

Achieving the Perfect Finish



By April Ruble-Nichols
CSC Estimating Manager

Providing a beautiful, perfectly matched factory finish sample is the gateway to achieving desired wood veneer doors for every opening. VT Industries' process is explained for achieving factory finish samples for the approval of distributors, general contractors, owners and architects on a variety of projects.

VT has eight standard colors readily available and can be used by distributors for architectural approval on a continual basis. VT stocks all standard colors in 3" x 5" box sets, as well as 8-1/2" x 11" samples that can be sent anywhere within the same business day if necessary.

CUSTOM COLOR SAMPLES

VT also offers custom color matches to suit any architectural masterpiece. The fun really begins once an architect has selected a color they want their doors to match. VT matches an average of 2,000 custom colors each year, which equates to an average of 8.3 custom colors per day.

When VT receives a control sample, a new sample is produced to match. VT's standard is to submit samples for architectural approval on 8-1/2" x 11" samples comprised of the specified veneer hot pressed onto a 3/8" MDF backer. Each sample comes with a protective VT sample jacket, labeled to indicate the veneer on the sample, as well as the custom factory finish color number for approval.

VT stocks a variety of sample boards, so once a physical control sample is received, the matching process begins.

SOMETHING IN COMMON

Who could guess what VT and some major U.S. metropolitan areas have in common? Both use a Spectrophotometer! Many metropolitan areas use their "Spectro" machine when graffiti is reported to match the building's original paint/finish color to paint over and immediately eliminate the graffiti. Many major U.S. cities who use this system have reported resounding declines in defacement and graffiti on their inner city historical buildings.

VT has been utilizing a Spectro machine to aid in matching custom color samples for nearly two years. When manufacturing has their sample boards and control sample ready to match in the dust-free sample room, they scan the control sample into the Spectro, which flashes light onto the control sample.

The machine measures the percent of light reflected back from the control sample in specific 20 nanometer (NM) increments. A nanometer is 1/1,000,000th of a meter, and it measures the wavelength that measures the distance from peak to peak on the physical control sample. The Spectro will retain this color reading.

The next step is to apply VT's top coat and sealer to the unfinished veneer sample. The boards are

then scanned into the Spectro so it can deduct the natural colors within the wood to assist in calculating the custom color match.



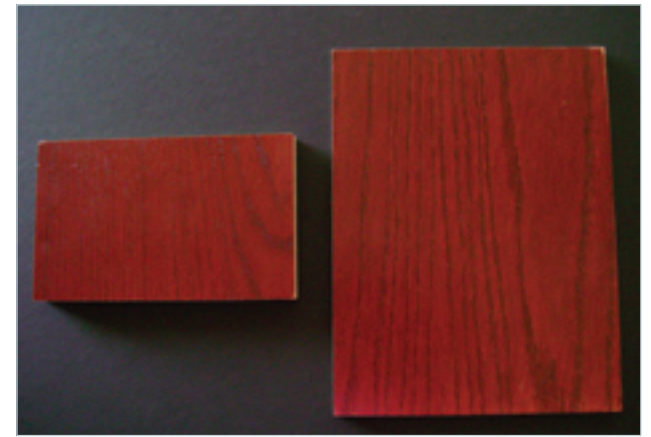
Spectrophotometer

Once the Spectro has read both the physical control sample as well as the specified veneer, it will give VT technicians the formula for the closest starting point to match the color. VT has trained specialists whose sole responsibility is to tweak and match custom finish colors. The actual matching process is very involved and can take several tries to achieve the best and most accurate color overall.

WATER-BASED PIGMENT

VT factory finish samples are made with water-based pigments — no alcohol dyes are used. Water-based pigments are used because they have outstanding transparency, which allows the natural graining of veneers to stand out and not be covered up. Pigments also have high color, strength and brilliance. Along with superior fastness properties compared to dyes, liquid pigments provide for accelerated preparation and are easy to handle. VT provides beautiful yet durable factory finish samples that consistently match doors because of consistent quality and excellent sedimentation.

In order for VT to provide samples that are exact duplicates of what doors will look like, samples are produced using an exact replica of the door finish line. Upon achieving the exact formula for the custom color, the stain is loaded into the stain applicator line. The sponge roller applies the stain and then the brushes smooth and take off the excess stain. The samples are then dried in a forced heated air oven. The next step is to apply the top coats and sealer to the samples. The final step is for the samples to be UV-cured. This process is an exact duplicate of the process doors go through to get finished, right down to the distance between the sponges and brushes on the sample line versus the door line.



Comparing the samples is an important step.

EXACT MATCH

Upon formulating and producing an exact match of the physical control sample, VT will process and provide the exact quantities of samples requested. After producing the final samples for approval, VT does what is called a "draw down" of that color. A draw down is when the exact color is wiped onto a white card and the formula and custom color number are created and identified.

Once samples have shipped, the custom color is approved and doors are ordered, as a final checkpoint VT will mix the color based off of the identified formula and number to complete another draw down to be scanned into the Spectro to ensure the color is again an exact match prior to finishing the doors.

The Spectro is also used to ensure the continuous and consistent color match of all eight VT standard finish colors. Each VT standard color is made in mass quantities and kept for quick and easy access. When a specific standard VT finish color is depleted, the same draw down process is completed to ensure standard color consistency. ■■

DOOR PRESS TRIVIA QUESTION

Congratulations to Carolyn Finch of Negwer Door Systems for correctly answering the question: "True or False? VT Industries and the leading laminate manufacturers recommend using high pressure decorative laminate (HPDL) as a face material for architectural wood doors." Carolyn won a VT prize for coming up with the correct answer, which was "True."

QUESTION: True or False? VT Architectural Doors averages 2,000 custom color matches each year.

Answer this question based on this issue of the *Door Press* for a chance to win a VT prize. View the newsletter on VT's website at <http://www.vtindustries.com/vt/news.pgm> and submit the correct answer by filling in your contact information electronically by December 14, 2007. Limit one entry per person, and one winning per year.

VT employees and sales representatives are excluded from this promotion.



DOOR PRESS

A MARKETING/COMMUNICATIONS PUBLICATION

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SIDELIGHTS



By **Trisha Clausen**
Marketing Communications Manager

The 32nd annual DHI Conference and Exposition held at the Gaylord Opryland Resort and Convention Center in Nashville was a great opportunity for us to introduce our customers to the partnership between VT Architectural Wood Doors and IDEAL Architectural Doors & Plywood, which led to our new IDEAL Door Division.

The venue was perfect, offering a wide range of amenities that included indoor gardens, winding streams, a 44-foot waterfall, climate-controlled glass atriums and numerous dining options. If you wanted to, you could eat at a different restaurant every night without ever leaving the resort.



VT held a customer appreciation reception at the Delta Fountain.

In addition to VT's two exhibitor booths, National Sales Manager Tim Petersen, LEED® AP, presented an Industry Marketplace educational session titled "Bold Steps Forward in Conjunction with the Door and Hardware Institute." In his presentation, Tim discussed new initiatives that will more closely align VT Industries with the direction being taken by DHI. He also focused on industry changes and how they will affect our distributors.

We had a great turnout and are looking forward to next year's DHI show, which is scheduled Nov. 8-15, 2008, at the Boston Convention and Exposition Center. ■■

VT Doors Assist New Hospital in Creating a Healthy Environment

Nearly every aspect of the new Metro Health Hospital in southwest Grand Rapids, Mich., is designed with the environment in mind, from its "green" roof to the VT Architectural Wood Doors made of lumber certified by the Forest Stewardship Council (FSC).

The \$150 million hospital, which opened this fall, features 1,538 plain sliced red oak veneer flush wood doors from VT Industries, according to Julie Chicklon, project manager with S. A. Morman & Co. "They were all constructed of FSC-certified stave core lumber, except, of course, for the fire-rated doors," Chicklon noted.

All doors were factory finished in Grassland (GR02) and came with an ASSA ABLOY hardware package, Sargent exit devices, mortise locks, Norton closers, McKinney hinges and HES and Securitron electronics.

VT doors were also selected for a second building that houses a cafeteria and clinics, which connects to the main hospital. "It was interesting because the building was constructed under a separate contract from the hospital," Chicklon reported. "It had a different architect and builder, but we provided the same door species, stains and hardware for continuity between the two buildings."

LEED® CERTIFICATION

The use of FSC-certified wood is among the construction features designed to assist the 203-bed acute care general hospital with earning the Leadership in Energy and Environmental Design (LEED®) certification from the U.S. Green Building Council.

Under the LEED system, Metro Health earned points toward achieving certification by using



Halls are curved and every patient room is set up in identical fashion.



The \$150 million Metro Health Hospital opened on September 30, 2007.

products made of lumber from forests that meet internationally recognized standards for environmentally responsible forestry practices.

VT's use of water-based adhesives, stains and ultraviolet-cured topcoats prevents the release of volatile organic compounds (VOCs) into the atmosphere, which also helped the hospital achieve LEED credits under indoor air quality criteria.

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VT Industries Inc. Acquires IDEAL Architectural Doors and Plywood

The acquisition of IDEAL Architectural Doors and Plywood of New Albany, Ind., is a welcomed expansion to the VT Architectural Wood Door business, according to Rick Liddell, senior vice president of sales and marketing.



"IDEAL doors are a very high-end product that brings us a whole new customer base, including woodworkers and millworkers," Liddell noted. "You'll see these doors in hotel lobbies, lawyer's offices and other prestigious projects. We're very excited about that."

Liddell cited several similarities between VT and IDEAL. "Both companies have earned a reputation for quality, customer service and manufacturing to

the highest standards in our industry," Liddell said. "IDEAL continues a tradition of manufacturing fine wood products dating back to 1886, and we look forward to working together to create outstanding synergies that will benefit our customers."

FIFTH GENERATION MANUFACTURER

Located on the Ohio River across from Louisville, IDEAL is a fifth generation manufacturer of fine wood products with a reputation for quality, craftsmanship and business integrity. The IDEAL product line and production capabilities provide an excellent complement to current products manufactured by VT Architectural Wood Doors.

"The company is very strong and doing well and we expect the marriage to be a win-win situation," Liddell asserted.

The new IDEAL Door Division will continue to manufacture AA grade flush doors, premium

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VT Doors Assist New Hospital in Creating a Healthy Environment

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Other environmentally friendly features of the new hospital include:

- A 48,500-square-foot green roof to minimize storm water runoff, improve air quality and insulation, reduce peak temperatures and provide aesthetically pleasing scenery
- Rain gardens to filter pollutants from storm water runoff
- Water conserving fixtures, including waterless urinals and low-flow faucets
- Motion sensitive lights to conserve energy
- Paints and interior furnishings designed to improve indoor air quality



Doors were installed as each floor was completed.

KEY TO SUCCESS

"Customer service was key to the success of this project," Chicklon acknowledged. "The project lasted two years, so our purchasing agent ordered

the doors segregated by floors and areas rather than all at once. We knew what the installation dates were and ordered materials accordingly. This way, we minimized storage and handling."

"The doors were installed as each floor was completed," Chicklon said. "The contractor was pleased with the quality and delivery of the doors. The very few door issues we had on this project were handled expeditiously by VT support staff. It was a very good experience for us."

A HEALTHY TREND

In addition to the hospital and clinic building, the Metro Health complex will be surrounded by an entire community of physician offices, specialty centers, medical suppliers, retail businesses, restaurants, a hotel, a medical-fitness facility and more. Every building in this complex will be LEED certified.

"Most large-scale construction in our area has been LEED projects, both in health care and



Doors featured an ASSA ABLOY hardware package, Sargent exit devices and mortise locks and Norton closers.



Metro Health offers a broad range of inpatient and outpatient services, emergency, surgery, intensive care, rehabilitation, wellness and community education.

education, but the size and scope are not the only indicators for LEED," Chicklon added. "Architects and owners are recognizing the value in green design, whether they achieve certification or not."

The 480,000-square-foot hospital annually provides more than 130,000 patients with a broad range of services, including inpatient and outpatient care, emergency, surgery, rehabilitation, wellness and community outreach.

ABOUT S. A. MORMAN & CO. Established in 1857, S. A. Morman & Co. is west Michigan's largest supplier of commercial doors, architectural hardware and building materials. With two full-service locations in Grand Rapids and Kalamazoo, the company offers its customers wood floor and hollow metal frame shop fabrication capabilities.

TECH TALK

Pending LEED® and Industry Standards Change



By Tom Hofert,
Technical Development Manager

The U.S. Green Building Council's (USGBC) Board of Directors has directed the Leadership in Energy and Environmental Design (LEED®) Materials & Resources (MR) Technical Advisory Group to examine credits 6 & 7 and consider possible changes to the biobased and wood credits that critics from the timber industry have stated are biased against wood as a generic material. The draft of this review is expected to be available later this year.

Proposed Recommendations for Changes are:

- Change MR-6 Rapidly Renewable Material Credit to Biobased Materials Credit, including wood as long as those materials meet certain minimum levels of environmental certification. The intent would be to approve all wood products that have undergone some level of certification that ensures they are not derived from illegal logging practices. MR-6 currently makes value judgments that rapidly renewable materials are better than longer-rotation biobased materials (wood) and this does not appear to be justified by the science.
- Modify MR-7 Certified Wood to establish a basis for adoption of other certification systems other than the Forest Stewardship Council (FSC). This would allow wood certified under other forest certification systems such as the Sustainable Forestry Initiative (SFI) to achieve this credit. The recognition of SFI and other wood certification systems in LEED might lessen the opposition of the North American forest products industry to FSC and reduce the adversarial relationship

that now exists between the environmental community and the timber industry.

To read more about these proposed changes view the White Paper at www.usgbc.org/showFile.aspx?documentID=1423.

ELIMINATING MULTIPLE STANDARDS

The Architectural Woodwork Institute (AWI) has signed an agreement with two other industry associations, the Architectural Woodwork Manufacturers Association of Canada (AWMAC) and Woodwork Institute (WI) to develop a single architectural woodwork standard through a Joint Standards Committee. They will hold their first meeting in November.

The nine member committee will consist of three representatives from each association. AWI states this agreement will help produce one woodwork standard for the industry, eliminating the confusion

of multiple standards. It will also provide a single unified base that the certification entities can use to provide compliance oversight. The anticipated release for this single unified standard is January 2009.

Representation from the Window & Door Manufacturers Association (WDMA) has been in contact with AWI in regards to the above development and supports the objective of eliminating confusion between competing standards. WDMA will continue to investigate alignment possibilities between the Joint National American Standard and WDMA standards; however, it will require some movement on both sides in aligning the standards.

There are still many differences between the AWI & WDMA I.S. 1A industry standards, as noted in the following Technical Bulletin Comparison Chart. Hopefully, some of the differences can be eliminated or lessened with this new movement by AWI. ■■

TECHNICAL BULLETIN COMPARISON CHART WDMA I.S. 1A-2004 AND AWI SECTION 1300-2003

| CHARACTERISTIC | WDMA I.S. 1-A | AWI SECTION 1300 |
|------------------------------------|--|--|
| Door Grades | Premium, Custom | Premium, Custom, Economy |
| Additional Veneer Species | Anegre, Beech, Makore, & Sapele Included | Not Included |
| HPVA Face Grade Charts | New Door Face Grade Charts | Panel Face Grade Charts |
| Premium Door Veneer Grade | "A" Grade (minimum) | "AA" Grade (minimum) |
| Premium Door Veneer Match | Running/Balance Match (minimum) | Center Balance Match (minimum) |
| Plastic Laminate Grades | HPDL, LPDL | HPDL |
| Door Construction | Performance Specifications 3 Duty Levels 8 Performance Attributes | Prescriptive Specifications |
| Crossbanding | Wood, Composite | Wood, Composite With Internal Bond ≥ 200 psi |
| Suggested Installation Chart | Included | Not Included |
| TR/OP Finishing System Descriptors | Included | Not Included |
| Guide Specifications | Specification Checklist Format for key aspects of the doors that must be addressed | Text Specification Format |
| ANSI Approval | Pending | No |

VT Welcomes New Sales Representative Paul Winicki



VT's New Sales Representative.

Paul Winicki has joined VT Industries as an independent sales representative responsible for architectural wood door sales in Ontario and Quebec, Canada.

"Paul brings more than 20 years of experience in the openings

industry," according to Randy Carpenter, sales manager, north U.S. region and Canada.

"Paul has represented division 8 and division 10 manufacturers for more than 18 years through

his firm, Ironmonger Architectural Ltd. in Toronto, Ontario. He is well-known among distributors in the architectural door, frame and hardware markets in Ontario and Quebec.

As a member of the Door and Hardware Institute, Winicki has earned his Architectural Hardware Consultants (AHC) designation. "Paul understands a builder's hardware requirements for door openings in all types of public, commercial, industrial and institutional buildings," Carpenter added. "He knows how to ensure that door openings are in compliance with fire, life safety, accessibility and building code requirements. We welcome him to his new role representing VT Industries." ■■

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grade stile & rail doors, thick doors (2-1/4" or more, rated and non-rated), oversize doors (up to 5-0' X 12-0'), blueprint matched panels and doors, sketch-faced doors, and specialty veneers.

ABOUT IDEAL

IDEAL is a long-standing associate member of the Architectural Woodwork Institute (AWI), the Door and Hardware Institute (DHI) and The Woodwork Institute of California. Its 96,000-square-foot manufacturing facility factory machines doors for hinges, locks, card readers and concealed vertical rod devices so they arrive at the job site ready to hang.

The company's core materials consist of 100 percent recycled and recovered wood fiber, as well as mineral cores for 45-, 60- and 90-minute Warnock Hersey fire-rated doors. Twenty-minute-rated doors are also available for both neutral and positive pressure tested applications.

Veneer-faced doors, constructed using a hardboard crossband for strength and stability, are finished with custom matched colors using both automated and manual finish lines.

Top and bottom rails, as well as inner stiles, are made from engineered laminated strand lumber for increased stability and moisture resistance. Outer stiles are hardwood that can be matched in most species to the face veneer.

SMARTWOOD CERTIFIED

Raw materials are inventoried by IDEAL from reputable sources with a commitment to the same standards specified by the U.S. Green Building Council. IDEAL is also SmartWood certified as approved by the Forest Stewardship Council (FSC).

"Both VT and IDEAL are committed to responsible forest management practices that promote sustainability and result in long-term economic and environmental benefits," Liddell affirmed.

IDEAL doors have been specified for prestige projects across North America including the Ministry of Education in Ontario, Canada; the St. Regis Sheraton in New York; the Yale School of Medicine in New Haven, Conn.; Purdue University in Lafayette, ID; the German Consulate in Chicago; the Federal Reserve Board in Washington, D.C.; and Orchestra Hall in Detroit.

"Together as leading manufacturers, VT Industries Architectural Wood Doors and the IDEAL Door Division will continue to produce the finest wood veneer, high pressure decorative laminate, stile & rail, profiled and specialty doors in the industry," Liddell said.

"Going forward, we will begin exploring opportunities for sharing technology and marketing initiatives that enhance our value to both DHI distributors and AWI millworker customer segments," Liddell added. ■■

THE GREEN SCENE

VT Architectural Wood Doors are GREENGUARD For Children & Schools Certified



By Tim Petersen, LEED AP National Sales Manager

Veneer and laminate particleboard and agrifiber core architectural doors from VT Industries are now GREENGUARD For Children & Schools Certified by the GREENGUARD Environmental Institute (GEI). The GEI created the new standard as an extension of the established GREENGUARD Indoor Air Quality Certification Program, which certifies low emitting products for various industries.

Both GREENGUARD certifications are valuable tools for architects, designers, product specifiers and purchasing organizations that want to specify and purchase off-the-shelf, low emitting products for indoor environments.

In addition to being the only architectural doors manufacturer to be GREENGUARD For Children & Schools Certified, VT Industries is working to comply with the new California Air Resources Board (CARB) approved standards which will virtually remove added formaldehyde from composite wood products by 2012.

LOW EMITTING PRODUCTS

The GREENGUARD Standard for Children & Schools sets rigorous product emission criteria for manufacturers of building materials, furnishings, finishes and cleaning products. Under the certification process, VT architectural wood doors were monitored for emissions of total volatile organic compounds (TVOCs), formaldehyde, total aldehydes and other volatile organic compounds (VOCs) by Air Quality Sciences Inc., based in Atlanta, Ga.

The certification program complies with the State of California Department of Health Services Standard Practice for testing chemical emissions

from building products used in schools. The CDHS Standard Practice is more stringent than GREENGUARD's Indoor Air Quality certification.

The GREENGUARD Standard For Children & Schools can be used to earn valuable credits in the CDHS Best Practices Manual for K-12 Schools, which was created to assist architects, engineers and school administrators in designing and building schools that offer an enhanced learning environment for children.

TAKING THE LEED®

VT architectural wood doors can also contribute toward achieving Leadership in Energy and Environmental Design (LEED®) certification. Created by the nonprofit U.S. Green Building Council (USGBC), LEED certification is a widely used benchmark for the design and construction of energy efficient and environmentally conscious buildings.

In September, the Ohio School Facilities Commission adopted LEED as part of its school design standards. The commission's action means that more than 250 buildings will be registering for LEED certification within the next two years. This initiative represents just one example of the many opportunities for VT architectural flush wood doors made of FSC-certified stave lumber, particleboard, Structural Composite Lumber and agrifiber cores.

As the only architectural wood door manufacturer accredited by the GREENGUARD For Children & Schools Certification Program, VT Industries has differentiated itself from its competitors. This means that distributors can sell VT architectural wood doors with confidence that they meet the most stringent requirements for an extensive range of TVOCs.

ABOUT GEI GEI was founded in June of 2001 to establish a true third-party product certification program based on proven emissions standards and to provide specifying and procurement professionals with a resource for low emitting products. GREENGUARD's goal is to improve public health and quality of life by helping manufacturers build better and safer products. To view VT's certified products on the online product guide at no charge or to view the certificates, visit www.greenguard.org. ■■