Greetings from your Chairman!

The IMF World Economic Outlook predicts advanced economies are out of recession and are expected to see modest growth. Here at home, the near-term construction rate is still negative but the rate of decline is leveling off. Automotive sales in October were up versus last year but expected to be flat thru the end of the year. Saint Louis beats Texas in Game 7. We had a successful CAD RETEC® in Lombard, IL yet Color and Appearance Division (CAD) membership is decreasing. So is the glass half full or half empty?

The consensus is that all of you who read the newsletter know the benefits of being a member of CAD and have profited from them in one way or another. It’s my opinion that we need your help in sharing the benefits with those who need them most (technicians, sales staff, new hires, etc.)

Key benefits of CAD Membership

- Conference Networking
- Contacts and Technical Information
- Current Events Schedules
- Social Media Interaction
- Scholarships & Educational Tools

The CAD is not interested in growing just for the sake of growth in numbers. The growth target is more in line with that of the Human Development Index (HDI). - Expansion in life expectancy, literacy, education, standard of living & better color calculations 😊... We want to stay vibrant, provide value and be relevant as an association and an industry. Education is the most basic approach to accomplishing this goal.

In addition to educational benefits provided by CAD there are other options. The CAD has been the force behind Terra Community College’s Coloring of Plastics Program for over 20 years. One aspect of the program that can benefit the less experienced members of our workforce is its internet-based, three-course certificate program. It has relatively low cost, no travel, and is very flexible. It can be completed when convenient. Inside this newsletter CAD’s Distinguished Fellow of the Society, Bob Charvat highlights the benefits of these courses. continued on page 2
There is also an advertisement that provides the details for the next set of courses that start in January.

The fact is, we all know at least one technician, new hire or sales representative... that could profit from the resources provided by being a member in the CAD or a TCC program. Our company, association and industry would benefit.

The “take away” - Make a difference – sponsor a new member and/or send an employee to a TCC course. I will and we can talk about how it worked out next year in Louisville (the 50th Anniversary of CAD RETEC®).

In regards to the idiom, we are a glass half full organization.

Best Regards,

Scott Heitzman
CAD Chairperson

PS Our new Chair-Elect: James Figaniak will conduct elections for the Color and Appearance Division Board of Directors and Division Councilor. If you or someone you know is interested please contact Jim at jim.figaniak@ltlcolor.com or call at 215-736-1126

Annual Board Elections of Color & Appearance Division
Deadline for Nomination Submissions: January 6, 2012

The Color & Appearance Division of the SPE will be conducting its annual board elections in February 2012. The election is open to SPE members with CAD as their primary division. Time commitment is four meetings per year including those held at ANTEC® and CAD RETEC®, and participation in CAD activities and initiatives. If you are interested or would like to nominate a colleague, please contact Jim Figaniak at the noted email address or phone before January 6th. Nominate a Colleague by emailing Jim Figaniak jim.figaniak@ltlcolor.com or call him at: 215-768-0769.

Submit your nomination now!

Disclaimer:
The information submitted in this publication is based on current knowledge and experience. In view of the many factors that may affect processibility and application, this data/information does not relieve processors from the responsibility of carrying out their own tests and experiments; neither do they imply any legally binding assurance of certain properties or of suitability for a specific purpose. It is the responsibility of those to whom this information is supplied to ensure that any proprietary rights and existing laws and legislation are observed.
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**COUNCILOR’S REPORT**

The Council meetings at ANTEC® were held on May 1, 2011 in Boston, MA. Two meetings were held, the morning meeting being the completion of the 2010/2011 Council year and the afternoon meeting was the first meeting of the 2011/2012 year. This summary covers both meetings. The change in leadership of SPE takes place at the ANTEC® Council meetings, so they are an opportunity to recognize the leadership completing their terms and look forward to the new leadership.

After a difficult 2009 for the organization, 2010 has been more positive, as both membership and revenue increased. For the first time since 2007, membership rose above 15000. Additionally, the first quarter of 2011 looks promising and is on track to be the best first quarter since at least 1999. The revenue for ANTEC® is up substantially and revenue from webinars is up 33% over the same period last year.

At the time of the Council meetings, ANTEC® 2011 looked promising as well. The registration revenues met budget almost a week before the conference was due to start which is unusual, as normally, on-site registration revenue is required to meet budget. During ANTEC®, Color and Appearance Division was recognized as a Communication Leader, the highest level of the Communications Excellence Award, and with the Pinnacle Gold, the top level of the Pinnacle Award. Additionally, sponsored by the Color and Appearance Division, Earl Balthazar was recognized as an Honored Service Member of the Society.

EUROTEC 2011 is scheduled to take place in Barcelona, Spain in November. This will be the first ANTEC®-style conference sponsored by SPE to take place in Europe.

The Proposed Alternative Operating Method (PAOM) has been renamed Strategic Planning, with the goal continuing to be a push of operations to the most local level and then charge for services which cannot be handled on a local level. The effort has been broken into sub-teams: Strategic *(which is looking longer term)* and Operational *(which is more tactical)*. As part of this discussion, there was also a discussion about a Financial Stimulus program for member groups *(sections and divisions)* which are struggling financially and have not met the eligibility requirements for the annual rebate. While CAD historically returns their rebate to the organization, CAD was among the member groups which objected to the stimulus as it appears to devalue their efforts to support SPE.

Sandra Davis

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**WANTED: HISTORIC CONFERENCE SEeks LEGACY MEMBERS**

In 2012, the Color and Appearance Division of SPE will celebrate 50 years of coloring plastics. This milestone would not have been reached without the hard work and dedication of many people. While some of these people are still actively involved in the business of coloring plastics, there are many more people who have moved on to other endeavors. The organizing committee for the 2012 SPE CAD RETEC® would like to reach out to as many legacy members of the color industry as possible.

If you know of someone who is a legacy member, we would like to share the conference details and encourage attendance. Please contact conference chairperson, Sandra Davis at sandra.p.davis@usa.dupont.com or 302-999-2540.
Keystone Aniline Corporation offers a comprehensive range of high-quality products to satisfy your specific color needs and applications.

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- Global Technical Support
- Global Regulatory Compliance

Product certification (FDA, CONEG, AP89, EN71, REACH Ready, etc.) as required

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SPE CAD RETEC® 2012
50 Years of Coloring Plastics
Louisville Marriott Downtown
Louisville, KY
September 30-October 2, 2012

Be part of this milestone occasion by contributing to the premier forum dedicated to the coloration of plastics!

Contacts:
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CAD RETEC® Technical Program Co-Chair  
Phone: 423-323-2202  
jchemie@aol.com

Jeff Drusda  
CAD RETEC® Technical Program Co-Chair  
Silberline Manufacturing  
Phone: 570-668-8321  
Fax: 570-668-4227  
drusdaj@silberline.com

Abstract Deadline: February 2012
CAD RETEC® RECAP – ‘Blown Away By Color’ in Chicago – 2011

Even though it is 49 years old, our annual CAD RETEC® shows no signs of aging or slowing down. The conference once gain lived up to its billing as The Premier Technical Conference dedicated to the coloration of plastics. Right from the opening reception where we were serenaded by Color Eye Blind to the closing draw for the iPad (as well as numerous other prizes), attendees were kept entertained, excited and engaged. The Oakbrook area (suburban Chicago) proved to be an excellent location in attracting both local attendees as well as those from across the continent and some from overseas. Attendance increased again this year to over 400 attendees with almost 75 ‘first time’ attendees. Over 40 golfers participated in the Sunday golf outing as well.

We implemented interesting and well received additions to the program in the form of two panel discussions. The first discussion on ‘Color Delivery Forms’ educated the audience about the various advantages and limitations of masterbatch, concentrate, liquid color, dry color and color compounds. The second panel discussion on the following day brought insight into how both color suppliers and color producers assess and manage supply chain risk. A summary of this panel discussion is the technical article for this newsletter.

Bob Charvat’s ‘Color Tutorial’ was held on the Sunday and was well received by a full class of individuals interested in gaining a basic perspective into the coloration of plastics. Despite the rain on the Tuesday morning and some rather ‘robust’ activity in the hospitality suites the night before, the Fun Run saw a healthy turnout of both walkers and runners and raised over $1000 for the local DuPage County Habitat for Humanity. The CAD RETEC® has now raised well over $20,000 since the inaugural Fun Run in 2005. The exhibit area again proved popular and was busy from opening to closing each day. Vendors and customers enjoyed ample opportunities to network during the numerous technical session breaks and during the ‘Networking Reception’ on the Monday evening.

No recap can be complete without noting the significant volunteer effort that went into making this CAD RETEC® successful. Most conferences of the CAD RETEC® nature are organized by paid staff members. Consequently, the fees to attend these conferences are significantly (sometimes two to three times) higher. Because CAD RETEC® uses volunteer efforts to organize everything including the Technical Sessions, the Golf Outing, the Registration and the hotel arrangements, we develop some significant value. Those efforts, plus the contributions from the 18 sponsors allow the CAD to produce a ‘top shelf’ conference at a very reasonable attendance cost. Special thanks to all those volunteers and to the sponsors that contributed to a very successful CAD RETEC® this year.

Howard Kennedy
Terra State Community College is located in the Northwest Ohio town of Fremont. Terra is a typical community learning center for many disciplines, but for plastics technology it is a very special. Not only does Terra have a full functioning plastics laboratory, it has a unique and sophisticated color matching and color compounding laboratory that rivals many four year colleges. Students are trained by knowledgeable full time and part time faculty. The Color and Appearance Division (CAD) of The Society of Plastics Engineers (SPE) has heavily supported the program by providing financial, as well as technical support. This industry contribution assures the curriculum remains technically accurate and up-to-date.

Obviously, not all of the coloring of plastics industry is within easy reach of Terra, but that doesn’t mean its courses can’t be utilized by anyone in the industry. This article will highlight an underutilized educational opportunity for some members of our industry. A very distinctive feature of the Terra plastics program is its ability to provide “distance learning” (online) courses to students who may reside too far from the Fremont, Ohio campus to participate in full time day or evening classroom activities. This distance learning program has successfully served students globally, as well as locally, for several years.

We all know people within the industry (technicians, sales staff, new hires, etc.) that have no color education to speak of. One aspect of Terra’s program that can benefit many of the newer, or under-educated, members of our industry is this internet based, three course certificate program. It is a relatively low cost, no travel, flexible program that the employee can complete anywhere, on their schedule. The three courses provide solid background knowledge for anyone working in the many segments of the coloring of plastics industry. The three courses are:

- **Introduction to Color**
  - Introductory course on color theory
  - Basic background knowledge for anyone working with color

- **Colorants for Plastics**
  - The study of colorant types and their incorporation into polymer materials
  - More in depth treatment than in Intro Class

- **Introduction to Plastics**
  - Introductory course on plastics
  - Polymer types, properties and processing

As color professionals know, the more knowledgeable our workforce is about technical matters the better they can perform their jobs. The courses are an excellent opportunity for newer color matchers, quality control technicians, production technicians, and others to learn more about the coloring of plastics. These courses are also good for people with industry experience, since many of them have learned on-the-job. This is a good opportunity for them to learn the theory behind what they do every day. Students completing this certificate can expect benefits including:

- Understanding of color terminology
- Accurate color communication
- Quicker color matches
- Better understanding of colorants and their use
- Prevention of color problems
- Solve color problems quicker
- Quicker batch corrections in production
- Better understanding of color at processors
- Cost savings

Please identify colleagues who could benefit from these Terra courses and recommend that they consider enrolling in them. It would not only be a benefit to them, but to their companies and to the industry as a whole. Also, it would be a benefit to the Terra program, as it is always looking for good students to keep it viable. Please see accompanying ad for details of individual course costs and schedule.

Sincerely,
Bob Charvat
CAD Board Member, Adjunct Faculty
Terra Community College

SPE CAD NEWS, Winter 2011
On-Line Plastics and Coloring of Plastics at Terra Community College

Terra Community College’s Coloring of Plastics Program now offers three Internet-based courses available from any computer connected to the Internet anywhere in the world.

These affordable courses will be in a completely distance format—no on campus time involved. They are designed for students who find it difficult to attend regularly scheduled classes on campus due to distance or time constraints.

Advantages include:

- Complete Terra’s basic Coloring of Plastics technology Certificate Program with these three classes.
- Receive a solid foundation for understanding how to color plastics.
- Perfect for processors who must understand color to produce plastic parts to customer specifications.
- Designed to provide valuable color knowledge to QC technicians, operators, production engineers, or anyone else who needs to work with the coloring of plastic parts.
- Longer programs of study up to two year Associates Degrees are available.

Distance Learning Courses Offered

Section VL PET 1100 Introduction to Plastics (3 Credits)
Fees: $400 Ohio students/$600 out-of-state
Books: approximately $200
Offered Fall 2011: (August 22—December 16)
Offered Spring 2012: (January 9–May 1)

Section VL PET 1240 Introduction to Color (3 Credits)
Fees: $400 Ohio students/$600 out-of-state
Books: approximately $200
Offered Fall 2011: (August 22—December 16)
Offered Spring 2012: (January 9–May 1)

Section VL PET 2320 Colorants for Plastics (4 Credits)
Fees: $500 Ohio students/$790 out-of-state
Books: approximately $150
Offered Spring 2012: (January 9–May 1)

Why is Terra the Right Choice?

Terra Community College is a two-year accredited, state-supported, commuter college. Its mission is to provide students with the opportunity for quality learning experiences that are both accessible and affordable.

Many options are offered for those who desire to take one course or a full curriculum leading to an Associate Degree. Students who wish to continue their education may transfer credits to a four-year college or university.

Terra maintains a strong commitment to provide state-of-the-art equipment, facilities, library, and instructors that give the students a quality technical education and a competitive edge in the job market.

In addition to the quality courses that are offered, Terra is the only technical college in the U.S. that offers the Coloring of Plastics program. TCC Plastics courses are designed to be flexible to work around the schedules of working adults.

For more information, contact Jamie Przybylski, Program Professor at 419.559.2459 or toll free 866.A1.TERRA, ext. 2459 or email jprzybylski@terra.edu.
Supply Chain Risk Assessment, A Must in Today’s World
By: Larry Nitardy, ComAssist and SPE CAD BOD Member

Powered by the changing landscape of the plastics colorant supply chain over the last several years, many companies have found their operations short on raw materials, and challenged to make routine commitments to their clients. From natural disasters, off-shore sourcing, stretched delivery distances, and reductions in inventories and manufacturing capacity, the supply chain has impaired share competitiveness and hampered chances to expand businesses. Certainly a new set of supply chain risks have risen in the last decade and now must be dealt with to prevent significant negative impact on your business.

So with this backdrop, your CAD Board of Directors decided to take a bit of a risk ourselves, and hosted a forum on “Supply Chain Risk Assessment” at CAD RETEC® in Lombard, IL, this September. We were glad we took that risk because the feedback was so positive that we thought it appropriate to bring some of the discussion and comments to you in this newsletter.

We were very fortunate to get agreement from three well-versed supply chain specialists in our industry to serve as our panel: Mr. John Andrews, CEO, Keystone Aniline Company, Chicago, IL; Dr. Mark Vincent, VP of Sales, Marketing and Technical, Dominion Colour Corporation, Toronto, ON; and Mr. Brian West, VP of Color Technologies, Techmer PM, Clinton, TN. The panel’s objective was to provide insights on how to minimize current risks and avoid others. Each panelist took time to share his insights on today’s supply chain risks, citing a specific case or two that recently impacted his business, explain how his company overcome the problem, and what the company is doing, or recommending, to prevent it from reoccurring.

Below is a recap of the forum. I hope it provides some sound ‘take-aways” for you and your company. As you read the remainder of this article, think of the unexpected business disruptions you have experienced due to your supply chain performance in the last year or two, and whether or not you have effectively addressed the risk in it.

ISSUES THAT CREATE RISK IN SUPPLY CHAIN:

Brian, Mark and John provided an interesting set of contributors to the recent supply chain crisis. Some we would all assume, but others not so much. Let’s look at capacity first. Here are a few examples of causes for the reduction of capacity of certain raw materials. One was the impact from governmental and environmental regulations. The recent enforcement of environmental regulations on the pigment and dye manufacturing industry in China significantly reduced the supply of certain colorants. In reviewing a detailed case of the conditions of Phthalo Blue in a particular region in China, Dr. Vincent warned that everyone must become educated with the entire supply chain for their pigments. The resulting impact of regulations to clean up the environment was the elimination of the discharge of many small to medium size manufacturers. Good for the environment, not so good for the supply. Mark demonstrated that lead times have climbed to three to five months on certain Phthalo Blue and Green pigments. Most important, the supply chain can be turned off without notice when the pigment supply is out of balance, to the point that all the materials will be consumed locally. Another example given for capacity reduction was of economically pressured managers who have inadvertently chosen to add risk to their supply chain by, as Dr. Vincent calls it, their “addiction to short term lowering of costs”.

continued on page 11
This discussion helped us understand the plant closings and drastic capacity reduction of some pigment chemistries. This under capacity, along with power shortages at other plants due to the diversion of limited power to such events like the World Expo and Olympics, resulted in several pigment chemistries becoming tight. This impinged on all tiers of the supply chain, right up to the processors who couldn’t deliver products to their consumer markets.

What about inventory levels? Recent belt tightening has reduced inventory levels at all points in the supply chain, which has caused the pipeline for some pigments to simply “dry up”. According to Brian West, product rationalizations and manufacturing relocations also contributed to the shortage of inventory in the pipeline. He added that divestitures and mergers resulted in the overall reduction of production facilities. Hence, more inventories could be taken out of the system. All in all, Brian stated that suppliers were too aggressive in their inventory reductions, both offshore and domestic.

John Andrews added that it is very important to understand the patent issues related to sourcing off-shore in this long supply chain. Additionally, he continued that it is even more important to understand the health and safety inventory registration requirements of each sourcing region, such as TSCA in the US and REACH in Europe. Millions of dollars in fines can be imposed when producers substitute products that are only slightly different. John also pointed out that issues such as anti-dumping regulations on products like Pigment Violet 23 and disulfonated stilbene optical brightener need to be understood as prices of these products could go up exponentially overnight. Add monetary policies such as the manipulation of the value of the Yuan against the US dollar, can result in the real threat of price instability.

As for natural disasters, how do they fit in? Paul Snell, reporting in the summer 2011 edition of CFO Agenda, provided some food for thought for our discussions. It may seem to many that there has been an abnormal number of disruptions in supply due to natural causes recently, but there is evidence that is not the case. Brian Squire of the University of Bath reported recently that there is no identifiable trend in the data showing that the disruptions are getting more or less severe. Rather he points out that it is the impact of the disruptions that is certainly more severe, due to the increase in length and complexity in our supply chains. Risks are on the increase as more businesses adopt a “lean” approach, using fewer suppliers in their supply chain and sometimes becoming single sourced. We have recently seen the impact of that risk when a natural disaster or disruption does occur. Further, Tim Lawrence, Managing Consultant at PA Consulting says that the true test in supply chain risk management will be the impact on organizations when, and if, a similar disruption happens again. In other words, will companies adjust their supply chains (manage their risks) in a manner that changes the potential impact of such disruptions. Needless to say, we all must determine the economic risk of the decisions we make. We must be prepared for the possibility of a natural disaster, with contingency plans, to have adequate control of our supply chains.

IMPACT OF RISK IN THE SUPPLY CHAIN:

So to summarize the impact and highlight the risk that these issues place on our companies, we can look at three business considerations: operational, image and financial.

The operational risks of a highly leveraged supply chain could be classified into safety, quality and choice issues. Safety is affected when a company is thrown into a “quick change” syndrome, moving to use unqualified materials or services in a rush, perhaps to keep its products moving out the door versus defaulting on customer orders. Certainly we can see where product quality can become questionable when a substitution is made with a quickly identified alternative, which was not adequately tested. Finally, choice is minimized when companies can be forced to operate at the will or consent of others who hold undue control over their compromised supply chain. The lack of flexibility, a safety concern that develops, or a series of defaults on order deliveries can hurt the image of the company. They can hurt both the trust factor that companies have earned, and the brand loyalty of their products and enterprise. In essence, serious disruptions to the supply chain can cast a poor image on an otherwise well trusted and branded company.

Financial impact is more quantifiable and a review of the depth of the issue may be helpful here. The impact is potentially very large. Following is a list of some of the issues mentioned at our forum:

continued on page 12
1) Lost revenue from current customers, caused by
   - missed, and/or transferred orders
   - inability to gain new share/compete for new business
   - “settlements for failures to deliver”, guarantee payments
   - lost incentives for volumes shipped,

2) Lost revenue from new customers
   - Inability to compete for new share

3) Lost margin
   - higher, unexpected materials costs
   - cost of unutilized/underutilized capital resources, idle time
   - reaction costs
     - rushing/expediting
     - communicating/communications to overcome conditions
     - opportunity costs, inability to react, reacting fast, later, etc.
   - inefficiency costs

No two companies are exactly the same, but all companies have built in risks associated with how they buy, who their suppliers are, and the breadth and width of its supply chains. Each company should identify the impact of disruptions to its supply chain, both in terms of financial and more intangible costs. They must then determine what choices they can make to move to a level of supply chain risk that they are comfortable with.

So what can be done to minimize, or mitigate these risks? Our panel had some great ideas, and several are shared with you here.

All three of our experts suggested companies take a direct look at their inventories, and the commitments of inventories, in their supply chain. When additional inventories are considered appropriate, the specific inventories to be increased must result from negotiations between the parties within the supply chain.

Dr. Vincent suggested developing skills to manage supply chains with longer and longer lead times. According to Mark, this requires better forecasting of requirements, higher inventory levels in the system, attention to growth planning and ensuring it is incorporated into the supply chain forecasts, working closely with all suppliers, and maintaining a viable western source as a contingency supplier. Mark repeatedly emphasized the risk in managing for short term cost reduction versus long term stability in the supply chain. A balance has to be achieved to prevent disruptions caused by one’s own policies and practices.

Brian West outlined an array of items that add flexibility to one’s supply chain. Brian suggested looking at alternative vendors and grades of materials, and to qualified secondary suppliers. Keeping the number of specified items to a minimum is also recommended. Keep specified items where they are required today, and employ non-specified items wherever possible. Perhaps most important, Brian stated that we must understand our customers’ need every step of the way, and work with them to develop supply chain solutions in advance of disruptions. This includes anticipate and test future business conditions and activities and forecasting results of disruptions and building contingencies for them.

John Andrews says companies need to know their suppliers and their capabilities in-depth. There should be an understanding of their quality risks, operational style and organizational make-up; the impact of regulations on their business and status in meeting regulatory and environmental regulations; and their logistical capabilities. Do suppliers manufacture their own products or broker/sell for others? What test methods are they using to ensure the quality you command in the arrangement? How do they guarantee consistency of both quality and supply? John also...
warns that it is imperative to know the ownership of your suppliers. Are they financially strong, properly capitalized, and do you know they will be there tomorrow? Finally, John suggests that you understand the logistics system used in your channel. For example, will it be disrupted when higher demands might be placed on it, such as need for transporting food and shelter when disasters occur?

Taking time to do a risk analysis of your own supply chain is necessary if we are to prevent disruptions of the proportion we have experienced in recent years. It doesn’t matter what the cause of the disruption is, scenarios need to be developed and forecasts of their impact made, monetized, and compared against the costs of shifting to a lower risk position.

No supply chain can be 100% risk free, but if you don’t understand your own risk, it would be worthwhile for you to determine what it is. Contact a professional for assistance on how to conduct an analysis of your risk. The need for risk management within the supply chain is so important, that there are professionals who now specialize in helping others study their own supply chain risks.

SUPPLY CHAIN RISK ASSESSMENT PANEL

Left to right: Larry Nitardy, John Andrews, Mark Vincent and Brian West
SOCIETY OF PLASTICS ENGINEERS
ENDOWMENT SCHOLARSHIP PROGRAM
FOR THE 2012 – 2013 SCHOOL YEAR

The Endowment Scholarship Program offered by the Color & Appearance Division of the Society of Plastics Engineers awards up to five scholarships each year to students who have demonstrated or expressed an interest in the coloring of plastics industry. The students must be majoring in or taking courses that would be beneficial to a career in this industry. This would include, but is not limited to, plastics engineering, polymer science, coloring of plastics, chemistry, physics, chemical engineering, mechanical engineering, industrial design and industrial engineering. All applicants must be in good standing with their colleges. Financial need is considered for most scholarships.

Undergraduate and graduate scholarships range up to $4,000 annually. Scholarships are awarded for one year only, but applicants may apply for a re-award for each year they are enrolled in school.

Scholarship Eligibility
1. Applicants for these scholarships must be full-time undergraduate students in either a four-year college or a two-year technical program or enrolled in a graduate program.
2. All applicants must be graduates of public or private high schools.

Scholarship Criteria
1. Applicants must have a demonstrated or expressed interest in the coloring of plastics industry.
2. Applicants must be majoring in or taking courses that would be beneficial to a career in the coloring of plastics industry.
3. An applicant must be in good academic standing with his or her school.
4. Preference is given to student members of SPE and also to students who have a parent(s) as a member of the Color & Appearance Division of the SPE.
5. Financial need of an applicant will be considered for most scholarships.

Application Procedure
To be considered for a scholarship from the Color & Appearance Division Endowment Scholarship Program, applicants must complete an application available at WWW.SPECAD.org and return it to the address specified on the application by June 15, 2012. All applications submitted must include:
1. A completed application form.
2. Three recommendation letters: two from a teacher or school official and one from an employer or non-relative.
3. A high school and/or college transcript for the last two years.
4. An essay by the student (500 words or less) telling why the applicant is applying for the scholarship, the applicant’s qualifications, and the applicant’s educational and career goals in the coloring of plastics industry.
The Color and Appearance Division regularly holds Board of Director (BOD) meetings at the ANTEC® and the CAD RETEC®. In addition, a Summer BOD meeting is typically held about 6 weeks prior to the next CAD RETEC®.

The Summer meeting is scheduled in various locations. A Winter BOD meeting is held in January. The Winter meeting is typically held at a site of a future CAD RETEC®.

Any SPE CAD members who wish to attend are welcome at these meetings. If interested in attending the next Board meeting, please contact the Division Chairperson for more information.

Events include:
Sunday evening reception at Glassworks, a working art glass studio

Two days of technical programming focused on the hottest topics in plastics coloration

Exhibit hall with more than 50 exhibitors

Networking reception – an opportunity to mingle with others involved in coloring plastics

New Technology Forum – the newest information from suppliers

Be part of this milestone event
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This Color Mischief starts with a question.

When a color matcher states a sample is “opaque”, just what does the color matcher mean?

The reason for this discussion is that Visual and Instrumental Opacity ARE NOT THE SAME!

It all relates to communications and evaluations that are completely understood and agreed upon. In the case of instrumental measurement of opacity, there are a number of specific spectrophotometric evaluation procedures one may follow. The data from these tests clearly (pun intended) result in a specific number related to a samples “instrumental opacity”. These test procedures specify exactly how the sample should be presented to the measuring instrument, the sample thickness, the calculation algorithms etc. This is very straightforward. The contrast ratio, measurement over white and black backgrounds is a very popular method to determine opacity. What isn’t very popularly understood is that the interface between the sample, the white and particularly the black backing must be air free.

On the visual side of the opacity issue, the field is wide open to variations that lead to misinterpreting the real opacity of a sample. Examples are, holding the sample up to a light source and visually determining if the light from the source is visible. Usually, no qualification of the source power is considered. Compare this to holding the sample up to direct intense sunlight on a cloudless day leading to wildly different results. These are just two examples of very misleading attempts to visually qualify opacity of a sample. Outrageous to say the least.

Finally, let’s describe a real situation to firmly illuminate the issue. A film sample was carefully examined using a fully calibrated spectrophotometer that produced data showing the sample was “instrumentally opaque”. That same film when placed upon a printed page let a visual observer easily read the page script with no difficulty whatsoever. So what is the opacity of this particular sample? From this description, no one actually knows!

What’s the takeaway from the above discussion? When opacity is an issue all participants involved MUST be on the same page on what truly is being decided! Clear complete communications are the answer.

As usual, this article is submitted anonymously to protect/hide the guilty!

Look for more Color Mischief in the next CAD Newsletter

The Color and Appearance Division (CAD) is committed to the publishing of at least three newsletters a year (four, if there is sufficient material to justify the extra issue). To that end, we would like you to think about the financial side of sponsorship of the newsletter. For the small donation of $300 per year, we offer a business card sized (2” x 3.5”) mention in our newsletter, which goes out to the nearly 1,500 members of the CAD as well as other SPE division members. These are people active in every aspect of plastic coloring and additive technology. Larger sized spots are available at a commensurate increase in rate.

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