

STANDARDS

AISC/SSPC Draft Now Available for Review

In April 2006, AISC and the Society for Protective Coatings (SSPC) announced the formation of a joint committee with the goal of creating a single standard for shop-painting structural steel. This joint committee invites public review and comment on a draft, *Certification Standard for Shop Application of Complex Protective Coating Systems (Enclosed, Covered, or Open Shop)*.

The draft certification standard will be available for a 45-day period of public review and comment beginning January 14, 2008 and concluding February 29, 2008. This review period provides individuals and organizations that may be affected by implementation of this standard with a valuable window of opportunity to share concerns and offer value-enhancing suggestions and recommendations. A copy of the draft standard will be available in the News section of

the AISC web site (www.aisc.org) with instructions for submitting comments.

When complete, the standard will support a certification program jointly sponsored by both AISC and SSPC and that will supersede the current SPE and QP 3 programs. The standard describes requirements for certification of firms that shop-apply complex painting systems. The jointly sponsored certification will confirm to owners, the design community, and the construction industry that a firm has knowledgeable personnel and the organization, experience, procedures, and equipment to provide surface preparation and application of complex painting systems in a shop facility according to contract specifications. Availability of this program is targeted for the second half of 2008. Until then, AISC will continue to offer its Sophisticated Paint Endorsement (SPE), and SSPC will con-

tinue to offer its QP 3 program.

Comments submitted by the public during the review period will be given full consideration by the joint committee developing this standard and used to prepare the final drafts of these documents for review and approval by the governing boards of AISC and SSPC.

For additional information about the AISC/SSPC joint program, contact:

AISC Certification
1 E. Wacker Drive, Suite 700
Chicago, IL 60601
312.670.7520
certinfo@aisc.org

SSPC Shop Certification Program
40 24th Street, 6th Floor
Pittsburgh, PA 15222
412.281.2331
damiano@sspc.org

PROJECTS

Construction of Art Institute of Chicago Pedestrian Bridge Now Under Way



Courtesy of the Art Institute of Chicago

Another architectural icon in Chicago is currently under construction. The Nichols Bridgeway, designed by architect Renzo Piano, will connect the Art Institute of Chicago's upcoming Modern Wing (also designed by Piano) to Millennium Park, adjacent to the city's Loop area. Unlike the curving bridge designed by Frank Gehry in the northeast section of the park, Piano's pedestrian bridge will be a straight, slim, sword-like structure. It will rise gently from grade level near the southwest corner of the Great Lawn of Gehry's Pritzker Pavilion to cross 23 ft above Monroe Street and land at restaurants and a sculpture garden 60 ft above on the third floor of the Modern Wing.

AISC member Chicago Metal Rolled Products was consulted by the program manager, the Rise Group, in late 2005 concerning this bridge, whose cross section will look something like the hull of a ship, with curved steel plate on the bottom, a flat surface on top, and stiffeners in

between. Specializing in curving structural steel, sheet, and plate, Chicago Metal's reputation for precision forming was strengthened by having curved 570 tons of 12- to 20-in. diameter pipe for the trellis over the Great Lawn at Millennium Park.

The 600-ft-long footbridge will have five supporting locations in the park and two off of cantilevers at the Modern Wing. The design includes $\frac{3}{8}$ -in., $\frac{1}{2}$ -in., and $\frac{5}{8}$ -in. plate that's 12 ft wide and 20 ft long and curved to a 10-ft radius. The top of the bridge will have a walkway that's heated in winter to melt ice and snow.

In something of a role reversal, both the program manager and the general contractor, Turner Construction, asked Chicago Metal for referrals on structural steel fabricators whose expertise matched this challenge, and eventually chose AISC/NSBA member Industrial Steel Construction of Gary, Ind., a company known for its extensive national bridge work.

The design went through several iterations before it was decided that the bridge would incorporate a box girder with a curved bottom covered by a curved soffit plate. A mock-up of a 10-ft-long section of the bridge was constructed with both a welded and a bolted joint. Piano viewed the structure as it was hoisted to the height where it would connect to the Art Institute. After an afternoon and evening viewing (with uplighting), he approved the prototype with further refinement of the weld preparation, and construction of the bridge began. The bridge will be factory-built in 70- to 90-ft-long sections in Gary, shipped to the jobsite, and supported by falsework while the sections are bolted and welded together. The completed structure will incorporate a 2,000-ft-radius camber and a 200-ft span over Monroe Street.

The Modern Wing is scheduled for completion in 2009.

EVENTS

Blast-Resistant Course Hits Texas

Blast-Resistant and Anti-Terrorism Design, a short course for engineers and architects, sponsored by Protection Engineering Consultants, will take place February 4–8, 2008 in San Antonio. This intensive course will cover significant topics in blast-resistant and anti-terrorism design, including:

- ✓ Physics of blast and structural response
- ✓ Blast test methods and data
- ✓ Analytical and computational methods for blast loads predictions and structural response
- ✓ Analysis and blast-resistant design of building, cladding, and framing components
- ✓ Design and analysis for steel, reinforced concrete, reinforced masonry, and timber
- ✓ Anti-terrorism design
- ✓ Progressive collapse design
- ✓ Design/analysis of windows, frames, and mullions

Presenters will provide software and design aides as well as multiple opportunities to use these tools in practical, problem-solving applications, enabling participants to gain experience and confidence. Bound course notes and software will be provided.

A special feature of the course is a shock tube testing demonstration. On Thursday,

February 7, course participants will attend a shock tube test at a facility in the northern San Antonio area. Shock tubes are commonly used to simulate explosions for evaluating structural components. Using the software and knowledge acquired in class, participants will predict the response of a structural element, such as a wall panel, door, or window, then will discuss the data and results in class the following day.

Dates

Monday, Feb. 4 – Friday, Feb. 8, 2008

Times

Monday – Thursday: 8 a.m. – 5 p.m.

Friday: 8 a.m. – 2:30 p.m.

Location

Best Western Hill Country Suites
18555 Highway 281 North
San Antonio, Texas 78258
210.490.9191 or 866.784.8346

Accommodations

The Best Western Hill Country Suites is offering short course participants a special rate of \$94.99. If you choose to stay at the Best Western, mention “PEC Short Course” when you call. The cut-off date for reservations at this rate is Jan. 11, 2008.

Participants may, of course, make their own arrangements for accommodations, and there are numerous exceptional locations in the San Antonio area.

PROJECTS

Staggered Truss Webcam

Chicago’s first staggered truss project is now underway and a live webcam is capturing the construction. The Staybridge Suites Hotel, which was designed by structural engineer Structural Affiliates International in Nashville and architect Valerio Dewalt Trane in Chicago, is scheduled to open in mid-2008. The fabricator and erector is AISC Member K & K Iron Works. For more information on the project, and to view the webcam, please visit www.aisc.org/staybridge.



AISC and the Associated Steel Erectors will host a breakfast presentation on the project and conduct a hard hat tour on Friday, Feb. 8, 2008. The program is free. For more information, contact Tabitha S. Stine, P.E., LEED AP, AISC’s Great Plains Regional Engineer, at stine@aisc.org or by telephone at 708.647.9395.

ENGINEERING JOURNAL

Call for EJ Papers

AISC is always looking for *Engineering Journal* articles on interesting topics pertinent to steel design, research, and fabrication methods, or new products of significance to the uses of steel in construction. We are especially seeking technical articles with practical applications in the steel industry. If you have a new idea or an improvement on an old idea, please submit a paper to AISC for publication in the *Engineering Journal*.

Please send your paper in duplicate to Cynthia Duncan, Editor, c/o AISC, 1 E. Wacker Drive, Suite 700, Chicago, IL, 60601, or e-mail your submittal to duncan@aisc.org.

Detailed information on our review process and requirements for submittals can be found in each *Engineering Journal*

issue or at www.aisc.org/ej.

In addition, all published papers are eligible for the Best EJ Paper of the Year award. Cast your vote for the best *Engineering Journal* paper of 2007 at www.aisc.org/ejsurvey and become eligible for a free trip to the 2008 North American Steel Construction Conference, held April 2–5 in Nashville. A drawing will be held in early March 2008.

All articles published in *Engineering Journal* in 2007 are included in the survey (excluding Discussions). The winning author will also receive free registration to the 2008 NASCC, as well as round-trip airfare and a one-night stay at the conference hotel.

Cast your vote today! Votes will not be accepted after February 28, 2008.

letters

A New Way to Read MSC

Thank you for the “as-printed” link to the magazine. I wish more publications and newspapers would include the same format. It’s great for when you remember reading an article but the magazine is long gone in the recycle bin. Thanks again for a great publication!

Glenn Ernst
OMNI Technical Services, Inc.
St. Johns, Mich.

To view previous issues of MSC, as well as the current issue of MSC, which appears exactly as the printed version—including all advertisements—visit www.modernsteel.com. —Editor