



## Case Study

### H2Engineering – Tallahassee

#### Architectural firm's restroom showcases “green” technology

##### Challenge

H2Engineering, an engineering firm based in Tallahassee, Fla., knows that when it comes to designing green buildings, “walking the talk” speaks louder than words to clients.

So, in 2007, principals Ryan Chewning and Matt Scaringe planned an addition onto their existing facility to serve as a state-of-the-art showplace for clients to get a real-life demonstration of H2Engineering's design personality, workmanship and commitment to green building design.

Since commercial restrooms are notorious for consuming large amounts of water and energy, the women's restroom became a top “green” priority for the addition.

“Our plan was to showcase the very latest plumbing technologies and fixtures that would reinforce our commitment to environmental stewardship and still stay true to the facility's contemporary design,” Chewning says. “We set out to achieve LEED silver certification.”



*Bradley's Express Lavatory System MG-Series comes equipped with ndite technology, the first ever light-powered handwashing fixture.*

## Solution

A main focal point of the finished restroom is Bradley's Express® Lavatory System MG-Series, designed with a continuous bowl that accommodates two users at one time. "The modern look of the solid surface material used with Express instantly appealed to us – especially in comparison with old-fashioned-looking china lavs," says Chewning. While the Express Lav employs the group handwashing concept, he continues, he likes how the lavatory still conveys the look and feel of individual lavs.

In addition, the Express Lav System features Bradley's ndite® technology, which powers the lavatory without electricity or batteries – a perfect fit for meeting their water and energy saving goals. Bradley representative, Jim Volk, Harry Warren, Inc., says that ndite technology was an easy choice for H2Engineering based on all the benefits it offers. "The great thing about ndite is that it is environmentally friendly, cost effective and practically maintenance-free all rolled into one," he says.

The patented ndite technology uses photovoltaic cells integrated into the top of the lavatory to capture and store solar or normal room-level lighting. The light is then converted into energy, which activates the flow of water. Since there is no electrical wiring or batteries involved, there is no maintenance or replacement costs.

"Because ndite has little impact on the environment – or on a facility's bottom line – ndite is a sustainable green technology in the truest sense," Volk explains.

### Contemporary restroom design with an eco-friendly twist

Chewning says he is pleased with how the look and feel of the finished restroom echoes the contemporary design of the firm's overall facility.

"The color of the Terreon® solid surface material we selected for the Express Lavatory is a rich neutral called Riverstone. This hue, as well as the sleek shape of the fixture, blends well with the interior of our building and adds welcome visual interest to what is typically a very ordinary room."

In addition, the solar panel on the lav that houses the ndite technology gives the fixture a "techy feel," according to Chewning. "Besides its energy-saving and eco-friendly qualities, what I like best about ndite is that it minimizes maintenance."

The firm has even surpassed its initial goal to achieve LEED silver certification and is close to obtaining a gold certification. Chewning gives Bradley part of the credit for helping to exceed its goal: "Bradley helped us earn at least two design points toward LEED certification. We cut our water consumption – with their help – by over 40% percent. The 0.5 gpm on the sprayhead helped us achieve our water usage reduction goals."

"The service from our local representative was also instrumental in our success. He helped us obtain products in a timely manner – it was a very smooth process. Between service and product performance, I wouldn't expect anything else from Bradley."



Bradley's ndite technology converts restroom lighting to energy, which activates the flow of water to the Express SS and MG-Series Lavatory Systems.

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– Ryan Chewning  
H2Engineering



Ryan Chewning (l), with Bradley Representative Jim Volk (r), values that ndite is virtually maintenance-free, since there is no need for batteries or electricity.