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MBSI is an Architectural Rep Agency for the metro NY and northern NJ construction markets specializing in select products used in the design & construction of various cavity wall, roofing & waterproofing systems.

MBSI hosted an educational day of seminars focusing on the "Design and Construction of Today's Complex Building Envelope" on April 19, 2007 at the Center for Architecture, NYC.



THE LATEST IN AIR BARRIER TECHNOLOGY — HENRY COMPANY

On behalf of the Building Science Group at Henry Company, in partnership with Metro Building Solutions, we wish to thank all of our invited guests and attendees who attended "The Latest Innovations in Air-Barrier Technology". The following is a summary of the information presented.

The Latest Innovations in Air-Barrier Technology

Today's Code sets new standards for the performance of a well designed Building Envelope by regulating issues related to energy conservation, increase thermal performance and measures to prevent uncontrolled air leakage and condensation.

Uncontrolled Air Leakage:

Uncontrolled air leakage through the Building Envelope translates into:

- High energy consumption,
- Premature deterioration of building elements,



Gary Osmond, Henry Co.

- Condensation and Mold.

Although there are a number of products that may exhibit resistance to air leakage, it should be understood air barriers are more than a line on the drawing, they need to be designed as a "system", in other words continuity through the five exposed sides of a box that represents a building.

A well designed & detailed air barrier system will perform a number of functions essential to lowering operating costs over the life span of the building.

Smart Wall Systems:

The selection process to specify the right air barrier membrane system will depend on a number of factors; the best time for this to take place is during the design development phase. Whether the wall assembly is permeable or non-permeable, a well designed wall maintains a continuous plane of air tightness and rain control, includes measures to reduce thermal bridging, prevent condensation and control vapor diffusion.

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Mary Hosley, PPG, Sponsor



Ron Muschello, Georgia-Pacific, Sponsor

TRANSPIRED SOLAR COLLECTORS — ATAS INTERNATIONAL

Bob Crane, Territory Manager for ATAS International, recently participated in the "Design & Construction of Today's Complex Building Envelope" program held at the Center for Architecture in New York City.

The topic of Transpired Solar Collectors was presented to

over 150 attendees, who learned about the heating & cooling season benefits which are offered by use of Transpired Solar Collectors. In addition, the functionality, design, wall orientation, components and installation of such a system was discussed. With high emphasis

today on the design & construction with sustainable building products, Transpired Solar Collectors not only make use of free solar heat, which reduces the owner's utility bills, but the collectors also reduce greenhouse gases. Along with

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Bob Crane, ATAS International

UNDERSTANDING RAINSCREEN CLADDING SYSTEMS — SIMPSON GUMPERTZ AND HEGER

Solid masonry wall construction dominated the playing field for well over 4,000 years, relying on sheer mass to control heat & moisture migration. As buildings grew taller and budgets tighter, solid masonry became a less viable option for new buildings and was gradually replaced by “skeleton” frames of steel and concrete that supported lightweight “curtain wall” systems. These systems, often known as “rainscreens”, rely on dedicated barriers to control heat & moisture, and in more recent times, airflow. The other defining feature of rainscreen cladding systems is the use of an exterior cladding material combined with internal, or backup, waterproofing and flashing. Although simple in concept, rainscreens are complex systems that must account for water penetration of the cladding, waterproofing and flashing to allow this water to exit the wall, compatibility be-

tween components, and thermal & differential movement of components and structures.

Although construction schedules and advancement of materials have sped up dramatically over the last 100 years, it is important to remember that good old-fashioned experience still takes time.



Sean O'Brien, SGH

While it is tempting to include all of the latest products and materials (with 1-2 year track records) into your building (which is being designed for a 50-year service), the complexity of modern rainscreen cladding systems warrants a more careful and well thought-out approach. Making hurried decisions without understanding the consequences of those decisions can only lead to one outcome—designers of the future looking back and asking “Why did they ever think this was a good idea?”

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ATAS International—

tax credits & incentives, & favorable payback periods, which offer an appealing financial impact to the owner, the building’s ventilation and indoor air quality is improved, resulting in healthier occupants of that building.

If you or your firm would like to learn more about Transpired Solar Collectors, please contact Bob Crane at 484-225-6720 , or via email at rcrane@atas.com. We look forward to participating in this event again in the Fall.

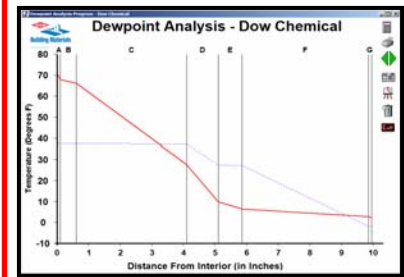
Henry Company—

Well written, technically correct air barrier Specifications are as crucial to the construction documents as understanding the details. Air barriers are “systems” assembled of many materials & components, not just a product with a low air leakage rate.

The information provided by the presentation mentioned here , as well as other relevant technical information about Henry Building Envelope Systems® may also be found on our web

Valuable Tool:

Through Dow Chemical, MBSI offers a building envelope dew point analysis as a free service. Please contact Dennis Italia for more info.



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A MESSAGE FROM MBSI PRESIDENT, DENNIS C. ITALIA



From L—R, Mary Hosley, Ron Muschello, Kim Beemer (MBSI), Dennis Italia, Bob Crane & Lee Ann Slattery (ATAS)

I would like to take this opportunity to thank everyone that was involved in making our 1st conference, “Design & Construction of Today’s Complex Building Envelope”, a great success. It was truly a dedicated team effort and the entire event seemed to go off without a hitch. The celebratory photo on the left really says it all (please be assured this was after the event and not prior to!!). There were close to 180 industry professionals in attendance consisting of Architects, Engineers, Consultants, GC’s, Owners, Spec Writers and Sub-Contractors. The feedback was overwhelmingly positive and we are now in the planning stage for another educational conference to take place in the fall. If anyone has any suggestions or comments on ways to improve upon it, please don’t hesitate to pass them along. Our industry continues to change for many different reasons and our goal is to keep the design & construction community well informed and ahead of the curve. Enjoy the summer and be safe!!

