

PT and PDC Updates:

The "Materials Training Videos" PT (164-05) reviewed the CD version of the TATA/DuPont Corrosion Awareness training program created from the 1980's vintage MTI VHS training tapes and were generally pleased with the quality and potential value of the results. The project is about 90% complete; the plan is to have the final version completed by the end of the year. The PT is asking MTI members who still have higher resolution 3/4-inch versions of the other 1980 tapes to let the MTI office know so that we can make copies to use on future projects.

The consensus of the "**User's Guide for Evaluating New High Tech Polymeric Materials**" PT (159-04) was that the latest version of the Phase II draft will be a valuable tool. The PT plans to thoroughly review the draft over the next two weeks in preparation for a final teleconference with the contractor (Bob Tatnall). The PT would like to use the final draft to evaluate some new polymeric materials to test the effectiveness of the Guide.

The nearly final draft of the "**Guide for Design, Manufacture, Installation & Operation of FRP Flanges & Gaskets—Phase II**" (PT "md") as written by technical experts in the PT was reviewed and, except for some small additions, will be ready for final formatting and distribution before the February meeting.

How to Implement Risk-Based Inspection (152-02)

Ricardo Valbuena presented a copy of the newly published RBI Manual at the Project Team meeting.

Valve Casting Specification (Ix)

The two casting state-of-the-art presentations given on Tuesday by Ron Bird, "Casting Production and Quality Issues" and Raymond Monroe (substitute speaker for Malcolm Blair), "SFSA Research and its Implications with Respect to Product Quality" were digitally recorded. These video recordings will be combined with the corresponding slides by Blue Sky Broadcast to make two synchronized web presentations. The web-based presentations will be available for members to view directly from the MTI site within a few weeks. A CD version will also be available.

Modernization of ASTM Specifications for Unalloyed Titanium (151-02)

MTI sponsored a study that has resulted in changes to the strength requirements for Grades 1 and 2 titanium. The study demonstrated that the minimum yield strength for Grade 1 titanium can be lowered from 25 to 20 ksi. ASTM has included this as part of its 2005 standards. The study also demonstrated that the minimum tensile strength for Grade 2 titanium and the variants of Grade 2 containing ruthenium and palladium can be increased from 50 ksi to 58 ksi. ASME Code Case 2497-2 has been issued, and can be used for pressure vessel construction. By one estimate, this could save as much as 100 million dollars for the chemical industry because the higher strength reduces the amount of titanium needed for pressure vessels.

Welding of Clad Titanium Plate (158-03)

MTI is participating in a group sponsored research project at the Edison Welding Institute (EWI) to develop a technically sound and cost effective way to weld titanium-clad steel plate sections to each other. Through the use of an interlayer and controlled short circuit arc welding procedure (CSC-GMAW), EWI has made sound welds that pass the ASTM shear bond test requirements. Additional work is needed, however, before the procedure can be used commercially. An interim report on the program's progress was presented to the Corrosion Solutions 2005 Conference in September.

Metal Dusting II (156-03):

The Metal Dusting Steering Team met on Monday, October 24. Ken Natesan reviewed progress on metal dusting studies at Argonne. Dr. Hans Van Wortel reviewed the activities at TNO in The Netherlands on metal dusting. The steering team expressed the desire to develop a working relationship with TNO on metal dusting. The steering team will meet at the June 2006 MTI meeting.

Integrity and Condition Assessment PDC

The project team to develop a roadmap on Condition Assessment agreed to terminate the current approved project. The unfavorable prospect of outside funding was a major factor. The Integrity/Condition Assessment PDC formed a pre-project team to scope a follow on project in Condition Assessment.

Monday Tours:

- **DMC Clad Metal Factory Tour**
27 MTI members and staff went on a plant tour of the DMC Clad Metal Factory in Mount Braddock. The tour included witnessing an explosion and an explanation of explosion welding. Lunch and transportation was provided by DMC Clad Metal.
- **Harbison Walker Facility Tour**
6 MTI members and staff went on an afternoon tour for ceramic experts and members of the New Materials-Ceramics PDC.

Riverboat Dinner Cruise:

Over 60 MTI members and staff enjoyed a Dinner Cruise aboard the Gateway Clipper Fleet Tuesday evening.

Penn Brewery & Restaurant:

45 MTI members and staff are scheduled to attend this event. Transportation for the pre-paid Oktoberfest at the Penn Brewery tonight will begin shuttling at 5:30.

MTI Meeting Attendance Statistics:

86 Attendees (including J. Bustillos)

43 Member Companies

3 Potential Members:

- Syncrude Canada – Mike Anderson
- ERCO Worldwide – Lester Dobosz
- Flowserve Corporation – Thomas Spence

Late Registrations:

Brian Baker	Special Metals
Paul Crook	Haynes International
Dale McIntyre	ConocoPhillips
Raymond Monroe	SFSA (Speaker)
Ashok Rakhe	Celanese
Elisabeth Torsner	Outokumpu

Special Offer on New Products

Announcing Special Offer on New Products Now Available for MS-1 2nd Edition, MS-CD and the RBI Manual until April 1, 2006. Orders must be placed directly with Mike Ross at (304) 522-0086 or rossbus@aol.com.

Certain restrictions apply. Check the Hot Topics of the Members Area.

TAC Meeting Presentation:

Change in the Chemical Industry & What It Means to You – Gene Liening/Dow Chemical

Did You Know?

- Lloyd's Register Americas, Inc. has acquired MTI member Capstone Engineering Services, Inc. and Capstone Software Services, Inc. The acquisition will be renamed Lloyd's Register Capstone, Inc.
- The September issue of the journal of The Minerals, Metals and Materials Society (JOM) contains four articles on Titanium. A copy of the September issue is available on the meeting registration table. MTI staff can make copies of the articles that are of interest to you.
- There is a list of current MTI active and potential projects and training classes in the Downloads area of the MTI Web Site.

Upcoming MTI Meetings:

- **TAC 89** – February 21-23, 2006 at Wyndham Orlando in Orlando, FL
- **EuroTAC 2006** – April 2006. Location to be announced.
TAC 90 – June 5-8, 2006 at Millennium Hotel in St. Louis, MO
- **TAC 91** – October 23-26, 2006 at Marriott Plano in Dallas, TX