tec Filter Co.
 Columbus Industries Inc
 Cuno, Inc., Filter Systems Div.
 Filter Specialists, Inc.
 Jaygo, Inc.
 Kaeser Compressors, Inc.
 Keller Products, Inc.
 MAC Equipment Inc.
 New Protectaire Systems Co.
 Process Systems & Components
R-P PRODUCTS RONNINGEN-PETTER DIV.
 Serfilco, Ltd.
SPENCER MACHINE & TOOL CO., INC.
 Uni-Wash/Polaris Indl. Ventilation Group
 Van Air Systems, Inc.
WESTERN EQUIPMENT COMPANY

Air Replacement

Columbus Industries Inc
 MAC Equipment Inc.
 Uni-Wash/Polaris Indl. Ventilation Group

Chemical

Aqua-Tec Filter Co.
 Cuno, Inc., Filter Systems Div.
 Filter Specialists, Inc.
 MAC Equipment Inc.
 Serfilco, Ltd.

Cloths

Aqua-Tec Filter Co.
 Filter Specialists, Inc.

Compressed Air

Kaeser Compressors, Inc.
 Keller Products, Inc.
 Van Air Systems, Inc.
WESTERN EQUIPMENT COMPANY

Dry Spray Booth

Aqua-Tec Filter Co.
 Columbus Industries Inc
 ECO Corporation
 MAC Equipment Inc.
 New Protectaire Systems Co.
 Uni-Wash/Polaris Indl. Ventilation Group

Liquid

Aqua-Tec Filter Co.
 Columbus Industries Inc
 Cuno, Inc., Filter Systems Div.
 Filter Specialists, Inc.
 Keller Products, Inc.
R-P PRODUCTS RONNINGEN-PETTER DIV.
 Serfilco, Ltd.

Oil

Aqua-Tec Filter Co.
 Cuno, Inc., Filter Systems Div.
 Filter Specialists, Inc.
 Serfilco, Ltd.
 Uni-Wash/Polaris Indl. Ventilation Group

Paint

Aqua-Tec Filter Co.
 Columbus Industries Inc
 Cuno, Inc., Filter Systems Div.

Filter Specialists, Inc.
 Serfilco, Ltd.

Solvent

Aqua-Tec Filter Co.
 Columbus Industries Inc
 Cuno, Inc., Filter Systems Div.
 Filter Specialists, Inc.

Filtering Bags/Strainers

Aqua-Tec Filter Co.
 Columbus Industries Inc
 DCE, Inc.
 ECO Corporation
 Filter Specialists, Inc.
 New Protectaire Systems Co.
R-P PRODUCTS RONNINGEN-PETTER DIV.
 Russell Finex, Inc.
 Safe,O Systems Inc.
 Tri-Clover Inc.
 U.V. Process Supply, Inc.
 Uni-Wash/Polaris Indl. Ventilation Group
 Vorti-Siv Division, MM Industries, Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Filtering Cartridges

Aqua-Tec Filter Co.
 Cuno, Inc., Filter Systems Div.
 DCE, Inc.
 ECO Corporation
 Filter Specialists, Inc.
 Keller Products, Inc.
 MAC Equipment Inc.
 Pall Filtron Corp., Industrial Div.
 Safe,O Systems Inc.
 Serfilco, Ltd.
 Special Masking Co.
THOMAS SCIENTIFIC
 Uni-Wash/Polaris Indl. Ventilation Group

Screening Machines

Aqua-Tec Filter Co.
 The Cleveland Vibrator Co.
 Gilson Co., Inc.
 International Reserve Equipment Corp.
 Process Systems & Components
 Russell Finex, Inc.
 SWECO
 Vorti-Siv Division, MM Industries, Inc.

Straining Equipment

Aqua-Tec Filter Co.
 Filter Specialists, Inc.
 Jaygo, Inc.
 Keller Products, Inc.
 Liquid Controls Corp.
 Petts Enterprises
 Process Systems & Components
 Russell Finex, Inc.
 Viking Pump, Inc.
 Vorti-Siv Division, MM Industries, Inc.
WESTERN EQUIPMENT COMPANY

Misc. Filtering/Straining

Aqua-Tec Filter Co.
 Blacoh Fluid Control, Inc
 Celite Corp., c/o World Minerals, Inc.
 Cuno, Inc., Filter Systems Div.
 ECO Corporation
 Filter Specialists, Inc.
 International Reserve Equipment Corp.
 Keller Products, Inc.
 MAC Equipment Inc.

Pall Filtron Corp., Industrial Div.
 Quackenbush Co., Inc.
 Russell Finex, Inc.
 Viking Pump, Inc.

Grinding/Milling

Paul O. Abbe, Inc.
 T.J. Bell Inc.
 Bishop International Co.
 C.W. Brabender Instruments Inc.
 Brinkmann Instruments Inc.
 Buhler Inc.
BYK-GARDNER USA
 CB Mills
 Coors Wear Products, Inc., Div. of Coors
 Ceramics Co.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Einstein and Co.
 Epworth Morehouse-Cowles
 Fryma Inc.
 Gilson Co., Inc.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 IKA Works, Inc.
 Indco, Inc.
 INOUE USA
 International Reserve Equipment Corp.
 Jaygo, Inc.
 Kady International
 Kemutec, Inc.
 Lehmann Mills, Inc.
 Microfluidics International Corp.
 Netzsch Incorporated
 Norstone, Inc.
 Petts Enterprises
 Prater Industries, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
 SEPR, Ceramic Beads & Powders Div.
 Sonic Corp.
 SWECO
THOMAS SCIENTIFIC
 U.S. Stoneware
 Union Process Inc.
 Vero Dispersion Machines, Inc.
WESTERN EQUIPMENT COMPANY
 Wyssmont Co., Inc.

Attrition

Bishop International Co.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 INOUE USA
 Kady International
 Kemutec, Inc.
 Netzsch Incorporated
 Norstone, Inc.
 Petts Enterprises
SCHOLD MACHINE CO.
 Union Process Inc.
WESTERN EQUIPMENT COMPANY
 Wyssmont Co., Inc.

Ball

Paul O. Abbe, Inc.
 Brinkmann Instruments Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles

Fryma Inc.
 Gilson Co., Inc.
 Glen Mills, Inc.
 INOUE USA
 International Reserve Equipment Corp.
 Jaygo, Inc.
 Process Systems & Components
SCHOLD MACHINE CO.
THOMAS SCIENTIFIC
 U.S. Stoneware
 Union Process Inc.

Bead

Bishop International Co.
 Buhler Inc.
 CB Mills
BYK-GARDNER USA
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Fryma Inc.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 INOUE USA
 Jaygo, Inc.
 Netzsch Incorporated
 Petts Enterprises
 Premier Mill Corp.
SCHOLD MACHINE CO.
 U.S. Stoneware
 Union Process Inc.
 Vero Dispersion Machines, Inc.

Colloid

Bishop International Co.
 Brinkmann Instruments Inc.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
 Einstein and Co.
 Fryma Inc.
 Gilson Co., Inc.
 Glen Mills, Inc.
 Jaygo, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Sonic Corp.
WESTERN EQUIPMENT COMPANY

Horizontal

Bishop International Co.
 Buhler Inc.
BYK-GARDNER USA
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 IKA Works, Inc.
 INOUE USA
 Jaygo, Inc.
 Kemutec, Inc.
 Netzsch Incorporated
 Petts Enterprises
 Premier Mill Corp.
 Process Systems & Components
SCHOLD MACHINE CO.
 Union Process Inc.
 Vero Dispersion Machines, Inc.
 Wyssmont Co., Inc.

Impact

Bishop International Co.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.

Epworth Morehouse-Cowles
 Gilson Co., Inc.
 Glen Mills, Inc.
 International Reserve Equipment Corp.
 Kady International
 Kemutec, Inc.
 Microfluidics International Corp.
 Netzsch Incorporated
 Prater Industries, Inc.
 Process Systems & Components
 Wyssmont Co., Inc.

Jar and Jar Rolling Machines

Paul O. Abbe, Inc.
 Epworth Morehouse-Cowles
 Gilson Co., Inc.
 Glen Mills, Inc.
 Jaygo, Inc.
 Process Systems & Components
THOMAS SCIENTIFIC
 U.S. Stoneware
WESTERN EQUIPMENT COMPANY

Laboratory

Paul O. Abbe, Inc.
 T.J. Bell Inc.
 C.W. Brabender Instruments Inc.
 Brinkmann Instruments Inc.
BYK-GARDNER USA
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Fryma Inc.
 Gilson Co., Inc.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 IKA Works, Inc.
 Jaygo, Inc.
 Kady International
 Kemutec, Inc.
 Lehmann Mills, Inc.
 Microfluidics International Corp.
 Netzsch Incorporated
 Prater Industries, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
 Sonic Corp.
THOMAS SCIENTIFIC
 U.S. Stoneware
 Union Process Inc.
 Vero Dispersion Machines, Inc.

Pebble Mills and Linings

Paul O. Abbe, Inc.
 Draiswerke GmbH, North America Div.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 INOUE USA
 Norstone, Inc.
 Process Systems & Components
 U.S. Stoneware
WESTERN EQUIPMENT COMPANY

Peg

Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
 Epworth Morehouse-Cowles
 Netzsch Incorporated
 Vero Dispersion Machines, Inc.
 Wyssmont Co., Inc.

Resonance

Epworth Morehouse-Cowles

Roller

Buhler Inc.
 Draiswerke, Inc.
 Epworth Morehouse-Cowles
 Indco, Inc.
 INOUE USA
 International Reserve Equipment Corp.
 Jaygo, Inc.
 Lehmann Mills, Inc.
 Charles Ross & Son Co.
 U.S. Stoneware
WESTERN EQUIPMENT COMPANY
 Wyssmont Co., Inc.

Sand

CB Mills
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 Jaygo, Inc.
 Netzsch Incorporated
 Petts Enterprises
 Process Systems & Components
WESTERN EQUIPMENT COMPANY

Shot

Buhler Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 INOUE USA
 Petts Enterprises
SCHOLD MACHINE CO.

Small Media

Bishop International Co.
 Buhler Inc.
 CB Mills
 Coors Wear Products, Inc., Div. of Coors
 Ceramics Co.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 IKA Works, Inc.
 INOUE USA
 Jaygo, Inc.
 Netzsch Incorporated
 Petts Enterprises
 Process Systems & Components
SCHOLD MACHINE CO.
 SEPR, Ceramic Beads & Powders Div.
 SWECO
 U.S. Stoneware
 Union Process Inc.

Vertical

Bishop International Co.
 Buhler Inc.
BYK-GARDNER USA
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles

Glen Mills, Inc.
 IKA Works, Inc.
 INOUE USA
 Jaygo, Inc.
 Netzsch Incorporated
 Petts Enterprises
 Prater Industries, Inc.
 Process Systems & Components
SCHOLD MACHINE CO.
 Union Process Inc.

Misc. Grinding/Milling

Brinkmann Instruments Inc.
 Buhler Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Einstein and Co.
 Epworth Morehouse-Cowles
 Fryma Inc.
 Glen Mills, Inc.
 IKA Works, Inc.
 INOUE USA
 International Reserve Equipment Corp.
 Jaygo, Inc.
 Kady International
 Kemutec, Inc.
 Microfluidics International Corp.
 Netzsch Incorporated
 Prater Industries, Inc.
 Process Systems & Components
SCHOLD MACHINE CO.
 SWECO
THOMAS SCIENTIFIC
 U.S. Stoneware
 Union Process Inc.
 Vero Dispersion Machines, Inc.

Grinding Media

Paul O. Abbe, Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Gilson Co., Inc.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 INOUE USA
 Jaygo, Inc.
 Kemutec, Inc.
 Netzsch Incorporated
 Norstone, Inc.
 Petts Enterprises
 Potters Industries, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Quackenbush Co., Inc.
SCHOLD MACHINE CO.
 SEPR, Ceramic Beads & Powders Div.
 Swarco Industries, Inc.
 SWECO
 U.S. Stoneware
 Union Process Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Heat Boilers

International Reserve Equipment Corp.
PARATHERM CORP.
WESTERN EQUIPMENT COMPANY

Heaters, Thermal Fluid

PARATHERM CORP.

Infrared Curing Equipment

Blasdel Enterprises Inc.
 Casso-Solar Corp.
 Cincinnati Industrial Machinery
 Cis-Can Industries Ltd.
FOSTORIA INDUSTRIES, INC., PROCESS HEAT DIV.
 Gasmac, Inc., Finish Div.
 Glenro Inc.
 Grieve Corp.
 Infra-Red Technologies, Inc.
 Infracol Manufacturing Corp.
 Jordan Composites Inc.
 Process Thermal Dynamics, Inc.
 Radiant Energy Systems, Inc.
 Safe₂O Systems Inc.
 Thermovation Engineering

Ink Production Equipment

A.P. Dataweigh Systems
 American Lewa, Inc.
 Apex Drum Co., Inc.
AUTOMATION PRODUCTS INC.
 Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 Buhler Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Fabricated Metals, Inc.
 Fawcett Co., Inc.
 Fryma Inc.
PAUL N. GARDNER CO., INC.
 Graco, Inc.
 Hockmeyer Equipment Corp.
 IGT Reptest Inc.
 IKA Works, Inc.
 Indco, Inc.
 INOUE USA
 Kady International
 Lehmann Mills, Inc.
 Little Joe Industries
 Microfluidics International Corp.
 Myers Engineering
 Petts Enterprises
 Plast-O-Meric, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Reynolds Industries, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
 U.V. Process Supply, Inc.
 Union Process Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Ink Knives

Apex Drum Co., Inc.
 Buhler Inc.
 U.V. Process Supply, Inc.

Ink Mills

Buhler Inc.
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Fryma Inc.
 Hockmeyer Equipment Corp.
 INOUE USA
 Lehmann Mills, Inc.
 Plast-O-Meric, Inc.
 Premier Mill Corp.

Process Systems & Components
Charles Ross & Son Co.
SCHOLD MACHINE CO.
Union Process Inc.
WESTERN EQUIPMENT COMPANY

Ink Mixers

AUTOMATION PRODUCTS INC.
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
Buhler Inc.
CB Mills
Draiswerke GmbH, North America Div.
Draiswerke, Inc.
EIGER MACHINERY, INC.
Epworth Morehouse-Cowles
Fawcett Co., Inc.
PAUL N. GARDNER CO., INC.
Hockmeyer Equipment Corp.
IKA Works, Inc.
Indco, Inc.
INOUE USA
Kady International
Microfluidics International Corp.
Myers Engineering
Petts Enterprises
Premier Mill Corp.
Process Systems & Components
Reynolds Industries, Inc.
Charles Ross & Son Co.
SCHOLD MACHINE CO.
U.V. Process Supply, Inc.
Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Ink Proof Presses

IGT Reprintest Inc.
Little Joe Industries

Ink Pumps

American Lewa, Inc.
Apex Drum Co., Inc.
Graco, Inc.
U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Ink Scales

A.P. Dataweigh Systems

Ink Tubs

Apex Drum Co., Inc.
Buhler Inc.
Fabricated Metals, Inc.
Charles Ross & Son Co.

Misc. Ink Equipment

Buhler Inc.
Draiswerke, Inc.
Epworth Morehouse-Cowles
Kady International

Instrumentation and Control

A.P. Dataweigh Systems
Accu-Rate, Inc., A Unit of Schenck
Acrison, Inc.
American Lewa, Inc.
Analytical Measurements, Inc.
Applied Thermal Technologies Inc.
AUTOMATION PRODUCTS INC.
Badger Meter, Inc.
Barnant Co.
Blacoh Fluid Control, Inc.
Brinkmann Instruments Inc.
Buhler Inc.

BYK-GARDNER USA
Cambridge Applied Systems, Inc.
CEM Corp.
Control Instruments Corp.
CSC Scientific Co., Inc.
Delta Controls Corp.
Draiswerke GmbH, North America Div.
E.C.D.
Electro-Technic Products, Inc.
Electronic Sensors, Inc.
Fabricated Metals, Inc.
Gilson Co., Inc.
Glas-Col
GretagMacbeth
Jordan Composites Inc.
Kaeser Compressors, Inc.
Kernco Instruments Co., Inc.
Liquid Controls Corp.
Micromeritics
Micromet Instruments
Minolta Corporation
Nametre Company
New Protectaire Systems Co.
Norton Chemical Process Products Corp.

OMNIMARK INSTRUMENT CORP.

Pfaudler, Inc.
Plast-O-Matic Valves, Inc.
Porous Materials, Inc.
Precision Dispensing, Inc.
Schlumberger Industries
Serfilco, Ltd.
Solartron Transducers
Tangent Systems, Inc.
THOMAS SCIENTIFIC
U.V. Process Supply, Inc.
United Air Specialists, Inc.
Viking Pump, Inc.

Control Systems

Accu-Rate, Inc., A Unit of Schenck
Acrison, Inc.
Analytical Measurements, Inc.
Applied Thermal Technologies Inc.
AUTOMATION PRODUCTS INC.
Badger Meter, Inc.
Barnant Co.
Buhler Inc.
Cambridge Applied Systems, Inc.
Control Instruments Corp.
Draiswerke GmbH, North America Div.
Electronic Sensors, Inc.
Fabricated Metals, Inc.
GretagMacbeth
Jordan Composites Inc.
Micromet Instruments
Minolta Corporation
Pfaudler, Inc.
Porous Materials, Inc.
Precision Dispensing, Inc.
Solartron Transducers

Flowmeters

Accu-Rate, Inc., A Unit of Schenck
Badger Meter, Inc.
Barnant Co.
BYK-GARDNER USA
Liquid Controls Corp.
Schlumberger Industries
THOMAS SCIENTIFIC

Heat Exchangers

Applied Thermal Technologies Inc.
Norton Chemical Process Products Corp.
U.V. Process Supply, Inc.
United Air Specialists, Inc.

Heat Recovery Systems

Kaeser Compressors, Inc.
Norton Chemical Process Products Corp.
United Air Specialists, Inc.

Level Alarms

Delta Controls Corp.
Electronic Sensors, Inc.
Kernco Instruments Co., Inc.
New Protectaire Systems Co.

Level Controls

AUTOMATION PRODUCTS INC.
Badger Meter, Inc.
Barnant Co.
Delta Controls Corp.
Electronic Sensors, Inc.
Kernco Instruments Co., Inc.
New Protectaire Systems Co.
Serfilco, Ltd.

Level Sensors

AUTOMATION PRODUCTS INC.
Badger Meter, Inc.
Barnant Co.
Delta Controls Corp.
Electronic Sensors, Inc.
Kernco Instruments Co., Inc.
New Protectaire Systems Co.
Serfilco, Ltd.

Liquid Depth Indicators

Delta Controls Corp.
Electronic Sensors, Inc.
New Protectaire Systems Co.

Liquid Level Indicators

AUTOMATION PRODUCTS INC.
Delta Controls Corp.
Electronic Sensors, Inc.
New Protectaire Systems Co.
Plast-O-Matic Valves, Inc.

Positive Displacement Meters

Badger Meter, Inc.
Barnant Co.
Liquid Controls Corp.
Schlumberger Industries
Viking Pump, Inc.

Proportioning Systems and Components

American Lewa, Inc.
AUTOMATION PRODUCTS INC.
Viking Pump, Inc.

Specific Gravity Measuring Devices

AUTOMATION PRODUCTS INC.
Gilson Co., Inc.
Kernco Instruments Co., Inc.
Micromeritics
Solartron Transducers
THOMAS SCIENTIFIC

Temperature Compensators

Kernco Instruments Co., Inc.

Temperature Controls

Applied Thermal Technologies Inc.
Barnant Co.
Cambridge Applied Systems, Inc.

Glas-Col
Kernco Instruments Co., Inc.
Tangent Systems, Inc.

Misc. Instrumentation and Control

A.P. Dataweigh Systems
AUTOMATION PRODUCTS INC.
Badger Meter, Inc.
Barnant Co.
Blacoh Fluid Control, Inc.
Brinkmann Instruments Inc.
Cambridge Applied Systems, Inc.
CEM Corp.
Control Instruments Corp.
CSC Scientific Co., Inc.
E.C.D.
Electro-Technic Products, Inc.
GretagMacbeth
Kernco Instruments Co., Inc.
Micromet Instruments
Minolta Corporation
Nanette Company
OMNIMARK INSTRUMENT CORP.
Pfaudler, Inc.
Plast-O-Matic Valves, Inc.
Porous Materials, Inc.
Tangent Systems, Inc.
THOMAS SCIENTIFIC
U.V. Process Supply, Inc.
Viking Pump, Inc.

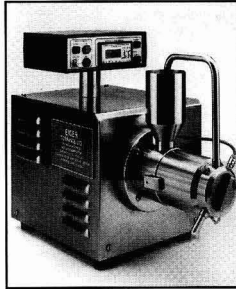
Mixing and Dispersing

A & J Mixing Intl. Inc.
A.P. Dataweigh Systems
Apex Drum Co., Inc.
Avestin Inc.
B & P Process Equipment and Systems
Barnant Co.
T.J. Bell Inc.
Bergen Barrel & Drum Co.
Bishop International Co.
The Blade Shop
Bowers Process Equipment Inc., Div. of
Steelcraft Industries Ltd.
C.W. Brabender Instruments Inc.
Brinkmann Instruments Inc.
Buhler Inc.
BYK-GARDNER USA
CB Mills
Draiswerke GmbH, North America Div.
Draiswerke, Inc.
DRUM-MATES, INC., DRUM MIXERS PUMP
Eclipse Systems
EIGER MACHINERY, INC.
Einstein and Co.
Epworth Morehouse-Cowles
PAUL N. GARDNER CO., INC.
Gilson Co., Inc.
Glas-Col
Glen Mills, Inc.
Hockmeyer Equipment Corp.
Hoover Color Corp.
IKA Works, Inc.
Indco, Inc.
Industry Tech
INOUE USA
International Reserve Equipment Corp.
Jaygo, Inc.
Kady International
Kemutec, Inc.
Littleford Day Inc.
Microfluidics International Corp.
MixMor
Morse Manufacturing Co., Inc.

EIGER

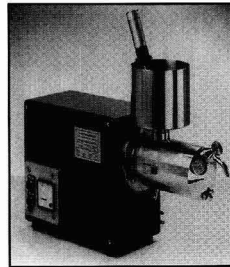
...Does It All
From R&D Through High-Output Production

Laboratory "Mini" Mills



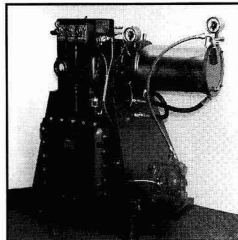
- Quick release chamber and end plate
- Diverter end plate for recirculation or single pass
- Self pumping
- Explosion proof
- Diagnostics available
- 50 ml, 100 ml, 250 ml and 750 ml chambers
- **NEW**—screen or gap separators

Laboratory/Production "Maxi" Mills



- Self contained
- Self pumping
- Single pass operation
- Pilot and small batch production
- Batch size of 500 ml and up
- Chamber sizes -
- 0.5, 1, 2 L lab sizes
- **NEW** 5, 10, 20 L production sizes

Production Mills



- High efficiency cooling
- High efficiency milling chamber baffle increases shear & impact forces
- Cartridge Mechanical Seal for long life
- High output media separator
- Electronic variable speed agitator for precise process control
- Mill size of 5 thru 250 L

EIGER

888 E. Belvidere Road
Grayslake, IL 60030
1-800-25-EIGER
or
PH# 847-548-0044
FAX 847-548-0099

Circle No. 165 on Reader Service Card

Myers Engineering
 Netzsch Incorporated
 Norstone, Inc.
 Petts Enterprises
 Plast-O-Meric, Inc.
 Premier Mill Corp.
 Process Systems & Components
 Readco Manufacturing, Inc.
 Reynolds Industries, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
 Sonic Corp.
 Theysohn America, Inc.
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 U.S. Best, Inc.
 U.V. Process Supply, Inc.
 Welding Engineers, Inc.
 Werner & Pfleiderer Corp.
 Westerlins Maskinfabrik AB

Change Can

Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 Buhler Inc.
 CB Mills
 Draiswerke GmbH, North America Div.
 Draiswerke, Inc.
 Epworth Morehouse-Cowles
 Glen Mills, Inc.
 Morse Manufacturing Co., Inc.
 Myers Engineering
 Plast-O-Meric, Inc.
 Process Systems & Components
 Charles Ross & Son Co.

Drum

A.P. Dataweigh Systems
 Apex Drum Co., Inc.
 Bergen Barrel & Drum Co.
 Draiswerke, Inc.
DRUM-MATES, INC., DRUM MIXERS
PUMP
 Eclipse Systems
EIGER MACHINERY, INC.
 Epworth Morehouse-Cowles
 Indco, Inc.
 Jaygo, Inc.
 Morse Manufacturing Co., Inc.
 Norstone, Inc.
 Petts Enterprises
 Process Systems & Components
 Charles Ross & Son Co.
 Plast-O-Meric, Inc.
 Premier Mill Corp.
 U.S. Best, Inc.

Homogenizers

Avestin Inc.
 Bishop International Co.
 Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 Brinkmann Instruments Inc.
 CB Mills
 Draiswerke, Inc.
 Einstein and Co.
 Epworth Morehouse-Cowles
 Glas-Col
 Glen Mills, Inc.
 IKA Works, Inc.
 Jaygo, Inc.
 Kady International
 Microfluidics International Corp.
 Myers Engineering
 Norstone, Inc.

Petts Enterprises
 Reynolds Industries, Inc.
 Charles Ross & Son Co.
 Sonic Corp.
THOMAS SCIENTIFIC

Horizontal Paddle-Type

A & J Mixing Intl. Inc.
 Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
BYK-GARDNER USA
 Draiswerke, Inc.
 Eclipse Systems
 Epworth Morehouse-Cowles
 Hockmeyer Equipment Corp.
 INOUE USA
 International Reserve Equipment Corp.
 Kemutec, Inc.
 Littleford Day Inc.
 Norstone, Inc.
 Plast-O-Meric, Inc.
 Readco Manufacturing, Inc.
 Charles Ross & Son Co.
 Reynolds Industries, Inc.

Kneaders

B & P Process Equipment and Systems
 Draiswerke, Inc.
 Epworth Morehouse-Cowles
 IKA Works, Inc.
 INOUE USA
 Jaygo, Inc.
 Littleford Day Inc.
 Readco Manufacturing, Inc.
 Charles Ross & Son Co.
 Theysohn America, Inc.
 Welding Engineers, Inc.
 Werner & Pfleiderer Corp.

Muller

Draiswerke, Inc.
 Epworth Morehouse-Cowles
 Hoover Color Corp.

Pipe Line

Charles Ross & Son Co.
 Einstein and Co.
 Epworth Morehouse-Cowles
 Petts Enterprises
 Process Systems & Components

**Rotary Batch Mixers
 and Blenders**

B & P Process Equipment and Systems
 T.J. Bell Inc.
 Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 CB Mills
 Draiswerke, Inc.
 Eclipse Systems
 Epworth Morehouse-Cowles
 Glas-Col
 IKA Works, Inc.
 INOUE USA
 Kemutec, Inc.
 Littleford Day Inc.
 Morse Manufacturing Co., Inc.
 Plast-O-Meric, Inc.
 Process Systems & Components
 Readco Manufacturing, Inc.
 Charles Ross & Son Co.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.

Rotor Blade

Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 C.W. Brabender Instruments Inc.
 CB Mills
 Draiswerke, Inc.
 Epworth Morehouse-Cowles
 Gilson Co., Inc.
 Hockmeyer Equipment Corp.
 Kemutec, Inc.
 Norstone, Inc.
 Readco Manufacturing, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.

Spiral Blade

Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 Epworth Morehouse-Cowles
 Hockmeyer Equipment Corp.
 Norstone, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.

Thinning and Tinting Tanks

Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 CB Mills
 Draiswerke GmbH, North America Div.
 Petts Enterprises
 Charles Ross & Son Co.
 Westerlins Maskinfabrik AB

Ultrasonic Energy Dispersers

Glen Mills, Inc.
 Sonic Corp.

Misc. Mixing and Dispersing

A.P. Dataweigh Systems
 Apex Drum Co., Inc.
 Barnant Co.
 The Blade Shop
 Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
BYK-GARDNER USA
 Buhler Inc.
 Draiswerke, Inc.
 Eclipse Systems
EIGER MACHINERY, INC.
 Einstein and Co.
 Epworth Morehouse-Cowles
PAUL N. GARDNER CO., INC.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 IKA Works, Inc.
 Industry Tech
 INOUE USA
 Kady International
 Kemutec, Inc.
 Littleford Day Inc.
 Microfluidics International Corp.
 MixMor
 Myers Engineering
 Netzsch Incorporated
 Norstone, Inc.
 Petts Enterprises
 Plast-O-Meric, Inc.
 Premier Mill Corp.
 Charles Ross & Son Co.
THOMAS SCIENTIFIC
 U.S. Best, Inc.
 U.V. Process Supply, Inc.
 Welding Engineers, Inc.
 Westerlins Maskinfabrik AB

Pumping/Metering

All-Flo Pump Co.
 American Lewa, Inc.
 Analytical Measurements, Inc.
 Apex Drum Co., Inc.
 Avestin Inc.
 Badger Meter, Inc.
 Barnant Co.
 Betz Dearborn, Metals Process Group
 Blacoh Fluid Control, Inc
 Brinkmann Instruments Inc.

BYK-GARDNER USA

DRUM-MATES, INC., DRUM MIXERS PUMP

Finish Thompson, Inc.
 Gilson Co., Inc.
 Graco, Inc.
 Granco Pump Co.
 Horiba Instruments Inc.
 International Reserve Equipment Corp.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 Jaygo, Inc.
 Jet Edge, Inc.
 Jordan Composites Inc.
 Kaeser Compressors, Inc.
 Kemutec, Inc.
 Kernco Instruments Co., Inc.
 Liquid Controls Corp.
 Morse Manufacturing Co., Inc.
 NLB Corp
 Plast-O-Matic Valves, Inc.
 Porous Materials, Inc.
 Quackenbush Co., Inc.
 Serfilco, Ltd.
 Sonic Corp.

THOMAS SCIENTIFIC

Titan Tool, Inc.
 Tri-Clover Inc.
 U.S. Best, Inc.
 U.S. Stoneware
 U.V. Process Supply, Inc.
 Viking Pump, Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.
 Yamada America, Inc.

Fittings

Barnant Co.
 Jaeco-Stewart Inc.
 Titan Tool, Inc.

Meters

Badger Meter, Inc.
 Liquid Controls Corp.

Meters-pH

Analytical Measurements, Inc.
 Barnant Co.
 Betz Dearborn, Metals Process Group
 Brinkmann Instruments Inc.

BYK-GARDNER USA

Gilson Co., Inc.
 Horiba Instruments Inc.
 Serfilco, Ltd.

THOMAS SCIENTIFIC

U.V. Process Supply, Inc.

Pumps

All-Flo Pump Co.
 American Lewa, Inc.
 Apex Drum Co., Inc.
 Avestin Inc.
 Barnant Co.
 Betz Dearborn, Metals Process Group

DRUM-MATES, INC., DRUM MIXERS PUMP

Finish Thompson, Inc.
 Gilson Co., Inc.
 Graco, Inc.
 Granco Pump Co.
 International Reserve Equipment Corp.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 Jaygo, Inc.
 Jet Edge, Inc.
 Jordan Composites Inc.
 Kaeser Compressors, Inc.
 Kernco Instruments Co., Inc.
 Morse Manufacturing Co., Inc.
 NLB Corp
 Plast-O-Matic Valves, Inc.
 Quackenbush Co., Inc.
 Serfilco, Ltd.
 Sonic Corp.
THOMAS SCIENTIFIC
 Titan Tool, Inc.
 Tri-Clover Inc.
 U.S. Best, Inc.
 U.S. Stoneware
 U.V. Process Supply, Inc.
 Viking Pump, Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.
 Yamada America, Inc.

Air Powered

All-Flo Pump Co.
 Apex Drum Co., Inc.
 Barnant Co.
 Betz Dearborn, Metals Process Group
DRUM-MATES, INC., DRUM MIXERS PUMP

Finish Thompson, Inc.
 Graco, Inc.
 ITT Marlow/ITT A-C Pump
 Quackenbush Co., Inc.
 Serfilco, Ltd.
THOMAS SCIENTIFIC
 Titan Tool, Inc.
 U.S. Stoneware
 U.V. Process Supply, Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.
 Yamada America, Inc.

Carboydrum

Betz Dearborn, Metals Process Group
 Finish Thompson, Inc.
 Serfilco, Ltd.

Centrifugal

DRUM-MATES, INC. DRUM MIXERS PUMP

Finish Thompson, Inc.
 International Reserve Equipment Corp.
 ITT Marlow/ITT A-C Pump
 Jordan Composites Inc.
 Serfilco, Ltd.
 Tri-Clover Inc.
 Warren Rupp, Inc. Unit of Idex Corp.

Diaphragm

All-Flo Pump Co.
 American Lewa, Inc.
 Apex Drum Co., Inc.
 Barnant Co.
 Graco, Inc.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 Kernco Instruments Co., Inc.

Quackenbush Co., Inc.
 Serfilco, Ltd.
 Titan Tool, Inc.
 U.V. Process Supply, Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.
 Yamada America, Inc.

Hand

Apex Drum Co., Inc.
 Barnant Co.
 Finish Thompson, Inc.
 Morse Manufacturing Co., Inc.
 Serfilco, Ltd.
THOMAS SCIENTIFIC
 U.S. Best, Inc.
 U.V. Process Supply, Inc.

High Pressure

American Lewa, Inc.
 Avestin Inc.
 Graco, Inc.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 Jet Edge, Inc.
 NLB Corp
 Quackenbush Co., Inc.
 Sonic Corp.
 Viking Pump, Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.

Metering

American Lewa, Inc.
 Apex Drum Co., Inc.
 Barnant Co.
 Graco, Inc.
 Jaeco-Stewart Inc.
 Kernco Instruments Co., Inc.
 Plast-O-Matic Valves, Inc.
 Quackenbush Co., Inc.
 Serfilco, Ltd.
 U.V. Process Supply, Inc.
 Viking Pump, Inc.

Positive Displacement Rotary

Barnant Co.
 Granco Pump Co.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 Plast-O-Matic Valves, Inc.
 Quackenbush Co., Inc.
 Sonic Corp.
 Tri-Clover Inc.
 Viking Pump, Inc.

Proportional

American Lews, Inc
 Graco, Inc.
 Jaeco-Stewart Inc.
 Kernco Instruments Co., Inc.

Reciprocating

American Lewa, Inc.
 Graco, Inc.
 ITT Marlow/ITT A-C Pump
 Jaeco-Stewart Inc.
 NLB Corp
 Plast-O-Matic Valves, Inc.
 Quackenbush Co., Inc.
 Warren Rupp, Inc. Unit of Idex Corp.
 Wilden Pump & Engineering Co.

Vacuum

Barnant Co.

Brinkmann Instruments Inc.
 Gilson Co., Inc.
 International Reserve Equipment Corp.
 Kaeser Compressors, Inc.
 Plast-O-Matic Valves, Inc.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.

Valves

All-Flo Pump Co.
 Apex Drum Co., Inc.
 Badger Meter, Inc.
 Jaeco-Stewart Inc.
 Kemutec, Inc.
 Plast-O-Matic Valves, Inc.
 Porous Materials, Inc.
 Quackenbush Co., Inc.
 Tri-Clover Inc.

Misc. Pumping/Metering

Barnant Co.
 Blacoh Fluid Control, Inc
 Glen Mills, Inc.
 Quackenbush Co., Inc.
 Viking Pump, Inc.

Ram Dischargers

Bowers Process Equipment Inc., Div. of
 Steelcraft Industries Ltd.
 Buhler Inc.
 Charles Ross & Son Co.
 Hockmeyer Equipment Corp.
 Myers Engineering
 Petts Enterprises

Reactor and Recovery Systems

International Reserve Equipment Corp.
 Littleford Day Inc.
 Pfaudler, Inc.
 Reynolds Industries, Inc.

Robotics/Automation

Fanuc Robotics North America, Inc.
 Heisler Industries, Inc.

Safety/Fire Protection

A.P. Dataweigh Systems
 American Specialty Equipment
 Buhler Inc.
 Consolidated Drum Reconditioning Co., Inc.
 DCE, Inc.
 Jet Wheelblast Equipment
 LPI Inc., Div. of LDPI Co.
 Mine Safety Appliances
 U.V. Process Supply, Inc.
 United Air Specialists, Inc.

Dust Removal Systems

Buhler Inc.
 DCE, Inc.
 Jet Wheelblast Equipment
 United Air Specialists, Inc.

**Explosion Detection and Sup-
 pression Systems**

Mine Safety Appliances

**Explosion-Proof Electric Lift
 Trucks**

American Specialty Equipment
 LPI Inc., Div. of LDPI Co.

Safety Containers

Consolidated Drum Reconditioning Co., Inc.
 U.V. Process Supply, Inc.

Misc. Safety/Fire Protection

A.P. Dataweigh Systems

Solvent Recovery

Brinkmann Instruments Inc.
 CB Mills
 Dedert Corp.
 Disti-Kleen, Inc.
 Epworth Morehouse-Cowles
 Finish Thompson, Inc.
 Littleford Day Inc.
 Petts Enterprises
 Pfaudler, Inc.
 Process Systems & Components
THOMAS SCIENTIFIC
 Vara International, Div. of Calgon Carbon

Spray Booths

Gasmac, Inc., Finish Div.
 New Protectaire Systems Co.
 Ramco Finishing Systems
 Safe,O Systems Inc.
 Wagner Systems, Inc.

Tinting

Precision Dispensing, Inc.

Laboratory Apparatus & Testing Equipment

Accelerated Weathering

Atlas Electric Devices
T.J. Bell Inc.
KTA-TATOR, INC.
PAUL N. GARDNER CO., INC.
WILLIAM HARRISON CORP.
Plast-O-Meric, Inc.
Q-Panel Lab Products
Singleton Corp.
Sub-Tropical Testing Service
THOMAS SCIENTIFIC
WESTERN EQUIPMENT COMPANY

Balances/Scales

A.P. Dataweigh Systems
CSC Scientific Co., Inc.
PAUL N. GARDNER CO., INC.
Gilson Co., Inc.
Kernco Instruments Co., Inc.
OMNIMARK INSTRUMENT CORP.
Sub-Tropical Testing Service
Testing Machines, Inc.
THOMAS SCIENTIFIC
Thwing-Albert Instrument Co.
U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Coating Application

ACT Laboratories
T.J. Bell Inc.
BYK-GARDNER USA
Eastern-Cleveland Mixers
PAUL N. GARDNER CO., INC.
Industry Tech
Moco Thermal Industries
Muetek Analytic Inc.
Research North America, Inc.
SEMico Corp.
TherMold Partners, L.P., Thermal Analysis
THOMAS SCIENTIFIC
Thwing-Albert Instrument Co.

Color/Optical/Appearance Measurement

Analytical Measurement Technology
Atlas Electric Devices
T.J. Bell Inc.
BYK-GARDNER USA
Color Communications, Inc.
Colorcurve Systems
ColorTec Associates
Corpro Companies, Inc.
Datacolor International
DSA Consulting, Inc.
Elcometer, Inc.
PAUL N. GARDNER CO., INC.
GretagMacbeth
HunterLab
Kernco Instruments Co., Inc.
KTA-TATOR, INC.
Labsphere Inc.
Microcolor Dispersions, Ltd.
Microview USA Inc., D.I.R.T. Systems Div.
Minolta Corporation
Ocean Optics, Inc.
Plast-O-Meric, Inc.
Research North America, Inc.
Rhpoint Instrumentation Ltd.
Sub-Tropical Testing Service
Testing Machines, Inc.
THOMAS SCIENTIFIC

Thwing-Albert Instrument Co.
Tricor Systems Inc.
U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY
X-Rite, Incorporated

Color Cards

T.J. Bell Inc.
BYK-GARDNER USA
Color Communications, Inc.
GretagMacbeth
Microcolor Dispersions, Ltd.
Minolta Corporation
U.V. Process Supply, Inc.

Color Control Systems

Color Communications, Inc.
Colorcurve Systems
ColorTec Associates
Datacolor International
GretagMacbeth
Minolta Corporation
X-Rite, Incorporated

Color Display

Color Communications, Inc.
Microcolor Dispersions, Ltd.

Color Matching/Measuring Instruments

Atlas Electric Devices
BYK-GARDNER USA
ColorTec Associates
Datacolor International
PAUL N. GARDNER CO., INC.
GretagMacbeth
HunterLab
Kernco Instruments Co., Inc.
Labsphere Inc.
Minolta Corporation
Ocean Optics, Inc.
Research North America, Inc.
Sub-Tropical Testing Service
Testing Machines, Inc.
THOMAS SCIENTIFIC
Thwing-Albert Instrument Co.
U.V. Process Supply, Inc.
X-Rite, Incorporated

Color Merchandising Aids

Color Communications, Inc.
Colorcurve Systems
Microcolor Dispersions, Ltd.

Color Meters

BYK-GARDNER USA
ColorTec Associates
Datacolor International
PAUL N. GARDNER CO., INC.
HunterLab
KTA-TATOR, INC.
Minolta Corporation
Sub-Tropical Testing Service
THOMAS SCIENTIFIC

Distinctness of Image Meters

Analytical Measurement Technology
PAUL N. GARDNER CO., INC.
Sub-Tropical Testing Service
Tricor Systems Inc.

Glossmeters

Analytical Measurement Technology
T.J. Bell Inc.
BYK-GARDNER USA
Corpro Companies, Inc.
Elcometer, Inc.
PAUL N. GARDNER CO., INC.
HunterLab
Kernco Instruments Co., Inc.
KTA-TATOR, INC.
Minolta Corporation
Rhpoint Instrumentation Ltd.
Sub-Tropical Testing Service
THOMAS SCIENTIFIC
Tricor Systems Inc.
WESTERN EQUIPMENT COMPANY

Hazemeters

BYK-GARDNER USA
Rhpoint Instrumentation Ltd.
THOMAS SCIENTIFIC
Tricor Systems Inc.

Misc. Color/Optical/Appearance Measurement

BYK-GARDNER USA
ColorTec Associates
Datacolor International
DSA Consulting, Inc.
PAUL N. GARDNER CO., INC.
GretagMacbeth
HunterLab
Labsphere Inc.
Microview USA Inc., D.I.R.T. Systems Div.
Minolta Corporation
Ocean Optics, Inc.
Rhpoint Instrumentation Ltd.
Sub-Tropical Testing Service
Testing Machines, Inc.
THOMAS SCIENTIFIC
Tricor Systems Inc.
X-Rite, Incorporated

Densitometers

C.W. Brabender Instruments Inc.
Eastern-Cleveland Mixers
PAUL N. GARDNER CO., INC.
GretagMacbeth
Quantachrome Corp.
Rhpoint Instrumentation Ltd.
Sensor Products
Solartron Transducers
U.V. Process Supply, Inc.

Gages

Automation USA
T.J. Bell Inc.
Blacoh Fluid Control, Inc.
BYK-GARDNER USA
CMI International
Corpro Companies, Inc.
DeFelsko Corporation
Dek-Tron Scientific Instruments
Elcometer, Inc.
Fischer Technology Inc.
PAUL N. GARDNER CO., INC.
Gibney-Bruce, Inc.
Gilson Co., Inc.
Industry Tech
Kernco Instruments Co., Inc.

Krautkramer Branson
KTA-TATOR, INC.
 The Leneta Company
 Microview USA Inc., D.I.R.T. Systems Div.
 Plast-O-Matic Valves, Inc.
 Precision Gage & Tool Co.
 Pro Motorcar Products
 S & G Technologies
 Testing Machines, Inc.
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 U.V. Process Supply, Inc.
 Veeco Instruments, Inc. UPA Technology
WESTERN EQUIPMENT COMPANY

Coating Thickness

Automation USA
 T.J. Bell Inc.
BYK-GARDNER USA
 CMI International
 Corpro Companies, Inc.
 DeFelsko Corporation
 Dek-Tron Scientific Instruments
 Elcometer, Inc.
 Fischer Technology Inc.
PAUL N. GARDNER CO., INC.
 Gibney-Bruce, Inc.
 Industry Tech
 Kernco Instruments Co., Inc.
KTA-TATOR, INC.
 Microview USA Inc., D.I.R.T. Systems Div.
 Precision Gage & Tool Co.
 Pro Motorcar Products
 S & G Technologies
 Testing Machines, Inc.
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 U.V. Process Supply, Inc.
 Veeco Instruments, Inc. UPA Technology
WESTERN EQUIPMENT COMPANY

Film Thickness

T.J. Bell Inc.
BYK-GARDNER USA
 CMI International
 Corpro Companies, Inc.
 DeFelsko Corporation
 Dek-Tron Scientific Instruments
 Elcometer, Inc.
 Fischer Technology Inc.
PAUL N. GARDNER CO., INC.
 Gibney-Bruce, Inc.
 Industry Tech
 Kernco Instruments Co., Inc.
KTA-TATOR, INC.
 Microview USA Inc., D.I.R.T. Systems Div.
 Precision Gage & Tool Co.
 Testing Machines, Inc.
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 U.V. Process Supply, Inc.
 Veeco Instruments, Inc. UPA Technology
 Div.
WESTERN EQUIPMENT COMPANY

Pressure

Blacoh Fluid Control, Inc.
 Gilson Co., Inc.
 Kernco Instruments Co., Inc.
KTA-TATOR, INC.
 Plast-O-Matic Valves, Inc.
 Testing Machines, Inc.
THOMAS SCIENTIFIC

Misc. Gages

Dek-Tron Scientific Instruments

PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.
 Industry Tech
 Kernco Instruments Co., Inc.
 Krautkramer Branson
KTA-TATOR, INC.
 The Leneta Company
 Precision Gage & Tool Co.
 Testing Machines, Inc.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Gas Chromatographs

Celite Corp. - c/o World Minerals, Inc.
 Mine Safety Appliances
 PE Photovac
WESTERN EQUIPMENT COMPANY

Holiday Detectors

T.J. Bell Inc.
 Corpro Companies, Inc.
 Elcometer, Inc.
 Electro-Technic Products, Inc.
PAUL N. GARDNER CO., INC.
THOMAS SCIENTIFIC

**Humidity/Condensation/
 Ultraviolet Chambers**

Atlas Electric Devices
 T.J. Bell Inc.
PAUL N. GARDNER CO., INC.
 Q-Panel Lab Products
 Singleton Corp.
 Sub-Tropical Testing Service
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.

Lab Mills

Paul O. Abbe, Inc.
 T.J. Bell Inc.
 Bishop International Co.
 Brinkmann Instruments Inc.
 C.W. Brabender Instruments Inc.
BYK-GARDNER USA
 CB Mills
 CSC Scientific Co., Inc.
EIGER MACHINERY, INC.
 Einstein and Co.
 Epworth Morehouse-Cowles
PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.
 Glen Mills, Inc.
 Hockmeyer Equipment Corp.
 Hoover Color Corp.
 Kady International
 Lehmann Mills, Inc.
 Charles Ross & Son Co.
SCHOLD MACHINE CO.
THOMAS SCIENTIFIC
 U.S. Stoneware
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Light Booths

T.J. Bell Inc.
BYK-GARDNER USA
 Datacolor International
PAUL N. GARDNER CO., INC.
 GretagMachbeth
 Minolta Corporation
 Sub-Tropical Testing Service
 Testing Machines, Inc.
THOMAS SCIENTIFIC
WESTERN EQUIPMENT COMPANY

Ovens

T.J. Bell Inc.
 Brinkmann Instruments Inc.
BYK-GARDNER USA
 Casso-Solar Corp.
 CEM Corp.
 Chemsultants International
 Eastern-Cleveland Mixers
**FOSTORIA INDUSTRIES, INC., PROCESS
 HEAT DIV.**
PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.
 Glenro Inc.
 Grieve Corp.
 Gruenberg Oven
 Infra-Red Technologies, Inc.
 Kernco Instruments Co., Inc.
 Moco Thermal Industries
 Safe₂O Systems Inc.
 Structure Probe, Inc.
 Sub-Tropical Testing Service
 Thermovation Engineering
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
WESTERN EQUIPMENT COMPANY

Particle Characterization

Amherst Process Instruments
 Brookhaven Instruments Co.
 CSC Scientific Co., Inc.
 Gilson Co., Inc.
 Horiba Instruments Inc.
 Lasentec
 Malvern Instruments
 Micromeritics
 Microview USA Inc., D.I.R.T. Systems Div.
 Muetek Analytic Inc.
PARTICLE SIZING SYSTEMS, INC.
 Quantachrome Corp.
 Structure Probe, Inc.

pH Meters

Analytical Measurements, Inc.
 Barnant Co.
 T.J. Bell Inc.
 Betz Dearborn, Metals Process Group
 Brinkmann Instruments Inc.
BYK-GARDNER USA
 Elcometer, Inc.
PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.
 Horiba Instruments Inc.
 Kernco Instruments Co., Inc.
 Serfilco, Ltd.
 Singleton Corp.
 Structure Probe, Inc.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Physical/Mechanical

Atlas Electric Devices
 Bjorksten Research Laboratories, Inc.
BYK-GARDNER USA
 CSC Scientific Co., Inc.
PAUL N. GARDNER CO., INC.
 Haake
 Imass, Inc.
 Quad Group
 Stony Brook Scientific Ltd.
 Sub-Tropical Testing Service
 TA Instruments, Inc.
 TherMold Partners, L.P., Thermal Analysis
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 Tricor Systems Inc.

Reflectometers

T.J. Bell Inc.
BYK-GARDNER USA
 Labsphere Inc.
PAUL N. GARDNER CO., INC.
 Rhopoint Instrumentation Ltd.
THOMAS SCIENTIFIC
 Tricor Systems Inc.
WESTERN EQUIPMENT COMPANY

Rheologicals

C.W. Brabender Instruments Inc.
 Brookfield Engineering Labs., Inc.
 Cannon Instrument Co.
 Dek-Tron Scientific Instruments
 Gilson Co., Inc.
 Haake
 Lasentec
 Paar Physica, USA Inc.
PAUL N. GARDNER CO., INC.
 Rhopoint Instrumentation Ltd.
 Stony Brook Scientific Ltd.
 TA Instruments, Inc.
 TherMold Partners, L.P., Thermal Analysis

Spectrophotometers

BYK-GARDNER USA
 ColorTec Associates
 CSC Scientific Co., Inc.
 Datacolor International
PAUL N. GARDNER CO., INC.
 GretagMacbeth
 Labsphere Inc.
 Minolta Corporation
 Ocean Optics, Inc.
 Sub-Tropical Testing Service
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.

Stirrers

Barnant Co.
 Bishop International Co.
 Brinkmann Instruments Inc.
 Eclipse Systems
 Fawcett Co., Inc.
PAUL N. GARDNER CO., INC.
 Glas-Col
 Glen Mills, Inc.
 IKA Works, Inc.
 Kernco Instruments Co., Inc.
 Research North America, Inc.
 Charles Ross & Son Co.
THOMAS SCIENTIFIC
 U.S. Best, Inc.
 U.V. Process Supply, Inc.
 Westerlins Maskinfabrik AB
WESTERN EQUIPMENT COMPANY

Surface Tension Instruments

Brinkmann Instruments Inc.
BYK-GARDNER USA
CAHN INSTRUMENTS
 CSC Scientific Co., Inc.
 Dek-Tron Scientific Instruments
 First Ten Angstroms
PAUL N. GARDNER CO., INC.
 Kernco Instruments Co., Inc.
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 U.V. Process Supply, Inc.

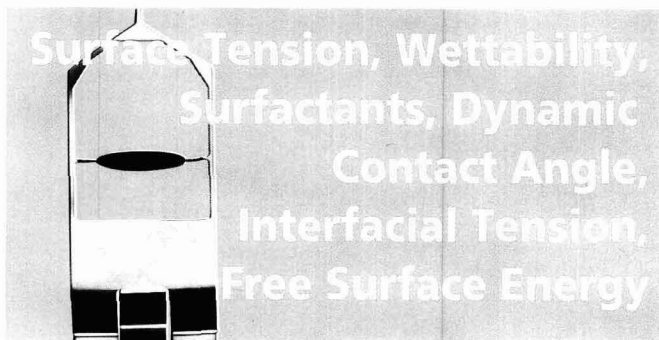
Test Charts/Panels

PAUL N. GARDNER CO., INC.
 The Leneta Company
 Q-Panel Lab Products

Test/Measurement

A.P. Dataweigh Systems
 Analytical Measurement Technology
 Arizona Instrument Corp.
 Automation USA
 Bjorksten Research Laboratories, Inc.
 C.W. Brabender Instruments Inc.
 Brookhaven Instruments Co.
BYK-GARDNER USA
 Chemsultants International
 CMI International
 CSC Scientific Co., Inc.
 DeFelsko Corporation
 Dek-Tron Scientific Instruments
 E.C.D.

Eastern-Cleveland Mixers
 Elcometer, Inc.
 Fischer Technology Inc.
PAUL N. GARDNER CO., INC.
GAMRY INSTRUMENTS, INC.
 Gilson Co., Inc.
 GretagMacbeth
 Haake
 Horiba Instruments Inc.
 Imass, Inc.
 International Light, Inc.
 Kernco Instruments Co., Inc.
 Krautkramer Branson
 Labsphere Inc.
 Malvern Instruments



**MEASURE
 CONTACT
 ANGLE
 WITHOUT
 EYE
 STRAIN**

Cahn, No. 1 in gravimetric technology, gives you the answer to unreliable optical methods...

automatic detection and analysis of θ contact angle and surface energy.

And now, with our new Windows-based software, **WinDCA™**, with features like *Auto Data Analysis* for a full range of probe geometries, *Real Time Buoyancy Correction*, *Simplified Fiber Analysis*, and an *Auto Trail File* for GLP, you can truly be...

For more information, **A step ahead in technology.**

Tel: (800) 244-6305
 Fax: (608) 273-6827
 E-Mail: info@cahn.com



Cahn Instruments, 5225 Verona Rd., Bldg. 1, Madison, WI 53711
 Circle No. 149 on Reader Service Card

Micromet Instruments
 Microview USA Inc., D.I.R.T. Systems Div.
 Minolta Corporation
OMNIMARK INSTRUMENT CORP.
 Porous Materials, Inc.
 Quad Group
 Rhopoint Instrumentation Ltd.
 SEMicro Div.
 Sensor Products
 Stony Brook Scientific Ltd.
 Structure Probe, Inc.
 TA Instruments, Inc.
 Testing Machines, Inc.
 TherMold Partners, L.P., Thermal Analysis
 Thwing-Albert Instrument Co.
THOMAS SCIENTIFIC
 Tricor Systems Inc.
 U.V. Process Supply, Inc.
 Veeco Instruments, Inc. UPA Technology

Viscosity Meters

AUTOMATION PRODUCTS INC.
 Barnant Co.
 T.J. Bell Inc.
 Brinkmann Instruments Inc.
 Brookfield Engineering Labs., Inc.
BYK-GARDNER USA
 C.W. Brabender Instruments Inc.
 Cambridge Applied Systems, Inc.
 Cannon Instrument Co.
PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.

IKA Works, Inc.
 Kernco Instruments Co., Inc.
 Lasentec
 Micromet Instruments
 Nametre Company
 Paar Physica, USA Inc.
 Solartron Transducers
 Stony Brook Scientific Ltd.
 TA Instruments, Inc.
 Testing Machines, Inc.
THOMAS SCIENTIFIC
 U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Misc. Testing Equipment

Paul O. Abbe, Inc.
 Atlas Electric Devices
 T.J. Bell Inc.
BYK-GARDNER USA
 Bjorksten Research Laboratories, Inc.
 CEM Corp.
 Chemsultants International
 Corppo Companies, Inc.
 CSC Scientific Co., Inc.
 Dek-Tron Scientific Instruments
 Eastern-Cleveland Mixers
 Elcometer, Inc.
 First Ten Ångströms
 Fischer Technology Inc.
PAUL N. GARDNER CO., INC.
 Gilson Co., Inc.
 GretagMacbeth

WILLIAM HARRISON CORP.
 IKA Works, Inc.
 Imass, Inc.
 Industry Tech
 International Light, Inc.
 Kernco Instruments Co., Inc.
 Krautkramer Branson
 Labsphere Inc.
 The Leneta Company
 Malvern Instruments
 Micromet Instruments
 Microview USA Inc., D.I.R.T. Systems Div.
 Minolta Corporation
OMNIMARK INSTRUMENT CORP.
 Quad Group
 Research North America, Inc.
 Rhopoint Instrumentation Ltd.
 SEMicro Div.
 Sensor Products
 Singleton Corp.
 Spraymation, Inc.
 Structure Probe, Inc.
 Sub-Tropical Testing Service
 Tangent Systems, Inc.
 Testing Machines, Inc.
 TherMold Partners, L.P., Thermal Analysis
THOMAS SCIENTIFIC
 Thwing-Albert Instrument Co.
 Tricor Systems Inc.
 U.V. Process Supply, Inc.
WESTERN EQUIPMENT COMPANY

Services

Air Pollution/Effluent Control

AAF International
 Alar Engineering Corp.
 DCE, Inc.
 Gasmac, Inc., Finish Div.
 Hockmeyer Equipment Corp.
 International Reserve Equipment Corp.
 Jet Wheelblast Equipment
 Johnson Matthey Environmental Products
 MAC Equipment Inc.
 Surco Products, Inc.
 Uni-Wash/Polaris Indl. Ventilation Group
 United Air Specialists, Inc.
 Vara International, Div. of Calgon Carbon

Consulting/Testing

ACT Laboratories
 American Standards Testing Bureau Inc.
 Atlas Weathering Services, DSET Laboratories Div.
 Atlas Weathering Services Group, South Florida Test Service Div.
 Bjorksten Research Laboratories, Inc.
 Bodycote Industrial Testing Ltd.
 British Standards Institution, Inc.
 Cannon Instrument Co.
 Captain Associates, Inc.
 Cause Engineering L.A., LLC
 Celotex Testing Services
CHEMIR/POLYTECH LABORATORIES
 Chemsultants International
 The Coatings Laboratory Inc.
 Coatings Technology Ltd.
 Color Communications, Inc.
 Consolidated Research Inc.
 Container Testing Laboratory, Inc.
 Corrosion Control Consultants & Labs., Inc.
 Corppo Companies, Inc.
 Cuno, Inc., Filter Systems Div.
 D/L Laboratories
 Detroit Testing Laboratory, Inc.
 Draiswerke GmbH, North America Div.
 DSA Consulting, Inc.
 Eastern-Cleveland Mixers
 Fry Consultants Inc.
 Global Solutions
 Hockmeyer Equipment Corp.
 Hubbard-Hall, Inc.
 Imation Enterprises Corp., Mfg. Div.
 INOUE USA
 Kady International
 M.P. Kenes, Inc.
 Kline & Company, Inc.
KTA-TATOR, INC.
 LaQue Corrosion Services
 Arthur D. Little, Technology Consulting & Product Development Div.
 Lonza, Inc. Specialty Anhydride-Additives
 Micromeritics
 University of Missouri-Rolla UMR Coatings Institute
 Orr & Boss
 Paint Research Associates
 Paint Research Association
 Phoenix Chemical Laboratory, Inc.
 Porous Materials, Inc.
 Precision Dispensing, Inc.
 Promation, Inc.
 Quad Group
 Quantachrome Corp.
 SEMicro Div.
 Skeist, Inc.

The University of Southern Mississippi
 Spiegel & Associates
 Structure Probe, Inc.
 Tangent Systems, Inc.
 TherMold Partners, L.P., Thermal Analysis
 U.V. Process Supply, Inc.
 Van Technologies, Inc.

Educational

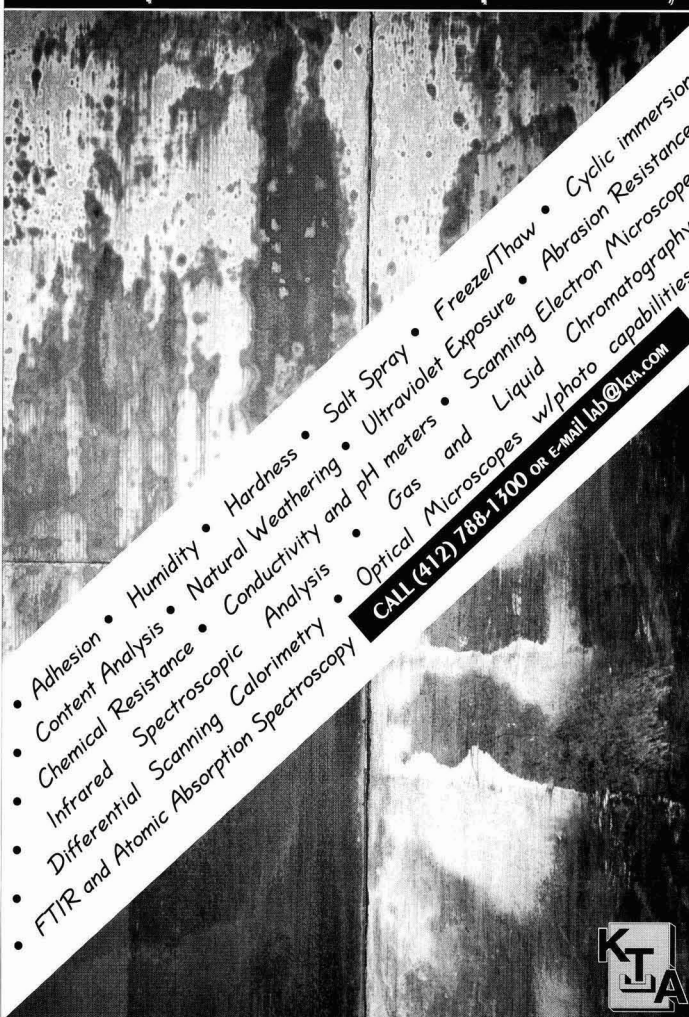
Corrosion Control Consultants & Labs.
 Datacolor International

FEDERATION OF SOCIETIES FOR COATINGS TECHNOLOGY

GretagMacbeth
 Krautkramer Branson
KTA-TATOR, INC.
 LaQue Corrosion Services
 University of Missouri-Rolla UMR Coatings Institute
 NACE International
 North Dakota State University, Dept. of Polymers & Coatings
 RadTech International North America

KTA-TATOR, INC.

COATINGS RESEARCH & TESTING LABORATORY



- Adhesion • Humidity • Hardness • Salt Spray • Freeze/Thaw • Cyclic Immersion
- Content Analysis • Natural Weathering • Ultraviolet Exposure • Abrasion Resistance
- Chemical Resistance • Conductivity and pH meters • Gas and Liquid Microscopes w/photo capabilities
- Infrared Spectroscopic Analysis • Optical Microscopes
- Differential Scanning Calorimetry • FTIR and Atomic Absorption Spectroscopy

CALL (412) 788-1300 OR E-MAIL lab@kta.com



Circle No. 234 on Reader Service Card

The University of Southern Mississippi
Stat-Ease Corp.
Van Technologies, Inc.
Vincentz Verlag

Engineering Services

American Standards Testing Bureau Inc.
Bjorksten Research Laboratories, Inc.
Bodycote Industrial Testing Ltd.
Cause Engineering L.A., LLC
Celotex Testing Services
Container Testing Laboratory, Inc.
Corpo Companies, Inc.
Cuno, Inc., Filter Systems Div.
Draiswerke GmbH, North America Div.
Electronic Sensors, Inc.
Hockmeyer Equipment Corp.
INOUE USA
Kady International
M.P. Kenes, Inc.
KTA-TATOR, INC.
LaQue Corrosion Services
Moco Thermal Industries
New Protectaire Systems Co.
Pfaudler, Inc.
Phoenix Chemical Laboratory, Inc.
Precision Dispensing, Inc.
Premier Mill Corp.
Promation, Inc.
Tricor Systems Inc.
Uni-Wash/Polaris Indl. Ventilation Group
Vara International, Div. of Calgon Carbon
Werner & Pfleiderer Corp.

Environmental/Regulatory Services

American Standards Testing Bureau Inc.
Bodycote Industrial Testing Ltd.
British Standards Institution, Inc.
Chem-Tel Inc.
Container Testing Laboratory, Inc.
Corbus - Div. of CMS, Inc.
D/L Laboratories
KTA-TATOR, INC.
MAC Equipment Inc.
Uni-Wash/Polaris Indl. Ventilation Group
Vara International, Div. of Calgon Carbon

Environmental Control

American Standards Testing Bureau Inc.
British Standards Institution, Inc.
Container Testing Laboratory, Inc.
D/L Laboratories
MAC Equipment Inc.
Uni-Wash/Polaris Indl. Ventilation Group
Vara International, Div. of Calgon Carbon

Environmental Testing Equipment

American Standards Testing Bureau Inc.
Container Testing Laboratory, Inc.
KTA-TATOR, INC.

Exposure Testing

American Standards Testing Bureau Inc.
Atlas Electric Devices
Atlas Weathering Services - DSET Laboratories Div.
Atlas Weathering Services Group - South Florida Test Service Div.
Bodycote Industrial Testing Ltd.
Celotex Testing Services
The Coatings Laboratory Inc.
Container Testing Laboratory, Inc.
Corrosion Control Consultants & Labs., Inc.

D/L Laboratories
Detroit Testing Laboratory, Inc.
WILLIAM HARRISON CORP.
LaQue Corrosion Services
Arthur D. Little, Technology Consulting & Product Development Div.
Phoenix Chemical Laboratory, Inc.
The University of Southern Mississippi
Sub-Tropical Testing Service

Graphic Arts

Global Solutions
Arthur D. Little, Technology Consulting & Product Development Div.
McCorquodale Color Card Spiegel & Associates

Packaging Design-Custom

American Standards Testing Bureau Inc.
Cleveland Pigment & Color Co.
Container Testing Laboratory, Inc.
Fort James Corporation
Labelmaster
Arthur D. Little, Technology Consulting & Product Development Div.
Norman International
Rexam Mulox Inc.
Tenneco Packaging

Publishing

American Chemical Society, Chemical & Engineering News
Captan Associates, Inc.
Chemical Week
FEDERATION OF SOCIETIES FOR COATINGS TECHNOLOGY
ICIS-LOR
Industrial Paint & Powder
NACE International
Paint Research Association
Vincentz Verlag

Research & Development

American Standards Testing Bureau Inc.
Bjorksten Research Laboratories, Inc.
Captan Associates, Inc.
Cause Engineering L.A., LLC
CB Mills
Celotex Testing Services
Chemsultants International
Consolidated Color Corp.
Container Testing Laboratory, Inc.
The Coatings Laboratory Inc.
Coatings Technology Ltd.
Corrosion Control Consultants & Labs., Inc.
Corpo Companies, Inc.
Cuno, Inc., Filter Systems Div.
D/L Laboratories
Dek-Tron Scientific Instruments
Eastern-Cleveland Mixers
ICI Paints/Glidden
Imation Enterprises Corp., Mfg. Div.
KTA-TATOR, INC.
LaQue Corrosion Services
Arthur D. Little, Technology Consulting & Product Development Div.
Lonza, Inc. Specialty Anhydride, Additives
University of Missouri-Rolla UMR Coatings Institute
NACE International
North Dakota State University, Dept. of Polymers & Coatings
Paint Research Associates
Paint Research Association
Phoenix Chemical Laboratory, Inc.
The University of Southern Mississippi

Structure Probe, Inc.
Tricor Systems Inc.
Van Technologies, Inc.

Safety/Health Services

American Standards Testing Bureau Inc.
CB Mills
Chem-Tel Inc.
Container Testing Laboratory, Inc.
Hubbard-Hall, Inc.
KTA-TATOR, INC.

Surface Preparation/Cleaning Pretreatment

AMEX® Cleaning & Coating Removal Systems
Cincinnati Industrial Machinery
Gasmac, Inc., Finish Div.
Hubbard-Hall, Inc.
Infracol Manufacturing Corp.
Jordan Composites Inc.
Sentry/Custom Services Corp.
The University of Southern Mississippi
Structure Probe, Inc.

Turnkey Processes

CB Mills
Cincinnati Industrial Machinery
Custom Aerosol Packaging
Draiswerke GmbH, North America Div.
Fanuc Robotics North America, Inc.
Heisler Industries, Inc.
Infracol Manufacturing Corp.
INOUE USA
Jordan Composites Inc.
Parasol Systems, Inc.
Pfaudler, Inc.
Precision Dispensing, Inc.
Premier Mill Corp.
Promation, Inc.
Ramco Finishing Systems
Reynolds Industries, Inc.
Sandvik Process Systems Inc.
Sonic Corp.
Werner & Pfleiderer Corp.

Waste Disposal

Ashland Chemical Co., IC&S Div.
B.A.G. Corp.
New Protectaire Systems Co.
Progressive Recovery, Inc.
R-Tech Manufacturing, Inc.
Systech Environmental Corporation
Vara International, Div. of Calgon Carbon
Westerlins Maskinfabrik AB

Hazardous

Ashland Chemical Co., IC&S Div.
B.A.G. Corp.
New Protectaire Systems Co.
Progressive Recovery, Inc.
R-Tech Manufacturing, Inc.
Systech Environmental Corporation

Nonhazardous

B.A.G. Corp.
New Protectaire Systems Co.
R-Tech Manufacturing, Inc.
Systech Environmental Corporation

Recycled

Ashland Chemical Co., IC&S Div.
R-Tech Manufacturing, Inc.
Vara International, Div. of Calgon Carbon
Westerlins Maskinfabrik AB

Computer Software

Software

Advanced Software Designs
BatchMaster Software Corp.
C.W. Brabender Instruments Inc.
British Standards Institution, Inc.
Brookfield Engineering Labs., Inc.

CHEMIDEX INC.

ColorTec Associates
Corbus - Div. of CMS, Inc.
DSA Consulting, Inc.
Datacolor International
Electronic Sensors, Inc.
Exxon Chemical Co.
Formation Systems, Inc.

GAMRY INSTRUMENTS, INC.

PAUL N. GARDNER CO., INC.

Gilson Co., Inc.
GretagMacbeth
Guthrie Latex, Inc.
HunterLab
IKA Works, Inc.
Infinium Software
INOUE USA
Krautkramer Branson

KTA-TATOR, INC.

Labelmaster
Microview USA Inc., D.I.R.T. Systems Div.
Minolta Corporation
Parasol Systems, Inc.
Precision Dispensing, Inc.
Promation, Inc.
Stat-Ease Corp.
Tricor Systems Inc.
X-Rite, Incorporated

Formulation

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
Corbus - Div. of CMS, Inc.
Datacolor International
DSA Consulting, Inc.
Exxon Chemical Co.
Formation Systems, Inc.

GretagMacbeth
HunterLab
Infinium Software
Parasol Systems, Inc.
Precision Dispensing, Inc.
Stat-Ease Corp.

Hazardous Material Handling

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
Guthrie Latex, Inc.
Infinium Software
Labelmaster
Precision Dispensing, Inc.

Inventory

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
Infinium Software
Parasol Systems, Inc.
Precision Dispensing, Inc.

Laboratory Analysis

Advanced Software Designs
BatchMaster Software Corp.
C.W. Brabender Instruments Inc.
ColorTec Associates
GAMRY INSTRUMENTS, INC.
Gilson Co., Inc.
IKA Works, Inc.
Infinium Software
Microview USA Inc., D.I.R.T. Systems Div.
Minolta Corporation
Parasol Systems, Inc.

MSDS

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
Corbus - Div. of CMS, Inc.

Infinium Software
Labelmaster
Parasol Systems, Inc.

Production

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
DSA Consulting, Inc.
Guthrie Latex, Inc.
Infinium Software
INOUE USA
Parasol Systems, Inc.
Precision Dispensing, Inc.
Promation, Inc.

Regulatory Compliance

Advanced Software Designs
BatchMaster Software Corp.
ColorTec Associates
Corbus - Div. of CMS, Inc.
Formation Systems, Inc.
Guthrie Latex, Inc.
Infinium Software
Labelmaster
Parasol Systems, Inc.

Misc. Computer Software

Advanced Software Designs
BatchMaster Software Corp.
British Standards Institution, Inc.
Brookfield Engineering Labs., Inc.
ColorTec Associates
DSA Consulting, Inc.
Electronic Sensors, Inc.
PAUL N. GARDNER CO., INC.
Guthrie Latex, Inc.
Infinium Software
Krautkramer Branson
KTA-TATOR, INC.
Parasol Systems, Inc.
Tricor Systems Inc.
X-Rite, Incorporated

FSCT Membership

Offers The Right Mixture for Success



PUBLICATIONS

- A **Complimentary subscription** to the *Journal of Coatings Technology* is included with your membership dues. The JCT, published monthly, is respected around the world for the quality of its technical information. Each issue features papers on the cutting edge of technology, as well as information covering regulatory updates, people in the news, new products, etc.
- The Year Book, the **Who's Who in the Coatings Industry** provides names, addresses, phone and fax numbers of over 7,400 coatings professionals. Included with dues, the spiral-bound desk reference lists FSCT's 27 Constituent Societies and Affiliated members. (a \$150 value)
- FSCT's reference materials including the *Coatings Encyclopedic Dictionary*, *SciQuest*, and the *Series on Coatings Technology* are available to members at discounted prices - you can **save up to 25%**.

EDUCATIONAL PROGRAMS

- Gain **useful ideas and methods** to implement on the job by attending FSCT's regional seminars.
- Network with industry peers at the **FSCT Technology Conference** featuring training sessions and courses for both veterans and beginners in the coatings industry.
- Evaluate the newest trends in technology at the **International Coatings Expo (ICE)**. Held in conjunction with the Technology Conference, the Expo is the largest international trade show for the coatings industry.
- Receive **mailings on FSCT programs**, including updates on the ICE and other FSCT- sponsored events.

SERVICES

- Further your **leadership skills** by serving on Society/FSCT Committees.
- **Save over 25% on registration rates** when attending the FSCT International Coatings Expo and Technology Conference.
- Obtain discounted travel rates through the **FSCT Travel Desk** by calling 800-448-FSCT or 215-628-2549.
- Request information from FSCT's Fax on Demand Service by calling 800-838-5445. International callers please use 215-953-7893.



For more information contact:
FSCT Membership Services
492 Norristown Rd.
Blue Bell, PA 19422-2350
(610) 940-0777 Phone
(610) 940-0292 FAX
<http://www.coatingstech.org>



Distributors

Companies listed Alphabetically 165

Companies listed Geographically 168

Advertisers appear in bold.

ALPHABETICAL

A

Alchemy-South, Ltd.

Alabama
Georgia
Tennessee

American Controls, Inc.
Michigan

American Dispersions, Inc.
Kentucky

Andes Chemical Corp.
Florida

The Argus Co., Inc.
Kentucky

Azalea Color Co.
Florida
Georgia
North Carolina

B

Baker & Collinson, Inc.
Michigan

Basco
Illinois

Bechem Technical Sales
Massachusetts

D.B. Becker Co., Inc.
New Jersey

H.H. Benner Co., Inc.
Kentucky

Blue Hills Group
New Jersey

Bosco Industries, Inc.
Texas

Brandt Technologies, Inc.
Illinois

GEORGE C. BRANDT, INC.

Colorado
Minnesota
Missouri

Brennan Associates, Inc.
Illinois

C

The M.F. Cachat Co.
Ohio

JH Calo Co., Inc.
New York

D.A. Campbell & Co., Inc.
Ohio

The Cary Co.
Illinois

Cascade Marketing
British Columbia

CDF Corp.
Massachusetts

Chem-Materials Co., Inc.
Ohio

CheMarCo., Inc.
North Carolina
South Carolina

Chemical Distributors, Inc.
Oregon
Washington

Chemroy Canada Inc.
British Columbia
Ontario
Quebec

The Chidley & Peto Co.
Illinois

Charles B. Chrystal Co., Inc.
New York

Corbe Chemicals, Inc.
New Jersey

Crozier-Nelson Sales, Inc.
Louisiana
Oklahoma
Texas

CSC Scientific Co., Inc.
Virginia

D

D & F Distributing, Inc.
Texas

DAR-TECH, INC.
Ohio

Distributors

Deeks & Co., Inc.
Alabama
Florida
Georgia
North Carolina
Tennessee

Deeks & Co.
Kentucky
Ohio

Delta Resources
Georgia

Dorsett & Jackson Inc.
California

Dorsett & Jackson, Inc.
California

Durr Marketing Associates Inc.
North Carolina
Ohio
Pennsylvania

E

EMCO Chemical Distributors, Inc.
Illinois

Erie Chemical Distributors Inc.
Massachusetts

F

FITZ CHEM CORP.
Illinois

S.E. Firestone Assoc., Inc
Pennsylvania

Firing Industries Ltd.
Ontario

Flanagan Associates Inc.
Ohio

G

G.L.C. Associates
Florida

J.M. Gillen Co./Van Horn, Metz & Co.
Pennsylvania

H

Hahn Northwest, Inc.
Washington

J.W. Hanson Co., Inc.
New York

Harvey Lipsitz Co.
Pennsylvania

Henley Chemicals (Canada) Ltd.
Ontario

Daniel G. Hereley Co.
Illinois

T.H. Hilsion Co.
Illinois

J.H. Hinz Co.
Ohio

Harry Holland Company, Inc.
Michigan

Horizon Chemicals Ltd.
British Columbia
Ontario
Quebec

E.T. Horn Co.
California

P.T. Hutchins Co. Ltd.
British Columbia
California
Oregon
Mexico

I

Inmark, Inc.
Alabama
Florida
Georgia
North Carolina
Tennessee

Intercorp., Inc.
Wisconsin

J

Jamieson Assoc., Inc.
Texas

K

E.W. Kaufmann Co.
Maryland
Pennsylvania

Kohl Marketing, Inc.
Georgia

Kraft Chemical Co.
Illinois

Kruss USA
North Carolina

L

Landman Chemical Corp.
New Jersey

Carl Lechner, Inc.
Illinois

Lipscomb Chemical Co.
California

D.H. Litter Co., Inc.
New York

Lomas International
Georgia

FITZCHEM HAS YOU COVERED!

*The FitzChem Team provides you with
Quality Products for Excellent Coverage
of all your Raw Material needs.*

<i>Allegheny Color Corporation</i>	<i>Geo Specialty Chemicals</i>
<i>Caschem, Inc.</i>	<i>Great Lakes Chemical Corp.</i>
<i>Cimbar Performance Minerals</i>	<i>Henkel Corp., Coatings & Inks Div.</i>
<i>Columbian Chemicals Co.</i>	<i>Huls America Inc.</i>
<i>Crosfield Co. (Tec-Mar, J.V. Corp.)</i>	<i>Kronos, Inc.</i>
<i>Cytec Industries</i>	<i>Laporte Pigments Corp.</i>
<i>Dominion Colour Corp.</i>	<i>Laufer International, Inc.</i>
<i>Dover Chemical Corp.</i>	<i>Lubrizol Corp., Coating Additives Unit</i>
<i>ECC International</i>	<i>Luzenac America, Inc.</i>
<i>Engelhard Corp.</i>	<i>Mayzo, Inc.</i>
<i>Ferro Corporation</i>	<i>Purac America</i>
<i>Franklin Industrial Minerals</i>	<i>Rhone-Poulenc Specialty Chemicals Co.</i>
<i>General Electric Co.</i>	<i>Süd-Chemie</i>



FitzChem CORPORATION

185 Industrial Drive • Elmhurst, IL 60126
Phone: 630-941-0410 • Fax: 630-941-0439

"Striving to exceed our customers' expectations"



Circle No. 247 on Reader Service Card

Loos & Dilworth, Inc. (Chem Div)
Pennsylvania

Ray Lyman & Co.
Pennsylvania

M

Majemac Enterprises Inc.
Florida

Manufacturing Business Systems
California

Matteson-Ridolfi, Inc.
Michigan

C.L. McGuire & Co.
Kentucky

Micco Distributors, Inc.
Ontario

C.D. Miller Packaging Corp.
New Jersey

S.P. Morell & Co. Inc.
New York

Morton-Myers Co.
Kansas

N

NanoMaterials, Inc.
Rhode Island

New West Sales Corp.
Colorado

O

Olinger Co., Inc.
Georgia
Michigan

Olivieri & Associates
Puerto Rico

P

Palmer Supplies Co.
Ohio

R.B. Patterson Co., Inc.
Georgia
Texas

Points West Dist., Ltd.
British Columbia

Prime Materials Associates, Inc.
Massachusetts

Process, Materials & Eng., Inc.
Alabama

R

RIBELIN SALES INC.
Arizona
Florida
Georgia
Louisiana
Texas

W. A. Ritz Marketing Co.
Pennsylvania

RJ Chemical Sales, Inc.
Maryland

George F. Robbins, Inc.
Missouri

B. H. Roettker, Inc.
Ohio

S

Schibley Chemical Co., Inc.
Ohio

Schoofs Inc.
California

Scientific Polymers Inc.
Georgia

Seachem
California

SEEGOTT INC.
California
Georgia
Illinois
New Jersey
Ohio
Texas

J.F. Shelton Co., Inc.
British Columbia
Oregon
Washington

Ed Simal & Associates, Inc.
Georgia
North Carolina
Tennessee

Donald McKay Smith, Inc.
Ohio

Spiegel & Associates
New Jersey

Stamat, Inc.
Texas

Sullivan Associates, Inc.
Pennsylvania

Superior Materials Inc.
Florida

Synergistic Performance Corp.
Arizona
California
Oregon
Washington

T

William B. Tabler Co., Inc.
Illinois
Kentucky
Missouri

Tavco Chemicals, Inc.
California

TCR Industries, Inc.
Arizona
California

Trans Western Chemicals, Inc.
California

Tri-iso, Inc.
California

The Truesdale Co.
Massachusetts

U

United Color Technology, Inc.
Pennsylvania

United States Container Corp.
Arizona
California

V

Van Horn, Metz & Co.
Maryland
Pennsylvania

VAN WATERS & ROGERS INC.
Illinois
Washington

W

Charles A. Wagner Co., Inc.
Pennsylvania

Walsh & Associates, Inc.
Colorado
Missouri
Nebraska
Tennessee
Utah

Robert I. Webber Co., Inc.
Connecticut

Westendorf Chemical Co.
Oregon

Western Reserve Chemical Corp.
Ohio

Western Star Color & Chemical Corp.
California

White Chemical Equip. Co., Inc.
Illinois
Michigan

Whittaker, Clark & Daniels, Inc.
California
Georgia
Illinois
New Jersey

Wininger & Associates
Ohio

Wise Technical Marketing, Inc.
Illinois

Z

C.L. Zimmerman Co.
Kentucky
Ohio

A.C. Zoller Co.
Pennsylvania

GEOGRAPHICAL

Alabama

Alchemy-South, Ltd.
155 Sylvest Dr., Apt. 1206
Montgomery, AL 36117
Phone: (334) 279-6823
Dan Brady
Representing:

See Corporate Headquarters in Georgia

Deeks & Co., Inc.
2511 Second St., W.
Birmingham, AL 35204
Phone: (205) 251-6920
Fax: (205) 254-8593
Representing:

See Corporate Headquarters in Georgia

Inmark, Inc.
165 Goodrich Dr., Ste. 101
Birmingham, AL 35217
Phone: (205) 856-9077
Fax: (205) 856-9083
Representing:

See Corporate Headquarters in Georgia

Process, Materials & Eng., Inc.
1021 Sedgefield Dr.
Sylacauga, AL 35150
Phone: (205) 249-2724
Fax: (205) 249-4275
W. Neil Laughridge, President; Aliene B. Laughridge, Office Mgr.

Representing:

Aldoro, SSA
Biomim, Inc.
Dromont srl
E & B, Inc.
Larand Chemical Corp.
Semi-Bulk Systems, Inc.
Spartan Minerals, Inc.

Arizona



Ribelin Sales, Inc.
402 W. Fairmont Dr.
Tempe, AZ 85282
Toll Free: (800) 374-9761
Phone: (602) 894-9761
Fax: (602) 921-0845
Bob Beier

Representing:

Air Products and Chemicals, Inc.
B&S Products
BASF Corp.
Brockway Standard, Inc.
Bronco
C.W. Brabender
Cargill, Inc.
CB Mills
Ciba Polymers
Day-Glo Color Corp.
Eckart America
Elf ATOCHEM North America Inc.
Engelhard Corp.
Fabricated Metals

Fawcett Co.
Great Lakes Chemical Corp.
Grefco
Gruber Systems
Hexcel
Hüls America Inc.
Huntsman Corp.
Hurri-Kleen
ICI Polyurethanes
Ideal Mfg. & Sales Corp.
Interplastic Corp.
Kronos, Inc.
Lee Industries
3M
3M/Zeelan
McWhorter Technologies
Midwest Zinc
National Refractories
Neste Polyester, Inc.
Neville Chemical Co.
Nexus
NYCO® Minerals Inc.
Olin Corp.
Omya, CalCarbs
Plasticolors, Inc.
Pluess-Staufner
Qual Tech Enterprises
Rexco
Rhône-Poulenc, Inc.
Ropak
Schold Machine Co.
Semi-Bulk Systems, Inc.
Solem Industries
Solutia Inc.
Southwest Oxide
Süd-Chemie Rheologicals Inc.
TR Industries
Unimin Corp.
Vetrotex Certainteed
Vorti-Siv
Wacker Silicones Corp.
Warren Rupp

Synergistic Performance Corp.
1130 North Judd Place
Chandler, AZ 85226
Phone: (602) 705-7101
Fax: (602) 705-7102

Representing:

See Corporate Headquarters in California

TCR Industries, Inc.
8711 E. Pinnacle Peak Rd.
Scottsdale, AZ 85255
Phone: (602) 515-2901
Fax: (602) 515-2901

Representing:

See Corporate Headquarters in California

United States Container Corp.
P.O. Box 60125
Phoenix, AZ 85085
Phone: (602) 966-6000
Fax: (602) 966-6000

Lisa Helmers, Branch Manager

Representing:

See Corporate Headquarters in California

California

Dorsett & Jackson Inc.
3800 Noakes St.
Los Angeles, CA 90023
Phone: (213) 268-1815

Fax: (213) 268-9082
E-Mail: dorjackinc@aol.com
Donald Witterman, President; Romer Johnson, Exec. V.P.; Raul Grubs, Chairman

Representing:

Aluminum Co. of America
Amoco Chemical Co.
ARCO Chemical Co.
BYK-Chemie, USA
Cerdec Corp.
Ciba Specialty Chemicals Corp.
Cookson Matthey Ceramics
Degussa Corp.
Halox Pigments
J.M. Huber Corp., Engineering Minerals Div.
Huntsman Corp.
ICI Polyurethanes
Laurel Industries
Mallinckrodt, Inc.
Malvern Minerals Co.
McWhorter Technologies
Mountain Minerals Co.
Occidental Chemical Corp.
Specialty Minerals Inc.
Tioxide Americas Inc.
U.S. Silica
Union Camp Corp.
Zeneca Resins

Dorsett & Jackson, Inc.
1001- 17th St.
San Francisco, CA 94107
Phone: (415) 626-9241
Fax: (415) 626-9246

Representing:

Aluminum Co. of America
Amoco Chemical Co.
ARCO Chemical Co.
Bennett Industries
BYK-Chemie, USA
Cerdec Corp.
Ciba Specialty Chemicals Corp.
Cookson Matthey Ceramics
Degussa Corp.
J.M. Huber Corp., Engineering Minerals Div.
Franklin Industrial Minerals-KMG Div.
Huntsman Corp.
ICI Polyurethanes
Laurel Industries
Mallinckrodt, Inc.
McWhorter Technologies
Mountain Minerals Co.
Occidental Chemical Corp.
Penreco, A Pennzoil Div.
Pluess-Staufner (California) Inc.
Specialty Minerals Inc.
Tioxide Americas Inc.
Union Camp Corp.
Zeneca Resins

E.T. Horn Co.
16141 Heron Ave.
La Mirada, CA 90638
Phone: (714) 523-8050
Fax: (714) 670-6851
E-Mail: ethorn@ethorn.com
Gene E. Alley, CEO; Patrick J. Marantette, President

Representing:

Air Products and Chemicals, Inc.
Arizona Chemicals
Bayer Corp.
Dow Chemical Co.
E.I. DuPont
Engelhard Corp.
Georgia-Pacific Resins
Goldschmidt Chemical
Goodyear Chemical Co.
J.M. Huber Corp.

Kronos, Inc.
Lansco Colors
Lindau Chemicals
3M
Millennium Inorganic Chemicals, Inc.
Solutia Inc.
NYCO® Minerals, Inc.
Phenoxy Specialties
Specialty Minerals Inc.
Unimin Corp.
Union Carbide Corp.
Velsicol Chemical
Vianova Resins inc.
Zeneca

P.T. Hutchins Co. Ltd.
2150 Mariner Square Dr. #201
Alameda, CA 94501
Phone: (510) 814-1980
Fax: (510) 814-1988

Representing:

Aarbor International
Alper Dispersions
Air Products and Chemicals, Inc.
Borden Chemical Co.
Consolidated Colors
Christianson Chemical
Eagle Picher
B.F. Goodrich Co.
Great Lakes Chemical Corp.
Gulf Resources
Ideal Equipment
Kraus & Company
K-T Clay
K-T Feldspar Corp.
Lawter International, inc.
Luzenac America
Mallard Creek Polymers
Malvern Minerals Co.
Minerals Mining
Mississippi Lime Co.
Nicks Silica
Pluess-Staufner
Reynolds Metal Co.
TR International
Texas Resin
Zochem

P.T. Hutchins Co., Ltd.
6055 East Washington Blvd., Ste. 730
Los Angeles, CA 90040
Phone: (213) 887-8508
Fax: (213) 887-7664

Representing:

See Corporate Headquarters in California

Lipscomb Chemical Co.
2839 E. 208th St.
Long Beach, CA 90810
Phone: (310) 637-0806
Fax: (310) 637-1266

Representing:

Calgon Corp.
Caschem, Inc.
Cleveland Pigment & Color
Dock Resins Corp.
Drew Chemical
Dusseck Campbell Ltd.
General Carbon
The Lubrizol Corp.
Milwhite
Mona Industries
Eckart America
Pflaumer Brothers
Polacyl
Tego Chemie Service USA
Zemex industrial Minerals

Lipscomb Chemical Co.
8707 San Leandro St.
Oakland, CA 94621
Phone: (510) 568-0600
Fax: (310) 637-1266

Representing:

See Corporate Headquarters in California

Manufacturing Business Systems
1250 E. Walnut St., Ste. 150
Pasadena, CA 91106
Phone: (626) 585-0103
Fax: (626) 585-0106
Herbert Molano

Schoofs Inc.
1675 School St.
Moraga, CA 94556
Phone: (510) 376-7311
Fax: (510) 376-8259
Adrian Adkins, Marketing Mgr.
Representing:

Alcoa Industrial Chemicals
Chemie Metikon
W.R. Grace, Davison Div.
PPG Industries, Silica Products Div.
Zeochem

Schoofs Inc.
5900 S. Eastern Ave., Ste. 142
Commerce, CA 90040
Phone: (213) 725-7612
Fax: (213) 725-0334

Representing:

See Corporate Headquarters in California

Schoofs Inc.
430 F St.
Davis, CA 95616
Phone: (916) 756-6670
Fax: (916) 756-6671

Representing:

See Corporate Headquarters in California

Seachem
315 29th Ave.
San Mateo, CA 94403-2701
Phone: (650) 574-5311
Fax: (650) 574-0419

Representing:

Ashai Denka
Hankook Titanium Ind., Ltd.
Kyung Kee Color Co., Ltd.
Pacific Way, Inc.
Sanyu Co., Ltd.

Seegott Inc.

Seegott Inc.
Nexus City Square
770 the City Dr. S., Ste. 1800
Orange, CA 92668

Toll Free: (800) 423-7869

Phone: (714) 980-0808

Fax: (714) 740-0875

Tom McLaughlin, Regional V.P.

Representing:

BASF Colorants
BASF Urethanes
Basins Inc.
Epworth Morehouse-COWLES
Evans Clay
Franklin Industrial Minerals, KMG Div.
Georgia Marble
Hampshire Chemical Co.
Harcros Pigments
Inolex Chemical-Ishihara Corp.
Ishihara Corp.
Kraus & Co.
Mayzo, Inc.
Morton International (Injecta Color Systems,
Universal Color Dispersions)
Ortec, Inc.
Pyochem, Inc. (Pyosa Pigments)
Rhône-Poulenc, Inc.
Sogen, Afriment, Inc.

Specialty Minerals Inc.
Thiele Kaolin Co.
U.S. Silica Co.

SEE OUR AD ON PAGE 181.

Synergistic Performance Corp.
1900 E. Orangethorpe Ave.
Fullerton, CA 92831
Phone: (714) 441-1141
Fax: (714) 441-1999

Representing:

See Corporate Headquarters in California

Synergistic Performance Corp.
333 Heegenberger Rd., Ste. 400
Oakland, CA 94621
Phone: (510) 636-0333
Fax: (510) 636-0616

Jim Lauria, President

Representing:

American Colloid
Franklin Industrial Minerals
Harcros Organics
Harcros Pigments
Johns Manville
Millennium Inorganic Chemicals, Inc.
MiniFIBERS, Inc.
Peer Chemical
The Sherwin-Williams Co.
Sostram
SCP (Laponite)
Specialty Minerals Inc.
Standard Industrial Minerals
U.S. Silica Inc.
World Minerals Inc.

Tavco Chemicals, Inc.
25401 Cabot Rd., #121
Laguna Hills, CA 92653
Phone: (714) 770-7666
Fax: (714) 770-8889
Ted Venia, President; Keith Venia, Sales Mgr.

Representing:

Akzo Nobel Surface Chemistry
American Fillers & Abrasives, Inc.
Asheville Mica Co.
Burgess Pigment Co.
Dexter Chemical Co.
Ferro Corp.
Innes Clips, Inc.
Nubiola, S.A.
P.L. Thomas Co., Inc.
Standard Industrial Minerals
Superior Oil Co.
Ultra Additives, Inc.
Ur-Cryl Polymers Corp.

TCR Industries, Inc.
26 Centerpointe Dr., Ste. 105
La Palma, CA 90623
Phone: (714) 521-5222
Fax: (714) 521-1636

Don Smith, President; Sam Rumfola, Sales;
Sam Bellettiere, Dir. of Operations

Representing:

Accurez
Ag Environmental
Columbian Chemicals Co.
Columbia River Carbonates
CR Minerals Corp.
Dover Chemical Co.
Fawcett Co.
Halstab
Hitox Corp. of America
Hoover Color Corp.
Kerr-McGee Chemical Corp.
Koch Chemical
Occidental Chemical Co.
Oglebay Norton
Penn Color
PQ Corp.
Reichhold Chemicals, Inc.

Distributors

Ross Chem
Rhône-Poulenc, Inc.
Shell Chemical Co.
Toyo Ink America
Troy Corp.
Wayne Pigment Corp.

TCR Industries, Inc.
167 Summerside Cir.
Danville, CA 94526
Phone: (510) 838-7478

Representing:
See Corporate Headquarters in California

Trans Western Chemicals, Inc.
7766 Industry Ave.
Pico Rivera, CA 90660
Phone: (562) 942-1833
Fax: (562) 942-9412

Henry J. Kirsch, V.P./ Sales & Marketing
Representing:

Arizona Oxides, Inc.
Bergen Materials
Color Corp. of America
Dominion Colour Corp.
Equipment Development Service
Ferro Corp.
Nan Ya Plastics Corp.
OMG Americas
Patco/American Ingredients
Poly-Resyn, Inc.
Protech Minerals
Raybo Chemical Co.
Semi-Bulk Systems, Inc.
Sino-American Pigments Systems, Inc.
SN CZ
Spectrum Sample Card Co.
U.S. Aluminum, Inc.
U.S. Bronze Powders, Inc.
Wacker Silicones
Witco Corp.

Tri-iso, Inc.
480 N. Indian Hill #2A
Claremont, CA 91711
Phone: (909) 626-4855
Fax: (909) 621-9119
E-Mail: trivince@cyberg8t.com
Edward J. Lysek, President; Deborah Lysek,
Chief Financial Officer; Vince Anderson,
V.P. Sales

Representing:
Ameribrom, Inc.
ANGUS Chemical Co.
Chartwell International, Inc.
Ciba Specialty Chemicals
International Specialty Chemicals (INSPEC)
Keil Chemicals, Div. of Ferro Corp.
King Industries, Inc.
Kromachem Ltd.
K.J. Quinn & Co.
PPG Industries, Inc.
Ruco Polymer corp.
Solvay Interox, Inc.
U.S. Borax Inc.
UOP
Velsicol Chemical Corp.
Wacker (USA) Div. of Wacker Chemie

United States Container Corp.
1952 Williams St.
San Leandro, CA 94577
Phone: (510) 357-7000
Fax: (510) 357-6606
Mark Stull, V.P. Branch Operations
Representing:

See Corporate Headquarters in California

United States Container Corp.
2465 Fruitland Ave.
Vernon, CA 90058
Phone: (213) 589-1000
Fax: (213) 589-9194

Della Martinez, V.P. Finance; Jeff Levine,
CEO; Craig Elzinga, V.P. Sales; Mark Stull,
V.P. Branch Operations

Representing:
Brockway Standard, Inc.
Container Supply
Contico Container Corp.
Enpac Corp.
Grief Bros.
Leticia Corp.
Myers Container Corp.
NAMPAC
Rez Tech West
Ring Can Corp.
Silgan Container Corp.
Smurfit
Sonoco
Southcorp Packaging
U.S. Can

Western Star Color & Chemical Corp.
6377 Drexel Ave.

Los Angeles, CA 90048
Phone: (213) 935-2229
Fax: (310) 594-8880

E-Mail: bkrantz@juno.com
B. Krantz, President

Representing:
GCI Chemical
UK Seung Chemical

Whittaker, Clark & Daniels, Inc.
24422 Avenida de La Carlota, Ste. 265
Laguna Hills, CA 92653
Toll Free: (800) 843-1935
Fax: (833) 325-1794

Representing:
See Corporate Headquarters in New Jersey

Colorado

George C. Brandt, Inc.
1720 S. Bellaire St., Ste. 912
Denver, CO 80222
Phone: (303) 584-0717
Fax: (303) 584-9915
Craig Hansen, Sales Mgr.; Wally McClellan,
Sales

Representing:
ADM Lecithin
Buckman Laboratories, Inc.
Central Can Co.
DuPont Co.
Engelhard Corp./Harshaw
Ferro Chemicals Corp.
Georgia Marble Co.
Hoover Color Corp.
MM Industries, Inc.
NYCO® Minerals, Inc.
Eckart America
Raybo Chemical Co.
Reichhold Chemicals, Inc.
Millennium Inorganic Chemicals, Inc.
Southcorp Packaging

New West Sales Corp.
P.O. Box 470130
Aurora, CO 80047
Phone: (303) 368-5140
Fax: (303) 368-8879
Lou Hartnell, President

Walsh & Associates, Inc.
10190 Bannock St., #212
Denver, CO 80221-6051
Phone: (303) 457-3111
Fax: (303) 457-9943

Representing:
See Corporate Headquarters in Missouri

Connecticut

Robert I. Webber Co., Inc.
35 Corporate Dr.
Trumbull, CT 06611
Phone: (203) 452-3080
Fax: (203) 452-3085
David Webber, V.P.; Dee Whittaker, Secy-
Treasurer

Representing:
Cinkama
Demateo
Metaland International, Inc.
Metasa
Ormya, Inc.
Pluess-Staufner California Inc.
Progressive Fillers
Pyosa/Pyosa Oxides
Westdry Industries, Inc.
Zinc Nacional, S.A.

Florida

Andes Chemical Corp.
10850 N.W. 30th St.
Miami, FL 33172
Phone: (305) 591-5601
Fax: (305) 591-5607
Fernando Espinosa, President

Representing:

Air Products and Chemicals, Inc.
Akcros Chemicals
ANGUS Chemical Co.
Caschem
Catalyst Systems
CR Minerals Corp.
Eastman Chemical Co.
J.M. Huber Corp.
Lipo Chemicals
Luzenac America
McWhorter Technologies
Millenium Inorganic Chemicals, Inc.
Oxy Petrochemicals
Rohm and Haas Co.
Schold Machine Co.
Süd-Chemie Rheologicals, Inc.
Toyal America
Troy Chemical Corp.

Azalea Color Co.
National Distribution Center
2000 N. 62nd St.
Tampa, FL 33619
Toll Free: (800) 245-2877
Fax: (800) 722-8223
Representing:
See Corporate Headquarters in Georgia

Deeks & Co., Inc.
7601-A Industrial Ln.
Tampa, FL 33617
Phone: (813) 987-9000
Fax: (813) 987-9027
Representing:
See Corporate Headquarters in Georgia

G.L.C. Associates
P.O. Box 789
Ponte Vedra Beach, FL 32082
Phone: (904) 280-9979
Fax: (904) 280-2008
Jerry Chait, President
Representing:
Inoue USA

Inmark, Inc.
600 Suemac Rd., Ste. 4
Jacksonville, FL 32254-2700

Phone: (904) 786-4991
 Fax: (904) 786-4995
 Representing:
 See Corporate Headquarters in Georgia

Majemac Enterprises Inc.
 P. O. Box 5613
 Clearwater, FL 33758
 Phone: (813) 797-8806
 Fax: (813) 791-7291
 John P. McMahon; Elizabeth E. McMahon

Representing:
 Akzo Nobel
 Bronco Mfg. Co.
 BYK-Chemie USA
 BYK-Gardner USA
 Colony Industries, Inc.
 Columbian Chemicals Co.
 Custom Metalcraft
 Degussa Corp.
 Dry Branch Kaolin Co.
 Eagle-Picher
 Eagle-Zinc
 Floridin
 Franklin Industrial Minerals
 BFGoodrich Specialty Chemicals & Polymers
 Hoover Group
 Kaopolite
 Kerr-McGee Chemical Corp.
 Mayzo
 Micro Powders, Inc.
 Morton International/Universal Color Dispersions
 NYCO® Minerals, Inc.
 Progressive Recovery Inc.
 Shepherd Chemical Co.
 Silberline Mfg. Co., Inc.
 Zemex Industrial Minerals



Ribelin Sales Inc.
 5129 Causeway Blvd.
 Tampa, FL 33619
 Toll Free: (800) 374-1603
 Phone: (813) 247-1603
 Fax: (813) 248-2468

Linda Immel
 Representing:
 Brockway Standard, Inc.
 Bronco
 Day-Glo Color Corp.
 Eckart America
 Engelhard Corp.
 Fabricated Metals
 Fawcett Co.
 Great Lakes Chemical Corp.
 Harcros Pigments
 ICI Polyurethanes
 Ideal Mfg. & Sales Corp.
 Kronos, Inc.
 McWhorter Technologies
 Neville Chemical Co.
 Olin Corp.
 Omya CalCarbs
 Plasticolors, Inc.
 Rhône-Poulenc, Inc.
 Ropak
 Schold Machine Co.
 Süd-Chemie Rheologicals, Inc.
 Troy Corp.

Superior Materials Inc.
 Southeast Division
 1231 Fairlake Trail #612
 Weston, FL 33326
 Phone: (954) 473-6973
 Fax: (954) 349-1471

E-Mail: supmat@aol.com
 David Kafka
 Representing:
 American Gilsonite Co.
 Cardinal Color Co.
 Clariant Chemical
 Interfibe Corp.
 Ohio Polychemical
 Prosys Software
 Raybo Chemical Co.
 SMI Lecithin

Georgia

Alchemy-South, Ltd.
 1345 Owenby Dr.
 Marietta, GA 30066
 Phone: (770) 427-1234
 Fax: (770) 427-1857
 W.G. Welch, CEO; H.L. Stanton, V.P.; T.H. Welch, President

Representing:
 Admark International
 Amirox Iron Oxides
 Arylescence, Inc.
 BYK-Chemie USA
 BYK-Gardner USA
 Columbian Chemicals Co.
 ColorMate Dispersions
 Genesis Dispersions
 Kalama Chemicals
 Lancer Dispersions
 New Brook International
 Poly-Resyn, Inc.
 Rockland React-Rite
 Westbridge Industries

Azalea Color Co.
 22 Perimeter Park Dr., Ste. 110
 Atlanta, GA 30341
 Toll Free: (800) 245-2877
 Fax: (800) 722-8223
 E-Mail: azalea@azaleacolor.com
 Keith Standbridge, V.P. Sales; David R. Durr, President

Representing:
 Allied Colloids, Inc.
 Arizona Oxides, Inc.
 Buckman Laboratories, Inc.
 Dominion Colour Corp.
 Ferro Corp.
 Floridin
 Reagens Comiel Canada Ltd.
 Rebus, Inc.
 Rhône Poulenc, Inc.
 Sachtleben Corp.
 Tioxide Americas, Inc.
 Union Camp Corp.
 Union Miniere

Azalea Color Co.
 Hewitt and Day Warehouse
 650 Great Southwest Pkwy.
 Atlanta, GA 30336
 Toll Free: (800) 245-2877
 Fax: (800) 722-8223
 Representing:
 See Corporate Headquarters in Georgia

Deeks & Co., Inc.
 4748 Lewis Rd.
 Stone Mountain, GA 30083
 Phone: (770) 938-3100
 Fax: (770) 491-6238
 E-Mail: atlmikebue@aol.com
 C.M. Buerkle, V.P.
 Representing:
 Allegheny Chemical
 Asheville Mica Co.

Brockway Standard, Inc.
 Cleveland Steel
 Color Corp. of America
 CR Minerals Corp.
 Crosfield Co.
 DuPont White Pigments
 Ferro Corp.
 H.B. Fuller Co.
 Goodyear Tire & Rubber Co.
 Gulf Reduction
 Huber Engineered Minerals
 New England Plastics
 Omya, Inc.
 Reichhold Chemicals, Inc.
 Ross Chem
 Ross & Rowe
 Silberline Mfg. Co., Inc.
 Southcorp Packaging
 Thor
 Unimin Specialty Minerals
 U.S. Oxides
 R.T. Vanderbilt Co.
 Wayne Pigment Corp.
 Zinc Corp. of America

Delta Resources
 5060 N. Royal Atlantic Dr., Ste. 22
 Tucker, GA 30084
 Phone: (770) 491-6981
 Fax: (770) 934-4376
 Shawn Hayes, President; Joe Keating, CFO

Representing:
 Cimbar Performance Minerals
 Delta Colours
 Nubiola
 Polar Minerals
 Rolles International

Inmark, Inc.
 220 Fisk Dr., S.W.
 Atlanta, GA 30336
 Toll Free: (800) 646-6275
 Fax: (404) 267-2021
 E-Mail: inmark@mindspring.com
 Tim Dooley, Product Mgr.; Kail Jordan, Hazmat Coordinator

Representing:
 Brockway Standard, Inc.
 CKS
 Nalgene
 Rieke

Kohl Marketing, Inc.
 1103 Bombay Ln.
 Roswell, GA 30076
 Phone: (770) 753-4979
 Fax: (770) 753-4980
 John M. Behan, V.P.

Representing:
 Akzo Nobel, Inc.
 Baerlocher USA
 BYK-Chemie USA
 Campine SA
 Caschem Inc.
 Degussa Corp.
 ECC International Inc.
 G.H. Chemicals Ltd.
 Hoover Color Corp.
 Huls America Inc.
 Lawter International, Inc.
 Mil International, Inc.
 Milwhite, Inc.
 Polymer Additive Groups
 Scott Bader, Inc.
 Sequa Chemicals, Inc.
 Soluol Chemical Co., Inc.
 Tioxide Americas Inc.
 Ultra Additives, Inc.

Lomas International
 P.O. Box 10225
 Macon, GA 31297
 Toll Free: (800) 652-9297

Fax: (912) 784-1745
 E-Mail: lomas@lomas.com
 Tom Hilson, President; Dennis Gillespie,
 V.P. Sales

Representing:

ANGUS Chemical Co.
 Arizona Chemical Co.
 Bioneer Technologies
 Cardinal Color
 Cimbar Performance Minerals
 Cytec Industries, Inc.
 Eif ATOCHEM North America, Inc.
 Everlight Chemical
 K-T Feldspar
 Kentucky-Tennessee Clay
 KMG Minerals
 Lockhart
 Laporte Pigments
 Luzenac America
 Peninsula Polymers
 Millennium Inorganic Chemicals, Inc.
 Southern Clay Products, Inc.
 Swada Ltd.
 Wacker Silicones
 Zeneca Resins

Olinger Co. Southeast
 P.O. Box 993
 Lilburn, GA 30226
 Toll Free: (800) 223-1979

Representing:

Astro Container
 Clawson Container Co.
 Custom Packaging
 Eastern Color & Chem.
 Knight Corp.
 Patco Defoamers
 Schold Machine Co.
 Tylanpol—TiO₂

R.B. Patterson Co., Inc.
 6753-C Jones Mill Ct.
 Norcross, GA 30092
 Phone: (770) 449-4946
 Fax: (770) 449-8882

Representing:

See Corporate Headquarters in Texas



Ribelin Sales Inc.

5570 Tulane Dr., SW
 Atlanta, GA 30336
 Toll Free: (800) 374-5570
 Phone: (404) 699-5570
 Fax: (404) 699-5575

Joe Barber; Jim Goodman

Representing:

Air Products and Chemicals, Inc.
 Brockway Standard, Inc.
 Bronco
 Day-Glo Color Corp.
 Eckart America
 Engelhard Corp.
 Fabricated Metals
 Fawcett Co.
 Great Lakes Chemical Corp.
 Harcros Pigments
 ICI Polyurethanes
 Ideal Mfg. & Sales Corp.
 Kronos, Inc.
 Lee Industries
 3M/Zeelan
 McWhorter Technologies
 Midwest Zinc
 Olin Corp.
 Omya CalCarbs
 Plasticolors, Inc.
 Rhône-Poulenc, Inc.

**Ropak
 Schold Machine Co.
 Solutia Inc.
 Süd-Chemie Rheologicals, Inc.
 Troy Corp.**

Scientific Polymers Inc.
 1534 Dunwoody Village Pkwy., Ste. 225
 Atlanta, GA 30338
 Phone: (770) 394-3990
 Fax: (770) 394-2690

Representing:

AmSolv
 Chemstar Products Co.
 Damron Chemicals Co., Inc.
 Morton International
 Penn-Carbose, Inc.
 Quimica-Amtex

Seegott Inc.

**Seegott Inc.
 385 Creekside Ct.
 Roswell, GA 30076
 Toll Free: (888) 733-4688
 Phone: (770) 645-4642
 Fax: (770) 552-0331**

**David B. Meier, V.P.; Russ Brewer, Area
 Sales Mgr.**

Representing:

Akzo Nobel Chemicals
 BASF Corp., Colorants
 BASF Corp., Dispersions
 BASF Corp., Polyurethanes
 CFF, Cellulose Filler Factory
 Calgon Corp.
 Cardolite Corp.
 General Electric Silicones
 Hitox Corp. of America
 ICI Polyurethanes Group
 Inolex Chemical
 Mortin Injecta Color
 OxyChem, Durez Div.
 PolySat Inc.
 Rhône-Poulenc, Inc.
 U.S. Silica Co.
 Witco Corp.

SEE OUR AD ON PAGE 181.

Ed Simal & Associates, Inc.
 1356 Milledge St.
 Atlanta, GA 30344
 Phone: (404) 761-7961
 Fax: (404) 761-7274

Representing:

American Lecithin Co.
 Blue Ridge Talc Co.
 Daniel Products Co.
 Dexter Chemical Co.
 Disti-Kleen Inc.
 Draiswerke Mannheim
 Eagle Zinc
 EPS Polymers
 Fanning
 Feldspar Corp.
 J.M. Huber Corp.
 King Industries, Inc.
 Malvern Minerals Co.
 NYCO® Minerals, Inc.
 Pioneer Talc
 Shepherd Chemical Co.
 The Sherwin-Williams Co.
 Spencer Machine & Tool Co., Inc.
 United Minerals & Chemical
 Western Equipment Co.

Whittaker, Clark & Daniels, Inc.
 6525 The Corner Parkway, Ste. 208
 Norcross, GA 30092
 Toll Free: (800) 833-8142
 Fax: (800) 833-8143

Representing:

See Corporate Headquarters in New Jersey

Illinois

Basco

2595 Palmer Ave.
 University Park, IL 60466
 Toll Free: (800) 776-3786
 FAX: (708) 534-0902
 Maureen Smolinski, Customer Service Mgr.

Brandt Technologies, Inc.
 231 W. Grand Ave., Ste. 202
 Bensenville, IL 60106
 Phone: (630) 787-1800
 Fax: (630) 787-1801
 E-Mail: brandttech@juno.com
 Thomas R. Brandt, President; Arthur G. Fox,
 V.P.; Ray Baltaragis, Sales; Frank Steslow,
 Sales; Dwayne Michaels, Sales; Pam
 Szmanesky, Sales; Karl Meyer, Inside Sales

Representing:

ADM Industrial Oils Corp.
 Color Corp. of America
 Dianal America, Inc.
 E.I. DuPont DeNemours & Co.
 Dura Chemicals
 ICI Nobel's Explosives Co., Ltd.
 Eckart America Corp.
 Reichhold Chemicals, Inc.
 Rhône-Poulenc Specialty Chemicals
 Sybron Chemicals
 Union Process, Inc.
 U.S. Borax Chemical Corp.
 Zeneca Biocides
 Zeneca Pigments & Additives

Brennan Associates, Inc.
 Solvents Sales Div.
 11N 190 Williamsburg Dr.
 Elgin, IL 60123
 Phone: (847) 695-5222
 Fax: (847) 695-9878

Bob Brennan, Senior V.P.; Florence

Brennan, President

Representing:

Citgo Chemicals and Refining
 FINA Oil and Chemicals
 Simple Green
 Uno-Ven
 Unocal

The Cary Co.

1195 W. Fullerton Ave.
 P.O. Box 403
 Addison, IL 60101-0403
 Phone: (630) 629-6600
 Fax: (630) 629-3690
 William G. Cary, President; Carl Hopf, V.P.
 & Dir. Regulatory & Tech Service; Kevin
 Krommel, Sales Mgr.

Representing:

Arizona Chemical Co.
 Bayer Corp., Industrial Chem. Div.
 Bennett Industries
 Brockway Standard, Inc.
 Buckman Laboratories, Inc.
 Degussa Corp.
 Dow Chemical Co.
 Dry Branch Kaolin Co.
 Evans Clay Co.
 Filtration Systems

Geo Pflaus Sons Co.
 Georgia Marble Co.
 Johns Manville Co.
 Kaopolite, Inc.
 Kemira Pigments
 Landis Plastics
 Loeffler Filters
 3M Specialty Chemicals
 3M Engineered Minerals
 Memtec-America Corp.
 Mineral Mining Co.
 OMG Americas
 Ropak Central
 Standard Industrial Minerals
 Unimin Specialty Minerals
 R.T. Vanderbilt Co.
 Van Leer Containers
 3M/Zeelan Industries
 Zinc Corp. of America

The Chidley & Peto Co.
 3800 N. Wilke Rd., Ste. 300
 Arlington Heights, IL 60004-1267
 Phone: (847) 577-3800
 Fax: (847) 254-5412
 Roland H. Chidley, President; Joseph A.
 Peto, V.P.

Representing:

Arakawa Chemicals (USA) Inc.
 Borden Chemical, Inc.
 Ciba Specialty Chemicals Corp., Additives
 Ciba Specialty Chemicals Corp.-
 Fluorosurfactants
 Clariant Corp.
 Millennium Inorganic Chemicals, Inc.
 Nitro Quimica
 Purity Zinc Metals Co., Ltd.
 Sachtleben Corp.
 Tego Chemie Service USA
 Thor Chemicals S.A. (PTY). Ltd.
 U.S. Oxides Inc.
 Wayne Pigment Corp.
 Ziegler Chemical & Mineral Corp.

EMCO Chemical Distributors, Inc.
 2100 Commonwealth
 P.O. Box 1030
 North Chicago, IL 60064
 Phone: (847) 689-2200
 Fax: (847) 689-8470
 E-Mail: info@emcochem.com
 Robert Korman, Marketing Development
 Mgr.; Scott Wallenberg, Business Mgr.;
 Jerry Hahn, Sales Mgr.

Representing:

Amoco Chemicals
 ARCO Chemical Co.
 Aristech
 BASF Corp.
 BP Chemicals
 Chemax, Inc.
 Citgo
 Eastman Chemical Co.
 Elf ATOCHEM North America Inc.
 Exxon Chemical Co.
 FMC Chemical
 G.E. Silicones
 Hoechst Celanese Corp.
 Huntsman Corp.
 Methanex
 Mobius
 OxyChem
 Pacific Epoxy Polymers
 PPG Industries, Inc.
 PQ Corp.
 Orisil
 Stepan
 Texas Resin Co.
 TNC Nitrocellulose
 Velsicol
 Vista
 U.S. Can Co.
 Westbridge Industries



Fitz Chem Corp.
185 Industrial Dr.
Elmhurst, IL 60126-1601
Phone: (630) 941-0410
Fax: (630) 941-0439
E-Mail: fitzchem@fitzchem.com
Edward G. Croco, V.P. Marketing; Robert
L. Milano, Sales Mgr.

SEE OUR AD ON PAGE 166.

Daniel G. Hereley Co.
 2590 Devon Ave., Ste. 220
 Des Plaines, IL 60018-4932
 Phone: (847) 390-9090
 Fax: (847) 390-7386
 Michael Siegall, President; Richard Rous;
 Larry Pluta; Tom Mau

Representing:

Accurate Coatings & Dispersions
 Engineered Carbons, Inc.
 Fillite North America, Inc.
 Hitox Corp. of America
 Hoover Color Corp.
 J.H. Huber Engineered Minerals Div.
 J.M. Huber Chemical Div.
 Hydrite Chemicals

ICI Surfactants
 KVK USA, Inc.
 MD Both Industries
 Peninsula Polymers
 SCNZ
 Solution Dispersions
 Spectra Colors Corp.
 Toyal America, Inc.
 Union Camp Corp.
 Zeneca Resins

T.H. Hilson Co.
 1761 S. Naperville Rd.
 Wheaton, IL 60187
 Phone: (630) 665-3085
 Fax: (630) 665-0196
 E-Mail: thhilson.com
 Terry Hilson, President; Lori Hilson Gaede,
 Sales Mgr.

Representing:

ANGUS Chemical Co.
 Akzo Nobel
 Cabot Cab-O-Sil Div.
 Chartwell International Inc.
 Crosfield Co.
 DeForest Products
 GAF
 Halox Pigments
 Interfibe Corp.
 King Industries, Inc.
 Koch
 Lansco Colors
 LG America
 Micro Powders
 Milwhite
 Pan Chemical
 PQ Corp.

BRANDT TECHnologies, inc.

**SERVING INDUSTRY FOR OUR PRINCIPALS
 THROUGH TECHNICAL SALES AND
 RESPONSIBLE DISTRIBUTION**

- ADM INDUSTRIAL OILS CORP.
- COLOR CORPORATION OF AMERICA
- DIANAL AMERICA
- E.I. DUPONT DE NEMOURS & CO.
- DURA CHEMICALS
- ECKART AMERICA
- ICI NOBEL'S EXPLOSIVES CO., LTD.
- REICHHOLD CHEMICALS, INC.
- RHONE POULENC SPECIALTY CHEMICALS
- SYBRON CHEMICALS
- UNION PROCESS, INC.
- U.S. BORAX CHEMICAL CORP.
- ZENECA BIOCIDES
- ZENECA PIGMENTS & ADDITIVES

BRANDT TECHnologies, inc.

231 West Grand Avenue · Suite 202
 Bensenville, Illinois 60106
 Phone (630) 787-1800 Fax (630) 787-1801
 E-Mail Address: brandttech@juno.com

Circle No. 248 on Reader Service Card

Distributors

Scott Bader
Sogem
Solvay
Southern Clay Products, Inc.
Ultra Additives
U.M.C.
UR-Cryl Polymer

Kraft Chemical Co.
1975 N. Hawthorne Ave.
Melrose Park, IL 60160
Phone: (708) 345-5200
Fax: (708) 345-4005
Ron Weiland, Sales Mgr.; Stan Lewis,
Industry Specialist
Representing:

American Colloids
Asheville Mica Co.
Aspect Mineral
Custom Grinders
Global Stone Penroc
Grefco
Gulf Reduction
Holtrachem
Industries Copolymers
K-T Clay
Karnthner Mountain Industries
Midwest Zinc
Mississippi Lime Co.
Nipa Labs
Pacer Corp.
Synpro/Ferro

Carl Lechner, Inc.
333 Skokie Blvd., Ste. 108
Northbrook, IL 60062
Phone: (847) 480-0222
Fax: (847) 480-9593
Albert M. Lechner, President; Charles W.
Lechner, V.P.
Representing:

Aceto Chemical Co., Inc.
American Lecithin Co.
Cimbar Performance Minerals
Coors Porcelain Co.
Cray Valley Ltd.
Disti-Kleen Inc.
Eagle Sales Co.
Epworth Manufacturing Co.
GRH Co.
Lockhart Chemical Co.
Mono-Chem Corp.
Neupak, Inc.
Potters Industries, Inc.
Premier Color Inc.
Quantum Color Technology
K.J. Quinn & Co., Inc.
Rainbow Chemicals Co.
RLM Industries Inc.
SEPR Ceramic Beads & Powders
Shar Equipment Co.
Shepherd Chemical Co.
Silverline Mfg. Co., Inc.

Seegott Inc.

Seegott Inc.
1675 D Holmes Rd.
Elgin, IL 60123
Toll Free: (800) 394-4950
Phone: (847) 468-0400
Fax: (847) 468-0424
David B. Meier, V.P.; Eric Barta, Area
Sales Mgr.
Representing:
BASF Corp., Colorants
BASF Corp., Dispersions
BASF Corp., Polyurethanes
Cardolite Corp.
Dixie Chemical

DuPont
Etna Products
E.T. Horn International
Goodyear Chemical
Huntsman Corp.
ICI Polyurethanes Group
Inolex Chemical Co.
OxyChem, Durez Div.
Rhône-Poulenc, Inc.
Shell Chemical Co.
Spartan Color Corp.
UOP
U.S. Polymers

SEE OUR AD ON PAGE 181.

William B. Tabler Co., Inc.
P.O. Box 584
Channahon, IL 60410
Phone: (815) 467-1596
Fax: (815) 467-1596
Representing:
See Corporate Headquarters in Kentucky



Van Waters & Rogers Inc.

A ROYAL PAKHOED COMPANY

Van Waters & Rogers Inc.
7050 Archer Rd.
Bedford Park, IL 60458
Phone: (630) 573-4300
Fax: (630) 573-2536
Representing:
See Corporate Headquarters in Washington
SEE OUR AD ON PAGE 184.

White Chemical Equip. Co., Inc.
Box 489
Geneva, IL 60134
Phone: (630) 232-1615
Fax: (630) 232-1628
E-Mail: jwhite@inil.com
Jim White, President; Eric White, Service
Mgr.; Jason White, Sales; Pat White, V.P.
Treasurer
Representing:
Anker Labelers USA, Inc.
Glen Mills, Inc.
Ideal Mfg. & Sales Corp.
Midwest Fabricators
MixMor Inc.
Myers Engineering
Patterson Process Equipment
Premier Mill Corp.
Thermal Care
Tri-Clover

Whittaker, Clark & Daniels, Inc.
914 Eastern Ave.
Plainfield, IL 60544
Toll Free: (800) 833-8140
Fax: (800) 833-8141
Representing:
See Corporate Headquarters in New Jersey

Wise Technical Marketing, Inc.
2300 Lincoln Park West, Suite. 909
Chicago, IL 60614
Phone: (773) 880-1881
Fax: (773) 880-1881
E-Mail: claudewise@wise-tech-mktg.com
Claude T. Wise, President
Representing:
Billings & Associates

Cortec Corp.
Morton Universal Color Dispersions
PolySat Inc.

Kansas

Morton Myers Co.
59 Ewing
Kansas City, KS 66118
Phone: (913) 621-2301
Fax: (913) 621-3947
Morton Myers, President; Charles Myers,
V.P.

Representing:
Admark Fumed Silica
Cleveland Steel Container
Coors Ceramics
Croffield Co.
E & B, Inc.
Epworth Morehouse-COWLES
Lawter International, Inc.
Milwest Zinc
O.G. Innes
PCI Group
Potters Industries Inc.
Progressive Fillers
Russell Finex Inc.
SEPR Ceramic Beads & Powders
Thiele Engineering
Tin Cans
Whittaker, Clark & Daniels
Western Equipment Co.
Zemex Industrial Minerals

Kentucky

American Dispersions, Inc.
2815 Magazine St.
P.O. Box 11505
Louisville, KY 40251-0505
Phone: (502) 776-9494
Fax: (502) 776-7525
Tim Fortney, General Mgr.; Dan Fortney,
Sales Mgr.

Representing:
Color Corp. of America
Dominion Colour Corp.
Etko Chemicals
The Lubrizol Corp.
Lanco Waxes
Polar Minerals
U.S. Stoneware Corp.
Ultra Additives, Inc.

The Argus Co., Inc.
215 Breckenridge Ln., Ste. 208
Louisville, KY 40207
Phone: (502) 896-8635
Fax: (502) 896-8774
E-Mail: rich@argus.win.net
Richard Powell; Pete Galitzne

Representing:
Admark
Becko
Dianal America, Inc.
Dry Branch Kaolin Co.
Eagle-Picher Minerals
Ferro Corp.
Filter Technologies
Franklin Industrial Minerals
Hüls America Inc.
Kaopolite
Quality Composite Systems
SEPR Ceramic Beads & Powders
Southern Clay Products, Inc.
Unimin Minerals

H.H. Benner Co., Inc.
214 Breckenridge Lane, Ste. 111
Louisville, KY 40207
Phone: (502) 895-0603
Fax: (502) 899-1575
Neil K. Benner, President; Tricia E. Stevens,
Customer Service Rep.

Deeks & Co.
2525 S. Fourth St.
Louisville, KY 40208
Toll Free: (800) 961-6221
Phone: (502) 636-5500
Fax: (502) 636-5509
Representing:
See Corporate Headquarters in Ohio

C.L. McGuire & Co.
8134 New LaGrange Rd.
Louisville, KY 40222
Phone: (502) 423-1630
Fax: (502) 423-1647
E-Mail: C.L.MCGUIRE@Unidial.com
J. Mount Davis, President; Bill Leightner,
V.P.

Representing:
CB Mills
Celite Corp.
Ciba-Geigy Polymers
Ciba-Geigy Additives
Dow Corning Corp.
Enviro Resins & Additives
Hoover Color Corp.
Kady International
Lawter International, Inc.
Myers Engineering
Neville Chemical Co.
New Riverside
Oakland Engineering
Ohio Polychemical Co.
Omya, Inc.
Rhône-Poulenc Inc.
Sachtleben Corp.
Schuller International
Sogem, UM Oxyde
Toyol America
U.S. Silica Co.
Vorti-Siv.

William B. Tabler Co., Inc.
Ormsby Pl. Indl. Pk
1331 S. 15th St.
Louisville, KY 40210
Phone: (502) 634-0596
Fax: (502) 634-1961
E-Mail: RichardsS@Tabler.IgloU.com
James D. Boggess, President; Richard W.
Sewell, V.P.; Eric D. Boggess, Sales Rep.

Representing:
BYK-Gardner USA
CPs Chemical
Daniel Products Co.
Degussa Corp.
Dover Chemical Co.
Engelhard Corp.
Epworth Morehouse-COWLES
Glidco Organics
King Industries, Inc.
3M Corp.
Precision Dispensing
Progressive Recovery
Reichhold Chemicals, Inc.
Troy Corp.
Unimin Specialty Minerals
Ziegler Chemical

C.L. Zimmerman Co.
8863 Deer Path Circle
Louisville, KY 40220
Phone: (502) 491-3005
Fax: (502) 491-0046
Representing:
See Corporate Headquarters in Ohio

Louisiana

Crozier-Nelson Sales, Inc.
One Galleria Blvd., Ste. 912
Metairie, LA 70001
Phone: (504) 836-5357
Fax: (504) 836-5159
Representing:
See Corporate Headquarters in Texas



Ribelin Sales Inc.
3350 Ridgelaque Dr., #225
Metairie, LA 70002
Toll Free: (800) 688-4883
Phone: (504) 828-7664
Fax: (504) 828-7361

Connie Cousin

Representing:
Air Products and Chemicals, Inc.
Brockway Standard, Inc.
C.W. Brabender
Bronco
Cargill, Inc.
CB Mills
Ciba Polymers
Day-Glo Color Corp.
Eckart America
Engelhard Corp.
Fabricated Metals
Fawcett Co.
Great Lakes Chemical Corp.
Grefco
Hüls America Inc.
Huntsman Corp.
ICI Polyurethanes
Ideal Mfg. & Sales Corp.
Kronos, Inc.
Lee Industries
3M/Zeelan
McWhorter Technologies
Midwest Zinc
Neville Chemical Co.
NYCO® Minerals, Inc.
Olin Corp.
Omya Inc.
Plasticolors, Inc.
Rhône-Poulenc, Inc.
Ropak
Schold Machine Co.
Semi-Bulk Systems, Inc.
Solutia Inc.
Southwest Oxide
Süd-Chemie Rheologicals, Inc.
Unimin Corp.
Vorti-Siv
Wacker Silicones Corp.
Warren Rupp

Fax: (410) 666-0644
Bob Jortland, President; Peter Rehgel, V.P.
Representing:
Admark
Custom Fibers
Krete Industries
Lindau Chemical
Laporte Pigments
Spartan Color Corp.
Troy Corp.
Tryline Co./Sino American Pigments

Van Horn, Metz & Co.
320 Towsontown Blvd., Ste. 205
Baltimore, MD 21286
Phone: (410) 828-9595
Fax: (410) 828-5296
Representing:
See Corporate Headquarters in Pennsylvania

Massachusetts

Bechem Technical Sales
P.O. Box 403
Concord, MA 01742
Phone: (978) 263-2568
Fax: (978) 263-7807
John C. Becker, Jr., President; John C.
Becker, IV, V.P.

Representing:
C.M. Ambrose Co., Inc.
Bronco Manufacturing Inc.
Colorscope Corp.
Dock Resins Corp.
H.B. Fuller Co.
Glen Mills, Inc.
National Chemical Co.
Pioneer Packaging Machinery, Inc.
U.S. Borax and Chemical Corp.
Western Star Color Chemical Corp.

CDF Corp.
Manufacture Drum Liners Division
77 Industrial Park Rd.
Plymouth, MA 02368
Toll Free: (800) 443-1920
Phone: (508) 747-5858
Fax: (508) 747-6333
E-Mail: cdf-liners.com
Customer Service

Erie Chemical Distributors, Inc.
205 Worcester Ct.
Falmouth, MA 02540
Phone: (508) 457-1000
Fax: (508) 457-1010
E-Mail: www.eriechemical.com
Michael T. Bearon, Sales; Sidney L. Bearon,
President; Elizabeth A. Bondarek, Sales
Representing:
Major manufacturers surplus and obsolete raw
materials

Prime Materials Associates, Inc.
19 Depot St., Box 14
Uxbridge, MA 01569
Phone: (508) 278-0099
Fax: (508) 278-3228
Cal Wieggers, President; Bryan Wieggers,
Sales Mgr.

Representing:
Calgene Chemical
Chemol
Daniel Products Co.
Drum Runner
Enviro Resins
Ferro Corp.
International Specialty

Maryland

E.W. Kaufmann Co.
9737 Gingerwood Dr.
Ellicott City, MD 21042
Phone: (410) 465-5438
Fax: (410) 418-9170
Representing:
See Corporate Headquarters in Pennsylvania

RJ Chemical Sales, Inc.
12 Galloway Ave., Ste. 1F
Cockeysville, MD 21030
Phone: (410) 666-2332

Distributors

Hickson Specialty
Lyondell Lubricants
Neville Chemical Co.
Poly-Resyn Inc.
Raybo Chemical Co.
Spectra Colors
Unichema
U.S. Bronze and Aluminum
Wilkinson Minerals
Witco Corp.

The Truesdale Co.
108 Holton St.
Brighton, MA 02135
Phone: (617) 782-5300
Fax: (617) 782-9924

Representing:

ASFS Corp.
Bayer Corp.
Burgess Pigment
Cargill Co.
Cytec Industries Inc.
Degussa Corp.
Hoover Color Corp.
Huntsman Corp.
ICI Acrylics
Kronos, Inc.
3M/Zeelan
New Riverside Ochre
Olin Corp.
Peninsula Polymers
Reynolds Aluminum
Rheox, Inc.
Rhein Chemie
Shell Chemical Co.
Thibaut & Walker
U.S. Silica
Union Camp
R.T. Vanderbilt Co.
Wacker
Westvaco

Michigan

American Controls, Inc.
20764 Whitlock
Farmington Hills, MI 48336
Phone: (248) 476-7782
Fax: (248) 476-3390
Pete Mockus, V.P.; John Carpenter, Office
Mgr.; Pat Schiller, Purchasing; Mark Murry,
Sales

Representing:

Corken Pump
Daniel Inc.
Dixon Valve & Coupling
Flux Pump
Grundfos Pump
Kent Meter Co.
Micro Pump
Monarch Pump
Morrison Bros.
Nemo/Netzsch Pump
Scot Pump
Schlumberger Neptune® Meter
Sherwood Pump
Tokheim Inc.
Topline Process Equipment
Versa-Matic Pump
Viking Pump
WDM Pump

American Controls, Inc.
2755 Birchcrest Dr., S.E.
Grand Rapids, MI 49506
Phone: (616) 285-3130
Fax: (616) 285-3134

Representing:

See Corporate Headquarters in Michigan

American Controls, Inc.

2442 E. Maple Ave.
Flint, MI 48507
Phone: (810) 742-2990
Fax: (810) 742-3245
Representing:
See Corporate Headquarters in Michigan

Baker & Collinson, Inc.
12000 Mt. Elliott Ave.
Detroit, MI 48212-2534
Phone: (313) 366-2100
Fax: (313) 366-0179
Thomas R. Bursleson, V.P.

Representing:

Aspect Mineral Inc.
Caschem, Inc.
C.E.D. Processed Minerals Inc.
Cinkarna
Daniel Products Co.
Degussa Corp.
Etna Products Co.
Microfine Minerals Ltd.
Mineral Mining
Piqua Minerals
Ross and Rowe, Inc.
Silberline Mfg. Co., Inc.
Sino-American Pigments Systems, Inc.
Synthetic Products Co.

Harry Holland Company, Inc.
702 E. 11 Mile Rd.
Royal Oak, MI 48067
Phone: (248) 544-8595
Fax: (248) 544-8022

Representing:

Alcan Chemicals
Calumet Refining Co.
Central Can Co.
Dover Chemical Corp.
ECC International, Inc.
The Elco Corp.
Gateway Additive Co.
The International Group, Inc.
ITOCHU Specialty Chemicals, Inc.
3M Specialty Additives
Orchidia
Geo. Pfau's Sons Co., Inc.
Plastican
Shell Oil Co.
Toyala America, Inc.
Witco Corp., Petroleum Specialties Group
3M/Zeelan Industries, Inc.

Matteson-Ridolfi, Inc.
14450 King Rd.
P.O. Box 2129
Riverview, MI 48192
Phone: (313) 479-4500
Fax: (313) 479-1630
Jack Westerbeeck, President; Scot
Westerbeeck, V.P.; Maynard Pittenser, V.P.;
John Wloch, Oper. Mgr.

Representing:

ABCO Enterprises
Akcros Chemical
Akzo Nobel Resins
Andrea Aromatics
Aztec Peroxides Inc.
BASF Corp.
Cabot Corp.
Calgon Corp.
Crosfield Chemical
Dry Branch Kaolin Co.
Franklin Industrial Minerals
General Electric Co.
Georgia-Pacific Resins
B.F. Goodrich
Halox Pigments
Harcros Pigments
Hüls America Inc.
Huntsman Corp.
Kaopolite, Inc.
Kronos, Inc.

Minerals Technologies, Inc.
Mobile Rosin Oil Co.
Solutia Inc.
OMG Americas
Phenoxy Associates, Inc.
Premier Mill Corp.
Resinall Corp.
Reynolds Metals Co.
Scott Bader (USA)
Shell Chemical Co.
Tomah Products
Unimin Specialty Minerals
Universal Color Dispersions
Wayne Pigment Corp.
Zircos

Olinger Co., Inc.
P.O. Box 876
Clarkston, MI 48347
Phone: (248) 620-2000
Fax: (248) 620-2002

Representing:

Astro Container
Clawson Container Co.
Color Corp. of America
Disti-Kleen Inc.
Dow Corning Corp.
Knight Corp.
Laporte Pigments
Mississippi Lime Co.
New England Plastics
Patco Deformers
Ranbar Technology
Ronningen-Petter
Schold Machine Co.
R.T. Vanderbilt Co.
Vorti-Siv.
Westbridge Industries

White Chemical Equip. Co., Inc.
26470 Meadowood Ct.
Lathrup Village, MI 48076
Phone: (810) 557-2954
Fax: (810) 559-6299

Representing:

See Corporate Headquarters in Illinois

Minnesota

George C. Brandt, Inc.
2975 Long Lake Rd.
St. Paul, MN 55113
Phone: (612) 636-6500
Fax: (612) 636-2879
E-Mail: chrisb@gcbinc.com
Chris Brandt, Chairman; Robin Norcutt,
Sales Mgr.

Representing:

ADM Lecithin
Central Can Co.
CB Mills
DuPont
Eckart America
Engelhard Corp.
Georgia Marble Co.
Grefco
Hi-Mar Specialties
Kady International
Mayzo, Inc.
Millennium Inorganic Chemicals, Inc.
MM Industries
NYCO® Minerals, Inc.
Potters Industries, Inc.
Raybo Chemical Co.
Reichhold Chemicals, Inc.
Reynolds Industries, Inc.
Southcorp Packaging
R.T. Vanderbilt Co.
Zeneca Colours

Missouri

George C. Brandt, Inc.
7730 Carondelet Ave., Ste. 208
St. Louis, MO 63105
Phone: (314) 725-5968
Fax: (314) 725-9940
Frank Niehaus, Sales Mgr.; Jim Brandt, Sales

Representing:

Central Can Co.
Eckart America
Engelhard Corp.
Ferro Corp.
Georgia Marble Co.
Kady International
Mayzo, Inc.
MM Industries
NYCO® Minerals, Inc.
Reynolds Industries, Inc.
Ross Chem, Inc.
Sherwin Williams Co.
Southcorp Packaging
Wright Corp.
Zinc Corp. of America

George C. Brandt, Inc.
1828 Swift Ave., Ste. 106
Town Square II
Kansas City, MO 64116
Phone: (816) 472-5400
Fax: (816) 471-7571

George A.C. Brandt, II, President; Robert Mady, Sales Mgr.

Representing:

ADM Lecithin
Buckman Laboratories, Inc.
Central Can Co.
C.B. Mills (Chicago Boiler)
Eckart America
Engelhard Corp.
Ferro Chemicals Corp.
Georgia Marble Co.
Gulf Reduction
Kady International
MM Industries
Mayzo, Inc.
Nesco Container Co.
NYCO® Minerals, Inc.
Raybo Chemical
Reichhold Chemicals, Inc.
Reynolds Industries, Inc.
Ross Chem, Inc.
Russell Stanley, Inc.
Southcorp Packaging
Storms Industries, Inc.
Williamsport Steel Container

George F. Robbins, Inc.
628 Gaslite Ln.
St. Louis, MO 63122
Phone: (314) 965-2440
Fax: (314) 965-7701
George F. Robbins, President

Representing:

Archer Daniels-Midland
C.I. Specialty Chemicals
Custom Grinders Sales
Dussek Campbell Ltd.
Ranbar Technology Inc.

William B. Tabler Co., Inc.
1331 South 15th St.
Louisville, KY 40210
Phone: (502) 634-0596
Fax: (502) 634-1961
See Corporate Headquarters in Kentucky

Walsh & Associates, Inc.
1801 S. Hanley Rd.
St. Louis, MO 63144-2996
Phone: (314) 781-2520
Fax: (314) 781-9424

E-Mail: walsh3@mail.idt.net
Timothy T. Walsh, President; Michael P. Hefferon, Equipment Mgr.; Timothy E. Halwy, Chemicals Sales Mgr.

Representing:

Acme-Hardesty Co.
Amerchol Corp.
Burgess Pigment Co.
Burlington Chemical Co.
CAP City Products Co.
Cargill, Inc.
Crandall Filling Machinery, Inc.
Croda Universal Inc.
Degussa Corp., Pigments Div.
Dominion Colour Corp.
E.I. DuPont Co.
ECC International Inc.
Fawcett Co., Inc.
Ferro Corp.
Floridin Co., Div. of ITC Industries
Franklin Industries, Inc.
GAF Filter Systems
GE Silicones
Hampshire Chemical Corp.
Harcros Pigments, Inc.
Hoover Group, Inc.
Interfibe Corp.
KMG Minerals Div., Franklin Industries, Inc.
Liquid Container Corp.
Lorama Chemicals, Inc.
McWhorter Technologies, Inc.
Millennium Specialty Chemicals, Inc.
National Can Corp., Closure Div.
Quackenbush Co., Inc.
Reliable Cap Co.
Rhône-Poulenc, Inc.-Coatings and Construction
Rhône-Poulenc, Inc.-Surfactants
RLM Industries
Ropak Central, Inc.
Ruetgers-Nease Corp.
Russell-Stanley Corp.
Sartomer Co.
Schold Machine Co.
Schuller International, Inc.-Filtration Division
Schutz Container System Inc.
Shell Chemical Co.
Specialty Minerals Inc.
Spencer Machine & Tool Co.
Stepan Co.
Toyal America, Inc.
U.S. Silica Co.
United States Can Co.
World Minerals, Inc.
Zochem, Ltd.

Walsh & Associates, Inc.
500 Railroad Ave.
Kansas City, MO 64116
Phone: (816) 842-3014
Fax: (816) 842-0077

Representing:

See Corporate Headquarters in Missouri

Nebraska

Walsh & Associates, Inc.
15329 Leavenworth Circle
Omaha, NE 68154-2856
Phone: (402) 330-4822
Fax: (402) 758-0585

Representing:

See Corporate Headquarters in Missouri

New Jersey

D.B. Becker Co., Ltd.
23 W. Main St., Ste. L-21
Clinton, NJ 08809

Phone: (908) 730-6010
Fax: (908) 730-9118
Dan Canavan; Dana Venner

Blue Hills Group
P.O. Box 7031
Bedminster, NJ 07921
Phone: (908) 221-9139
Fax: (908) 221-9230
E-Mail: hbillerbeck@msn.com
E. Missbach, President; K. Missbach, V.P.

Representing:

Albright & Wilson
Badders
Century Multech
Crescent Chemical
GLC Colours
Goldschmidt
Kum Yang
Lyondell
Orcas
Protech
Pumasil Minerals

Corbe Chemicals, Inc.
117-C Harrison Ave.
Roseland, NJ 07068
Phone: (201) 226-2215
Fax: (201) 226-2063
Harold Freedman, President

Representing:

H & C Industries
Halox Pigments
Ohio Polychemical
Rhône-Poulenc, Inc.
Unimin Corp.
UDI Polymers

Landman Chemical Corp.
24 Shadowlawn Dr.
Livingston, NJ 07039
Phone: (973) 533-9198
Fax: (973) 535-5705
Alan D. Bass, President

Representing:

Bayer Corp.
Degen Oil & Chemical Co.
Landers-Segal Color Co.
PolySat, Inc.
Soluol Chemical Co., Inc.
Synray Corp.
Troy Corp.

C.D. Miller Packaging Corp.
760 Route 10 West
Whippany, NJ 07981
Phone: (973) 428-8811
Fax: (973) 428-9280
Charles D. Miller, President; Melvin G. Hammel, III, V.P.

Representing:

Brockway Standard, Inc.
Cleveland Steel Container
International Performance Packaging
Southcorp - Nampac

Seegott Inc.

Seegott Inc.
140 Littleton Rd.
Parsippany, NJ 07054
Toll Free: (888) 733-4688
Phone: (973) 334-0171
Fax: (973) 334-6614
Marty Jachts, Regional V.P.
Representing:
BASF Corp., Colorants
BASF Corp., Dispersions

BASF Corp., Polyurethanes
Calgon Corp.
Celite Corp.
DuPont
ICI Polyurethanes Group
Inolex Chemical Co.
Morton International, UCD Div.
OxyChem, Durerz Div.
Reynolds Metals, Inc.
Rhône-Poulenc, Inc.
Sartomer Co.
Shell Chemical Co.

SEE OUR AD ON PAGE 181.

Spiegel & Associates
 P.O. Box 1538
 Morristown, NJ 07960
 Phone: (973) 538-8242
 Fax: (973) 829-1303
 E-Mail: mspiegel@gti.net
 Mort Spiegel, President
 Representing:
 D/L Laboratories, Inc.
 Farbenwerke Wumsiedel GmbH
 G & G International, Inc.

Whittaker, Clark & Daniels, Inc.
 1000 Coolidge St.
 South Plainfield, NJ 07080
 Toll Free: (800) 732-0562
 Fax: (800) 833-8139
 E-Mail: http://www.wcdinc.com
 Ted Hubbard, Executive V.P.; Dave Barret,
 Commercial Mgr.

Representing:
 Akzo Nobel Resins
 Alcoa Industrial Chemicals
 CR Minerals Corp.
 Cerdec Corp.
 Clariant Pigments
 Harcros Pigments
 Holliday Pigments Ltd.
 Kronos Inc.
 Specialty Minerals Inc.

New York

J.H. Calo Co., Inc.
 1600 Stewart Ave., Ste. 303
 P.O. Box 647
 Westbury, NY 11590
 Phone: (516) 832-7750
 Fax: (516) 832-7758
 E-Mail: JHCALO@AOL.COM
 Kathy Reccardi

Charles B. Chrystal Co., Inc.
 30 Vesey St.
 New York, NY 10007
 Phone: (212) 227-2151
 Fax: (212) 233-7916
 Peter D. Schnur, President; James R. Ryan,
 Sales
 Representing:
 Evans Clay
 Specialty Minerals Inc.
 U.S. Gypsum
 Uminin Corp.

J.W. Hanson Co., Inc.
 144 Woodbury Rd.
 Woodbury, NY 11797
 Phone: (516) 692-6890
 Fax: (516) 692-6865
 Carter Lavay, President; Dennis Provda,
 V.P.

D.H. Litter Co., Inc.
 565 Taxter Rd., Ste. 610
 Elmsford, NY 10523
 Phone: (914) 592-1077
 Fax: (914) 592-1499
 Michael Granito, President; Michael Griffin,
 Dir. of Sales; Robert Schweickart, Dir. of
 Marketing
 Representing:
 Alcoa
 Allied Colloids, Inc.
 Arizona Chemical
 Bayer Polyurethanes
 Ciba Specialty Chemicals
 Columbian Chemicals Co.
 Dominion Colour Corp.
 Dow Chemical Co.
 ECC International Inc.
 Ferro Corp.
 General Electric
 Holtrachem Corp.
 Hüls America
 Kerr-McGee Chemical Corp.
 Laporte Pigments
 Lawter International, Inc.
 NYCO® Minerals Inc.
 Occidental Chemical Co.
 Silberline Mfg. Co., Inc.
 Southern Clay Products, Inc.
 UOP
 U.S. Borax
 Zinc Corp.

S.P. Morell & Co. Inc.
 200 Business Park Dr.
 Armonk, NY 10504
 Phone: (914) 273-0300
 Fax: (914) 273-1231
 E-Mail: smorell@spmorell.com
 Samuel P. Morell, President; Rick
 Mazzariello, Sales Mgr.

Representing:
 Air Products and Chemicals, Inc.
 CCP Polymers
 Crosfield Chemicals
 Halox Pigments
 Hitox Corp.
 King Industries, Inc.
 Micro Powders, Inc.
 Neville Chemical Co.
 K.J. Quinn & Co.
 Sequa Chemicals
 Solvay Interox
 Süd-Chemie Rheologicals Inc.
 Toyal America

North Carolina

Azalea Color Co.
 Central Carolina Warehouse
 801 Warehouse St.
 Greensboro, NC 27420
 Toll Free: (800) 245-2877
 Fax: (412) 829-7680
 Representing:
 See Corporate Headquarters in Georgia

CheMarCo., Inc.
 3238 Reynolda Rd.
 Winston Salem, NC 27106
 Phone: (910) 723-3171
 Fax: (910) 723-3171
 Representing:
 See Corporate Headquarters in South Carolina

Deeks & Co., Inc.
 1709 Blandwood Dr.
 High Point, NC 27260
 Phone: (910) 885-8185

Fax: (910) 887-7592
 Representing:
 See Corporate Headquarters in Georgia

Durr Marketing Associates Inc.
 Central Carolina Warehouse
 801 Warehouse St.
 Greensboro, NC 27420
 Toll Free: (800) 245-2877
 Fax: (412) 829-7680
 Representing:
 See Corporate Headquarters in Pennsylvania

Inmark, Inc.
 8301 Triad Dr.
 Greensboro, NC 27409
 Phone: (910) 668-4279
 Fax: (910) 668-4099
 Representing:
 See Corporate Headquarters in Georgia

Kruss USA
 9305 Monroe Rd., Ste. B
 Charlotte, NC 28270-1488
 Phone: (704) 847-8933
 Fax: (704) 847-9416
 Lee Gilman, General Mgr.; Chris Rulison,
 Research Chemist
 Representing:
 Kruss GmbH

Ed Simal & Associates, Inc.
 707 Sussex Ct.
 Greensboro, NC 27410
 Phone: (910) 852-8686
 Ed Lancaster
 Representing:
 See Corporate Headquarters in Georgia

Ohio

The M.F. Cachat Co.
 1391 W. 110th St.
 Cleveland, OH 44102
 Toll Free: (800) 729-8900
 Phone: (216) 228-8900
 Fax: (216) 228-9916
 E-Mail: info@mfcachat.com
 P. William Head, V.P. Development; John
 Mastrantoni, Dir. Sales; Ron Toivonen,
 Sales Administrator
 Representing:

Air Products and Chemicals
 Akzo Nobel Surface Chemistry
 ANGUS Chemical Co.
 Arizona Chemical Co.
 Bayer Corp., Industrial Chemical Div.
 Ciba-Additives for Coatings
 Ciba-Polymers/Resins
 Columbian Chemicals Co.
 CR Minerals Corp.
 Engelhard Corp.
 Hitox Corp. of America
 J.M. Huber Corp.
 Laporte Pigments
 Lorama Chemicals, Inc.
 McWhorter Technologies
 Millennium Inorganic Chemicals, Inc.
 NYCO® Minerals Inc.
 OM Group Inc.
 Omya, Inc.
 Quackenbush Co.
 Scholle Corp.
 Solutia Inc.
 The Sherwin-Williams Co.
 Solvay Interox Ltd.
 Toyo Ink America Inc.
 Wilkinson Kaolin Associates, Inc.
 Zinc Corp. of America

D.A. Campbell & Co., Inc.
6001 Cochran Rd., #A-202
Solon, OH 44139
Phone: (216) 498-9100
Fax: (216) 498-9105
Gary Whewell, President; Tom Dressel,
V.P.; Mike Wright, Sales; George Bless,
Exec. V.P.; Dave Morris, Sales

Representing:

Alcoa Powder Div.
Aluchem
Arizona Oxides, Inc.
Aspect Minerals
Cabot Corp.
Carborundum
Chartwell International, Inc.
Colloids (Rhône-Poulenc)
Cookson Pigments
Dianal America, Inc.
DuPont
Dussek Campbell Ltd.
Fibertec
ECC International Inc.
Interfibe Corp.
KT Clay Co.
Magnesium Elektron, Inc.
Metsa-Seria
Milwhite
Resinall
Rhône-Poulenc, Inc.
Silberline Mfg. Co., Inc.
Silbrico
Suzorite Minerals Products
Thibaut & Walker Inc.
Unimin Specialty Minerals
Ur-Cryl Polymer Corp.

Chem-Materials Co., Inc.
16600 Sprague Rd.
Cleveland, OH 44130-6318
Phone: (440) 243-5590
Fax: (440) 243-1940
R. Morsek, President

Representing:

Alcan Chemicals
Arakawa Chemicals
Aztec Peroxides
Daniel Products Co.
Expancel
Fillite
General Carbon
Goldschmidt Chemical
Lucas Meyer
Ogleby-Norton
Piqua Materials
Schnectady Canda
Songwon Color
Swada
Tego Chemie Services
R.T. Vanderbilt Co.

dar-tech, inc.

Dar-Tech, Inc.
16485 Rockside Rd.
Maple Heights, OH 44137-4336
Phone: (216) 663-7600
Fax: (216) 663-8007
Walt Walburn, President; Jim Benduhn,
V.P., Sales/Marketing

Representing:

ADM Lecithin
Burgess Pigment Co.
BYK-Chemie USA
BYK-Gardner USA
Cimbar Performance Minerals
CVC Specialty Chemical
Dominion Colour Corp.
Hampshire Chemical Co.
Hüls America Inc.

K-T Feldspar
Franklin Industrial Minerals, KMG Division
Lonza, Inc.
Luzenac America
3M/Zeelan
Micro Powders, Inc.
Ohio Polychemical Co.
PPG Industries, Inc.
SEPR Quartz Prod.

SEE OUR AD ON THIS PAGE.

Deeks & Co.
6615 Corporate Dr.
Cincinnati, OH 45242
Toll Free: (800) 489-6654
Phone: (513) 489-1300
Fax: (513) 489-1303
G. Neal Overbey, President; Neil J.
Stubbers, V.P., Sales/Marketing

Representing:

Akross Chemicals
American Tartaric
Ames Chemical Inc.
Borden Chemicals (Graphic Div.)
Asheville Mica Co.
Cargill Inc.
Central Can Co.
Cleveland Steel Container Corp.
Crosfield Co.
Crucible Chemical Co.
Dexter Chemical Corp.
Dussek Campbell
E & B, Inc.
General Electric Co.
Georgia Marble Co.

Hedwin Corp.
Indiana Naval Stores, Inc.
Lancer Dispersions
Leneta Co.
Letica Corp.
Midwest Zinc
Mil International, Inc.
Möbius, Inc.
Morton International
Northern Container
Poly-Resyn, Inc.
Silberline Mfg. Co., Inc.
Stepan Co.
Synthron Specialty Chemicals
Wm. B. Tabler Co., Inc.
Universal Color Dispersions
R.T. Vanderbilt Co.
Wayne Pigment Corp.
Witco Corp.

Durr Marketing Associates Inc.
Wisco Warehouse
2525 E. 93rd St.
Cleveland, OH 44104
Toll Free: (800) 937-3877
Fax: (412) 829-7680

Representing:

See Corporate Headquarters in Pennsylvania

Flanagan Associates, Inc.
10999 Reed Hartman Hwy., Ste. 109C
Cincinnati, OH 45242
Phone: (513) 984-8880
Fax: (513) 984-8883
Jim Flanagan, President

Representing:

American Ingredients Co.

Products

People

Personal
Service

The World of

dar-tech, inc.

Your one-stop solution supplier for
pigments, functional minerals, specialty additives,
resins and lab instrumentation.

16485 Rockside Rd. / Cleveland, OH 44137
(800) 228-7347 / FAX (216) 663-8007
Cleveland • Detroit • Cincinnati
Pittsburgh • Buffalo • Louisville



Circle No. 249 on Reader Service Card

Distributors

Etna Products, Polyester Resins Div.
Paar Physica USA, Rheometer Div.
Patco Defoamer, Additives Div.

J.H. Hinz Co.
2001 Crocker Rd., Ste. 350
Westlake, OH 44145
Phone: (440) 871-3333
Fax: (440) 871-4475
E-Mail: jhhinz@msn.com
Gary E. Peacock, President; Tami L.
Furlong, Office Mgr.

Representing:
Aarbor International
Asheville Mica
CR Minerals, Navajo Div.
Flavormatic Industries
Goldmont International Corp.
Hi-Mar Specialties, Inc.
Hokoku Oil and Chemical
Itochu Specialty Chemicals
Japan Hydrazine Co.
Ishihara Sangyo Kaisha, Ltd.
Koel Chemicals
Millenium Specialty Chemicals, Inc.
Nan Ya Plastics
Shin Nakamura
Silver Springs Citrus
Socer Resinas SA
Solvay Performance Chemicals
Spectratek Corp.
Taiwan Fertilizer
Tayca Chemical Co.
Total America, Europe, Japan
Toyota Tsusho America

J.H. Hinz Co.
3552 Stonecreek Rd., Ste. B
Cincinnati, OH 45209
Phone: (513) 321-9914
Fax: (513) 321-9914
Representing:
See Corporate Headquarters in Ohio

Palmer Supplies Co.
3607 W. 56th St.
Cleveland, OH 44102
Toll Free: (800) 635-4822
Phone: (216) 631-2200
Fax: (216) 631-3543
Ron Kehl, President; Bryn Irvine, Sales Mgr.

Representing:
Advanced Polymer Inc.
Air Products and Chemicals, Inc.
Alcan-Toyo America
American Colors Inc.
Bayer Corp.
Bell Flavors and Fragrances
Berenfield Containers
Biotrace Inc.
Black Hills Bentonite Co.
Brockway Standard, Inc.
Calgon Corp.
Central Soya
Cook Composites and Polymers
Cray Valley, Ltd.
Degussa Corp.
Drew Chemical
Fabricated Metals, Inc.
Franklin Mineral Products Co.
Halox Pigments
Hammond Lead Products Inc.
Henkel Corp.
ICI Surfactants
Ideal Mtg. & Sales Corp.
International Compliance Centre Ltd.
J.M. Huber Minerals Div.
SC Johnson Polymer
Kolon Chemical Co. Ltd.
Krete Industries Co.
Kronos Inc.
Landers-Segal Color Co., Inc.
M D Both Industries
Mallinckrodt Chemicals

Milton Can Co.
Mineral Mining Co., Inc.
Nan-Ya Plastics Corp.
Raybo Chemical Co.
Frank B. Ross Co.
Schold Machine Co.
Scott Bader Co. Ltd.
Southcorp Packaging Inc.
Southern Clay Products, Inc.
T.M.L. Industries
Trinity Tool Co.
U.S. Polymers/Accurez
United Clays Inc.
United Desiccants
Zochem Ltd.

B. H. Roettker, Inc.
4226 Bridgetown Rd.
Cincinnati, OH 45211
Toll Free: (800) 755-7795
Phone: (513) 574-0220
Fax: (513) 574-5479
E-Mail: roettker@frontiernet.net
Donald Roettker, President; Richard
Roettker, V.P.
Representing:
Central Fabricators, Inc.
Cimbar Performance Minerals
ECCI Performance Minerals
Evans Clay Co.
Hüls America Inc.
Luzenac America, Inc.
Synthetic Products Co.
Tioxide Americas, Inc.

Schibley Chemical Co., Inc.
3136 W. 63rd St.
Cleveland, OH 44102
Phone: (216) 631-4280
Fax: (216) 631-8282
Paul Asadorian
Representing:
Elf ATOCHEM North America Inc.
Hampshire Chemical Co.
McWhorter Technologies
Rhône-Poulenc, Inc.
Unichema
Venus-Gusmer
Witco Corp.

Schibley Chemical Co., Inc.
7659 Montgomery Rd.
Cincinnati, OH 45236
Phone: (513) 891-8850
Representing:
See Corporate Headquarters in Ohio

Seegott Inc.

Seegott Inc.
Rubber & Plastics Group
10040 Aurora-Hudson Rd.
Streetsboro, OH 44241
Toll Free: (888) 733-4688
Phone: (330) 528-0808
Fax: (330) 528-0675
John Freemont, Regional V.P.
Representing:
BASF Corp.
Budd Chemical
CasChem, Inc.
Celite Corp.
Cytec Industries, Inc.
DuPont
Farboil Co.
General Electric Silicones
Harcros Pigments, Inc.
Hull/Finmac Corp.
OxyChem, Durez div.
Resinoid Engineering

Sartomer Co.
Specialty Minerals Inc.
U.S. Silica

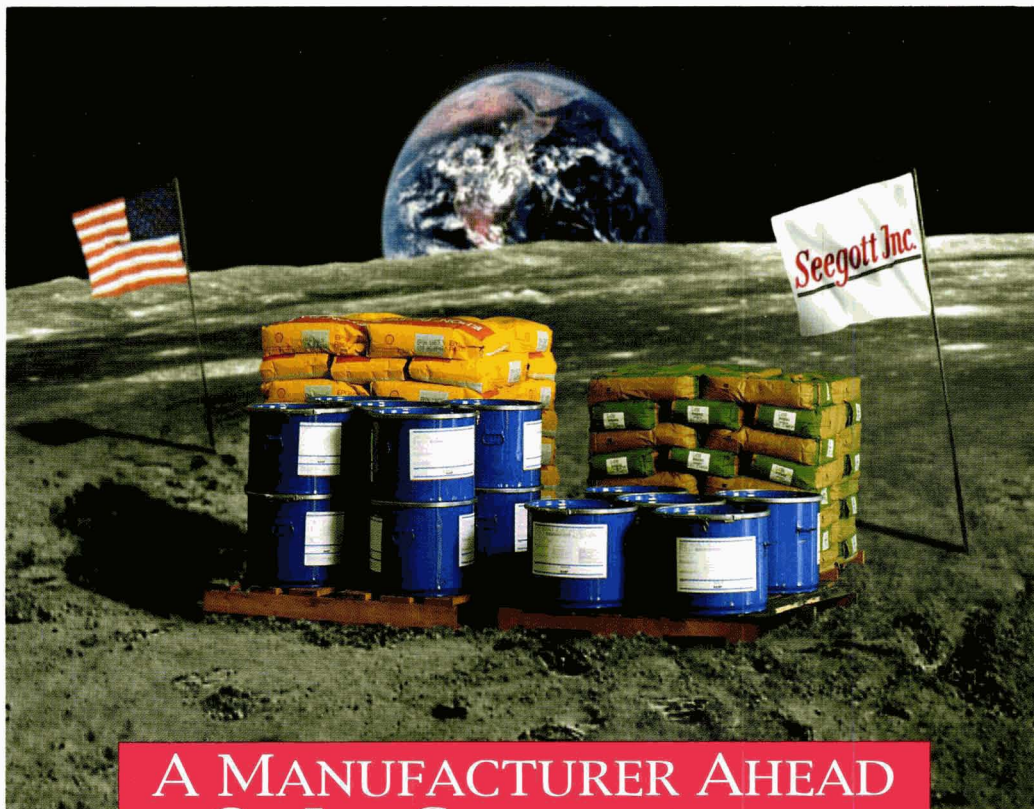
SEE OUR AD ON OPPOSITE PAGE.

Seegott Inc.
10040 Aurora-Hudson Rd.
Streetsboro, OH 44241
Toll Free: (888) 733-4688
Phone: (330) 528-0808
Fax: (330) 528-0675
David B. Meier, V.P.; Michael Wolfe, Area
Sales Mgr.

Representing:
Akzo Nobel Chemicals
BASF Corp., Colorants
BASF Corp., Dispersions
BASF Corp., Polyurethanes
Cabot Corp.
CasChem, Inc.
Celite Corp.
DuPont, PTFE (Teflon®)
DuPont, TiO₂
General Electric Silicones
Goodyear Chemical
Harcros Pigments, Inc.
ICI Polyurethanes Group
Inolex Chemical Co.
OxyChem, Durez Div.
PPG Industries/Mazer Chemicals
Raybo Chemical Co.
Reynolds Metals Co.
Rhône-Poulenc Inc.
Schuller International
Shell Chemical
Specialty Minerals Inc.
UOP
U.S. Polymers
U.S. Silica Co.

Donald McKay Smith, Inc.
19915 Lake Rd.
Rocky River, OH 44116
Phone: (440) 333-2100
Fax: (440) 333-1757
Michael J. Grady, President
Representing:
T.J. Bell, Inc.
Cargill, Inc.
Cleveland Container Recycling Corp.
Corrostabill International
Enviro Resins
Florida Chemical Co.
H & C Industries
Hoover Color Corp.
International Resources
MiniFIBERS, Inc.
K.J. Quinn, Inc.
Werner G. Smith, Inc.
P.L. Thomas & Co., Inc.
Troy Corp.
Unimin Corp.
Universal Color Dispersion

Western Reserve Chemical Corp.
4837 Darrow Rd.
Stow, OH 44224
Phone: (216) 650-2244
Fax: (216) 650-2255
E-Mail: wrccstow@worldnet.att.net
Ronald Anderson, President; David Jividen,
V.P.; Maria Baughman, Customer Service
Representing:
Anderson Development
Biomin
Cortec Corp.
Globtrade
G.H. Chemical
Hedman Resources
Lindau Chemicals
Martin Marietta



A MANUFACTURER AHEAD OF ITS COMPETITION...

NEEDS DISTRIBUTION AHEAD OF ITS TIME.

We're Seegott, **an established network of regional specialty raw material distributors.**

And in our world, being a few steps ahead means being a few years ahead. So behind the scenes, we rely on breakthroughs in data processing, inventory control, digital sales and customer service tools. On the scene, we offer the technical mastery to help industries use your products for new and innovative applications. Six regions, covering coast to coast. Over a dozen facilities sized to inventory all your products. Set your clock ahead and see why Seegott is ***your local source for world class solutions.***

SERVING THESE COMPANIES:

Shell Chemical • DuPont • Celite Corp.
• ICI • Harcros Pigments • OxyChem
• Cabot Corporation • Goodyear • BASF
• Rhône-Poulenc • U.S. Silica • CasChem
• General Electric • Morton International
• Specialty Minerals • Reynolds Metals
• Sartomer • and more.

SERVING THESE INDUSTRIES:

Paint • Coatings • Adhesives • Sealants
• Petrochemicals • Civil Engineering
• Plastics • Rubber • Paper • Food
• Ink • and more.

FOR MORE INFORMATION CALL TOLL-FREE 1-888-SEEGOTT (733-4688)

www.seegott.com



Quality • Responsibility • Stewardship

Seegott Inc.



Orange, CA • Houston, TX • Elgin, IL • Streetsboro, OH • Ft. Myers, FL • Parsippany, NJ • Atlanta, GA

Circle No. 226 on the Reader Service Card

Distributors

Polysat
Rockland React
Rite
Solulol

Wininger & Associates
28450 Bradner Rd.
Millbury, OH 43447
Phone: (419) 836-5151
Fax: (419) 836-5151

Bob Wininger, President

Representing:

Batchmaster Software Corp.
Century Container Co.

C.L. Zimmerman Co.
5493 Union Centre Dr.
West Chester, OH 45069
Phone: (513) 860-9300
Fax: (513) 870-5210
E-Mail: www.clz.com

John Stephens, President; Mark Leverone, V.P.

Representing:

Addiment
American Fillers & Abrasives
American Pulverizer Co.
Arizona Chemical Co.
Aspects Minerals, Inc.
T.J. Bell
Berry Plastics
Browning Chemical Corp.
Crandall International
CDF Corp.
Custom Grinders
Degussa Corp.
Disti-Kleen, Renzmann, VanWyk
Drum Runner® Mt. Handling Co.
Elf ATOCHEM North America Inc.
Engelhard Corp.
Fawcett Co., Inc.
Filter Technology
Flexcon and Systems Inc.
Flux Pumps Corp.
GAF, ISP Filter Systems
Glen Mills Inc.
Harcros Pigments, Inc.
Henkel Corp.
Hüls America Inc.
Indco, Inc.
Mega Bag Corp.
Mineral Mining
Mineral Technologies, Inc.
Morse Mfg. Co., Inc.
MM Ind. Inc./Vorti-Siv® Div.
Nabaltec
Nampac Inc.
OMGroup, Inc.
Olcott Plastics
Philcan
Polycryl
Potteries Industries Inc.
Premier Mill Crop.
K.J. Quinn & Co.
R.L.M. Industries
Reynolds Metals
RXI Plastic
Saskatchewan Minerals
Schütz Container Systems Inc.
Self Industries
Spencer Machine & Tool Co., Inc.
SQG Industries, Inc.
SST Industries
Thiele Engineering Co.
U.S. Can
Waxes offered from C.L.Z.
Wilkinson Minerals
Zinc Corp. of America

Oklahoma

Crozier-Nelson Sales, Inc.
5400 N. Grand Blvd., Ste. 100-R
Oklahoma City, OK 73112
Phone: (405) 943-4120
Fax: (405) 943-4765
Representing:
See Corporate Headquarters in Texas

Oregon

Chemical Distributors, Inc.
2727 N.W. Industrial
P.O. Box 10763
Portland, OR 97210
Phone: (503) 243-1082
Fax: (503) 243-1162
Donald J. Cruickshank, President

Representing:

Burgess Pigment Co.
Cargill Technical Oils
Columbia River Carbonates
Columbian Chemicals Co.
Dianal America, Inc.
Dominion Colour Co. Ltd.
Dover Chemical Corp.
Ferro Corp., Polymers Additives Div.
Floridin Co.
Franklin Industrial Minerals, KMG Div.
Huls America, Inc.
Industrial Containers Ltd.
Interfibe Corp.
Luzenac America
Morton Water Based Polymers
Mountain Minerals Co. Ltd.
OMYA/Pluuss-Staufier CA, Inc.
PG Lecithin
PQ Corp.
K.J. Quinn & Co., Inc.
Solomon Colors, Inc.
Tioxide Americas Inc.
Toyal America, Inc.
Unimin Specialty Minerals, Inc.
U.S. Can Co.
Wacker Silicones Corp.
World Minerals, Inc.
Zinc Corp. of America

P.T. Hutchins Co. Ltd.
8040 N.E. Sandy
Portland, OR 97213
Phone: (503) 288-2577
Fax: (503) 280-7917

Representing:

See Corporate Headquarters in California

J.F. Shelton Co., Inc.
3339 NW 26th Ave.
Portland, OR 97210
Phone: (503) 223-3944
Fax: (503) 223-4721

Representing:

See Corporate Headquarters in Washington

Synergistic Performance Corp.
2720 N.W. 35th Ave.
Portland, OR 97210
Phone: (503) 222-1303
Fax: (503) 827-7669

Representing:

See Corporate Headquarters in California

Westendorf Chemical Co.
2627 NW Nicolai
Portland, OR 97210
Phone: (503) 241-3520

Fax: (503) 241-8040
John Westendorf, President; Karen Becker
Westendorf, Sec./Treas.

Representing:

Calgon Corp.
Dock Resins Corp.
Drew Industrial
Dussek Campbell, Ltd.
Eckart America
BFGoodrich
Heucotech Ltd.
Milwhite Inc.
Neville Chemical Co.
Polyacryl, Inc.
Shamrock Technologies
Sud Chemie Rheologicals
Tego Chemie Service (USA) Inc.

Pennsylvania

Durr Marketing Associates Inc.

P. O. Box 17600

Pittsburgh, PA 15235

Toll Free: (800) 937-3877

Fax: (412) 829-7680

Keith Standbridge, V.P. Sales; David R.

Durr, President

Representing:

Akzo Nobel
Allied Colloids, Inc.
Campine S.A.
Ciba Polymers
Dominion Colour Corp.
Degussa Corp.
Floridin/ITC Industrials
Great Lakes Chemical Corp.
Huber Engineered Minerals
3M/Zeelan Industries
Neville Chemical Co.
PPG Industries, Inc.
Reagens Comiel
Rebus, Inc.
Rhône-Poulenc, Inc.
Sachtleben Corp.
Tioxide Americas, Inc.
U.S. Silica Co.
Union Camp Corp.
Union Miniere

Durr Marketing Associates Inc.

Shovel Warehouse

Chamber & Ella Sts.

Mc Kees Rocks, PA 15136

Toll Free: (800) 937-3877

Fax: (412) 829-7680

Representing:

See Corporate Headquarters in Pennsylvania

Durr Marketing Associates Inc.

MCC Warehousing, Inc.

Depot St.

Bridgeport, PA 19405

Toll Free: (800) 937-3877

Fax: (412) 829-7680

Representing:

See Corporate Headquarters in Pennsylvania

S.E. Firestone Assoc., Inc.

101 Surrey Rd.

Melrose Park, PA 19027-2931

Phone: (215) 635-1366

Fax: (215) 635-6355

Daniyel Firestone, President; Samuel E.

Firestone, C.E.O.

Representing:

American Ingredients (Patco)
Bowers Process Equipment
Brookfield Viscometers
Coors Ceramics Co.

Disti-Kleen, Inc.
 Elcometer Instruments Co.
 Fawcett Air Mixers
 Hess Pumice
 Hurri-Kleen DOT 57 Tanks
 Innovative Magnetics
 Kady International
 Mardem Filling Equipment Co.
 Netzsch Inc.
 Netzsch-Condux Inc.
 Norstone Urethane Impellers
 Potters Industries, Inc.
 Ranbar Technology
 Red Devil Dispensers and Shakers
 Reliance Universal Nitro/Soln
 Russell Finex Inc.
 SEFA Steel Balls
 Shamrock Technologies, Inc.
 Sheen Instruments
 Taber Engineering
 Western Equipment Co. (Used)

J.M. Gillen Co./Van Horn, Metz & Co.
 681 Millers Run Rd.
 P. O. Box 428
 Cuddy, PA 15031
 Phone: (412) 257-3300
 Fax: (412) 257-4999
 John G. Gillen; Timothy C. Zeffrio

Representing:

Akzo Nobel Resins
 Buckman Laboratories, Inc.
 CDF Corp.
 Cimbar Performance Minerals
 Columbian Chemicals Co.
 CVC Specialty Chemicals
 Disti-Kleen, Inc.
 E.I. DuPont DeNemours
 Engelhard Corp.
 Great Lakes Chemical Corp.
 Hoover Color Corp.
 ICI Specialty Chemicals
 Interfibe Corp.
 Leticia Corp.
 Luzenac America, Inc.
 Millennium Inorganic Chemicals, Inc.
 Morton UCD
 Premier Mill Corp.
 Shamrock Technologies, Inc.
 Silberline Mfg. Co., Inc.
 United States Can Co.
 Wacker Silicones Corp.
 Wilkinson Minerals, Inc.

Harvey Lipsitz Co.
 5621 Butler St.
 Pittsburgh, PA 15201
 Phone: (413) 782-2461
 Fax: (413) 782-5507
 E-Mail: melip@sgi.net
 Marc H. Lipsitz; Mel S. Lipsitz

Representing:

Allstate Can
 Brockway Standard, Inc.
 Cleveland Steel Container
 Plastipak
 Superfos Packaging
 Southcorp Packaging

E.W. Kaufmann Co.
 1320 Industrial Hgwy.
 P. O. Box 529
 Southampton, PA 18966
 Phone: (215) 364-0240
 Fax: (215) 364-4397
 Donald F. Denny, President; Brian T. Gilbert, V.P.

Representing:

Akros Chemicals
 Burgess Pigment Co.
 Caschem, Inc.
 Central Soya
 Daniel Products Co.
 Dock Resins Corp.

Clifford W. Estes Co.
 Fillite North America Inc.
 Halox Pigments
 Henkel Corp.
 Hockmeyer Equipment Co.
 Millennium Inorganic Chemicals
 Milwhite Co.
 MM Industries, Inc.
 Omya, Inc.
 Oxychem
 PPG Industries, Inc.
 Reichhold Chemicals, Inc.
 Skinner Engine Co.
 Süd-Chemie Rheologicals Inc.
 Sybron Chemicals
 Toyal America, Inc.
 Unimin Specialty Minerals, Inc.
 Union Camp Corp.
 Zinc Corp. of America

Loos & Dilworth, Inc. (Chem Div)

61 E. Green Lane
 Bristol, PA 19007
 Phone: (215) 785-3591
 Fax: (215) 785-3597
 David F. Tompkins, V.P. & G.M.; Linda M. Schepise, Acct Mgr.

Representing:

BP Chemicals Ltd.
 Diamond Shamrock Refining
 Elf ATOCHEM North America Inc.
 Flexsys, Inc.
 Hercules, Inc. (Resins/Paper Tech.)
 Huntsman Corp.
 SPI Polyols
 Tosoh USA

Ray Lyman & Co.

3462 Hills Church Rd.
 Export, PA 15632
 Phone: (412) 733-2678
 Fax: (412) 733-5918
 E-Mail: rlymanco@nb.net
 Ray Lyman, Owner; Linda Lyman, Customer Service

Representing:

Canada Square Resins
 Cardinal Color
 Dock Resins Corp.
 Dussek Campbell Co.
 Landers-Segal Color Co.
 Pressure Chemical
 Progressive Recovery, Inc.
 Resinall
 Worthen Industries

W. A. Ritz Marketing Co.

3627 Wallace Dr.
 P. O. Box 9822
 Pittsburgh, PA 15227
 Phone: (412) 881-0912
 Fax: (412) 881-7374
 William A. Ritz, Owner

Representing:

Alo Chem Inc.
 American Filler & Abrasives
 ADM
 Astor Wax
 Baroid Corp.
 Etna Products
 Evans Clay
 Fawcett Equipment
 Global Stone Penrol
 Hockmeyer Equipment
 J.M. Huber Corp.
 Keystone Color Works
 KMG, Div. of Franklin Industries
 Mobile Rosin
 Oglebay Norton
 PolySat Inc.
 PDM
 Therm-o-Rock Co.
 R.T. Vanderbilt Co.
 Wabash Gilonite

Sullivan Associates, Inc.
 201 S. Gulph Rd, Unit C
 King of Prussia, PA 19406
 Phone: (610) 354-9720
 Fax: (610) 354-9733

United Color Technology, Inc.
 660 Newtown-Yardley Rd., Ste. 205
 P.O. Box 480

Newtown, PA 18940
 Phone: (215) 860-2165
 Fax: (215) 860-2560

Thomas Nowakowski, President; Thomas E. Nowakowski, Jr., Dir.; Robert Cwik, National Sales Mgr.; Michael J. Smith, Chief Chemist

Representing:

Aron Universal
 Delsi Corp.
 Far East Chemical Ltd.
 ICI Nitrocellulose
 United Color Manufacturing Inc.
 Zeneca Pigments & Additives

Van Horn, Metz & Co.

201 E. Elm St.
 Conshohocken, PA 19428
 Phone: (610) 828-4500
 Fax: (610) 828-0936
 E-Mail: Barry-Fisher@vanhornmetz.com
 H. Morgan Smith, President; Paul W. Kase, V.P.; A. Marshall Jones, V.P., Packaging;
 John G. Gillen, V.P.

Representing:

Akzo Nobel
 Borden Chemical Co.
 Buckman Laboratories, Inc.
 Ciba-Geigy Corp.
 Cimbar Performance Mineral
 Columbian Chemicals Co.
 E.I. DuPont
 Endex Polymers
 Engelhard Minerals
 Great Lakes Chemicals Corp.
 Georgia Marble
 Hedwin Corp.
 Hoover Color Corp.
 ICI Americas
 Interfibe Corp.
 Leticia Corp.
 Luzenac America
 Mallinckrodt Inc.
 Millennium Inorganic Chemicals, Inc.
 Wacker Silicones Corp.

Van Horn, Metz & Co.

681 Millers Run Rd.
 Cuddy, PA 15031
 Phone: (412) 257-3300
 Fax: (412) 257-4999
Representing:
 See Corporate Headquarters in Pennsylvania

Charles A. Wagner Co., Inc.

P.O. Box 46845
 Philadelphia, PA 19160
 Phone: (215) 457-0600
 Fax: (215) 457-2710
 Wayne Rabon, President

Representing:

Barretts Minerals Inc.
 Cosmetic Specialties Inc.
 Dianal America, Inc.
 ECC International Inc.
 Filter Technology, Inc.
 Halox Pigments
 RLM & SQG Industries
 H.M. Royal, Inc.
 Sachtleben Corp.
 Smectite Inc.
 Southeastern Clay Co.
 Specialty Minerals Inc.
 Spectrum Quality Products
 USG Corp.



Van Waters & Rogers

A ROYAL PAKHOED COMPANY

WE HAVE ALL *the* MAKINGS of a GREAT PAINT *and* COATINGS COMPANY.

Servicing your formulating needs from 110 stocking
locations throughout North America.

Solvents, titanium dioxide, acrylic resins, dispersants, defoamers, biocides,
pigments, surfactants, plasticizers, Chemcare® waste disposal and much more.

For further information:

call: (630) 573-4300 or visit: www.vwr-na.com



COMMITTED to be THE BENCHMARK of EXCELLENCE.

A.C. Zoller Co.
740 Seventh St.
P.O. Box 289
Oakmont, PA 15139
Phone: (412) 828-8040
Fax: (412) 828-7219
Alan C. Zoller; Mark A. Zoller
Representing:

Canada Talc Industries Ltd.
Crucible Chemical Co.
Custom Metalcraft Inc.
Dover Chemical Co.
Ferro Corp.
Georgia Marble Co.
Hüls America Inc.
Poly-Resyn, inc.
Snyder Industries
Suzorite Mineral Products Inc.
Suzorite Mica Products
Thibaut and Walker
Wayne Pigment Corp.

Puerto Rico

Olivieri & Associates
P.O. Box 361413
San Juan, PR 00936-1413
Phone: (787) 764-9954
Fax: (787) 756-5930
E-Mail: joliv@caribe.net
Pepe Olivieri; Jose A. Olivieri
Representing:

Brockway Standard, Inc.
Cardinal Color Co.
Corob/Toatek NA
Epworth Morehouse-COWLES
Harcros Pigments
Hüls America Inc.
Hunter Lab
Ideal Mfg. & Sales Corp.
Kronos, Inc.
Rheox Inc.
Specialty Minerals Inc.
Sun Chemical Co.
U.S. Silica

Rhode Island

NanoMaterials, Inc.
9 Preston Dr.
Barrington, RI 02806
Phone: (401) 433-7022
Fax: (401) 433-7001
E-Mail: sales@nanomaterials.com
Emily S. Reade, Owner; Charles Reade,
Sales Manager

South Carolina

CheMarCo., Inc.
63 Pelham Davis Cir.
Greenville, SC 29615
Phone: (864) 234-6735
Fax: (864) 234-6975
Richard P. Carter, President
Representing:
Air Products & Chemicals, Inc.
Aluchem
Bergen Materials
Drew Industrial
Epworth Morehouse-COWLES
ETNA Products
H&C Industries

Heucotech, Inc.
 Hitox Corp. of America
 Interfibe Corp.
 Kaopolite, Inc.
 The Lubrizol Corp.
 Magnesium Elektron
 Silberline Mfg. Co., inc.
 Thibaut-Walker
 U.S. Borax
 Ur-Cryl Polymers
 Zemex Industrial Minerals

Tennessee

Alchemy-South, Ltd.
 216 Cain Dr.
 Blountville, TN 37617
 Phone: (423) 323-9543
 Fax: (423) 323-9537
 Gary Watts

Representing:

See Corporate Headquarters in Georgia

Deeks & Co., Inc.
 520 Central Ave.
 Nashville, TN 37211
 Phone: (615) 242-0464
 Fax: (615) 254-5118

Representing:

See Corporate Headquarters in Georgia

Inmark, Inc.
 3330 Ambrose Ave.
 Space Park East
 Nashville, TN 37207-4716
 Phone: (615) 262-9961
 Fax: (615) 262-9755

Representing:

See Corporate Headquarters in Georgia

Ed Simal & Associates, Inc.
 3601 Brush Hill Rd.
 Nashville, TN 37216
 Phone: (615) 227-3192
 Jim Allen

Representing:

See Corporate Headquarters in Georgia

Walsh & Associates, Inc.
 3929 Senator St.
 Memphis, TN 38118-9050
 Phone: (901) 366-6111
 Fax: (901) 366-1178

Representing:

See Corporate Headquarters in Missouri

Walsh & Associates, Inc.
 151 Holly Forest Dr.
 Nashville, TN 37221-2237
 Phone: (615) 662-6567
 Fax: (615) 662-6568

Representing:

See Corporate Headquarters in Missouri

Texas

Bosscio Industries, Inc.
 13700 Veterans Memorial Dr., Ste. 380
 Houston, TX 77014
 Phone: (281) 893-6006
 Fax: (281) 893-1552
 E-Mail: service@bosscioindustries.com
 Edward Boss, President; Frank Lee, V.P.,
 Sales Mgr.
 Representing:

Acheson Colloids
 Air Products and Chemicals, Inc.
 ANGUS Chemical Co.
 Cabot Corp.
 Chartwell International, Inc.
 Crosfield Chemicals
 Cytec Industries, Inc.
 Fanning Corp.
 King Industries, Inc./
 Landers-Segal Color Co.
 3M
 K.J. Quinn & Co.
 Solvay Interox

Crozier-Nelson Sales, Inc.
 1425 Greenway, Ste. 420
 Irving, TX 75038

Phone: (972) 518-2311

Fax: (972) 580-1973

Representing:

See Corporate Headquarters in Texas

Crozier-Nelson Sales, Inc.
 2502 Collingsworth
 Houston, TX 77026

Phone: (713) 223-3037

Fax: (713) 225-1942

Victor Ortiz, V.P. Sales-Houston; Joe

Jedrusiak, V.P. Sales-Dallas

Representing:

Air Products and Chemicals, Inc.

Akzo/Lanchem

Alcoa

Bayer Corp.

MD Both Industries

Calgon Corp.

CDF Corp.

Cimbar Performance Minerals

Degussa Corp.

Dexter Chemical Co.

Dow Chemical Co.

ECC International, Inc.

Ferro Corp.

Floridin

Franklin Industrial Minerals

Holliday Pigments

KMG Minerals, Inc.

Luzenac America

Myers Engineering

Mississippi Lime Co.

OM Group/Mooney Chemicals, Inc.

Quackenbush Co.

Sachtleben Corp.

Southwest Trading Industries, Inc.

Thiele Engineering Co.

Thiele Kaolin Corp.

Toyo Pigments Corp.

Ultra Additives Inc.

Universal Color Dispersions

Ziegler Chemical and Minerals Corp.

Zinc Corp. of America

D & F Distributing, Inc.

2501 Oak Lawn, Ste. 820

Dallas, TX 75219

Phone: (214) 520-1334

Fax: (214) 520-9214

Representing:

See Corporate Headquarters in Texas

D & F Distributing, Inc.

9800 N.W. Freeway

Houston, TX 77092

Phone: (713) 681-4891

Fax: (713) 681-5217

E-Mail: dandf@flash.net

Wayland Dunlap, President; Steve

Hightower, V.P. & Marketing

Representing:

BYK-Chemie USA

BYK-Gardner USA

Ciba Specialty Chemicals

Color Corp. of America

Columbian Chemicals Co.
 CPS Chemical Co., Inc.
 CR Minerals Corp.
 Dock Resins Corp.
 Dussek-Campbell
 Engineered Polymer Solutions, Inc.
 Epworth Morehouse-COWLES
 Georgia Marble Co.
 Georgia-Pacific Resins
 Hitox Corp. of America
 Hoechst Celanese/Clariant
 J.M. Huber Corp., Chemical Div.
 Kemira, Inc.
 Laporte Pigments
 Malvern Minerals Co.
 OxyChem
 Shell Chemical Co.
 Toyal America
 Wayne Pigment Corp.
 Zemex Industrial Minerals

Jamieson Assoc., Inc.
 3309 W. Kingsley Rd.
 Garland, TX 75041
 Phone: (972) 864-0865
 Fax: (972) 864-0781
 E-Mail: jjamieson@ibm.net
 John Jamieson, V.P. & G.M.; Jim Crinnion,
 Account Exec.

Representing:

Hardeners
 Isocyanates
 Industrial Liquids
 Packaging Services

R.B. Patterson Co., Inc.
 11933 FM 529 Rd.
 Houston, TX 77041
 Phone: (713) 849-5727
 Fax: (713) 849-5113
 E-Mail: RBP2@Flash.net
 Mike Patterson, President; Fred
 Schuenaman, Sales

Representing:

Berry Plastics
 Brockway Standard, Inc.
 Daniel Products Co.
 Dianal America, Inc.
 Dry Branch Kaolin Co.
 Evans Cooperation
 The Leneta Co.
 Polar Minerals
 Polyethylene Products
 Tom Thumb Clip Co.
 The Sherwin-Williams Co.
 Troy Chemical Corp.
 U.S. Polymers

R.B. Patterson Co., Inc.

1128 Longpoint

Dallas, TX 75247

Phone: (214) 631-4485

Fax: (214) 637-2350

Representing:

See Corporate Headquarters in Texas



Ribelin Sales Inc.
 3857 Miller Park Dr.
 Garland, TX 75042
 Toll Free: (800) 374-1594
 Phone: (972) 272-1594
 Fax: (972) 272-1078

Representing:

Air Products and Chemicals, Inc.
 Brockway Standard, Inc.
 C.W. Brabender

Bronco
Cargill, Inc.
CB Mills
Ciba Polymers
Day-Glo Color Corp.
Eckart America
Engelhard Corp.
Fabricated Metals
Fawcett Co.
Great Lakes Chemical Corp.
Grefco
Hüls America Inc.
Huntsman Corp.
Hurri-Kleen
ICI Polyurethanes
Ideal Mfg. & Sales Corp.
Kronos, Inc.
Lee Industries
3M/Zeelean
McWhorter Technologies
Midwest Zinc
Neville Chemical Co.
NYCO® Minerals, Inc.
Olin Corp.
Omya Inc.
Plasticolors, Inc.
Rhône-Poulenc, Inc.
Ropak
Schold Machine Co.
Semi-Bulk Systems, Inc.
Solutia Inc.
Southwest Oxide
Süd-Chemie Rheologicals, Inc.
Unimin Corp.
Vorti-Siv
Wacker Silicones Corp.
Warren Rupp

Ribelin Sales Inc.
7786 Blankenship
Houston, TX 77055
Toll Free: (800) 688-4883
Phone: (713) 688-7722
Fax: (713) 688-1934

Buster Brown
Representing:

Air Products and Chemicals, Inc.
Brockway Standard, Inc.
C.W. Brabender
Bronco
Cargill, Inc.
CB Mills
Ciba Polymers
Day-Glo Color Corp.
Eckart America
Engelhard Corp.
Fabricated Metals
Fawcett Co.
Great Lakes Chemical Corp.
Grefco
Hüls America Inc.
Huntsman Corp.
ICI Polyurethanes
Ideal Mfg. & Sales Corp.
Kronos, Inc.
Lee Industries
3M/Zeelean
McWhorter Technologies
Midwest Zinc
Neville Chemical Co.
NYCO® Minerals, Inc.
Olin Corp.
Omya Inc.
Plasticolors, Inc.
Rhône-Poulenc, Inc.
Ropak
Schold Machine Co.
Semi-Bulk Systems, Inc.
Solutia Inc.
Southwest Oxide
Süd-Chemie Rheologicals, Inc.
Unimin Corp.
Vorti-Siv
Wacker Silicones Corp.
Warren Rupp

Seegott Inc.

Seegott Inc.
Three Kings Place
800 Rockmead Dr., Ste. 100
Kingwood, TX 77339
Toll Free: (800) 394-4950
Phone: (281) 358-8300
Fax: (281) 358-8399
Lee Bower, Regional V.P.

Representing:

BASF Corp., Colorants
BASF Corp., Dispersions
BASF Corp., Polyurethanes
CFF, Cellulose Filler Factory
DuPont
Goodyear Chemical Co.
Inolex Chemical Co.
The Lubrizol Corp.
Microfine
OxyChem, Durez Div.
Sartomer Co.
Shell Chemical
Thomas & English
UOP
Witco Corp.

SEE OUR AD ON PAGE 181.

Stamat, Inc.
3031 Glenfield Ave.
Dallas, TX 75233
Phone: (214) 333-2181
Fax: (214) 333-2491
Karen W. McDaniel, President; Robert D. Newman, V.P.

Representing:

C.E.D. Process Minerals, Inc.
Continental Dispersions
DeFelsko
Disti-Kleen, Inc.
Equipment Manufacturing Corp.
Halox Pigments
Indco, Inc.
Kady International
Keeva Chemical
Master Chillers
Mobile Rosin Oil Co., Inc.
Modern Printing Colors, Inc.
Netzsch, Inc.
Pico Chemical Corp.
R & A Specialty Chemical Co., Inc.
Shamrock Technologies, Inc.
The Shepherd Chemical Co.
Spectra Colors Corp.
T.O.W. Industries
The Recycling Group
U.S. Aluminum, Inc.
U.S. Bronze Powders, Inc.
U.S. Coatings Technology Corp.

Utah

Walsh & Associates, Inc.
4192 Edgehill Dr.
Ogden, UT 84403-2524
Phone: (801) 621-4002
Fax: (801) 621-4451
Representing:

See Corporate Headquarters in Missouri

Virginia

CSC Scientific Co., Inc.
2810 Old Lee Highway
Fairfax, VA 22031
Toll Free: (800) 458-2558
Phone: (703) 876-4030
Fax: (703) 280-5142
E-Mail: cscsci@dgs.dgsys.com
Barbara Weber, Product Mgr., Moisture;
Barbara Abel, Product Mgr., Surface
Tension
Representing:
Aquadal
Branson
Dan Foss
Denver
Elgan Industries
Endecotts
Glen Mills, Inc.
Setra
Sinar

Washington

Chemical Distributors, Inc.
20 S. Idaho St.
Seattle, WA 98134
Phone: (206) 623-1000
Fax: (203) 343-0963
Representing:
See Corporate Headquarters in Oregon

Hahn Northwest, Inc.
677 Strander Blvd., Ste. E
Seattle, WA 98188
Phone: (206) 575-3161
Fax: (206) 575-4325
E-Mail: sangkiH@aol.com
Bill Hahn, President; Bill Clary, Sales Rep.;
Darin Shields, V.P. Sales; Melany Cooley,
Cust. Service Mgr.

Representing:

Air Products & Chemicals, Inc.
CR Minerals Corp.
Consolidated Color
Disti-Kleen, Inc.
E.P.S., Inc.
Harwick Chemical Corp.
Holland Colors Americas, Inc.
Kalama Chemical, Inc.
Kolon Chemical
Naya-Epoxy Resins
Penn Color, Inc.
Premier Mills Corp.
Rhône-Poulenc, Inc.
Sino-American Pigment Systems Inc.
Southcorp Packaging
The Tryline Co., Inc.
U.S. Borax, Inc.
U.S. Silica
R.T. Vanderbilt Co., Inc.
Wayne Pigment Corp.
Whittaker, Clark & Daniels, Inc.
Zemex Industrial Minerals

Hahn Northwest, Inc.
804 N. Main
P.O. Box 56
Ridgefield, WA 98642
Phone: (360) 887-1015
Fax: (360) 887-1015
E-Mail: darinrl@aol.com
Representing:
See Corporate Headquarters in Washington

J.F. Shelton Co., Inc.
1110 Andover Park W.
Tukwila, WA 98188
Phone: (206) 575-9377
Fax: (206) 575-1826
Brad Campbell, V.P.; Dan Kiefel, President;
Dick Strellman, G.M.

Representing:
Akzo Nobel
Brockway Standard, Inc.
Cabot Corp.
Color Corp. of America
General Electric Co.
Hampshire Chemical Corp.
J.M. Huber Corp.
Kerr-McGee Chemical Corp.
Laporte Pigments
Letica
McWhorter Technologies
Myers Container Corp.
Penn Color
Rheox Inc.
Russell Stanley
Sartomer Co.
Shell Resins
Sonoco
Troy Chemical Corp.
U.S. Bronze Inc.
U.S. Silica Inc.
Zeneca Resins

Synergistic Performance Corp.
5950 6th Ave., S., Ste. 109
Seattle, WA 98108
Phone: (206) 762-4118
Fax: (206) 762-3853
Representing:
See Corporate Headquarters in California



Van Waters & Rogers Inc.

A ROYAL PAKHOED COMPANY

Van Waters & Rogers Inc.
6100 Carillon Point
Kirkland, WA 98033-7357
Phone: (206) 889-3400
Fax: (206) 889-4100
Jack Clennon, Industry Mgr.
Representing:

Albermarle Corp.
ARCO Chemical Co.
BASF Corp.
Celanese Chemicals Div.
Citgo Petroleum Corp.
Cytec Industries Inc.
Dow Chemical Co.
DuPont
Eastman Chemical Co.
Exxon Chemical Co.
ICI Acrylics, Inc.
ICI Surfactants
Lucas Meyer
Newton Pigments
Rohm and Haas Co.
Stepan Co.
Union Carbide Corp.
Velsicol Chemical
Witco/OSI Specialties

SEE OUR AD ON PAGE 184.

Wisconsin

Intercorp., Inc.
3628 W. Pierce St.
Milwaukee, WI 53215

Toll Free: (800) 532-6303
Fax: (414) 383-2021
Peter Trettin, Sales Mgr.; David Wareham,
Sales Rep.

Representing:
Arimetco Industrial Minerals
Diasource Inc.
Mica Manufacturing
PI Industries
Wolkem India Ltd.

Canada

British Columbia

Cascade Marketing
#210-3540 W. 41st Ave.
Vancouver, BC V6N 3E6
Canada
Phone: (604) 263-1681
Fax: (604) 263-8914
E.E. Jefferys, President; David Jefferys,
Sales

Representing:
CB Mills
Color Corp. of America
Corob
Crowley Tar
Daniel Products Co.
General Electric Canada
Guertin Bros. Polymers
Halox Pigments
Henry Co.
Ideal Mfg. & Sales Corp.
J.B. Atlas
Paul N. Gardner Co.
Microcolor Dispersions
Neville Chemical Co.
Troy Chemical Canada
U.S. Can Co.
U.S. Silica Co.
R.T. Vanderbilt Co.
Western Equipment Co.

Chemroy Canada Inc.
#108, 250 Schoolhouse St.
Coquitlam, BC V3K 6V7
Canada
Phone: (604) 540-7424
Fax: (604) 540-7425
Representing:
See Corporate Headquarters in Ontario

Horizon Chemicals Ltd.
12290-56th Ave.
Surrey, BC V3X 3H8
Canada
Phone: (604) 590-5275
Fax: (604) 590-1475
O. Schmidt, President
Representing:
B My Supply Ltd.
BYK-Chemie USA
BYK-Gardner USA
Columbia River Carbonates
Dura Chemicals
Epworth Morehouse-COWLES
H.D. Fowlers Ltd.
H & R Industries
ICI Polyurethanes
Knapp Manufacturing
Morton U.C.D.
National Chemicals
Savolite Chemicals
Tenco Westech.
Zeneca Resins

P.T. Hutchins Co. Ltd.
12247 103rd A Ave.
Surrey, BC V3V 3G7
Canada
Phone: (604) 689-3312
Fax: (604) 588-8004
Representing:
See Corporate Headquarters in California

Points West Dist., Ltd.
871A Belgrave Way
Delta, BC V3M 5R8
Canada
Phone: (604) 526-4121
Fax: (604) 526-4541
Bob Pinfield; Barbara Fairbrother
Representing:
Asheville Mica Co.
CR Minerals Corp.
Dock Resins Corp.
ECC International, Inc.
Hi-Mar Specialties Inc.
MiniFIBERS Inc.
OMG Americas
K.J. Quinn & Co., Inc.
Ragogna Custom Machinery
Scott Bader Inc.
Specialty Minerals Inc.
Unimin Specialty Minerals Inc.
Western Equipment Co.

J.F. Shelton Co., Inc.
3034 Edgemont Blvd.
N. Vancouver, BC V7R 4XL
Canada
Phone: (604) 983-2061
Fax: (604) 983-2071
Representing:
See Corporate Headquarters in Washington

Ontario

Chemroy Canada Inc.
2201 Drew Rd.
Mississauga, Ont. L5S 1E5
Canada
Phone: (905) 677-0701
Fax: (905) 677-8411
J.A. Bernard, President; J. Graham, V.P.,
Sales
Representing:
BASF Canada Inc.
Toyol America Inc.
Cardolite Corp.
CVC Specialty Chemicals
Dow Chemical Canada Inc.
EMS-American Grilon, Inc.
Georgia Marble Co.
Goodyear Tire & Rubber Co.
Henkel Canada Ltd.
U.S. Silica Co.
Heucotech Ltd.
Hoover Color Corp.
Huntsman Corp. Canada Inc.
Lonza Inc.
MD Both
Occidental Chemical Co.
PPG Industries, Inc.
Q-Panel Lab Products
Rhône-Poulence Canada Inc.
UOP

Firing Industries Ltd.
509 Glendale Ave., E.
Niagara on the Lake, Ont. L0S LJ0
Canada
Phone: (905) 688-0962
Fax: (905) 688-6643
E-Mail: firing@firing.com
Daniel J. Feasby, President

Distributors

Representing:

Arde Barinco, Inc.
Fluid Energy Aljet
Kemutec Inc.
Matcon USA Inc.
Union Process Inc.

Henley Chemicals (Canada) Ltd.

199 Courtland Ave.
Concord, Ont. L4K 4T2
Canada

Phone: (416) 661-1500
Fax: (416) 661-1333

John Roeleveld, Sales Mgr.; Don Maetyn,
Marketing Mgr.

Representing:

Akros Chemicals America
Boehringer Ingelheim KG
Canada Square Resins
Crystal Inc.
Dexter Chemical Corp.
International Fragrances Inc.
Mayco Oil & Chemical Co.
Süd-Chemie Rheologicals, Inc.
Tayca Corp.
Toyal America
U.S. Can Co.
Velsicol Chemical Corp.
Vinnolit Kunststoff GmbH
Wacker-Chemie GmbH
Wacker Silicones Corp.
Witco Corp.
Zemex Industrial Minerals

Horizon Chemicals Ltd.
5370 B Munro Ct.
Burlington, Ont. L7L 5N8
Canada

Phone: (905) 632-5544
Fax: (905) 632-5739

Representing:

See Corporate Headquarters in British
Columbia

Micco Distributors, Inc.
6291 Dorman Rd. Unit #17
Mississauga, Ont. L4V 1H2
Canada

Phone: (905) 673-1288
Fax: (905) 673-1134

Jim Gosse; Edward Levy

Representing:

CB Mills
DeVree
Mid Atlantic Chemical Inc.
Myers Engineering
Premier Mill Corp.

Whittaker, Clark & Daniels, Inc.

135 Bethridge Rd.
Rexdale, Ont. M9W 1N4
Canada

Phone: (416) 744-6580
Fax: (416) 744-6582

Representing:

See Corporate Headquarters in New Jersey

Quebec

Chemroy Canada Inc.
4025 Blvd. Industriel, Ste. 201
Laval, Que. H7L 4S3
Canada

Phone: (514) 625-0505
Fax: (514) 625-1734

Representing:

See Corporate Headquarters in Ontario

Henley Chemicals (Canada) Ltd.
670 Victor Hugo St.
Brossard, Que. J4W 1V1
Canada

Phone: (514) 465-0671
Fax: (514) 465-0536

Representing:

See Corporate Headquarters in Ontario

Horizon Chemicals Ltd.
835 Bancroft Ave.
Pointe Claire, Que. H9R 4L6
Canada

Phone: (514) 694-4040
Fax: (514) 630-1959

Representing:

See Corporate Headquarters in British
Columbia

GIVE THE GIFT OF LIFE

Suggest that memorial
contributions be made to the
Muscular Dystrophy
Association and honor a loved
one by helping a million
Americans with neuromuscular
diseases.



MDA[®]

Muscular Dystrophy Association

(800) 572-1717

Regulatory Update November 1997

This digest of current regulatory activity pertinent to the coatings industry is published to inform readers of actions which could affect them and their firms, and is designed to provide sufficient data to enable those interested to seek additional information. Material is supplied by National Paint and Coatings Association, Washington, D.C. The Regulatory Update is made available as a service to FSCT members, to assist them in making independent inquiries about matters of particular interest to them. Although all reasonable steps have been taken to ensure the reliability of the Regulatory Update, the FSCT cannot guarantee its completeness or accuracy.

Department of Transportation Research and Special Programs Administration, (RSPA)

**September 22, 1997 - 62 FR 49560
Action: Final Rule (Amendment)**

On Jan. 8, 1997, Research and Special Programs Administration (RSPA) published a final rule which amended the Hazardous Materials Regulations (HMR) to expand the scope of the regulations to intrastate transportation of hazardous materials. The intended effect of the January 8, 1997 rule is to raise the level of safety in the transportation of hazardous materials by applying a uniform system of safety regulations to all hazardous materials transported in commerce throughout the United States. In this amendment to the final rule, RSPA is providing one additional year, until Oct. 1, 1998, for compliance, responding to petitions for reconsideration and correcting errors in the Jan. 8, 1997, final rule. The minor editorial changes made by this final rule will not impose any new requirement on persons subject to the HMR.

The rule, was effective Oct. 1, 1997.

For additional information, contact Diane LaValle or Deborah Boothe, Office of Hazardous Materials Standards, RSPA, 400 Seventh Street, S.W., Washington, D.C. 20590-0001, (202) 366-8553.

Department of Transportation Research and Special Programs Administration (RSPA)

**September 22, 1997 - 62 FR 50222
Action: Notice of Proposed Rule-making**

RSPA proposes to make miscellaneous amendment to the Hazardous Materials Regulations based on petitions for rulemaking and RSPA initiative. These

proposed amendments are intended to update, clarify or provide relief from certain regulatory requirements. Comments must be received by Nov. 24, 1997.

For additional information, contact: Joan McIntyre, Office of Hazardous Materials Standards, RSPA, U.S. Department of Transportation, 400 Seventh Street, S.W., Washington, D.C. 20590-0001, (202) 366-8553.

Environmental Protection Agency September 9, 1997 - FR 62 47495 Notice of Availability of Final Draft Guidance for Developing Superfund Memoranda of Agreement (MOA) Language Concerning State Voluntary Cleanup Programs Action: Notice Of Availability and Request for Comments.

This notice announces the availability of the document "Final Draft Guidance for Developing Superfund Memoranda of Agreement (MOA) Language Concerning State Voluntary Cleanup Programs," and the U.S. EPA request for stakeholder comment on both aspects of the document, i.e., the final draft guidance and the site screening or designation process. In this document, the Agency is encouraging its regions to develop partnerships with states by negotiating MOAs that delineate roles and responsibilities for the cleanup of hazardous substance sites, such as Brownfields, that do not pose the type of risk usually addressed by Federal Superfund National Priorities List cleanups. These MOAs are designed to facilitate the expeditious cleanup of these lower risk sites under state voluntary cleanup programs. This document sets baseline criteria

that EPA will use to evaluate state voluntary cleanup programs. This evaluation will be part of the negotiation of an MOA, or work planning document. As explained more fully in the draft guidance, for those sites included within the scope of the MOA, EPA will not exercise cost recovery authority and does not generally anticipate taking removal or remedial actions under the Comprehensive Environmental Response, Compensation and Liability Act of 1980 at these sites except under the limited circumstances detailed in the draft guidance.

For additional information, contact Linda Garczynski, Director, Outreach and Special Projects Staff, Office of Solid Waste and Emergency Response, U.S. EPA, Mail Stop 5101, 401 M Street, N.W., Washington, D.C. 20460, (202) 260-4039, or Linda Boornazian, Policy and Program Evaluation Division, Office of Enforcement and Compliance Assurance, U.S. EPA, Mail Stop 2273A, 401 M Street, N.W., Washington, D.C. 20460, (202) 564-5144.

Environmental Protection Agency September 26, 1997 - 62 FR 50546 Action: Proposed rule; extension of comment period.

The U.S. EPA is extending the public comment period from Sept. 30, 1997 to Dec. 1, 1997, on the proposed rule published in the *Federal Register* of June 26, 1996 (61 FR 33178)(FRL-4869-1) requiring the testing of 21 hazardous air pollutants (HAPs) for certain health effects. This extension is needed to allow the agency more time to amend the HAPs test rule proposal to reference 11 new Toxic Substances Control Act (TSCA)

test guidelines and make other changes and clarifications to the proposed rule.

For additional information contact: Susan B. Hazen, Director, Environmental Assistance Division (7408), Rm. ET-543B, Office of Pollution Prevention and Toxics, EPA, 401 M St., S.W., Washington, D.C. 20460; (202) 554-1404; e-mail: TSCA-Hotline@epamail.epa.gov.

**Environmental Protection Agency
September 25, 1997 - FR 62-50335
Action: Notice of Public Meeting on
Establishing a Program for Lead-
Based Paint Hazard Evaluation
and Reduction Products.**

The U.S. EPA announced a public meeting on Sept. 29, 1997, in Arlington, VA, to take suggestions from a cross-section of stakeholders on the development of a program to carry out the testing and registration of lead-based paint hazard evaluation and reduction products as required under Section 405(f) of the Toxic Substances Control Act (TSCA, 15 U.S.C. Section 2685(f)).

For additional information, contact Darlene Watford, National Program Chemicals Division, (7404), Office of Pollution Prevention and Toxics, Environmental Protection Agency, 401 M St., SW., Washington, D.C. 20460, (202) 260-3989, fax: (202) 260-0001, e-mail: watford.darlene@epamail.epa.gov.

Superfund—The U.S. EPA is proposing to support provisions allowing the agency to form "Superfund Partnership Agreements" with states to enforce a

new Superfund law. The agency will oppose Republican Superfund reform proposals which include delegation of authority for Superfund enforcement to states, including enforcement authority over federal facilities.

H.R. 2485, introduced by Congressman Stupak (D-MI), on Sept. 16, 1997, would amend the Comprehensive Environmental Response, Compensation, and Liability Act of 1980 to provide liability relief for small parties, innocent landowners, and prospective purchasers. The bill is currently in the House Transportation and Infrastructure Committee.

Air Quality—On July 29, 1997, legislation was introduced in the Senate, S. 1084 (Inhofe, R-OK), to establish a research and monitoring program for the National Ambient Air Quality Standards for ozone and particulate matter and to reinstate the original standards under the Clean Air Act. The bill is currently in Senate Environment and Public Works Committee.

Hazardous Materials Transportation—Congressman Oberstar, (D-MN) introduced H.R. 2455, "to reform the safety practices of the railroad industry, to prevent railroad fatalities, injuries, and hazardous materials releases, and for other purposes." The bill is currently in House Transportation and Infrastructure Committee.

Lead—The Lead Exposure Associated with Renovation and

Remodeling Activities study was conducted from 1993 to 1995. Its major goal was to gather information to help determine which groups involved in renovation and remodeling require training and certification to help reduce the lead-based paint hazard to themselves and building occupants. For additional information, contact Renee Edwards, Public Affairs Director of the National Technical Information Service, (703) 487-4778.

Notice of Meeting—The U.S. EPA, Office of Pollution Prevention and Toxics has scheduled a series of two-day training courses to help industries subject to the reporting requirement of the Toxic Release Inventory for the first time, starting in January 1998. The training courses are free. For additional information, contact Michael Hart, EPA, (202) 260-1576.

How to obtain documents—**Senate** and **House** bills, reports, public laws, and conference reports are available to the public at no charge. The public may obtain as many as six different items per request, either in person or by mail. Multiple copies of one item are not available, and only one request per day will be filled. Send requests for **Senate** information to: Senate Document Room, B-04 Hart Building, Washington, D.C. 20510, (202) 224-7701. **House** requests should be sent to: House Document Room, B-18 House Annex No. 2, Washington, D.C. 20515, (202) 226-5200.

States Proposed Legislation and Regulations

ALABAMA

Storm Water—AL H.J.R. 144 (Knight, A.) encourages efficient water and storm management and local management programs. The bill was signed by the governor on Sept. 23.

ALASKA

Hazardous Waste—AK S. 39 (Leman) relates to hazardous chemicals, materials, and hazardous waste; establishes state liability for areas of release of hazardous substances; authorizes the Alaska Department of Safety to enforce all ordinances within those areas of release; facilitates the

preparation and implementation of all emergency plans. The bill was signed by the governor on June 11.

ARIZONA

Air Quality (Proposed Rule)—Maricopa County Environmental Services Department (ESD), is proposing to amend regulations under Rules 310, 315, and 316 regarding open fugitive dust, spray coating operations, and non-metallic mineral mining and processing. Additional amendments are being proposed as well for Rules 331 and 336 regarding solvent cleaning and surface coating operations. A workshop was

scheduled for Oct. 9, 1997, in Phoenix. For more information contact Jo Crumbaker, ESD, (602) 506-6705.

Air Quality (Final Rule)—The Arizona Occupational Safety and Health Standards Board (OSHSB) has amended general industry safety orders by incorporating federal standards and adopts regulations governing methylene chloride. The new rule becomes effective Nov. 2, 1997. For further information contact Christine Demes, OSHSB, (916) 322-3640.

CALIFORNIA

Air Quality—CA S. 987 (Sher)

relates to regulations requiring the maximum feasible reduction in volatile organic compounds emitted from the use of aerosol paints. Deletes an exception for aerosol paints from provisions prohibiting the adoption of a regulation that requires the elimination of a product form. The bill was signed by the governor on Sept. 28.

Hazardous Materials—CA S. 660 (Sher) enacts the Environmental Cleanup and Fee Reform Act of 1997. Creates the Toxic Substances Control Account in the General Fund and requires that specified funds be deposited in that account, including charges imposed on corporations handling hazardous materials, which would be administered by the director of Toxic Substances Control. Authorizes the funds deposited in the account to be appropriated to the Department of Toxic Substances Control for specified purposes. The bill is awaiting the governor's signature.

Hazardous Waste—CA S. 1081 (Calderon) establishes the Environmental Responsibility Acceptance Act. Requires the owner of a defined site who has actual awareness of a release of a hazardous material or hazardous materials that exceeds a notification threshold to take all reasonable steps to expeditiously identify the potentially responsible parties and, after obtaining actual awareness of the potentially responsible parties, send a notice of potential liability to the parties. The bill was signed by the governor on Oct. 11.

CA A. 1357 (Baldwin) makes various changes concerning the authority of certified unified program agencies (CUPAs) with regard to the hazardous waste element of the unified hazardous waste and hazardous materials management regulatory program. Specifies that persons subject to certain notification requirements are required to submit a notice to the CUPA or to the authorized officer or agency and also to the Department of Toxic Substance Control, until specified regulations are adopted. The bill was signed by the governor on Oct. 7.

CA A. 882 (Wayne) relates to existing law which defines the term "waste" for purposes of the hazardous waste control laws and excludes from the definition a

discarded material that is an intermediate manufacturing process stream. Makes clarifying changes in that definition of waste and additionally excludes from the definition a coolant, lubricant, or cutting fluid necessary to the operation of manufacturing equipment or connected equipment, as specified. The bill was signed by the governor on Sept. 24.

CA A. 1157 (Wayne) requires the California Department of Toxic Substances Control to issue a public notice in the *California Regulations Notice Register* not less than 30 days immediately preceding the date of the proposed granting of the variance from the requirements regulating the management of hazardous waste except in the case of described variances. This bill was vetoed by the governor on Sept. 21.

Recycling—CA A. 705 (Strom-Martin) reenacts, until Jan. 1, 2001, provisions of existing law requiring all state agencies to purchase rerefinned automotive lubricants, recycled antifreeze, recycled solvents, and recycled paints, except that the bill would require the purchase of the listed materials only when recycled products are available and not more costly than the lowest price quoted by suppliers. The bill was vetoed by the governor on Oct. 4.

Storm Water—CA A. 1186 (Knox) requires the fees collected from the storm water discharge facilities that are subject to a general industrial or construction storm water permit under the National Pollutant Discharge Elimination System to be accounted for separately in the Waste Discharge Permit Fund. Authorizes not less than 50% of that money in the account to be used by the California Regional Water Quality Control Board with jurisdiction over the permitted industry or construction site. The bill was signed by the governor on Oct. 7.

Water Quality—CA A. 11 (Poochigian) relates to existing law concerning discharging specified substances into the waters of the state; the bill creates an exception to the prohibition, thereby allowing certain discharges that have express authorization and are in with compliance a waste discharge requirement or waiver and/or federal permit. The bill was signed by the governor on Oct. 7.

Air Quality (Final Rule)—California Occupational Safety and Health Standards Board (OSHSB) has amended general industry safety orders governing methylene chloride. For further information, contact Christine Demes, OSHSB, (916) 322-3640.

Hazardous Materials Transportation (Final Rule)—Effective Sept. 19, 1997, the California Highway Patrol (CHP) amended and repealed regulations making hazardous materials provisions consistent with federal standards. For further information, contact Steve Brown, CHP, (916) 327-3310.

Proposition 65 (Availability of Notice and List)—California Environmental Protection Agency (EPA), Office of Environmental Health Hazard Assessment announced the availability of a revised list of chemicals that cause cancer as well as the amendments adding the 18 chemicals. In addition, a draft hazard identification document for benzene is also available. For further information, contact Cynthia Oshita, California EPA, (916) 445-6900.

DELAWARE

Hazardous Materials Transportation—DE H. 268 (Boulder, et al.) amends Title 16 of the Delaware Code relating to notification given at certain railway yards concerning the transportation of hazardous substances. Requires shippers to provide warning devices. The bill is in the House Environmental Management Committee.

GEORGIA

Superfund—GA H. 470 (Dobbs and Porter) relates to "Georgia Hazardous Site Response Act"; relates to oil or hazardous material spills or releases; provides for a lien on real property on which the Georgia Environmental Protection Division of the Department of Natural Resources has performed remedial action. The bill was signed by the governor on Apr. 22.

Lead—GA H. 580 (Thomas and Pelote et al) relates to buildings generally; makes it unlawful to rent, let, or lease any building or dwelling if any portion is painted with lead-based paint or poses any other lead hazard. (Carried over to 1998 regular session.)

Underground Storage Tanks—GA H. 647 (Dobbs and Lane) relates to

notification of certain information by owners of underground storage tanks; prohibits the placing of certain substances in certain underground storage tanks. (Carried over to 1998 regular session.)

LOUISIANA

Lead (Proposed Rule)—Amendments to regulations under 33 LAC III.223 and Chapter 28 establishing requirements for the certification and training of individuals who conduct lead-based paint activities are being proposed by the Louisiana Department of Environmental Quality (DEQ). For further information, contact Patsy Deaville, DEQ, (504) 925-4895.

MAINE

Hazardous Materials Transportation—ME H. 465 (Campbell) (LD 636) waives the fees for the removal and transportation of certain hazardous waste. The bill was signed by the governor on May 22.

Solvent Abuse—ME H. 241 (Marvin) (LD 305) relates to an act to prohibit the inhaling of toxic vapors for effect. The bill was signed by the governor.

MARYLAND

Air Quality (Final Rule)—Effective Sept. 8, 1997, the Department of the Environment (DOE) amended regulations establishing Reasonably Available Control Technology standards for sources that use flexographic printing presses to print on plastic (non-vinyl) substrates such as polyethylene. For further information, contact Deborah Rabin, DOE, (410) 631-3240.

MICHIGAN

Hazardous Materials Transportation—MI S. 554 (Bennett) regulates the transportation of hazardous waste. The bill is in the Senate on the second reading.

Underground Storage—MI S. 167 (McManus) provides appropriation for the Michigan Department

of Environmental Quality for fiscal year 1997-1998; appropriates money for various groundwater remediation programs and leaking underground storage tank cleanups around the state. The bill is in the Senate Committee on Appropriations.

NORTH CAROLINA

Lead—NC S. 516 (Balance) establishes a Lead-Based Paint Hazard Management Program in lieu of a federally managed program; concerns abatement, inspection and risk-assessment of a child-occupied facility, or target housing; requires certain certification and permits; provides for fees; makes exception for owner-occupied residential housing; clarifies certification inclusions. The bill was signed by the governor on Sept. 9.

Underground Storage Tanks—NC H. 227 (Hackney) provides that recordation of an inactive hazardous substance or waste disposal site is not required in certain cases; expedites permanent closure of low-risk sites under the Leaking Petroleum Underground Storage Tank Act. The bill was signed by the governor on Sept. 17.

NEW JERSEY

Air Quality (Proposed Rule)—The New Jersey Department of Environmental Protection (DEP), Air Quality Regulation Program, would like to amend regulations governing permits and certificates for minor/major facilities without an operating permit. For further information, contact Ann Zeloof, DEP, (609) 292-0716.

NEW YORK

Environmental Hazards (Lead)—NY A. 8612 (Committee on Rules) enacts the Children's Environmental Health and Safety Bill of Rights Act, directing the commissioner of education, environmental conservation, and health to develop programs and regulations to promote the protection of children from environmental hazards; makes such protection one of the

highest priorities of the state. The bill is in the Assembly Committee on Education.

PENNSYLVANIA

Hazardous Waste—PA H. 1767 (Veon) amends the Hazardous Sites Cleanup Act. Further provides for financial assistance. The bill is in the House Committee on Environmental Resources and Energy.

Solvent Abuse—PA H. 1752 (DiGiolamo, et al) amends the Crimes and Offenses Code. Further provides for sale and illegal use of certain solvents. The bill has been tabled by the House.

PA H. 1789 (Belfanti, et al) amends the Crimes and Offenses Code. Provides for sale or illegal use of certain solvents. The bill is in the House Committee on Judiciary.

PA H.B. 1790 (Staback) amends the Crimes and Offenses Code. Regulates paint projectiles. The bill is in the House Committee on Judiciary.

RHODE ISLAND

Automotive Paint—RI H. 5107 (Faria and Farrell) relates to automobile body repair shops; limits the sale of motor vehicle paints to persons who are licensed to operate or conduct an auto body shop, or dealers who operate licensed auto body shops; allows commercial paint sellers to obtain paint for resale to licensed persons; provides a \$500 penalty for violations. This bill has been referred to the House Committee on Corporations.

Hazardous Waste—RI H. 6119 (Palumbo) relates to hazardous waste management. The bill is in the Joint Committee on Environment and Energy.

WISCONSIN

Storm Water—WI A. 187 (Staskunas, et al) relates to the imposition of service charges for a storm water and surface water sewerage system. Assembly concurred with Senate amendments Sept. 17.

KANSAS CITY—MAY

Nomination of Officers

The officers nominated and approved for 1997-98 include the following: President—Curry Sanders, of Tnemec Co., Inc.; Vice President—Debbie Koss, of Davis Paint Co.; Secretary—Tom Hilton, of Weskem-Hall, Inc.; Treasurer—Ted Golden, of Hillyard Industries, Inc.; Past-President—Randall Ehmer, of Walsh & Associates, Inc.; and Society Representative—Lawrence Murphy, of Tnemec Co., Inc.

Educational Committee Chair, Kim Nee, of Mozel, Inc., introduced the winners of the Science Pioneer Judging. Greg Brazeal, of Blue Valley High School won first place for his project "Artist Pigments for the Next Millennium." Evan Boxberger, of Scarborough School received second place for "Water You Trying to Proof."

The evening's technical program "WHAT IS PAINT?" was delivered by Robert Risner, of Weskem-Hall, Inc. and Perry Kilpatrick, of Tnemec Co., Inc.

The speakers discussed the different functions of paint, including decorative and protective. In addition, the speakers covered the different ingredients needed to make paint, i.e., colorants, resins, solvents, and additives. The program concluded with an explanation of different applications: spray, roller, etc.

DEBBIE KOSS, *Secretary*

LOS ANGELES—SEPTEMBER

"Water-Based Acrylic Emulsions"

V.C. "Bud" Jenkins performed the swearing in of the 1997-98 officers. This year's officers include the following: President—Sandra Dickinson, of Tri-iso Inc.; Vice President—Art Lorenz, of Akzo Nobel; Treasurer—Joe Reilly, of JCR Enterprise; and Secretary—Darin Everhart, of Behr Process Corp.

Bob Backlin, of Hüls America Inc. presented Sandra Dickinson with the Hüls gavel. Ms. Dickinson then presented Mr. Jenkins with a Past-President's plaque.

President Dickinson presented the following committee chairs for 1997-98: Computer—Don Jordan; Education—V.C. "Bud" Jenkins; Environment—Dave Muggee, of E.T. Horn Co.; Health and

Safety Regulations—Denese Crick, of Ameron International; Entertainment—Denese Crick; Library—Carl Thompson, of Stabond Corp.; Membership—Joe Reilly; Nominating—V.C. "Bud" Jenkins; Photography—Margarita Gomez Ortega, P.T. Hutchins, Co., Inc.; Program—Art Lorenz; Publicity—Margarita Gomez Ortega; and Scholarship—James Hall, of ICI Paints.

Scholarship Committee Chair, James Hall, presented scholarships to Sarah Burl and Josh Garretson.

Frank Peters, of Dunn Edwards Corp., presented diplomas to the LASCT Coatings Course graduates. Eighteen students completed the three-semester course. Melody Chang, of Courtauld's Aerospace, received the Outstanding Student Award.

Aurelia Sheppard, of Rohm and Haas, discussed "CORROSION PROTECTION USING WATER-BASED ACRYLIC EMULSIONS."

According to Ms. Sheppard, changes due to environmental standards, as well as increased performance characteristics, are causing a shift to acrylic waterborne maintenance coatings. As the data from real world testing continues to accumulate, the benefits of these systems are being seen. The speaker stated that the acrylic systems are more flexible and do not continue to crosslink and fail as do their solvent-borne counterparts. Other benefits include, but are not limited to: resistance to chalking, fading and dirt pick-up, better color retention, virtual freedom of potentially toxic vapors, ease of applications, quick dry time, and easy water clean up.

Ms. Sheppard reported that much work has been done with a variety of resins as well as accompanying dispersants, surfactants, pigments, and rheology packages.

Q. Are we able to formulate waterborne acrylics at acid side pH to get better adhesion to metal and get better corrosion prevention?

A. Formulating low pH is very problematic due to stability problems.

DARIN EVERHART, *Secretary*

LOUISVILLE—SEPTEMBER

"Coatings Rheology"

Incoming President Dan Fortney, of American Dispersions, Inc., received the Louisville gavel from Past-President

Andy Traister, Courtaulds Coatings Inc.

David Beasley, of Hüls America Inc., presented President Dan Fortney with the Hüls/Nuodex Gavel.

Richard Fortener and Ed Richter were presented with 50-Year Membership Pins. In addition, 25-Year Membership Pins were presented to Robert Andrews, of Rohm and Haas Co.; John Ballard, of Burgess Pigment Co.; Neil Benner, of H.H. Benner Co., Inc.; Darryl Harvey, of Engelhard Corp.; John Lanning, of Courtaulds Coatings Inc.; Nick Lanning, Lanning Chemical Co.; Kirk Menefee, of Hy-Klas Paint Co.; Paul Nilles, of Hy-Klas Paint Co.; Larry Pitchford, of Reynolds Metals Co.; Richard Powell, of Reynolds Metals Co.; and Stan Kimmel, of Progress Paint Mfg.

Society Representative Larry Pitchford discussed the FSCT Strategic Plan. He urged members to review the Plan and respond back to him prior to the FSCT Annual Meeting.

In another matter, Mr. Pitchford notified the Society that he will not seek reelection. The Executive Committee nominated Andy Traister. The general membership elected Mr. Traister.

Cleveland Society member, Richard Eley, of The Glidden Co., presented "CHARACTERIZATION AND ANALYSIS OF COATINGS RHEOLOGY AND COATINGS FLOWS."

Dr. Eley defined flow as permanent deformation. He then defined rheology as the science of deformation and flow of matter. The flow behavior is a critical process and plays a key role in a coating's success. According to the speaker, approximately half of product development cost is rheology related. Relatively minor changes in a formulation can cause rheology problems.

Shear rates change for coatings' processes such as airless spray, coil coatings, brush, dip coating, sag, leveling, and pigment settling. Dr. Eley stated that the formulator must build the product so that the value is different for all these processes.

A viscosity shear rate curve was shown for simple flow models and Dr. Eley explained that this is a very small part of the rheological description. One can fit mathematical models to the curves for flow behavior. Also, the speaker demonstrated a generalized flow curve, which is true for every non-Newtonian fluid. The flow curve needs to be measured over three or four regions because coatings' processes occur over nine or 10 magnitudes of shear rates.

Constituent Society Meetings and Secretaries

BALTIMORE (Third Thursday—Martin's West, Baltimore, MD). STEPHANIE ROTHENBERG, Thomley Co., 1500 E. Newport Pike, Ste. 204, Wilmington, DE 19804.

BIRMINGHAM (First Thursday—Strathallan Hotel, Birmingham, England). GRAHAME W. FOWKES, Technivelopments Co., 14 Wells Close, Chippenham, Wilts. SN14 0GD, England.

CDIC (Second Monday—Location alternates between Cincinnati, Columbus, Dayton, and Indianapolis). BRIAN P. MARZANO, Sun Chemical Corp., 5020 Spring Grove Ave., Cincinnati, OH 45232.

CHICAGO (First Monday—Sharko's Restaurant, Villa Park, IL). SUSAN A. SIMPSON, Chemcept Services, 2 South 902 Heritage Glen Ct., Batavia, IL 60510-5100.

CLEVELAND (Third Tuesday—Monthly meeting site to TBA). PATRICIA WAGLE, The Flood Co., 1212 Barlow Rd., Hudson, OH 44236.

DALLAS (Second Thursday following first Wednesday—Dallas Medallion Hotel, Dallas, TX). JOSEPH HILBUN, The Sherwin-Williams Co., 2802 W. Miller Rd., Garland, TX 75041.

DETROIT (Second Tuesday—meeting sites vary). NAOMI SUSS, PPG Industries, Inc., 5875 New King Ct., P.O. Box 3510, Troy, MI 48007.

GOLDEN GATE (Monday before third Wednesday—alternates between Francesco's in Oakland, CA, and Bertolucci's in S. San Francisco, CA). TIMOTHY G. SPECHT, Flecto Co., 1000 45th St., Oakland, CA 94608.

HOUSTON (Second Wednesday—Medallion Hotel, Houston, TX). STEVEN RAGSDALE, Intercoastal Paint, P.O. Box 38114-433, Houston, TX 77238.

KANSAS CITY (Second Thursday—Cosccone's Restaurant, Kansas City, MO). THOMAS HILTON, Weskem-Hall, Inc. 1424 Atlantic Ave., N. Kansas City, MO 64116.

LOS ANGELES (Second Wednesday—Maggie's Pug, Santa Fe Springs, CA). DARIN EVERHART, Behr Process Corp., 3400 W. Barry St., Santa Ana, CA 92704.

LOUISVILLE (Third Wednesday—Executive West Motor Hotel, Louisville, KY). CAROL WINSLOW RAPP, Dar-Tech, Inc., 101 Glenmill Rd., New Albany, IN 47150.

MEXICO (Every fifteen days—Gabriel Mancera, Mexico City, Mexico). MANUEL MAESTRO NAVARRO, DuPont, S.A. de C.V., Km. 9.5 Via Dr. Gustavo Baz, Col. Barrientos, 54110 Tlalhepanla, Edo de Mexico, Mexico.

MONTREAL (First Wednesday—Restaurant Le Bifhèque, St. Laurent, Quebec). ROBERT BENOIT, Kronos Canada Inc., 3390 Marie Victorin, Varennes, Que., J3X 1T4 Canada.

NEW ENGLAND (Third Thursday—Best Western TLC, Waltham, MA). GARY SMALL, Zeneca Resins, 730 Main St., Wilmington, MA 01887-3366.

NEW YORK (Second Tuesday—Landmark II, East Rutherford, NJ). E. ROBERT CARDIN, Rohm and Haas Co., 16 Meadowview Dr., Colts Neck, NJ 07722.

NORTHWESTERN (Second Tuesday—Jax Cafe, Minneapolis, MN). ROBIN L. NORCUTT, George C. Brandt, Inc., 2975 Long Lake Rd., St. Paul, MN 55113.

PACIFIC NORTHWEST (PORTLAND SECTION—Tuesday before third Wednesday—Saylors Old Country Kitchen; SEATTLE SECTION—Third Wednesday—All City Diner; VANCOUVER SECTION—Thursday after third Wednesday—Abercorn Inn, Richmond, B.C.). KELVIN HUGET, Imasco Minerals, Inc., 19287 98A Ave., Surrey, B.C. V4N 4C8, Canada.

PHILADELPHIA (Second Thursday—Doubletree Guest Suites, Plymouth Meeting, PA). NEIL R. SHEARER, Andek Corp., P.O. Box 392, Moorestown, NJ 08057.

PIEDMONT (Third Wednesday—Ramada Inn Airport, Greensboro, NC). RANDOLPH G. COX, Akzo Nobel Coatings Inc., 1431 Progress St., P.O. Box 2124, High Point, NC 27261.

PITTSBURGH (Second Monday—Montemurro's Restaurant, Sharpsburg, PA). JOHN GILLEN, J.M. Gillen Co./Van Horn, Metz & Co., 681 Millers Run Rd., P.O. Box 428, Cuddy, PA 15031.

ROCKY MOUNTAIN (Monday following first Wednesday—DelMonico Hall, Denver, CO). GEORGETTE SIPARSKY, TDA Research, 12345 W. 52nd Ave., Wheat Ridge, CO 80033.

ST. LOUIS (Third Tuesday—The Salad Bowl Restaurant, St. Louis, MO). NICHOLAS HALL, U.S. Paint Corp., 831 S. 21st St., St. Louis, MO 63103.

SOUTHERN (GULF COAST SECTION—third Tuesday; CENTRAL FLORIDA SECTION—third Thursday after first Monday; ATLANTA SECTION—third Thursday; MEMPHIS SECTION—bi-monthly on second Tuesday; and MIAMI SECTION—Tuesday prior to Central Florida Section). DALE KENKNIGHT, Akzo Nobel Coatings Inc., 6369 Old Peachtree Rd., Norcross, GA 30071-1780.

TORONTO (Second Monday—Speranza Restaurant & Banquet Hall Convention Centre, Brampton, Ont., Canada). FRANS GROOTVELD, Ciba Pigments, 6860 Century Ave., Mississauga, Ont., L5N 5N3, Canada.

Western New York—Marko Markoff, 182 Farmingdale Rd., Cheektowaga, NY 14225.

Dr. Eley stated that colloidal fluids shear-thin due to the breakage of floculates and by hydrodynamic ordering; viscosity is inversely related to order. Rheological behavior observed in coatings is Newtonian and non-Newtonian. The speaker cited examples of non-Newtonian materials as shear dependent, time dependent (thixotropic), plastic, and visco-elastic. According to Dr. Eley, the most important single criterion for success is the achievement of a uniformly thick film, which implies successful leveling. He also stated that there are some analytical models for coatings processes, but process modeling by computer simulation that integrates all variables to provide a detailed description of the whole process is needed.

CAROL WINSLOW-RAPP, *Secretary*

MONTREAL—SEPTEMBER

"TiO₂ Selection"

Society Representative Horace Philipp, of PWGSC, presented the Hüls gavel to Ralph Weberbauer, of Debro Chemicals, Inc.

The evening's technical presentation was given by Baltimore Society member Leon Williams, of Millennium Inorganic Chemicals. He discussed "FUNDAMENTALS OF TiO₂ SELECTION AND USE."

According to Mr. Williams, TiO₂ pigments are the most significant white hiding products available. Their cost and use levels in coatings make them a major contributor to the MRC.

Mr. Williams reviewed physical, optical, and chemical basis for TiO₂'s performance.

HORACE PHILIPP, *Society Representative*

ROCKY MOUNTAIN—SEPTEMBER

"Water-Based Acrylic Emulsions"

Charlie Schroeder, of Fel-Pro Chemical Products L.P., was presented with the President's Gavel.

The 1997-98 Officers were introduced. They include: President—Charlie Schroeder; Vice-President—John Elverum, of Hauser Chemical Research; Treasurer—Mike Zink, of Kwal-Howells, Inc.; and Secretary—Georgette Siparsky, of TDA Research.

The evening's technical speaker was Aurelia Sheppard, of Rohm and Haas. She discussed "CORROSION PROTECTION USING WATER-BASED ACRYLIC EMULSIONS."

GEORGETTE SIPARSKY, *Secretary*



W. Konecny



A. Alda

William Konecny, Marketing Manager, Coatings Raw Materials, for Hüls America Inc., Somerset, NJ, has assumed responsibility for Röhm GmbH methacrylic monomers and polymers. A member of the New York Society, Mr. Konecny joined Hüls in 1987 as a Senior Technical Service Chemist.

In addition, **Alan Alda** has been promoted to Technical Sales Support Manager for Colorants and Biocides. In this position, Mr. Alda will support the marketing and sales activities for such products as Colortrend[®] machine colorants; Aqua-Trend[®] in-plant colorants; Chroma-Chem[®] industrial colorants; and Fungitrol, Nuosept[®], and Nuocide[®] biocides.

Roseanne Russo has accepted the promotion to Product Manager for the company's Coatings Additives. In this position, Ms. Russo will coordinate marketing efforts for the Coatings Additives product lines.

Joseph R. Gibson has been named Vice President, Coatings and Emulsions, for Wacker Silicones Corp., Adrian, MI. Mr. Gibson was previously employed by Cabot Corp.

Paul Good has been named Regional Manager for U.S. Filter/Wheelabrator Wisconsin Service Center, Muskegon, WI. Mr. Good has been with the company since 1995.

Zeneca Resins, Wilmington, MA, has appointed **Ben Berrios** to the position of Account Manager for the New England and Mid-Atlantic territory. Based in Montgomeryville, PA, Mr. Berrios will sell the company's line of advanced polymers to the industrial coatings and adhesive markets.

In addition, **James Rozema** was named Technical Service Representative for the Industrial Coatings group. In his new position, Mr. Rozema will provide technical support on the company's line of advanced polymers for the industrial coatings market.

Morris Gelb has been elected Senior Vice President of ARCO Chemical Co., Newtown Square, PA. Mr. Gelb will be responsible for worldwide manufacturing, research, engineering, and environmental health and safety.

The Laser Institute of America, Orlando, FL, will present the 1997 Arthur L. Schawlow Award to **Conrad M. Banas**. A retired Chief Scientists, Industrial Laser Division, United Technologies, Inc., Mr. Banas was selected in recognition of his ground-breaking accomplishments in the area of laser-material interactions and industrial laser processes.

Lou Hahn, Research Director, G.S. Roofing Products Company, Inc., Charleston Heights, SC, has been elected to serve as Chairman of the Asphalt Roofing Manufacturing Association, Calverton, MD. Mr. Hahn succeeds **Bob Metz**, Director of Quality Assurance-Roofing Division Celotex Corp.

Paint Research Associates (PRA Laboratories, Inc.) has appointed **Mark Hedstrom** as Executive Director. Based at the Research facilities on the campus of Eastern Michigan University, Ypsilanti, MI, Mr. Hedstrom will direct the laboratory operations of PRA and will head marketing efforts. He is a member of the Detroit Society.



M. Hedstrom

Olin Corp., Norwalk, CT, has appointed **Michael A. Cook** to Director of Biocides, Asia. In this capacity Mr. Cook will provide leadership and direction for the company's biocides business in Asia. In addition, he will be responsible for developing Olin's biocides manufacturing facility in China.

Obituaries

Carl W. Fuller, Past-President of the Philadelphia Society, passed away on September 10, 1997. He was 75 years old.

Mr. Fuller received his B.A. Degree in Chemistry from Kenyon College in 1943. Upon graduation, he enlisted in the U.S. Navy and served during World War II.

Mr. Fuller began his career in the coatings industry with Clifton Products Co. He remained active in the industry until he retired from Reichard Coulston, Inc., as Technical Manager in 1986. Since his retirement, Mr. Fuller was active as a consultant for the International Executives Service Corp., where he served as a volunteer to aid industries in third world countries.

Mr. Fuller was elected President of the Philadelphia Society in 1981. Throughout his career, Mr. Fuller held membership in the Cleveland, Pittsburgh, and Los Angeles Societies as well.

In addition, Mr. Fuller was a member of the American Society for Testing and Materials. He served as Chair of Committee D01:31 from 1978-1985. In 1986, he received the Henry A. Gardner Award. He was also a member of the Society for Plastics Engineers and Dry Color Manufacturing Association.

Mr. Fuller is survived by his wife Margaret; two daughters; two sons; and eight grandchildren.

Margaret A. "Margo" Ciez, of the Chicago Society, died on August 21, 1997.

Ms. Ciez was a 1980 graduate of Purdue University, where she received a B.S. Degree in Chemistry.

She was employed at Morton's Lansing, IL, facility as Business Manager of Morton Universal Color Dispersions. Ms. Ciez was a member of the Chicago Society.

Robert Switzer, Co-Founder of Day-Glo Color Corp., died recently. He was 83 years old.

In 1934, Mr. Switzer and his brother, Joseph, started experimenting with fluorescent pigments. From this experimentation, they founded Switzer Brothers Inc. in 1946 and changed the name to Day-Glo Color in 1969.

Mr. Switzer was President and Chief Executive Officer of Day-Glo Color Corp. until 1976. Then he served nine years as its Board Chairman.

In 1986, he and his family established the Robert and Patricia Switzer Foundation to promote the education of graduate students in the environmental sciences.

Mr. Switzer is survived by his wife, Patricia; two sons; one daughter; seven grandchildren; and one great granddaughter.

New FSCT Members

BALTIMORE

Active

Kaiser, Eric J.—Union Carbide Corp., Somerset, NJ.
Nelson, Bruce E.—MD State Highway Administration, Brooklandville, MD.

CDIC

Active

Billler, Kevin M.—Billler Technical, Columbus, OH.

DETROIT

Active

Gheyea, Vistasp N.—Standard Products Co., Dearborn, MI.

KANSAS CITY

Active

Schwab, Rick W.—Tnemec Paint Co., N. Kansas City, MO.
Yu, Hui—Cook Composites & Polymers, N. Kansas City.

Associate

Farrell, Christopher—Akzo Nobel Resins, Orland Park, IL.
Scott, Carol L.—I.T. Bauman, Overland Park, KS.

Honorary

Edwards, James N.—Liberty, MO.
Smith, Richard L.—Leawood, KS.

LOS ANGELES

Active

Alcala, Rafael—ICI Paints North America, Los Angeles, CA.
Arkoian, Norair A.—Smiland Paint Co., Los Angeles.
Aviki, Caroline—Ameron International, Brea, CA.
Bell, Martel A.—Vista Paint Corp., Fullerton, CA.
Bhakta, Keta—Behr Process, Santa Ana, CA.
Chen, Dinguo—YTC America Inc., Camarillo, CA.
Chung, Dennis W.—The Sherwin-Williams Co., Victorville, CA.
Dhaliwal, Pritam S.—Delta Technical Coatings Inc., Whittier, CA.
Fobar, Christopher M.—Delta Technical Coatings, Corona, CA.
Glendrange, Mark M.—Custom Building Products, Bell, CA.
Kmetani, Ani A.—Behr Process, Buena Park, CA.
Ko, Benita U.—Delta Technical Coatings Inc., Whittier.
Lackritz, Gil—Excellent Coatings, Vista, CA.

Lazarus, Richard M.—Morton International, Salem, OR.

Lin, Lin—Ameron International, Brea.
Magistrado, Victoria B.—Akzo Nobel Coatings, Orange, CA.
Manalang, Sheila J.—Behr Process Corp., Santa Ana.
McCarthy, James E.—Ameron International, Brea.
Mislang, Rudy—Dunn-Edwards Corp., Los Angeles.
Nguyen, Ly D.—Ameron International, Brea.
Oppenstein, Adam—Akzo Nobel Coatings, Orange.
Rogers, Michael L.—The Sherwin-Williams Co., Victorville.
Rogers, Neal D.—Behr Process Corp., Santa Ana.
Sanchez, Ruth C.—Dunn Edwards Corp., Los Angeles.
Sessions, Jeff E.—Flexart, Div. of Blue River Products, Laguna Hills, CA.
Stude, Lew M.—Vintage Ink & Paint, Burbank, CA.
Toha, Abul K.—Ellis Paint Co., Los Angeles.
Vargas, Jose L.—Dunn-Edwards Corp., Los Angeles.
West, Jason D.—Delta Technical Coatings Inc., Whittier.
Wilson, Kim L.—Akzo Nobel Coatings, Orange.

Associate

Bennett, Steven P.—Microfluidics, San Diego, CA.
Browning, Gary A.—Stewart Filmscreen, Torrance, CA.
Buckley, Charles I.—California Environmental/Geologists and Engineers Inc., Westlake Village, CA.
Chastain, William R.—Oxychem, San Mateo, CA.
Dobrenski, Don A.—Lipscomb Chemical Co., Long Beach, CA.
Dye, Lynn Marie—Pacific Westmark Corp., Pico Rivera, CA.
Edwards, Richard J.—Seegott Inc., Orange, CA.
Giloth, Ian F.—Chem Central, Santa Fe Springs, CA.
Holst, Britton R.—La Habra, CA.
Huang, William—H.M. Royal of California, Inc., Buena Park, CA.
Jones, Patricia L.—Air Products & Chemicals Inc., Riverside, CA.
Kingston, John R.—Letica Corp., Helendale, CA.
Kirtan, Peter—EPS, Los Angeles, CA.
Krinsky, Peter R.—Millennium Inorganic Chemicals, Santa Fe Springs.
Krupchak, Crystal—Seegott Inc., Orange.
Laird, Robert C.—Coatings Resource Corp., Huntington Beach, CA.
Levine, Norman—Norman International, Los Angeles.
Levy, Edward C.—C.P. Hall Co., Torrance, CA.
Macaluso, Evelyn—Synergistic Performance Corp., Fullerton, CA.
McLaughlin, Tom—Seegott Inc., Orange.
Meindersma, R. Duane—Dow Corning Corp., Irvine, CA.
Ochwat, Chancy A.—Ashland Chemical Co., Redondo Beach, CA.
Pabich, Dan—Seegott Inc., Orange.

Pircher, Mike—Van Waters & Rogers, Inc., Los Angeles.

Raab, Blaine—McWhorter Technologies, Lynwood, CA.
Richardson, J. Mark—Smiland Paint, Los Angeles.
Rowson, Donald E.—Industrial Hydrocarbons, Inc., Blue Jay, CA.
Serge, Anthony F.—Consolidated Drum Co., Montebello, CA.
Smyth, Ed R.—BYK-Gardner Inc., Los Angeles.
Waltman, Chuck—Evr-Gard Coatings, Paramount, CA.
Weinberg, Gregory A.—Coast Business Credit, Los Angeles.

Educator/Student

Cabrol, Mathilde—Chaffey College Continental Coatings, Fontana, CA.
Itoh, Greg M.—Cal Poly Pomona, Pomona, CA.
Parrack, Troy V.—Cypress College, Brea, CA.
Spencer, Carol Marie—Cal Poly Pomona, Pomona.

LOUISVILLE

Active

Nally, Alison L.—Color Corp., Louisville, KY.

NORTHWESTERN

Active

Bronk, John M.—McWhorter Technologies, Minneapolis, MN.

Associate

Kowalewski, Charles—Witco Corp., Lisle, IL.
Langenfeld, Dean T.—Vision-Ease Lens, Brooklyn Center, MN.
Lighthart, Lane S.—Luzenac America, Galena, IL.
Wright, Michael D.—Hoechst Celanese, Bridgman, MI.

Educator/Student

Xing, Linlin—North Dakota State University, Fargo, ND.

PHILADELPHIA

Berger, Kevin Y.—Henkel Corp., Newark, DE.
Frey, Diane—Rohm and Haas Co., Spring House, PA.
Kaiser, Eric J.—Union Carbide Corp., Somerset, NJ.
Renk, Christine A.—Bayer Corp., North Wales, PA.

Associate

Baker, Robert T.—New England Container, Baltimore, MD.
Delconte, Tony—First Source Inc., Denville, NJ.
Deluca, Mark P.—Superior Materials, Garden City, NY.



Books/
Publications

Specialty Waxes

A data sheet summarizing typical properties and applications for Vestowax polyethylene, modified polypropylene, and Fischer-Tropsch waxes is available from Hüls America Inc. In addition to presenting a product overview, the literature is designed to be used as a file folder, providing storage for technical bulletins, MSDSs, or other information.

Circle No. 30 on Reader Service Card

Coatings Newsletter

Sartomer Co. has introduced the first volume of its *Coatings Concepts* newsletter. Volume One highlights new performance information on UV/EB, peroxide-cure, and two-part epoxy/amine (Michael Addition) crosslinked coatings systems. The newsletter contains test data on the use of acrylic monomers and oligomers.

Circle No. 31 on Reader Service Card

Nemo® Pump Brochure

A range of Nemo® Progressing Cavity Pumps offered by Netzsch Inc. is featured in a six-page brochure. The brochure is a condensed version of the company's 28-page pump catalog. It is designed to provide an overview of the products' capabilities as well as the applications and industries they serve.

Circle No. 32 on Reader Service Card

Weathering Services

A 32-page publication details the Atlas Weathering Services Group's (AWSG) line of services and provides climatological data for its 17 domestic and international exposure facilities. The company's outdoor static (conventional) and accelerated weathering services are described. In addition, the brochure details AWSG's range of automotive testing capabilities.

Circle No. 33 on Reader Service Card

Fluorescence and Color

A 12-page technical guide entitled "Fluorescence and Color—An Introduction to the Fundamentals of Measuring Fluorescence Color," has been published by Labsphere, Inc. The guide discusses the general principles associated with measuring fluorescent color, the chemistry and physics of what causes pigments to fluoresce, and the effects of different illuminants on fluorescent pigments.

Circle No. 34 on Reader Service Card



Paints/
Coatings

Aluminum Extrusion Coating

PPG Industries, Inc. has introduced a new spray coating for the aluminum extrusion market. Acrynar™ spray coatings meet AAMA 605 weathering specifications of less than 5ΔE units of color fade, maximum chalking rate of 8, and greater than 50% gloss retention after five years of exposure in South Florida at a 45° angle.

Circle No. 35 on Reader Service Card

Interior Latex Paint

An interior latex paint designed for masking minor surface imperfections on drywall has been introduced by Duron Paints and Wallcoverings. Builders Masterpiece High Build reportedly applies up to 30 mils wet without sagging or mudcracking.

Circle No. 36 on Reader Service Card

Dryfall Coating

An advanced alkyd coating designed to provide greater hiding at a lower film thickness than conventional dryfalls has been introduced by The Sherwin-Williams Co. Super Save-Lite® Hi-Tec Dryfall reportedly delivers a white flat finish with high light reflectance and better uniformity in a single coat. Recommended spreading rate per coat is only 3.0 to 4.0 mils wet film thickness for coverage of 1.5 to 2.0 mils dry film thickness.

Circle No. 37 on Reader Service Card



Laboratory
Apparatus

Paint Test Charts

Wall-Matte paint test charts are now available from The Leneta Co. These are large-area, matte finish, gray and white test surfaces for the laboratory test application of wall paints. The charts are sealed with flat finish similar in texture and "tooth" to a typical trade sales flat wall paint and are supplied in sheets sized 20 x 28 in. or 28 x 40 in.

Circle No. 38 on Reader Service Card

Dual-Beam Spectrophotometer

A new generation dual-beam spectrophotometer, the Spectraflash® SF600® Plus is an industrial instrument designed

for a variety of uses where consistent, high resolution color measurement is required. Available from Datacolor International, the new model offers an automatic zoom lens, automatic included/excluded specular port positioning as well as automatic controls which adjust to light source UV content.

Circle No. 39 on Reader Service Card

Colorimeter

Labsphere introduces the BFC-450 Bispectral Fluorescence Colorimeter, a spectrometer for absolute measurement and quantification of color fluorescent materials. This instrument evaluates color metamerism and supports numerical color tolerancing for fluorescence.

Circle No. 40 on Reader Service Card

Lab Coater/Laminator

The newly combined resources of Acumeter and May Coating Technologies provides several models of hot melt laboratory coater/laminators. The slot die technology of these systems apply hot melt and thermoplastics onto webs such as papers, films, nonwovens, and foils. Coating widths are available up to 18 in. with lamination capabilities standard.

Circle No. 41 on Reader Service Card



Software

Video Image Software

Spectra-Tech Inc. has introduced the uView Version 1.5 video imaging software for visible and infrared microscopes. This software package works with a video camera and the company's video capture board to allow the user to collect images from the microscope and display them on a computer data station monitor. The live sample image, which is resizable to full screen, appears in a video pane within the Windows® application.

Circle No. 42 on Reader Service Card

Real-Time Data Acquisition

Now available from Ocean Optics is the OOiWinIP, a Windows® driver package that allows users to write their own real-time data acquisition programs for Ocean Optics spectrometers. This software includes programs written in Microsoft® Excel, Visual Basic®, Borland C++, Visual C++®, and Delphi™, plus the complete source code to the company's OOIBase spectrometer operating software for Win-

dows. The package consists of a 16-bit device driver for Windows 3.1 and Windows 95 and a 32-bit device driver for Windows 95 and Windows NT.

Circle No. 43 on Reader Service Card

DyeSelect Software

Organic Dyestuffs Corp. has released their new DyeSelect™ software program for final beta testing at selected customer sites. DyeSelect is an interactive reference tool enabling a textile industry user to select dyes, pigments, colorants, procedures, and chemicals for common fibers and blends. The program includes a complete description of each dye class.

Circle No. 44 on Reader Service Card

Rheological Data

A new software module, RSIOrchestrator, determines molecular weight and molecular weight distribution. Introduced by Rheometric Scientific, the new software module allows the calculation of real Mw and MWD data from the dynamic moduli G' and G'' as well as from the relaxation time spectrum H(Int). The software has two modes: (1) calculation of the MWD from the spectrum; and (2) synthesis of a molecular weight distribution.

Circle No. 45 on Reader Service Card



Epoxy Monomers

Two new epoxy monomers, one the diglycidyl ether of dibromo neopentyl glycol and the triglycidyl ether of trimethylololthane, are available from CVC Specialty Chemicals. The Erisys GE-20 monomer, ranging between 275 and 500 cps at 20°C, is designed for flame retardant epoxy systems. Erisys GE-31 is low in color and is recommended for 100% solids chemical resistant coatings, concrete crack repairs, and coatings for containment areas.

Circle No. 46 on Reader Service Card



On-Line Trademark Directory

The National Paint and Coatings Association has added another section to its Internet Home page—the Trademark Directory. Over 35,000 registered trademarks and common-law marks from international classes 1, 2, 3, 16, 17, and 19 pertaining to paint and paint related

products are contained in this directory. Each trademark listing includes the trademark's name, company holder, status, class, registration date, and product description.

Circle No. 47 on Reader Service Card

Injection Molding Program

The *Troubleshooting Injection Molding Problems* CD-ROM has been introduced by the Society of Manufacturing Engineers (SME). This interactive, multi-media troubleshooting reference with built-in tutorial allows the user to identify injection molding defects, understand the

cause of the defect as well as offer suggestions on how to correct the problem.

Circle No. 48 on Reader Service Card

Mixing Equipment Video

Charles Ross & Son Co. has produced a new library of demonstration videos that enable processors to see the company's mixing and blending equipment in action in a variety of applications. Each video focuses on the formulation and mixing techniques and includes close-up views inside the mix vessel during the mixing cycle.

Circle No. 49 on Reader Service Card

STATEMENT OF OWNERSHIP, MANAGEMENT AND CIRCULATION (Act of August 12, 1970; Section 3685, Title 39, United States Code)

Title of Publication: Journal of Coatings Technology
 Date of Filing: October 24, 1997
 Frequency of Issue: Monthly
 Number of Issues Published Annually: 12
 Annual Subscription Price: U.S./Canada—\$60.00; Europe—\$90.00; Other Countries—\$75.00
 Location of Known Office of Publication: 492 Norristown Rd., Blue Bell, PA 19422
 Location of Headquarters of General Business Offices of the Publisher: Same as above
 Names and Addresses of Publisher, Editor, and Managing Editor:
 Publisher—Federation of Societies for Coatings Technology, 492 Norristown Rd., Blue Bell, PA 19422
 Editor—Patricia D. Ziegler, 492 Norristown Rd., Blue Bell, PA 19422
 Managing Editor—Kathleen M. Wikiera, 492 Norristown Rd., Blue Bell, PA 19422
 Owner: Federation of Societies for Coatings Technology, 492 Norristown Rd., Blue Bell, PA 19422
 Federation Officers:
 President—Jay Austin, 1326 Summer St., Hammond, IN 46320
 President-Elect—Thomas Hill, 24 Lily Brooke Ct., East Amherst, NY 14051
 Treasurer—Forest Fleming, 1431 Progress St., High Point, NC 27261
 Executive Vice President—Robert F. Ziegler, 492 Norristown Rd., Blue Bell, PA 19422

Known Bondholders, Mortgages, and Other Security Holders Owning or Holding One Percent or More of Total Amount of Bond, Mortgages, or Other Securities: None.

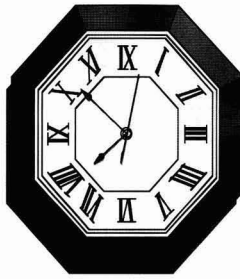
The Purpose, Function, and Nonprofit Status of This Organization and the Exempt Status for Federal Income Tax Purposes: Have Not Changed During the Preceding 12 Months

Extent and Nature of Circulation:

	Average No. Copies Each Issue During Preceding 12 Months	Actual No. Copies of Single Issue Nearest to Filing Date
A. Total No. of Copies Printed (Net Press Run)	10,974	10,478
B. Paid Circulation		
1. Sales Through Dealers and Carriers, Street Vendors and Counter Sales	0	0
2. Mail Subscriptions	8,470	8,609
C. Total Paid Circulation	8,470	8,609
D. Free Distribution by Mail, Carrier, or Other Means, Samples, Complimentary, and Other Free Copies	329	397
E. Total Distribution	8,799	9,006
F. Copies Not Distributed		
1. Office Use, Left Over, Unaccounted, Spoiled After Printing	2,175	1,472
2. Returns From News Agents	0	0
G. Total	10,974	10,478

I certify that the statements made by me are correct and complete. (signed)
 Patricia D. Ziegler, Editor

How Much



Do You Spend in Training?

SciQuest—A Revolutionary Coatings Tool for State-of-the-Art Multimedia Training . . .

- Eliminates the Need for Expensive Off-Site Training
- Offers Employees at Every Level the Opportunity to Increase Knowledge and Experience
- Provides the Most Comprehensive Overview of Coatings Technology and Manufacturing

Here's What the Experts Have to Say:

"Volume I of SciQuest is a MUST for coatings technologists, forensic chemists, professors and teachers, sales and marketing personnel, managers and others. In addition, office personnel and other non-technologists will find it is fun to use and easy to understand. The 24 embedded videos and thousands of graphics provide a quick, visual understanding and feeling for many processes."

—Dr. Joseph V. Koleske, Editor
ASTM Paint and Coatings Test Manual,
14th Edition of the Gardner-Sward Handbook

"SciQuest is the most accessible, in-depth resource of information on coatings, in my experience."

—Robert Springate
R&D Supervisor
TruTest Manufacturing

"This user friendly, informative CD is a must for industrial and university information centers and serious coatings operations. It is easily accessed, very readable and like having a consultant at your disposal. Get one!"

—Dr. Thomas J. Miranda
Adjunct Professor, Chemistry
Indiana University, South Bend

With just a keystroke, the world of coatings can be yours to explore and master!

System Requirements: IBM PC or compatible, 386 or greater, Microsoft Windows with 8 MB of RAM, VGA monitor, 256 Color recommended, CD-ROM drive.

For more information on SciQuest, contact:

Federation of Societies for Coatings Technology
492 Norristown Rd., Blue Bell, PA 19422-2350.
Phone: (610) 940-0777 or FAX: (610) 940-0292

Call for a Free
CD DEMO DISC
(610) 940-0777

FEDERATION MEETINGS



For information on FSCT meetings, contact Federation of Societies for Coatings Technology, 492 Norristown Rd., Blue Bell, PA 19422 (610) 940-0777, FAX: (610) 940-0292. Web site: <http://www.coatingstech.org>

1998

(Apr. 15-17)—ICE Latinoamerica '98. Miami Beach Convention Center, Miami, FL.

(July 23-24)—Pan-American Coatings Expo. World Trade Center, Mexico City, Mexico.

(Oct. 14-16)—ICE '98—FSCT Annual Meeting and International Coatings Expo and Technology Conference. Ernest N. Morial Convention Center, New Orleans, LA.

1999

(Oct. 20-22)—ICE '99—FSCT Annual Meeting and International Coatings Expo and Technology Conference. Dallas, TX.

SPECIAL SOCIETY MEETINGS

1998

(April 22)—"Manufacturing Symposium." Co-sponsored by the Cleveland Society and the Pittsburgh Society. (James Currie, Jamestown Paint Co., 108 Main St., P.O. Box 157, Jamestown, PA 16134; 412-932-3101).

(April 23-24)—"Waterborne Coatings: Sink or Swim II." 41st Annual Technical Symposium. Co-sponsored by the Cleveland Society and the Pittsburgh Society. (Vicki Fisher, Jamestown Paint Co., 108 Main St., P.O. Box 157, Jamestown, PA 16134; 412-932-3101).

(May 1-2)—"Maximizing Performance Properties and Minimizing Production Problems of Waterborne Coatings." 51st Annual Technical Symposium. Sponsored by the Pacific Northwest Society. Doubletree Inn at the Quay, Vancouver, WA. (Debra Severson, Miller Paint Co., 12730 NE Whitaker Way, Portland, OR 97230; 503-255-0190).

(May 11-14)—Eastern Training Conference II. Sponsored by the Philadelphia Society. Valley Forge Convention Center, King of Prussia, PA. (Wayne Kraus, Hercules Incorporated, Research Center, 500 Hercules Rd., Wilmington, DE 19808).

1999

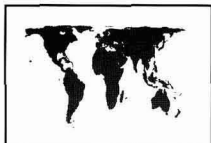
(Feb. 16-18)—24th Biennial Western Coatings Societies's Symposium and Show. Sponsored by the Golden Gate, Los Angeles, Pacific Northwest, and Rocky Mountain Societies. John Ascuaga's Nugget, Sparks, NV.

OTHER ORGANIZATIONS

1997—North America

(Nov. 17-20)—ICALEO '97. Sponsored by The Laser Institute of America. Catamaran Resort Hotel, San Diego, CA. (Laser Institute of America, 12424 Research Pkwy., Ste. 125, Orlando, FL 32826)

(Dec. 8-10)—Electroless Nickel '97. Sponsored by *Products Finishing Magazine*. Hyatt Regency, Cincinnati, OH. (Cindy Goodridge, Gardner Management Services, 6915 Valley Ave., Cincinnati, OH 45244-3029).



1998—North America

(Jan. 7-9)—"Spray Finishing Technology Workshop." Sponsored by Bowling Green State University and ITW DeVilbiss. ITW DeVilbiss Training Center, Maumee (Toledo), OH. (Dr. Richard A. Kruppa, College of Technology, Bowling Green State University, Bowling Green, OH 43403).

(Jan. 11-14)—ASTM Committee D-1 on Paint and Related Coatings, Materials, and Applications. Sheraton San Diego Hotel and Marina, San Diego, CA. (Scott Orthey, ASTM, 100 Barr Harbor Dr., West Conshohocken, PA 19428-2959).

(Jan. 13)—PCI Technical Subcommittee on Test Methods and ASTM D01.51 on Powder Coatings. Sponsored by the American Society for Testing and Materials. Sheraton Harbor Island Hotel, San Diego, CA. (Jeffrey Hagerlin, O'Brien Powder Products, 9800 Genard Rd., Houston, TX 77041).

(Jan. 13)—"Measuring Color, Retroreflection and Gloss." D01 Mini-Symposium. San Diego, CA. (Dr. Romesh Kumar, Clariant, 500 Washington St., Coventry, RI 02816; 401-823-2161).

(Jan. 13-14)—ASTM Committee G-3 on Weathering and Durability. Sheraton San Diego Hotel and Marina, San Diego, CA. (Scott Orthey, ASTM, 100 Barr Harbor Dr., West Conshohocken, PA 19428-2959).

(Jan. 14-16)—ASTM Committee E-12 on Appearance. Sheraton San Diego Hotel and Marina, San Diego, CA. (Bode Buckley, ASTM, 100 Barr Harbor Dr., West Conshohocken, PA 19428-2959).

(Jan. 14-17)—"Winter Leadership Conference." Sponsored by The Adhesive and Sealant Council, Inc. The Registry, Naples, FL. (The Adhesive and Sealant Council, Inc., 1627 K St., N.W., Ste. 1000, Washington, D.C. 20006).

(Jan. 15-16)—ASTM Committee D-33 on Protective Coating and Lining Work for Power Generation Facilities. Sheraton San Diego Hotel and Marina, San Diego, CA. (Susan Canning, ASTM, 100 Barr Harbor Dr., West Conshohocken, PA 19428-2959).

(Jan. 15-16)—"60 Years of Polyurethanes." International Symposium and Exhibition sponsored by University of Detroit Mercy. Ward Conference Center, Detroit, MI. (Eleanore Eldred/Jiri E. Kresta, Polymer Institute, University of Detroit Mercy, P.O. Box 19900, Detroit, MI 48219-0900; 313-993-1270).

(Jan. 17-20)—"The RCMA Express, A Journey to Creative Thinking and Opportunity." Conference and Expo sponsored by Roof Coatings Manufacturers Association (RCMA). Omni Tucson National Resort and Spa, Tucson, AZ. (RCMA, 6000 Executive Blvd., Ste. 201, Rockville, MD 20852-3803).

(Jan. 20-23)—"Environmentally Compliant Coatings." Course sponsored by The Department of Polymers and Coatings, North Dakota State University. Crowne Plaza Resort, Hilton Head Island, SC. (Debbie Shasky, Program Coordinator, North Dakota State University, Dept. of Polymers and Coatings, 54 Dunbar Hall, Fargo, ND 58105).

(Feb. 9-12)—"Composites '98 Manufacturing and Tooling Conference and Exhibits." Sponsored by Society for Manufacturing Engineers (SME). Hyatt Alicante, Anaheim, CA. (SME, One SME Dr., P.O. Box 930, Dearborn, MI 48121-0930).

(Feb. 18-20)—25th Annual International Waterborne, High-Solids, and Powder Coatings Symposium. Sponsored by The University of Southern Mississippi (USM). New Orleans, LA. (Robson F. Storey or Shelby F. Thames, WHS&PC Symposium, Dept. of Polymer Science, USM, Box 10076, Hattiesburg, MS 39406-0076).

(Feb. 22-24)—"Color and Design: 21st Century Technology and Creativity." Williamsburg Conference sponsored by the Inter-Society Color Council. Williamsburg, VA. (Robert T. Marcus, ISCC Publicity Chairman, D&S Plastics International, 100 S. Mitchell Rd., Mansfield, TX 76063).

(Feb. 23-25)—"Basic Coatings for Sales, Marketing, and General Personnel." Short course sponsored by University of Missouri-Rolla (UMR), Rolla, MO. (UMR Coatings Institute, 236 Schrenk Hall, 1870 Miner Circle, Rolla, MO 65409).

(Mar. 2-4)—"Polymer Stabilizers and Modifiers '98." Conference and Exhibition sponsored by The Institute of Materials Science. Hilton

jct Journal of
Coatings
Technology
Reader Service Card
February 1994 Issue

Your Company

(Check One Block)

- AA Manufacturers of Paints,
Varnishes, Lacquers, Printing
Inks, Sealants, Adhesives
BB Manufacturers of Raw
Materials
CC Manufacturers of Equipment
and Containers
DD Sales Agents for Raw
Materials and Equipment
EE Government Agency
FF Research/Testing/Consulting
GG Educational Institution/
Library
HH Paint Consumer
JJ Other

Your Position

(Check One Block)

- KK Management/Adm.
LL Mfg. & Engineering
MM Quality Control
NN Research & Development
PP Technical Sales Service
QQ Sales & Marketing
RR Consultant
SS Educator/Student/Librarian
TT Other

Circle the numbers of the items you would like more
information on, and mail it—postage paid!

001	021	041	061	081	101	121	141	161	181	201	221	241	261	281
002	022	042	062	082	102	122	142	162	182	202	222	242	262	282
003	023	043	063	083	103	123	143	163	183	203	223	243	263	283
004	024	044	064	084	104	124	144	164	184	204	224	244	264	284
005	025	045	065	085	105	125	145	165	185	205	225	245	265	285
006	026	046	066	086	106	126	146	166	186	206	226	246	266	286
007	027	047	067	087	107	127	147	167	187	207	227	247	267	287
008	028	048	068	088	108	128	148	168	188	208	228	248	268	288
009	029	049	069	089	109	129	149	169	189	209	229	249	269	289
010	030	050	070	090	110	130	150	170	190	210	230	250	270	290
011	031	051	071	091	111	131	151	171	191	211	231	251	271	291
012	032	052	072	092	112	132	152	172	192	212	232	252	272	292
013	033	053	073	093	113	133	153	173	193	213	233	253	273	293
014	034	054	074	094	114	134	154	174	194	214	234	254	274	294
015	035	055	075	095	115	135	155	175	195	215	235	255	275	295
016	036	056	076	096	116	136	156	176	196	216	236	256	276	296
017	037	057	077	097	117	137	157	177	197	217	237	257	277	297
018	038	058	078	098	118	138	158	178	198	218	238	258	278	298
019	039	059	079	099	119	139	159	179	199	219	239	259	279	299
020	040	060	080	100	120	140	160	180	200	220	240	260	280	300

Name _____
Company _____
Address _____
City _____ State _____ Zip _____
Phone _____ FAX _____

jct Journal of
Coatings
Technology
Reader Service Card
February 1994 Issue

Your Company

(Check One Block)

- AA Manufacturers of Paints,
Varnishes, Lacquers, Printing
Inks, Sealants, Adhesives
BB Manufacturers of Raw
Materials
CC Manufacturers of Equipment
and Containers
DD Sales Agents for Raw
Materials and Equipment
EE Government Agency
FF Research/Testing/Consulting
GG Educational Institution/
Library
HH Paint Consumer
JJ Other

Your Position

(Check One Block)

- KK Management/Adm.
LL Mfg. & Engineering
MM Quality Control
NN Research & Development
PP Technical Sales Service
QQ Sales & Marketing
RR Consultant
SS Educator/Student/Librarian
TT Other

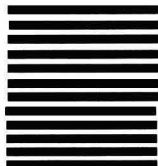
Circle the numbers of the items you would like more
information on, and mail it—postage paid!

001	021	041	061	081	101	121	141	161	181	201	221	241	261	281
002	022	042	062	082	102	122	142	162	182	202	222	242	262	282
003	023	043	063	083	103	123	143	163	183	203	223	243	263	283
004	024	044	064	084	104	124	144	164	184	204	224	244	264	284
005	025	045	065	085	105	125	145	165	185	205	225	245	265	285
006	026	046	066	086	106	126	146	166	186	206	226	246	266	286
007	027	047	067	087	107	127	147	167	187	207	227	247	267	287
008	028	048	068	088	108	128	148	168	188	208	228	248	268	288
009	029	049	069	089	109	129	149	169	189	209	229	249	269	289
010	030	050	070	090	110	130	150	170	190	210	230	250	270	290
011	031	051	071	091	111	131	151	171	191	211	231	251	271	291
012	032	052	072	092	112	132	152	172	192	212	232	252	272	292
013	033	053	073	093	113	133	153	173	193	213	233	253	273	293
014	034	054	074	094	114	134	154	174	194	214	234	254	274	294
015	035	055	075	095	115	135	155	175	195	215	235	255	275	295
016	036	056	076	096	116	136	156	176	196	216	236	256	276	296
017	037	057	077	097	117	137	157	177	197	217	237	257	277	297
018	038	058	078	098	118	138	158	178	198	218	238	258	278	298
019	039	059	079	099	119	139	159	179	199	219	239	259	279	299
020	040	060	080	100	120	140	160	180	200	220	240	260	280	300

Name _____
Company _____
Address _____
City _____ State _____ Zip _____
Phone _____ FAX _____



NO POSTAGE
NECESSARY
IF MAILED
IN THE
UNITED STATES



BUSINESS REPLY MAIL
FIRST CLASS PERMIT NO. 12522 CHICAGO, ILLINOIS
POSTAGE WILL BE PAID BY ADDRESSEE

Journal of Coatings Technology
Reader Service Center
650 S. Clark St.
Chicago, IL 60605-9960



NO POSTAGE
NECESSARY
IF MAILED
IN THE
UNITED STATES



BUSINESS REPLY MAIL
FIRST CLASS PERMIT NO. 12522 CHICAGO, ILLINOIS
POSTAGE WILL BE PAID BY ADDRESSEE

Journal of Coatings Technology
Reader Service Center
650 S. Clark St.
Chicago, IL 60605-9960



Head Island, SC. (Angelos V. Patsis, The Institute of Materials Science, State University of New York, New Paltz, NY 12561).

(Mar. 8-12)—"AICHe Spring National Meeting/Petrochem and Technochem '98." Sponsored by the American Institute of Chemical Engineers (AICHe). Sheraton New Orleans, New Orleans, LA. (AICHe, 345 E. 47th St., New York, NY 10017).

(Mar. 9-11)—"Introduction to Emulsion Polymers/Polymer Colloids." Conference sponsored by The Institute of Materials Science. Hilton Head Island, SC. (Angelos V. Patsis, The Institute of Materials Science, State University of New York, New Paltz, NY 12561).

(Mar. 9-12)—"Pigment Dispersion: Science and Technology." Conference sponsored by The Institute of Materials Science. Hilton Head Island, SC. (Angelos V. Patsis, The Institute of Materials Science, State University of New York, New Paltz, NY 12561).

(Mar. 22-25)—Spring Convention. Sponsored by The Adhesive and Sealant Council, Inc. Buena Vista Palace, Orlando, FL. (The Adhesive and Sealant Council, Inc., 1627 K St., N.W., Ste. 1000, Washington, D.C. 20006).

(Mar. 22-27)—"Corrosion/98." Sponsored by NACE International. San Diego Convention Center, San Diego, CA. (NACE International, P.O. Box 218340, Houston, TX 77218-8340).

(Mar. 23-27)—"Basic Composition of Coatings." Short course sponsored by University of Missouri-Rolla (UMR), Rolla, MO. (UMR Coatings Institute, 236 Schrenk Hall, 1870 Miner Circle, Rolla, MO 65409).

(Mar. 24-26)—"Silicones in Coatings II." Sponsored by The Paint Research Association. Disney World Village, Orlando, FL. (Dip Dasgupta, Paint Research Association, 8 Waldegrave Rd., Teddington, Middlesex TW11 8LD United Kingdom).

(Apr. 19-22)—RadTech '98 North America Conference. Sponsored by RadTech International North America. Hyatt Regency, Chicago, IL. (RadTech International North America, 60 Revere Dr., Ste. 500, Northbrook, IL 60062).

(Apr. 20-24)—"Introduction to Paint Formulation." Short course sponsored by University of Missouri-Rolla (UMR), Rolla, MO. (UMR Coatings Institute, 1870 Miner Circle, Rolla, MO 65409).

(Apr. 21-24)—"Coverings." Exhibition organized by TSI, Inc. Orange County Convention Center, Orlando, FL. (TSI, Inc., 900 E. Indiantown Rd., Ste. 207, Jupiter, FL 33477).

(Apr. 22)—"Manufacturing Symposium." Co-sponsored by the Cleveland Society for Coatings Technology and the Pittsburgh Society for Coatings Technology. (James Currie, Jamestown Paint Co., 108 Main St., P.O. Box 157, Jamestown, PA 16134; 412-932-3101).

(Apr. 23-24)—"Waterborne Coatings: Sink or Swim II." 41st Annual Technical Symposium. Co-sponsored by the Cleveland Society for Coatings Technology and the Pittsburgh Society for Coatings Technology. (Vicki Fisher, Jamestown Paint Co., 108 Main St., P.O. Box 157, Jamestown, PA 16134; 412-932-3101).

(May 1-2)—51st Annual Technical Symposium. Sponsored by the Pacific Northwest Society for Coatings Technology. Doubletree Inn at the Quay, Vancouver, WA. (Debra Severson, Miller Paint Co., 12730 NE Whitaker Way, Portland, OR 97230; 503-255-0190).

(May 4-6)—"Adhesion and Coatings Adhesion: Theory, Applications, and Durability." Conference sponsored by The Institute of Materials Science. Orlando, FL. (Angelos V. Patsis, The Institute of Materials Science, State University of New York, New Paltz, NY 12561).

(May 5-6)—"Effects of Surface Finish on Corrosion Testing." Symposium sponsored by the American Society for Testing and Materials (ASTM). Atlanta, GA. (Pierre R. Roberge, Royal Military College of Canada, Department of Chemistry and Chemical Engineering, Kingston, Ontario K7K 5L0, Canada).

(May 11-14)—Eastern Training Conference II. Sponsored by the Philadelphia Society. Valley Forge Convention Center, King of Prussia, PA. (Wayne Kraus, Hercules Incorporated, Research Center, 500 Hercules Rd., Wilmington, DE 19808).

(May 17-20)—1998 Fluid Controls Institute Annual Meeting. The Cloister, Sea Island, GA. (Fluid Controls Institute, Inc., 1300 Summer Ave., Cleveland, OH 44115-2851).

(May 18-22)—"Physical Testing of Paints and Coatings." Short course sponsored by University of Missouri-Rolla (UMR), Rolla, MO.

(UMR Coatings Institute, 236 Schrenk Hall, 1870 Miner Circle, Rolla, MO 65409).

(June 1-5)—"Advances in Emulsion Polymerization and Latex Technology." Short course sponsored by Lehigh University. Emulsion Polymers Institute, Bethlehem, PA. (Mohamed S. El-Aasser, Emulsion Polymers Institute, Lehigh University, 111 Research Dr., Bethlehem, PA 18015).

(June 9)—ASTM D01.51 on Powder Coatings. Sponsored by the American Society for Testing and Materials (ASTM). Omni Inner Harbor Hotel, Baltimore, MD. (Jeffrey Hagerlin, O'Brien Powder Products, 9800 Genard Rd., Houston, TX 77041-7624).

(July 23-24)—Pan-American Coatings Expo. World Trade Center, Mexico City, Mexico. (Lisa McGlashen, FSCT, 492 Norristown Rd., Blue Bell, PA 19422; (610) 940-0777, FAX: (610) 940-0292. Web site: <http://www.coatingstech.org>).

(Aug. 31-Sept. 3)—"Safety in Ammonia Plants and Related Facilities." Sponsored by the American Institute of Chemical Engineers (AICHe). Charleston Place, Charleston, SC. (AICHe, 345 E. 47th St., New York, NY 10017).

(Sept. 10-11)—"Engineering and Construction Contracting Conference." Sponsored by the American Institute of Chemical Engineers (AICHe). The Phoenician, Scottsdale, AZ. (AICHe, 345 E. 47th St., New York, NY 10017).

(Sept. 22-24)—"Powder Coating '98." Sponsored by The Powder Coating Institute. Indiana Convention Center, Indianapolis, IN. (Vicki Thatcher, Conference Coordinator, P.O. Box 54464, Cincinnati, OH 45254).

(Oct. 14-16)—ICE '97—FSCT Annual Meeting and International Coatings Expo and Technology Conference (Formerly Annual Meeting and Paint Industries' Show). Ernest N. Morial Convention Center, New Orleans, LA.

(Oct. 25-28)—Fall Convention. Sponsored by The Adhesive and Sealant Council, Inc. Fairmont at Grant Park, Chicago, IL. (The Adhesive and Sealant Council, Inc., 1627 K St., N.W., Ste. 1000, Washington, D.C. 20006).

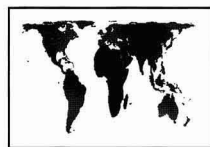
(Nov. 3-5)—"Second Conference on Emulsion Polymers/Polymer Colloids." Sponsored by the Institute of Materials Science—State University of New York at New Paltz. Hilton Head Island, SC. (Angelos V. Patsis, The Institute of Materials Science, State University of New York, New Paltz, NY 12561).

(Nov. 15-20)—AICHe Annual Meeting. Sponsored by the American Institute of Chemical Engineers (AICHe). Fontainebleau Hilton/Eden Roc, Miami Beach, FL. (AICHe, 345 E. 47th St., New York, NY 10017).

(Nov. 17-20)—"The Fifth Color Imaging Conference: Color Science, Systems, and Applications." Sponsored by the Society for Imaging Science and Technology and the Society for Information Display. Radisson Resort, Scottsdale, AZ. (Society for Imaging Science and Technology, 7003 Kilworth Lane, Springfield, VA 22151).

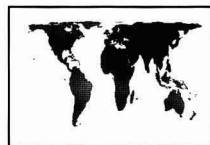
1998—Africa

(Mar. 6-8)—"Coatings for Africa '98." Sponsored by The Oil & Colour Chemists' Association's (OCCA) South African Division, the Natal Section, and Surflex Ltd. International Convention Centre, Durban, South Africa. (Christopher Pacey-Day, OCCA, 967 Harrow Rd., Wembley, Middlesex, England HA0 2SF).



1998—Asia

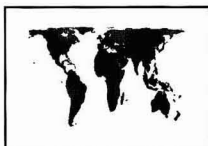
(May 12-14)—Techno Trade '98. Sponsored by Singapore Confederation of Industries, Taiwan Association of Machinery Industry, and Taiwan Industrial Fasteners Institute. World Trade Center, Singapore. (Interfama Brooks Exhibitions Pte. Ltd., Forum Place, Hatfield, Hertfordshire AL10 ORN, United Kingdom).



1998—Australia

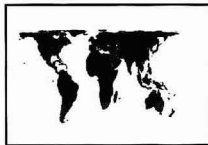


(July 29-Aug. 1)—“Coatings for the Future.” Second Trans Tasman Surface Coatings Conference. Co-sponsored by Surface Coatings Association, New Zealand, Inc., and Surface Coatings Association, Australia, Inc. The Carlton Hotel, Auckland, New Zealand. (98 Transtas Conference, P.O. Box 5192, Wellesley St., Auckland, New Zealand).



1997—Europe

(Nov. 18-19)—“Coatings for Wood.” Course sponsored by Paint Research Association (PRA). Teddington, Middlesex, United Kingdom. (Heena Mehta, PRA, 8 Waldegrave Rd., Teddington, Middlesex TW11 8LD, United Kingdom).



(Nov. 24-26)—“Design of Experiments.” Training course sponsored by Paint Research Association (PRA). Teddington, Middlesex, United Kingdom. (Heena Mehta, PRA, 8 Waldegrave Rd., Teddington, Middlesex TW11 8LD, United Kingdom).

(Dec. 4-5)—“Forum de la Connaissance.” Sponsored by Association Française des Techniciens des Peintures, Vernis, Encres d'imprimerie, Colles et Adhésifs (AFTPVA). Maison de la Chimie, Paris, France. (AFTPVA, 5 rue Etex, F-75018, Paris, France).

1998—Europe

(Jan. 20-22)—Powder Coating Europe 98. Sponsored by Vincentz Verlag, Amsterdam Exhibition Centre, Amsterdam, The Netherlands. (Vincentz Verlag, Postfach 6247, D-30062 Hannover, Germany).

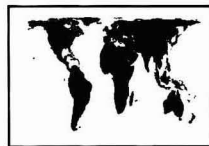
(Apr. 20-25)—Hannover Fair '98: World Center for Industrial Technology. Hannover Fairgrounds, Hannover, Germany. (Andrea Anderson, Hannover Fairs USA, Inc., 103 Carnegie Center, Princeton, NJ 08540).

(May 25-27)—11th International Symposium on Polymer Analysis and Characterization (ISPAC-11). Santa Margherita Ligure, Genoa, Italy. (Oscar Chiantore, Dept. of Chemistry IPM, University of Torino, Via Giuria 7-101025 Torino, Italy; Fax: +39 11 670 7855).

(June 28-July 2)—Third Oxford Conference on Spectrometry. Co-sponsored by the Council for Optical Radiation Measurement and the Ultraviolet Spectrometry Group. Royal Holloway College of the University of London, Egham, Surrey, United Kingdom. (Art Springsteen, Third Oxford Conference, c/o Labsphere, Inc., P.O. Box 70, Shaker St., North Sutton, NH 03260).

1998—South America

(Apr. 15-17)—ICE Latinoamerica '98. Miami Beach Convention Center, Miami, FL. (Lisa McGlashen, FSCT, 492 Norristown Rd., Blue Bell, PA 19422; (610) 940-0777, FAX: (610) 940-0292. <http://www.coatingstech.org>).



Classified Ads

USED EQUIPMENT

Dispersers, Media Mills, Mixers, Ribbon Blenders, Ball & Pebble Mills, Reactors, Fillers & Labelers, Stainless Steel Storage & Batch Tanks

Call with your list of Surplus Equipment!

SOUTHWEST PROCESS EQUIPMENT, INC.

Phone: (713) 223-1238 • Fax: (713) 225-1942

Reprints

Reprints of articles appearing in the JCT are available in quantities of 100 to 25,000.

To order reprints, call the Reprint Department at (610) 940-0777.

HELP WANTED

Career Opportunities Nationwide

Career Opportunities Nationwide: We have the finest opportunities available with Fortune 100 companies as well as smaller firms. If you have experience in coatings, thin-films, vacuum technology, resins, polymers, etc., then send your resume in confidence. We have hundreds of openings currently available to you in all industries: optical, manufacturing, defense, semiconductors, etc. Same day response for qualified applicants. Visit our website at www.ansara.com or e-mail resume to: pk@ansara.com. Send to: Mr. Peter Kratimenos, P.O. Box 239, West Springfield, MA 01090. Tel: 413-733-0791 ext. 14 or FAX: 413-731-1208. Never a fee.

HELP WANTED

Manufacturing Plant Mgr.

Planned retirement creates an opportunity for a mature professional capable of continuing actions to grow an important business segment of a Fortune 500 firm in the LA area. College degree (chemistry preferred), 5-10 years of management experience, good interpersonal skills and knowledge of a chemical compounding operation is required as well as the ability to operate distant from headquarters. Lab experience, including QC, understanding of environmental issues and familiarity with ISO practices are preferred. We offer a competitive salary/benefit package. Please send resume to:

**HUMAN RESOURCES
DAY-GLO COLOR CORP.
4515 ST. CLAIR AVE.
CLEVELAND, OH 44103**

HELP WANTED

Raw Material Sales

The E.W. Kaufmann Company, a specialty Chemical Distributor has a position open in New England. A potential candidate should have a minimum of five years selling experience with resins, pigments, and additives. The territory will involve accounts in the Coatings, Printing Ink, Sealant, and other Allied Industries. We are seeking an individual who is a self starter and hard working. We offer an excellent benefit program and an above average compensation.

Please send your confidential resume to:

**E.W. Kaufmann Company
Attention: Sales Manager
P.O. Box 529
Southampton, PA 18966**

Advertisers' Index

Air Products & Chemicals Inc.	37	Paul N. Gardner Co.	79
Alnor Oil Co.	135	Genesee Polymers Corp.	Cover 4
ANGUS Chemical Co.	112	Halox	53
Aqualon	119	William Harrison Corp.	88
ARCO Chemical Co.	Cover 3	Henkel Corp.	63
Automation Products Inc.	39,73,89	Heubach	33-34
BASF Corp.	39	Hüls America Inc.	Cover 2, 55, 108
Bayer Corp.	11	Innes Clips	145
Borden Chemical, Inc.	133	Kerr-McGee Chemical Corp.	58-59
Brandt Technologies, Inc.	173	KTA-Tator, Inc.	161
BYK-Gardner, Inc.	90	The Lubrizol Corp.	115
Cabot Corp., Cab-O-Sil	41	Morton International	129
Cahn Instruments	159	Nissan Chemical Co.	110
Chemir/Polytech Laboratories, Inc.	100	OMG	72
Ciba Specialty Chemicals	45	Paratherm Corp.	82
Conn & Co., Inc.	76	Particle Sizing Systems, Inc.	94
Cortec Corp.	120	Ronningen-Petter	83
Dar-Tech, Inc.	179	Sartomer Co.	123, 131
Degussa Corp.	49	Schold Machine Co.	85
Dominion Colour Corp.	143	Seegott Inc.	181
Drum-Mates, Inc.	77	The Shepherd Color Co.	117
DuPont Specialty Chemicals	114	Silberline Mfg. Co., Inc.	66
Eiger Machinery Inc.	153	Southwest Process Equipment	202
EM Industries, Inc.	137	Spencer Machine & Tool Co., Inc.	148
Federation of Societies for Coatings Technology	1	Thomas Scientific	96
Fitz Chem Corp.	166	Troy Corp.	69
Fostoria Industries, Inc.	78,91	UCB Radcure	139
Franklin Industrial Minerals	51	Unimin Specialty Minerals	141
FSCT Order Form	98	Van Waters & Rogers	184
Gamry Instruments, Inc.	92	R.T. Vanderbilt Co.	71
		Western Equipment Co.	147

NOTE: The Advertisers' Index is published for the convenience of our readers and as an additional service to our advertisers. The publisher assumes no liability for errors or omissions.

Among the odds and ends scavenged from "Newsclips" in the *C&E News*, by Bob Athey, was "Words Out of Context":

"Beer advertisings' detractors are entitled to their opinion, of course, and have every right to voice their discontent.

What these critics do not have the right to do, however, is impose their will on the rest of us.

To justify their desire to restrict beer ads, the would-be censors often claim that beer advertising causes abusive or underage drinking. The scientific evidence doesn't support their claim, however. Watching a beer ad doesn't cause a person to drink any more than watching a detergent ad causes a person to do laundry."

Bob notes, "This cantankerous person wishes he'd said this."

✓ x ✓ x ✓ x ✓

And speaking of ads, my friend Sol Schoenbach adds the following to Art Tractor's October 1996 list of crazy one liner ads with these nutty "authentics":

—We will oil your sewing machine and adjust tension in your home.

—Dog for sale: eats anything and is fond of children.

—Get rid of aunts. Zap does the job in 24 hours.

—Used cars: Why go anywhere else to be cheated? Come here first.

—Illiterate? Write today for free help.

—Wanted: Man to take care of cow that does not smoke or drink.

—Stock up and save. Limit one.

✓ x ✓ x ✓ x ✓

Included in *Surface Coatings Australia*, Larry Hill's entertaining column, "Overspray" in August was this interesting analytical session:—

"I don't know what to do," a woman said to her therapist. "I love him. He loves me. We like the same books, the same food, the same movies, the same hobbies. When we're apart, we're both miserable."

"It sounds like you two were made for each other," the counselor responded. "I don't see the problem."

"The problem?" the woman wailed. "What am I going to tell my husband?"

✓ x ✓ x ✓ x ✓

From Dick Kiefer, some "real" stories of the non-technically inclined.

• 1st Person: "Do you know anything about this fax machine?"

2nd Person: "A little. What's wrong?"

1st Person: "Well, I sent a fax and the recipient called back to say that all she received was a cover sheet and a blank page. I tried it again and the same thing happened.

2nd Person: "How did you load the sheet?"

1st Person: "It's a pretty personal memo and I didn't want anyone to read it by accident, so I folded it so only the recipient would open it and read it.

• Tech Support: "What does the screen say now?"

Person: "It says, 'Hit Enter when ready'."

Tech Support: "Well?"

Person: "How do I know when it's ready?"

• My friend called his car insurance company to tell them to change his address from Texas to Vermont. The person who took the call asked where Vermont was. As he tried to explain, the person interrupted and said, "Look, I'm not stupid or anything, just what state is it in?"

• Several years ago we had an intern who was not too swift. One day he was typing and turned to a secretary and said, "I'm almost out of typing paper. What do I do?" "Just use copier machine paper," she told him. With that, the intern took his last remaining blank piece of paper, put in the copier and proceeded to make five blank copies.

• I called a company and asked to speak to Bob. I was told, "Bob is on vacation. Would you like to hold?" More next time!

✓ x ✓ x ✓ x ✓

And this, from Dick Mullen, slightly edited as I heard it some time ago:

If a man speaks in the forest and his wife doesn't hear him, is he still wrong?...Aside to Dick: Tell your wife it was my fault.

✓ x ✓ x ✓ x ✓

If you will forgive me, now to something more serious and personal.

Dave and Doris Platt, my very old friends, have been longtime contributors to this column; Dave with his nonsense and Doris with her poetry. Sadly, Doris died in July and left these lines:

How often we wish for another chance

To make a fresh beginning.

A chance to blot out our mistakes

And change failure into winning.

And it does not take a New Year

To make a brand new start.

It only takes the deep desire

To try with all our heart

To live a little better

And to always be forgiving,

And add a little sunshine

To the world in which we're living.

So never give up in despair

And think that you are through,

For there's always tomorrow

And a chance to start anew.

—Herb Hillman, *Humbug's Nest*,
P.O. Box 135, Whitingham, VT 05361.

NOW AVAILABLE
LUXATE®
ALIPHATIC
ISOCYANATES

Enhances high solids, waterborne,
powder & conventional
coatings

Peak Performance

Improve your next formulation with these ARCO Chemical products:

ARCOSOLV® P-Series Glycol

Ethers & Acetates

- Non-HAPs listed solvents
- Not on SARA Title III, Sec. 313
- Low toxicity
- Excellent solvency
- Broad evaporation rates

NMP (N-Methyl-2-Pyrrolidone)

- Powerful, aprotic solvent
- Non-HAPs listed
- Recyclable & biodegradable

MPDiol® Glycol

(2-Methyl-1,3-Propanediol)

- Reactive monomer with unique non-crystallizing properties
- Produces low viscosity resins
- Offers flexibility while maintaining hardness

T-HYDRO® Solution, or TBHP

(Tertiary-Butyl Hydro-Peroxide)

- Safer handling
- Low cost, free radical initiator

SAA-100™/101™/103™*

Resinous Polyols

- Improved adhesion
- Higher gloss
- Improves water and chemical resistance

Allyl Propoxylate

- Low toxicity monomer
- Lower VOC intermediates
- Lower viscosity resins

**Developmental product*

For technical information or formulation assistance, in the U.S. and Canada call:

1-888-880-ARCO

www.arcochem.com

ARCO Chemical



ARCO Chemical Company

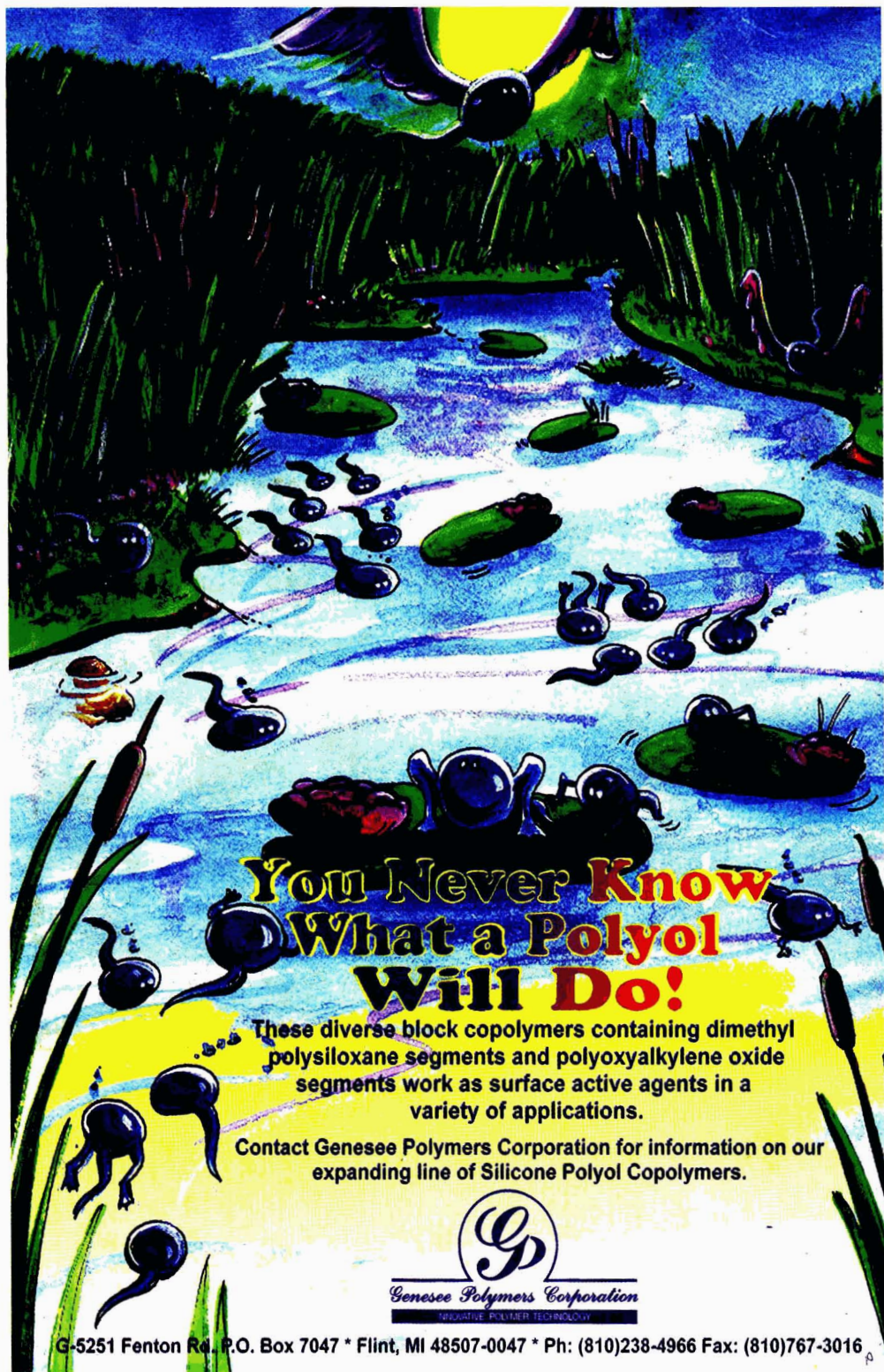
World Headquarters
Newtown Square, PA, USA
Phone: (610) 359-2000
Fax: (610) 359-2722

ARCO Chemical Europe, Inc.

Maidenhead, England, U.K.
Phone: (44) 1 628-775000
Fax: (44) 1 628-775180

ARCO Chemical Asia Pacific, Ltd.

Hong Kong
Phone: (852) 2882-2668
Fax: (852) 2840-1690



You Never Know What a Polyol Will Do!

These diverse block copolymers containing dimethyl polysiloxane segments and polyoxyalkylene oxide segments work as surface active agents in a variety of applications.

Contact Genesee Polymers Corporation for information on our expanding line of Silicone Polyol Copolymers.



Genesee Polymers Corporation
INDUSTRIAL POLYMER TECHNOLOGY

G-5251 Fenton Rd., P.O. Box 7047 * Flint, MI 48507-0047 * Ph: (810)238-4966 Fax: (810)767-3016