

A GUIDE TO CAREERS IN SUSTAINABLE ARCHITECTURE,
DESIGN, ENGINEERING, DEVELOPMENT, AND OPERATIONS

**BONUS
CHAPTER!**

Becoming a

Green Building Professional

HOLLEY HENDERSON LEED AP BD+C/ID+C

FOREWORD BY ANTHONY D. CORTESE, ScD, PRESIDENT, SECOND NATURE

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Published by John Wiley & Sons, Inc., Hoboken, New Jersey

Published simultaneously in Canada

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Library of Congress Cataloging-in-Publication Data:

Henderson, Holley, 1971-
Becoming a green building professional : a guide to careers in sustainable architecture, design, development and more / Holley Henderson.
p. cm.
Includes index.
ISBN 978-0-470-95143-9 (pbk.); 978-1-118-30028-2 (ebk); 978-1-118-30030-5 (ebk);
978-1-118-31037-3 (ebk); 978-1-118-31038-0 (ebk); 978-1-118-31039-7 (ebk)
1. Sustainable architecture. 2. Architects—Training of. 3. Architecture—Study and teaching.
4. Sustainable buildings—Design and construction. 5. Buildings—Energy conservation. I. Title.
NA2542.36.H46 2012
720'.47023—dc23

2011047550

Printed in the United States of America

10 9 8 7 6 5 4 3 2 1

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Fresh Perspectives

The world is round and the place which may seem like the end may also be the beginning.

—Ivy Baker Priest (an American political figure who was treasurer of the United States under President Dwight D. Eisenhower)

THROUGHOUT LIFE, WE ALL REINVENT OURSELVES ANEW AT DIFFERENT STEPS ALONG THE WAY.

From starting college to a job after graduation to a thoughtful career change, there are many different times when we begin again. Regardless of their educational background or years of experience, most people are unsure of themselves when taking those first few steps on a new path. Though the emotions may be overwhelming—from a heady mix of nervous excitement and anticipation to the flutters of fear of the unknown—there is a dynamic energy generated as every initial step is taken. This excitement in the adventure to come brings a fresh perspective to what is ahead, lending valuable insight to areas that those more experienced might have become too entrenched to notice. And for green building professionals, it is often their unique perspective that is a catalyst for effecting change.

The twenty-some interviews in this chapter represent the views of the most promising emerging professionals across the nation in green building today. These architects, designers, contractors, engineers, city planners, green consultants, and graduate students are all part of the U.S. Green Building Council's Emerging Professionals program, a nationwide initiative that works with local USGBC chapters to help develop the next generation of green building leaders. The program is geared toward individuals out of school and under 30, but does not exclude anyone who may be interested. Local Emerging Professionals committees and their USGBC chapters focus on leadership development and community impact by hosting educational, community, and networking events for those just embarking on their green building careers. Despite their relative newness to the field, these professionals are already building strong reputations and paving the way for the next generation of sustainable experts. From pairing with nonprofits to create a hugely successful volunteer day to assist those in need, to creating a local community center in Peru that serves former gang members, the successes of this group are astounding—and extremely heartening.



Omega Center for Sustainable Living: South view detail. The south facade features operable windows and a roof design that allows the ideal amount of daylight into the Eco Machine and educational spaces. The south facade opens up onto the constructed wetlands, one of the stages in the water purification process (LEED NC Platinum and Living Building Challenge Certified). Firm: BNIM. PHOTO: ©ASSASSI/(BNIM OWNS FULL RIGHTS)

These interviews give insight into this group of emerging leaders' perspectives, including the following topics:

- Why enter the field of green building?
- Greatest influences?
- How to get involved?
- Advice to those considering the green building field
- What is missing from the green discussion?
- Scary issues and possible solutions
- Forecasting green building trends

Career Merger

LISA LIN, LEED AP BD+C

International Council for Local Environmental Initiatives (ICLEI)

Local Governments for Sustainability

What made you choose green building as a career (or volunteer)?

› I wanted to be an architect since I was five years old, but it wasn't until my time in college that I was introduced to green building. When I studied environmental design, I never would have guessed that the environmental aspect of the degree would become such an elemental part of my life and supersede design. To me, architecture was more than highly engineered curves, rare metal skins on building facades, and monumental statements to mankind. It was about how buildings were oriented to achieve the maximum amount of natural daylighting, how roof design can help capture rainwater, or how local materials should be chosen to respond to the building's context and region. It was about how buildings coexist with nature, not how they develop on it. After having worked in the architectural world for five years, I have chosen to move to the nonprofit sector focusing on sustainability initiatives for local governments. I am hoping these two roads will converge in the future and bring me back to a greater understanding of promoting and working in the green building movement.

Share a green building story.

› When I went to see environmentalist, author, and activist Bill McKibben speak at the Greenbuild Conference in 2008, the one statement that lingered in my mind was his comment about the green movement. Essentially, he said that the movement had stopped moving. A lot of people discussed and

argued, but no one was putting him or herself in public and peacefully demonstrating the cause for the environment. I found myself tearing up during this master speaker session. We needed to act, and it needed to be immediate. This inspired me to gather my fellow emerging professionals and organize a local climate rally in Houston. It was the first of its kind, and it helped us move into the spotlight of being a leading green organization in our city.

Who or what has been your biggest influence in green building, and why?

› The USGBC has been my biggest influence in green building. Being the first LEED AP in my firm allowed me to educate my coworkers, using all the helpful resources I received from the local and national chapter. Also, I have had the pleasure of working and collaborating with so many other positive, enthusiastic, and visionary green leaders through this organization. Aside from the benefits of networking with everyone, each person brings so much insight from their field of work, and that wealth of knowledge is invaluable. I have a lot of respect for this organization because it understands how to grow, develop, and push itself to new heights as the movement changes. As an individual, that's what I strive to do as well.

What advice would you give to a student who is considering the green building field?

› The green building field opens the door to so many opportunities. It's important to focus on what one's interests are and talk to the people who are in that area of expertise. Find a mentor and learn from their mistakes and successes. The next generation of green builders will only be better and more prosperous if they know what happened in the previous generation. Also, they should understand that green

building is not limited to architecture, engineering, and construction. We are all green builders because we are building the movement.

Forecasting eco-trends—what do you see in your crystal ball?

› I think the next big thing is Living Buildings. After LEED becomes an established standard of building, everyone will be clamoring to build regenerative and restorative architecture. Gone will be the days of buildings that are “less bad.” It will be about “how good” buildings will be for the environment. It will become a truly integrated system.

What scary green factoid keeps you up at night? Any solutions?

› Overpopulation. I think everyone should read *The Population Bomb* by Paul Ehrlich.

What inspires you the most about green building?

› Knowing how much influence green buildings have on our natural resources, quality of life, health,

biodiversity, economy, energy (and the list goes on) inspires me to feel like I am making not only a positive impact but also a substantial impact on the Earth.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› Through the many friends I have made through the USGBC, I was able to find a new job that aligns more closely with my passion for the environment. I have officially joined the ranks of the green-collar work force, working for a nonprofit that helps local governments implement climate action plans. I am hoping the technical knowledge I acquire about greenhouse gas emissions and public policy will help my future career in promoting living buildings. Also, my volunteer experiences are always enriching and memorable. There will always be people to be educated, enlightened, and moved, and I will be there as a champion of this movement. In other words, I feel like I am not just one individual, I am part of a huge network of individuals that is saving this planet.

Deep Roots

LINDSEY ENGELS, LEED AP BD+C

Project Coordinator

LPA, Inc.

What made you choose green building as a career (or volunteer)?

› I chose green building as a career because it was just the right thing to do, and the way I was brought up. Growing up in the San Francisco Bay area, it's

what we learned in elementary school along with our ABC's. Recycling was a standard thing to do, like washing dishes or doing laundry. Conserving resources was just what you were supposed to do, why would you be wasteful? So, when it came to work, I knew I wanted to be an architect, but when it came to adding the sustainability aspect, I didn't have to think about it. I mean, who wants to do substandard work that is outdated and less desirable? Buildings built sustainably are just more comfortable.

Share a green building story.

› Before I started working at LPA, Inc., I became very familiar with one of their new buildings in Newport Beach, called the Environmental Nature Center. Although the Environmental Nature Center itself has been around for a while (started in 1972), it was initially just a gully next to a high school that was more or less used as a dumping site. It was considered useless land, situated between a high school and private residences, until some biology teachers and student volunteers decided to transform it into a living laboratory. They took “waste soil” from an excavation (the high school was adding a swimming pool) and added

it to the site as a buffer between the athletic fields and the nature center.

Over time, non-native species were removed and replaced with native species, and very recently, they completed their first real building on the site, which was a LEED Platinum facility. This building is powered completely from solar panels, has no air conditioning, and is naturally ventilated. This now top-notch learning facility offers two classrooms, an office area, a main lobby/learning area, an outdoor fire pit/auditorium, a butterfly habitat, and of course, the native garden itself.

Atrium with wood trellis. PHOTO: DAN GRILLET



To me, though, the best part about this whole thing is that the dreams of a few teachers and student volunteers back in 1972 were held onto throughout the years, and expanded on in the whole design, construction, and use of the new building. And it added value to the neighborhood, created a stronger sense of community, and resulted in a place where the public is welcome to stroll in and get educated on the environment. The value of this building and the Environmental Nature Center as a whole extends well beyond its property lines.

Forecasting eco-trends—what do you see in your crystal ball?

› In the future, I think “local harvesting” will be key. You can harvest water from rain or from gray water sources such as sinks. You can harvest food from an organic garden on your patio. (I did it when I lived in an apartment.) People are so grid dependent that they forget what is available to them, right under their noses.

What scary green factoid keeps you up at night? Any solutions?

› In all my reading, research, and information, the one thing I always come back to is how the general public has no idea what is in their food, where their

water comes from, or what the products they use in their daily lives are really made from. People think reducing our petroleum dependence means driving around less and having a fuel-efficient car. It helps . . . a little. Did you know that plastic is usually made from petroleum, breaks down into more plastic, and then some of it ends up circling in our oceans in little bits. Or heck, did you know a Butterfinger has a petroleum-based ingredient? They call it TBHQ on the nutrition label. It’s an antioxidant/preservative made from petroleum. Still sound yummy?

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› I think volunteering and working at a green architecture firm go hand-in-hand. Really, I wouldn’t have gotten this job without having my volunteer work on my resume.

I could confidently tell my employer that I wanted to do green building and back it up. Considering LPA, Inc. requires all employees to be LEED accredited (I already was), that was a huge selling point. Being in the green building industry really requires you to keep up with the latest technologies and trends. Working and volunteering together keeps me up to speed.

City Planner with a Passion

BRIAN C. SMALL, LEED AP BD+C

City Planner

City of Jacksonville

What made you choose green building as a career (or volunteer)?

› Green building is not just my career, it is my passion. I have a passion to create sustainable environments that include residential dwelling units, commercial buildings, offices, and industrial sites. My underlying goal is to always reduce energy, and save and preserve wetlands, open space, and mass transit lines. As a city planner, I have an opportunity to weigh in on development decisions that are going to last for the next three generations. In a sense, I am developing the world that my future children are going to play and live in. With that knowledge, I simply want to give them the best future possible.

Share a green building story.

› I read a story that students were being sent home from school because of the mold and air quality in the building. After that story, my personal action and involvement escalated.

Who or what has been your biggest influence in green building, and why?

› My father (Ron Small) was the greatest influence in the development of my green building passion. My father is a residential home framer. Since I was little he taught me to pound nails, cut wood, measure, etc. But as I grew older he taught me the importance of reducing material consumption, having a clean and safe environment, as well as reducing the amount of electricity needed for a home. More importantly, he taught me the benefit of savings in materials, energy, and construction. Since my ap-

prenticeship with him, I have been passing along his knowledge and values through my work and research as a city planner.

What advice would you give to a student who is considering the green building field?

› If people are not laughing at your ideas, then you are not dreaming big enough. Learn the system, build your reputation, and then dust off your ideas and present them and ultimately implement them. When I asked why we don't have LEED building in our city, the decision makers laughed and said it was too expensive and impossible to get funding. We now have three LEED-certified buildings and a green building ordinance that mandates all new construction or reconstruction buildings must be green building certified.

Forecasting eco-trends—what do you see in your crystal ball?

› Ecological trends in the next twenty years will involve water, pollution, population, garbage, and air quality.

What inspires you the most about green building?

› The greatest inspiration for me is the energy of people when they first get involved. They ask questions and voice concerns that challenge the status quo. The energy and enthusiasm are the inspirations that make the hair on my neck stick straight up.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› In one word: networking. The opportunity to meet people is multiplied when you are involved in both a professional and volunteer atmosphere. And to be honest, some of the best networks I have formed do not occur in the office setting. The best networking occurs when you are getting your hands dirty and making a difference in your community.



Residential streets are reduced below the City of Seattle standard to 26' curb-to-curb, slowing traffic and increasing pedestrian safety while maximizing pervious surfaces. High Point Community, Seattle, Washington (Built Green Three Star Rating). FIRM AND PHOTO: MITHUN



Market-rate home-ownership parcels and SHA rental homes are dispersed evenly across the site, providing equitable access to open space and views for all High Point residents. High Point Community, Seattle, Washington (Built Green Three Star Rating). FIRM AND PHOTO: MITHUN



The natural drainage system routes storm water from the entire site through infiltration and conveyance features in the right-of-ways to a retention pond. This provides both water-quality and water-quantity protection for the salmon-bearing Longfellow Creek below the hilltop site. High Point Community, Seattle, Washington (Built Green Three Star Rating). FIRM AND PHOTO: MITHUN



As runoff is collected and conveyed through the natural drainage system to the retention pond, multiple strategies are employed to maximize infiltration of stormwater runoff throughout the site. This provides for a verdant and varied streetscape. High Point Community, Seattle, Washington (Built Green Three Star Rating). FIRM AND PHOTO: MITHUN

Exponential Impact

JIM RATLIFF, LEED AP BD+C

Project Manager

Champlin Architecture

What made you choose green building as a career (or volunteer)?

› My green building career started in college. For my senior design project, I designed a fire station to be LEED certified. Throughout the process I studied green building design and documentation. After becoming a LEED AP, I started volunteering with the USGBC Cincinnati Regional Chapter's Emerging Professionals Committee (Emerging Green Builders, at the time). The group helped develop skills relating to the organization of the group and its activities—such as hosting the annual design competition. I am now documenting a LEED project in my professional career and I continue learning more about green buildings by working on these projects on a daily basis.

What advice would you give to a student who is considering the green building field?

› My advice to a student considering the green building field is to look at all of the indications that show how green building will advance over their lifetime. It's not just a trend—it will be the

new standard, and you can help make the needed changes. You'll find yourself a valuable asset to both your employer and your community as green building becomes a requirement. If you are planning on a design profession, I would recommend learning as much as possible about building information modeling and how it can be used to improve green building design.

Forecasting eco-trends—what do you see in your crystal ball?

› Eco-friendly products will continue to become accessible to everyday users. Homeowners are learning what they can do to make their home energy efficient and “green.” With companies developing new products, it is becoming a competitive marketplace for who can come up with the most affordable and greenest product.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› The coinciding professional and volunteer experiences have enriched my career by making me the go-to person in the workplace for knowledge of LEED and green buildings. By volunteering I get to meet people with various backgrounds, and I'm able to make friends outside of the workplace.

As you embark in a career (or volunteer) in green building, what has surprised you the most about the field?

› How much work there still is to be done. I guess there is a little bit of naiveté that says that most of the world's problems have been solved and at best I can offer a contribution. Being involved in the green building movement, I've had an opportunity to see, firsthand, just how much opportunity there is to really do some impact work. That's a major draw.

Ventrell Williams, Assoc. AIA, LEED AP O+M, Bank of America

› I was surprised by how easy it was to get involved. Like many volunteer-based organizations, the vast majority of the work gets done by the dedicated few. Green building is no exception. If you show up with a willingness to roll up your sleeves and take on responsibilities, you can learn as you go along. This is not true of all fields.

Lauren E. Graham, LEED AP, graduate student

› How new it is to everybody in the industry. The playing field is level for all; in what other industries can a young professional take their education upon themselves and be as knowledgeable in the

technology and methods of green building as experienced members of the industry?

Mark Schrieber, LEED AP BD+C and Homes, project manager, The Spinnaker Group

› Despite the range of experience in green building that exists in the industry, the network of professionals is very small. It is one of the few professions that people can truly enjoy doing and integrate into their daily life.

Marc Costa, LEED AP BD+C, CGBP, Environmental Technology Programs, Long Beach City College

› It really amazes me how much people still don't know about the movement. While it feels like some people are fully invested, others don't know the first thing about going green. Or maybe they just don't care. I still see people throw away cans when there is a big blue bin right next to the trashcan. The challenge is really in the education. How can we change the habits of the greatest amount of people in the shortest amount of time?

Ryan R. Murphy, Associate AIA, CDT, LEED AP BD+C

Inspired by Generation Next

DANA MATHEWS, IIDA, LEED AP ID+C

Interior Designer

Hickok Cole Architects

What advice would you give to a student who is considering the green building field?

› Stop considering and get involved. If you are pursuing an education in architecture, design, or

construction, then you are pursuing a green building field; it is no longer a trend but commonplace, and you are expected to be versed in green building principles to be a viable asset to any firm. Indeed, those hiring are looking to emerging professionals to provide the knowledge base necessary to compete for the larger or high-profile projects that require sustainable design and LEED certification strategies as part of their request for proposals.

What has been your best experience as a USGBC Emerging Professional?

► I've had so many great experiences while serving as co-chair for the National Capital Region Chapter's Emerging Professionals. I've stood neck-deep in mud while digging holes and planting trees in a November downpour I've helped fellow EPs gain various means of employment in the green building industry, including recommending a young

professional who now works at a leading construction company and is now spearheading their green education initiative, and an individual who now works at USGBC National. My favorite and most memorable experience was a meet and greet I hosted with renowned sustainable chef Barton Seaver at his restaurant Blue Ridge in Washington, DC. Guests of all ages and types were in attendance—including a newborn representing our future!

LaGrange College: Lewis Library and Gulley Gateway (LEED NC Silver). PHOTO: 2009 DAVID MASSENGILL



We had truly reached a wider audience who was interested in listening and learning about sustainability. I was grateful to have the opportunity to spread the goodwill of the green movement.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› My single most important project to date is the Spanish Education Development Center (SED) in Washington, DC. SED is a forty-year-old child development center with a focus on providing low-cost child care and enrichment programs for Hispanic families. I was part of a team responsible for the design of their new building, a complete renovation of a 24,000-square-foot Art Deco style 1940s-era former Hahn Shoes warehouse in the Petworth area of Washington, DC. The project did not have the fee to pursue LEED certification, but I nonetheless followed guidelines established by the LEED for Schools pilot program.

Classrooms have access to natural daylight. Low-VOC materials were used throughout. Partition assembly was designed to establish auditory barriers between classrooms to reduce noise and distractions. An existing porch and fire escape was transformed into an outdoor science lab. The children are designing a garden with their teachers to help them learn about nutrition, colors, and botany. I willingly volunteered countless hours of my own time researching ways in which to make this building sustainable for the children attending, and I was there on move-in day lending a hand to install the pint-sized chairs and art easels donated by the local community on move-in day.

My hope is that some of the children who matriculate from the SED Center go on to pursue green careers and volunteer with their local communities because of this school's green designs and the community efforts put forth to make it a reality.

So Complicated Yet So Simple

BRITTANY GRECH, LEED AP BD+C, O+M

Sustainability Coordinator

YR&G Sustainability

What made you choose green building as a career (or volunteer)?

› I chose the green building industry for my career because it can be so complicated and so simple all at the same time—and it's everywhere. We deal with everything from simple operations solutions to extremely complicated situations, like achieving net-zero neighborhoods. It is also an area where I feel that as an individual, I am capable of making a big difference.

Who or what has been your biggest influence in green building, and why?

› Well, this may seem lame, because I was the co-chair of the Emerging Professionals in NYC, but the Emerging Professionals! When I first moved to NYC, they inspired me to start my first business. I was hired at YR&G because the past EP co-chair works at YR&G

and recommended me. It is really a unique community of people that has continuously inspired me and supported me—which is not an easy thing to find in NYC's competitive building/real estate industry.

What advice would you give to a student who is considering the green building field?

› This industry is competitive and full of passion—bring that to the table. Getting your LEED AP (or Green Associate) is only the first step. This field is looking for folks that demonstrate leadership and a diverse set of skills.

What scary green factoid keeps you up at night? Any solutions?

› Factoids are a tool to convince others. They don't keep me up at night—they fuel me during the day. Better, more innovative solutions are developed every day. I try focusing my energy on making a difference, rather than what's not working. And in green building, the issues are all-important—it's just a matter of prioritization.

Optimistic Simplicity

**ALESSANDRA R. CARREON, PE, LEED AP O+M
ENVIRON**

What made you choose green building as a career (or volunteer)?

› I truly believe that in order to obtain a sustainable society and planet, it is not sufficient

to design large systems that can lead to sustainability, it is important to live and plan sustainably as well. While my job exposure to green building is limited as a consultant involved primarily in environmental compliance and permitting of industrial facilities, I find that volunteering in green building allows me to build the necessary educational background that can inform my consult-

ing career as well. Furthermore, my voluntarism allows me to meet thought and civic leaders in green building that I would not necessarily have met otherwise.

Share a green building story.

› One of the simplest examples of green building that accidentally made its way into and impacted my life has to do with space and size. I moved from a city in which three-bedroom, 1,500-square-foot apartments were cheap and the norm. These apartment complexes came complete with many amenities—for instance, large, lavish pools and apparently useless pool décor, including gas-fired flame torches.

While I noticed such energy-intensive amenities, I thought nothing of this until I moved to Seattle, WA, and my living space was reduced to a third of my previous apartment and the elaborate amenities were absent. I found that I had the exact same amount of “stuff,” that my utility and electricity bills were exponentially lower, and that I felt happier with my space. This green building story shows that existing buildings can sometimes show you greener pastures with a life change for the better—and for the simpler!

Forecasting eco-trends—what do you see in your crystal ball?

› I am very optimistic about the future and the implementation of green or eco-based practices. My crystal ball shows signs of hard work to reach a society and standard of living that cannot help but exist on sustainable principles. I don’t see how the planet populations can go much longer without seeing the need for this lifestyle shift—if not resource depletion, a devastating scenario, then

simple common sense will lead everyone to an “a-ha!” moment where sustainability prospers. If I had to choose one specific area on which to focus, I would forecast more serious attention will be applied towards water sustainability and efficient water management.

What inspires you the most about green building?

› Humans’ relationship with the built environment is ancient and will continue to persist as long as humans exist. Green building represents a way for humans to continue innovating, progressing, and building in such a way that our humanity can be maintained and ultimately nurture and—hopefully—improve the very environment in which humans build.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› My volunteer experiences have certainly informed my professional pursuits, helping me understand wherein my skills, talents, and passions lay so that I can embark on a career path that will have maximum impact in furthering sustainability progress in industry and business. Conversely, my professional experiences in environmental permitting, compliance and LEED-related projects allow me to have perspective in industry trends that can be further explored in my volunteer experiences. A career in sustainability inevitably enriches my personal life, because my other endeavors and volunteer work all tend to support or aspire to build a sustainable, green future.

What is missing from the green discussion?

› More diversity. This could be applied to race, profession, and age. The earlier we bring up the green discussion the better. It needs to spread to groups that do not normally talk about environmental issues, and we need to inform them about why they should be in the dialogue.

Lisa Lin, LEED AP BD+C, ICLEI, Local Governments for Sustainability

› Communications. You've got a green building, now what? Whether your building is LEED Platinum, certified, or even "LEED-certifiable," why did you pursue it, and how can you tell your story in a way that is meaningful to your audience?

Brittany Grech, LEED AP + BD+C, O+M, sustainability coordinator, YR&G Sustainability

› What is missing from the green discussion is a more express effort at linking green opportunities or sustainable solutions to all aspects of business and industry. "Green" is still seen as a distinct or explicitly different emphasis or effort, while it should be made more ubiquitous in all kinds of operations.

Alessandra R. Carreon, PE, LEED AP O+M, ENVIRON

› More emphasis on how to educate people that living sustainably doesn't mean that you have to live in the woods and eat berries. I try to show people that you can really have a comfortable and more rewarding life by taking a hard look at your priorities. Another thing missing is access for all to the good way of building and living. Until the healthy, organic deliciousness costs close to what the "food" that is passed out of a drive-thru window costs, it's not mainstream.

Heather Smith, City of Houston on the Green Office Challenge, VP of program development for veterans programs under the Bush Cares Project

› It is mentioned some, but I think we need to look much more closely at the triple bottom line costs of not doing green and the true impact it has/will have on our lives.

Stephanie Coble, RLA, ASLA, landscape architect, HagerSmith Design PA

› Community buy-in and inclusion. We have approached it mainly from a new construction view to this point. We have to expand the grassroots movement to truly include everyone in the community. The green movement is not only for those who can afford high-profile green projects.

Edward Wansing, Associate AIA, LEED AP BD+C, project manager, sustainable design assistance, Architectural Energy Corporation

› I think that a true environmental education is missing. Of course we rely on experts to guide our decision making, but the average person has a limited knowledge of environmental sciences, making it difficult to separate solid, factually based information from junk science.

Lauren E. Graham, LEED AP, graduate student

› A comprehensive plan to ratchet down on energy efficiency to meet sustainability goals on our way to regenerative buildings. We are moving in the right direction but need a more concise goal to be moving towards.

Mark Schrieber, LEED AP BD+C and Homes, project manager, The Spinnaker Group

› The people that don't want to be a part of the green discussion.

Marc Costa, LEED AP BD+C, CGBP, Environmental Technology Programs, Long Beach City College

› Can you go green without going LEED? And as a building user, how can you tell the difference between a truly green building and one that uses the word "green" as a marketing tool?

Miriam Saadati, LEED AP, Tangram Interiors

Opportunity Local

STEPHANIE WALKER

Interior Designer

The Flooring Gallery

What made you choose green building as a career (or volunteer)?

› I became interested in interior design and environmental awareness separately. During my time working for a large corporate tile company, I pondered the impact we were having as a company, and it did not sit well with me. I imagined the large quarries of earth being gutted for use in our floors and on our countertops. I was laid off in March of 2008 and seriously considered my future as a designer. I was still in school, so I utilized my resources and began researching environmentally responsible design principles. I fell completely in love! I try to live my life as environmentally aware as I possibly can. Why should I not try to be a responsible citizen and extend these values to my professional life as well? I get excited when my customers are interested in environmentally responsible choices for their homes.

Share a green building story.

› Being unemployed for a year and a half was really the best thing that could have ever happened to my career. I was able to reflect on the best, and most environmentally sound choices as a designer.

Who or what has been your biggest influence in green building, and why?

› I would say that Gill Holland, a California movie producer has been a great influence on

my interest in the green building movement. He moved here to be in his wife's hometown (Louisville, KY) and shed light on the green building movement in our city. He built The Green Building downtown, which is a multipurpose museum, restaurant, and office space in Butchertown, our own "meat-packing district." His goal was to receive LEED Platinum certification and he succeeded admirably.

The construction of this building has completely revitalized our East Market Street neighborhood and created a lively atmosphere of local and sustainable shops. He also does work with the local Go Green Louisville organization.

What advice would you give to a student who is considering the green building field?

› Make sure you read plenty of trade material—textbooks, current magazines, blogs, etc. Subscribing to the works of like-minded professionals helps to keep you informed, energized, and motivated. Also, network! Join a monthly group that will be helpful to you. Do not underestimate the value of professional knowledge (i.e., leads, job openings) that others are willing to share. There are many valuable contacts that I have made through professional networking events.

Forecasting eco-trends—what do you see in your crystal ball?

› There is a push toward biomimicry: that is, studying the natural world for processes that work more efficiently. It dumbfounds me that this is a new concept in the building industry.

What scary green factoid keeps you up at night? Any solutions?

› Buildings are such a large consumer of energy, we have to create more efficient methods of managing the energy use in all buildings we use. Looking at the larger picture should be a priority. Do we need to build new, or can we remodel existing structures? The greenest building practices are in using what resources we already have.

What inspires you most about green buildings?

› That there are efficient solutions for our problems. That we can step foot into a structure that is not only healthy from an energy standpoint, but also from a human perspective. A truly green building should be a healthy building. This means a high level of indoor air quality. This leads to a more productive human force. What is so inspiring about this? The level of human possibilities is endless!



201 Westlake, Seattle, WA (LEED CS Gold). Firm: Callison. PHOTO: CALLISON/CHRIS EDEN 2011

Landscape + Art

STEPHANIE COBLE, RLA, ASLA

Landscape Architect

HagerSmith Design PA

Who or what has been your biggest influence in green building, and why?

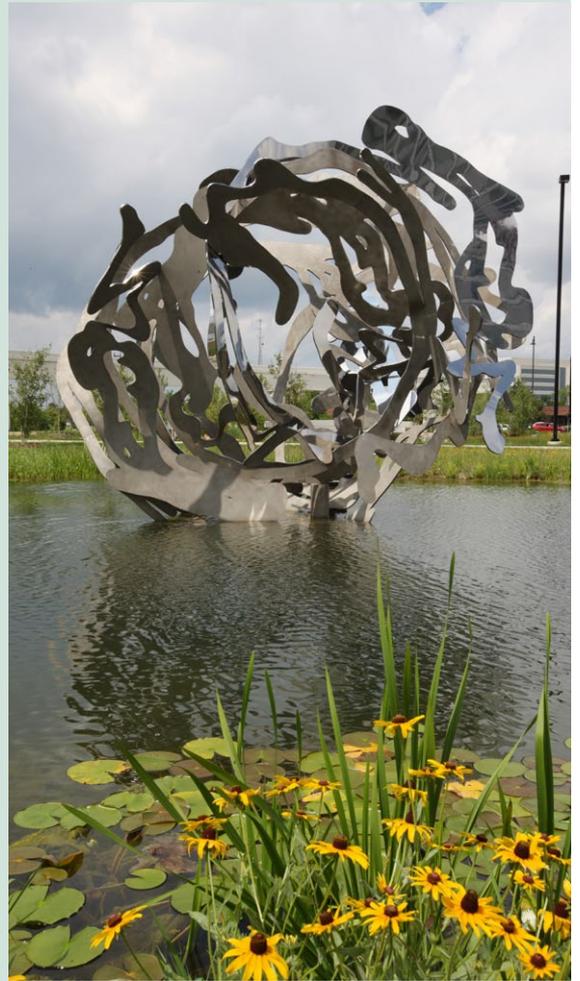
› Dr. Charles Headington is the person who has had the most profound influence on me. He is a professor at University of North Carolina at Greensboro (UNCG) who taught my honors Ecological Revolutions class. The class was amazing, and an invaluable mind opener that set the foundation upon which I stand today! This emerging profession seemed like the perfect way to combine my love of art and design with that of the natural world. I applied to NC State University's College of Design's Landscape Architecture program, and was accepted. My final degree project was the conceptual design of highly visible rooftop healing gardens at a local hospital.

Forecasting eco-trends—what do you see in your crystal ball?

› I foresee more environmental/climate disasters that will force various eco-trends and changes in lifestyle. More specifically, our need for healthy food, clean water, and a stable climate will positively influence eco-trends, but failing economies, natural disaster recovery, and shrinking resources may stall these trends in certain aspects. I'll certainly not give up and will continue my mission to do what I can, because as a collective of aware individuals we are the drivers for change.

What scary green factoid keeps you up at night? Any solutions?

› The Earth has a finite amount of resources and well-established ecosystems that work like a machine



Renaissance Schaumburg, Schaumburg, IL. Sculpture "Chronos" by John Portman in the water garden. Firm: John Portman & Associates. PHOTO: JAMES STEINKAMP

to keep our planet inhabitable. The sheer amount of people living in our world today, coupled with an ever-expanding population, is worrisome in terms of the stress we are putting on this well-oiled machine.

Solutions include public awareness, green infrastructure, legislation—and changing culture and values. We need to make it easy for people to live more and adapt methods of sustainability into everyday life. Examples are bringing your own reusable bag to stores, significantly less packaging on products, bike lanes on all streets, recycling required everywhere, dense development, wildlife corridors in regional/city/town planning, green infrastructure, updated legislation to give credit/allow for innovative design such as green roofs and wastewater treat-

ment, green lifestyle programs, and sustainability classes in schools and in the workplace.

What inspires you the most about green building?

› As a designer in the field of landscape architecture, one of the things I'm inspired by the most is the opportunity for creativity. Incorporating design into natural systems offers the opportunity to appreciate the beauty of our world and the greater grand design, and this is the very prospect that inspired me to become a landscape architect.

Smart Moments

WILL SENNER, LEED AP BD+C

Senior Project Manager

Skanska USA Building

What made you choose green building as a career (or volunteer)?

› For me, green building was always less about being green and more about being smart—being more efficient with the way we use our resources (materials, energy, etc). The choice to get into green building as a career wasn't much of a choice at all. It was just obviously the only right way to build.

Who or what has been your biggest influence in green building, and why?

› It's hard for me to choose a single biggest influence in my career. If I had to choose a single entity, it would probably be the USGBC community as a whole. The longer I've been involved in this career, the more I've realized that although we can all ac-

complish great things ourselves in our local areas, we can only truly succeed together, globally.

What advice would you give to a student who is considering the green building field?

› Don't be afraid to lead with your heart. If you truly have a passion for sustainability, it will be your greatest tool. Your challenge will be learning how to harness it and adapt your message to different audiences and different types of people so that you can truly leverage that power of community.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› I think one of the most convenient things about my work with USGBC has been the fact that the education, networking, and leadership opportunities have allowed me to grow tremendously professionally within the green building arena, and yet I'm able to do work that is simultaneously very fulfilling personally thanks to USGBC's overall mission and social equity agenda.

NATURAL TALENT DESIGN COMPETITION IN NEW ORLEANS

Not only does the USGBC Emerging Professionals program benefit its participants—with educational, networking, and community opportunities—but it also strives to lend a hand and apply green building skills to people and places in need. One such example is the annual Natural Talent Design Competition. In 2010, the competition was a collaboration between USGBC and the Salvation Army's EnviRenew program. In the aftermath of Hurricane Katrina, the Broadmoor neighborhood was one of the most blighted in New Orleans, with water levels having risen above seven feet. The Natural Talent Design Competition provided a platform for environmental home designs whereby the winning designs could become reality. An expert panel of jurors announced the winners of the Natural Talent Design Competition; two teams of students and two teams of emerging professionals received awards. Design features included:

- Small building footprint of 880 square feet
- Energy efficiency for lower future energy bills
- Affordable design and construction with the maximum cost of \$100,000
- Designs that reflect the community context
- LEED Platinum certification

The designs are currently being built in the Broadmoor neighborhood. Check out the progress at: <http://www.usgbc.org/DisplayPage.aspx?CMSPageID=2426>

Vacant lot. PHOTO: USGBC





Run-down house.
PHOTO: USGBC

Natural Design Talent Competition flyer. PHOTO: USGBC

PRESENTED BY THE SALVATION ARMY®  **Envirenew**

New Orleans, Louisiana Broadmoor Neighborhood
A LEED for Homes Design

USGBC'S NATURAL TALENT 2010 DESIGN COMPETITION

Small. Affordable. Green.

2 teams of students + 2 teams of emerging professionals =
4 national finalists, 4 green homes in the heart of New Orleans,
4 families with a better place to live

National Finalists will travel to New Orleans and to the U.S. Green Building Council's Greenbuild 2010 in Chicago where their designs will be showcased on green building's biggest stage! Register and submit your project by May 31, 2010.

INFORMATION
www.usgbc.org/designcompetition
www.openarchitecturenetwork.org/competitions/naturaltalent

INQUIRIES
designcompetition@usgbc.org





Rick Fredrizzi on-site.
PHOTO: USGBC



Little Easy rendering.
PHOTO: FREEGREEN.COM
ARCHITECTURE



E.A.S.Y. House rendering.
PHOTO: JOON HA

All about People

MICHAEL PULASKI, PhD, LEED AP BD+C

Project Manager

Thornton Tomasetti | Fore Solutions

Tell me a green building story that has impacted your life.

› After finishing our graduate degrees, my wife, Amy, and I got married in August 2005 and decided to spend nine months volunteering on our own in Peru—an extended honeymoon of sorts. Our adventures really began when we arrived at our second destination, Chimbote, Peru. Forty-five percent of the people in this city of 400,000 people live in extreme poverty.

We had a contact there named Father Jack, who ran a very impressive nonprofit group called “Los Amigos” that provided every type of social service imaginable, from education to food to medical assistance and housing. Amy and I started off by assisting in the redesign and construction of a new quinta, an enclosed ten-unit housing development intended for abandoned women with children. After a month or so, Father Jack put us in charge of a little community center that was open a few hours a day for kids to play games and get off the streets—and was the center of the territory of one of the most violent gangs in the area. We started doing some community projects, cleaning up and painting the center, bringing in some new games and repairing an old foosball table, and eventually getting funding to work in the park across the street to finish some sidewalks, put in an irrigation system, and start some plants. We started talking to the young men and asking them, “What is it that you guys really want?” Most of them said they wanted “a job” or to “finish school.” We soon learned that none of them

had any real skills, and most of them didn’t finish their high school education, some didn’t even finish elementary school, and these were mostly eighteen- to twenty-five-year-olds.

So we listened to the young men, took notes, and spent a lot of time asking questions to find out what resources were available. We were soon able to enter about twelve of them in an education program where they could work in the evenings to finish their high school degree. We started to teach them some English.

We also met with the women, who also typically didn’t have any work. So we found a local artist who we were able to hire and start teaching the women the art of jewelry making (artesania). We were able to purchase some of the tools and material necessary to get the group started. We also were able to make an arrangement with the local trade institute, and they came to the center and offered classes in welding and electricity, skills that the men could then use to get jobs. The success of our youth center soon spread and, before we left town, two others had sprung up.

We could see that this concept of creating opportunities for the youth to actually acquire skills that could immediately be used in the field was getting them excited, off the streets, and doing good work. The youth center could be like a hub for various trades, carpentry, metal work, electricity, and jewelry making that could enlist and teach people throughout the community. I drew up some plans, thinking that someday a big donor may come by and be interested in funding such an opportunity. And the most unexpected funder did come by: the City of Chimbote. Every year they do a building project for the community, so Father Jack got word

of this and brought the city officials by our bustling little youth center. I showed them my plans and they agreed to build it

We left town a few weeks later, but we returned a year later, and there was our building, far greater than we could have ever imagined. There were two floors with a walled-in soccer field for the kids to play in, and four workshop areas each with a little shop (or tienda) out front to showcase the various products that were made. All built with local materials and local labor. Those kids in one of the toughest gangs in the country had helped build themselves a beautiful building that is helping to reduce the violence, restore some peace, and hopefully put more people to work and improve the lives of those living in the Antenor Orrego neighborhood of Chimbote, Peru.

Who or what has been your biggest influence in green building, and why?

› Dr. Michael J. Horman was by far the most influential person in my life and certainly with respect to my entry into the green building industry. He picked me out of our fourth-year Construction Management class one day, and asked in his young professor “Aussie” voice, “What do you think about doing an internship at the Pentagon . . . hey?” It all worked out and I spent the summer of 2001 working on Wedge 1 (of 5) of the Pentagon Renovation, learning all about various construction practices.

Just about every other week, Dr. Horman would come down to DC to talk about my progress, get me thinking about writing papers and other research ideas. One day he asked, “What do you think about doing a PhD?” I was initially taken aback. But I decided that it was an opportunity that I just couldn’t pass up. So I was convinced to spend the next three years working very closely with the Pentagon and Dr. Horman on what turned out

to be some of the most exciting and intellectually challenging years of my life. Our work aimed at merging the design management practices of improving project constructability and applied those practices to the integration of sustainability issues on projects to improve project performance. No one had taken this angle on the topic before. We spoke at several conferences on the topic, wrote many journal articles, and quickly became field experts in this topic of how to manage the sustainable design process. Dr. Horman took this another step further and was awarded one of the most prestigious tenure track faculty grants in the academic world, a National Science Foundation Career Grant to start the Lean and Green Research Initiative, which aims to improve the delivery of high-performance buildings through the development of resource-efficient (lean) processes that maximize value at minimal delivery cost, and is still in operation today at www.leanandgreen.org.

I was devastated when I heard that Dr. Horman had passed away unexpectedly at the very young age of 38, on September 15, 2009. He taught me so much and played such a huge part in shaping the person I am today. A green builder’s life isn’t always about building projects; it’s really all about people.

Forecasting eco-trends—what do you see in your crystal ball?

› Existing buildings offer the greatest opportunity for drastically reducing carbon emissions.

What inspires you the most about green building?

› Right now some of the more forward-thinking groups are trying to crack this nut of how to cost-effectively get to a net-zero building. It has been done and can be done. And what’s next, a living building, a regenerative building? The beauty is that there is no end to the possibilities.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› The best example that comes to mind is when I volunteered to work on the Habitat for Humanity of Greater Portland's new Green Building Initiative. The initial call for volunteers went out and at the time I was doing a lot of work in the

Boston area and didn't know many local green building folks in the Portland area, so I decided to join. It was an incredible experience that really opened me up and got me connected to many of the local experts. We ended up building four new Habitat houses in a small subdivision, all of which achieved several different forms of green building certifications.

Bravery Pays Off

EDWARD WANSING, ASSOCIATE AIA, LEED AP BD+C

Project Manager, Sustainable Design Assistance

Architectural Energy Corporation

What made you choose green building as a career (or volunteer)?

› I decided that I wanted to be an architect at a young age and I ended up getting my bachelor of architecture from Kansas State University. After graduation, I moved to Nashville, TN, to work for Gould Turner Group, where I had done an internship the previous year. While working in health-care architecture, seeing developments go up and trees come down all over the country, I decided we should be doing things differently. I grew up on a small farm in rural Missouri, and had developed a love for nature and the land that we cared for. Seeing all of the land that was being destroyed in the name of "progress" was something that I couldn't continue to be a part of. I went to a meeting at Vanderbilt University at the LEED-certified student commons building and learned about the USGBC Emerging Green Builders,

now the USGBC Emerging Professionals. I joined the group, and become the chairman.

Share a green building story.

› I was working on a new hospital project. The community had mandated the new facility be LEED Silver certified, or not be built. It was the first LEED project that I had worked on, so there was a big learning curve for me, and the rest of the design team, and the client. I was the lead on everything LEED.

It seemed that every idea I brought the table to achieve the certification was considered too expensive, or wasn't the way the client did it. It was a great learning experience. I had to understand when the client had a legitimate argument, but also when they were just scared of the unknown, and how I could alleviate their fears. It was as much a lesson in psychology as a lesson in green building. I found that I had to bring the client out of their comfort zone on many of the issues that would make big impacts on our design. Most of the time this meant that I got yelled at for bringing up an idea that had already been shot down, but it also meant that I got to the root of the concern, and learned to present my idea in a way that made the project better, and satisfied

the client. The most memorable example involved the site drainage. I was proposing pervious paving and natural infiltration that would reduce the amount of site runoff and the amount of stormwater piping that would be placed under the parking lot. This was a significant cost savings, but the pervious paving was also significantly more expensive than normal asphalt. Getting our civil engineer and client to look at the big picture instead of just the cost of paving was quite a task. In the end, using an integrated design approach, and using pervious paving showed a savings of nearly \$100,000 on the site.

What advice would you give to a student who is considering the green building field?

› I would tell them to think outside the box in how they pursue their career path. There are many opportunities within the green building industry that are not necessarily thought of as “green building

jobs.” To create a truly sustainable society, everyone has to be a part of the solution. The real estate agent that is selling a house has as much power to push the green building movement forward as the architect or builder who designs it. No matter how good you are at something, if you don’t enjoy it, you will never realize your full potential.

Forecasting eco-trends—what do you see in your crystal ball?

› I am working on starting up a business in the organic waste processing industry. Organic wastes are something that have been on a lot of people’s radar for a long time. We know we should keep them out of the landfills, but it is just now becoming a hot topic. I want to make a difference in my community by reducing the amount of organic waste that goes into our landfills and reducing the costs for companies to dispose of their wastes.

LaGrange College: Lewis Library, north view (LEED NC Silver). PHOTO: 2009 DAVID MASSENGILL



What scary green factoid keeps you up at night? Any solutions?

› The sheer amount of energy that our nation uses scares me. When I hear people in my neighborhood complaining about enormous electric bills, and how renewable energy isn't viable because it is so expensive and we can never produce enough to run our energy needs, I am saddened by the lack of understanding that people have for energy efficiency. My wife and I have reduced our energy bills to 20 percent of the average Southeast household, and are producing the rest of our energy with photovoltaics. We have spent less on our home with purchase and upgrades than what many similar homes in the area

cost. Being green is not hard, or expensive, it just takes commitment and understanding. We need to have more educational programs for the general public to really get people to understand the benefits of energy efficiency and waste reduction.

What inspires you the most about green building?

› The amount of energy and enthusiasm that come out of the green building community is very inspiring. Whenever I am depressed with the lack of involvement of the community, I can always be picked back up by a discussion with a fellow green building advocate. The people who have drunk the Kool-Aid and walk the talk are some of the most inspiring people that I have ever met.

Telling the Story

**LAUREN E. GRAHAM, LEED AP
Graduate Student**

Forecasting eco-trends—what do you see in your crystal ball?

› I think that vegetarianism and veganism are going to become even more mainstream. I wouldn't trivialize a dietary choice by calling it a "trend," but I do think more and more people are becoming aware of the health benefits of a plant-based diet and also the carbon footprint of livestock production.

What inspires you the most about green building?

› There is something shiny and seductive about "new construction," but green building has made reused, recycled, and repurposed building materials en vogue. Green building also has a tremendous capacity to address issues of social equity with respect to the quality and access of housing. All communities (and the buildings they comprise)

have value, whether they are in high- or low-income areas or whether they are majority-white or majority-minority communities. I think that green building is a tool to create regenerative communities that function for ALL people, regardless of their racial, ethnic, or socioeconomic situations.

It has the capacity to make "gentrification" into a positive word, as opposed to a code word for "re-creating blighted, urban communities that are drained of color, character, and culture to make way for cookie-cutter, predominantly white, yuppie spaces."

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› I started volunteering with the USGBC prior to working as a project manager/LEED consultant. Volunteering enabled me to explore my interests in sustainability and to think about the trajectory of my career prior to committing to moving in that direction.

Creative Solutions

MARK SCHRIEBER, LEED AP BD+C, HOMES

Project Manager

The Spinnaker Group

Share a green building story.

› After graduation from college I took a break to travel which included a month in Costa Rica, where I spent a majority of my time at Rancho Mastatal, a sustainable living center which promotes natural building techniques. I was able to practice and learn many natural building techniques such as wattle and daub, work with bamboo and natural plasters, while helping to construct new buildings within their campus. This gave me a great perspective on truly sustainable building and low-impact living.

Who or what has been your biggest influence in green building, and why?

› One of the first environmental books I read was Paul Hawken's *Natural Capitalism* which was great to start with because it laid out the framework for why sustainability made business sense,

which is something I carried over into green building. Hawken has continued to be an inspiration with his other writings and speaking engagements. William McDonough would be a close second.

What scary green factoid keeps you up at night? Any solutions?

› The challenge to convert to clean energy is immense. The inability to bring the world together on a global solution is my greatest concern. I think we will see more, from solid-state lighting, material innovation to drive efficiency, and on-site renewable energy.

What inspires you the most about green building?

› The innovation and creativity behind green building excites me the most. We are faced today with questions and problems to answer and solve which haven't been parts of our vocabulary since air conditioning was invented. It adds a layer of problem solving into the design process, which helps drive true innovation and authentic design.

Who is leading the green movement now?

The U.S. Green Building Council is leading the green movement—by its volunteers and others that share a common vision. The USGBC is giving us the tools that we need to teach and promote green building.

Jim Ratliff, LEED AP BD+C, project manager, Champlin Architecture

Be Unique

MARC COSTA, LEED AP BD+C, CGBP
Environmental Technology Programs
Long Beach City College

What advice would you give to a student who is considering the green building field?

➤ Meet people in person and get involved on your campus, in your firm, in industry organizations and nonprofits. Sitting at home sending resumes to companies does little to further your professional development or to expand your awareness of sustainability. And when you are in the industry, take advantage of free (or even not free) seminars and events that exist through utility companies and local nonprofits.

Forecasting eco-trends—what do you see in your crystal ball?

➤ Being in economic and workforce development, one near-term forecast is that green jobs are growing in a time of economic contraction. With firms learning to be leaner, efficiency is paramount, which gives opportunity for green business in the operations and services sector. Ingraining green building policies in cities, counties, states, and on federal levels also proves to be a growing trend to sustain sustainability. Large-scale government purchasing as well as an increased frequency of demand for sustainability in general will drive down the cost of technologies, goods, and services that have initially given people the impression that green is more expensive.

Merrill Lynch Campus, Hopewell, New Jersey (LEED EB Certified). Firm: tvsdesign. PHOTO: BRIAN GASSEL/tvsdesign



Positive Eye-Opener

MIRIAM SAADATI, LEED AP

Tangram Interiors

What made you choose green building as a career (or volunteer)?

› I chose to volunteer with the U.S. Green Building Council because, other than other design/architecture organizations currently in existence, the USGBC has a common theme amongst their member base of people who acknowledge that what we design and build affects our environment and care enough to do something about it.

What advice would you give to a student who is considering the green building field?

› Stay on top of the latest and greatest products and research within the green community, there is always new information to soak in and it's in your best interest to always be on the lookout for it. And good luck!

What inspires you the most about green building?

› The idea of minimizing or eliminating waste when building a green building with concepts such as green roofs, reuse of existing building materials, and the use of new materials without toxins.

The Volunteer Difference

KAROLINA PORMANCZUK, LEED AP BD+C, CGPB

Office Manager

Jensen Architects

What made you choose green building as a career (or volunteer)?

› While working on a project for school, vinyl wallpaper was still highly recommended as an interior finish for commercial spaces. There had to be other options available and after some research, I learned about the documentary *Blue Vinyl*. This opened up a world of information on interior environment and air quality that I am still passionate about today.

Share a green building story.

› What is now known as the Albany Bulb in the Bay Area used to be a landfill with mainly construction debris. Currently, the Bulb is a large,

waterfront park, where you can see visitors walking their dog, taking in the San Francisco views, and even creating works of art. Though these dump sites may take years to restore, we are seeing successful examples such as Fresh Kills Park in New York. A fact that is a constant reminder to most green building professionals is that building and construction refuse adds up to about 38 to 42 percent of our total waste.

What advice would you give to a student who is considering the green building field?

If there is any advice I could give, it would be to volunteer frequently to get a variety of knowledge. You can get hands-on experience on just about any building system installation and eventually you can speak from personal experience, which can translate into inspiring a client and helping your company or organization move forward.

Forecasting eco-trends—what do you see in your crystal ball?

- › Continuing with the trend “less is more!”

What scary green factoid keeps you up at night? Any solutions?

› Indoor air quality statistics tend to keep me up at night! We spend 90 percent of our time indoors and this air is ten times more toxic than the air outside. The solution is simply to get outdoors, even for an hour during lunch, and go dig in the dirt when you have the chance. But when it comes to sleep you spend about eight hours a day on a mattress. I am convinced this is one of the most important purchases you can make. Mattresses are often constructed with polyurethane foam emitting toluene, formaldehyde and benzene.¹ All of these chemicals are noted by the US EPA as chemicals of concern.²

What inspires you most about green building?

› What currently inspires me most is looking to nature for our answers to green building. It’s exciting to see design mimicking nature and the possibilities with biomimicry.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› My previous work experience and current employment are proof that volunteering can benefit your career and personal life. Volunteering allows you to meet potential employers in a casual atmosphere, where the “informational interview” can be all about your interests and showcasing what you do best.

Emerging Green Builders Zeta Tour (LEED for Homes Platinum). PHOTO: KAROLINA PORMANCZUK



THE USGBC EMERGING PROFESSIONALS LEADERSHIP ACADEMY

The Emerging Professionals program consistently provides opportunities for self-advancement within the field—and one of their newest programs is no exception. Established in 2011 as an elite leadership program, the Emerging Professionals Leadership Academy is a six-month program that selects the best and the brightest of those in the field to participate in a series of webinars and a three-day studio training event to help foster leadership within the green building field. In addition, each professional who takes part is assigned a six-month, hands-on project in conjunction with the local USGBC chapter to help develop nonprofit management skills, such as creating fundraising plans, organizing an event, or bringing in new chapter members.

The selection process is careful. All applicants must be members of their local USGBC chapter, and must also be between twenty-one and thirty years of age. The reward for those who fit the bill and are selected? An opportunity to have a deeper look at and in-the-field experience of green building—and the chance to form lasting relationships, both personal and professional, in their field of expertise.

See this link for more details on the USGBC Emerging Professional Leadership Academy:
www.usgbc.org/DisplayPage.aspx?CMSPageID=2427

The Green Individual

**RYAN R. MURPHY, ASSOCIATE AIA, CDT,
LEED AP BD+C**

Share a green building story.

› Green isn't a new concept. My former colleagues and bosses told me about the time they were coming out of school in the late 1970s and early 1980s. That's where our generation comes

in. No longer is it a fad to “go green”—it's the smart move.

Forecasting eco-trends—what do you see in your crystal ball?

› Greenwashing will get worse. We already see endless lines of “green” products and technologies that have proven to NOT be sustainable. Just because they claim it is a green product doesn't make it so.



***What scary green factoid keeps you up at night?
Any solutions?***

› What if we pass the threshold of too many gasses in the atmosphere, too much coal burning, higher global temperatures and water levels? Holding someone or some groups responsible won't do a damn thing at that point.

How have your professional and volunteer experiences coincided to benefit and enrich your career and personal life?

› It really has been a win-win for me. Participating in USGBC events introduces me to

Neoterra: courtyard. This project has three low-cost underground concrete tanks with a combined storage capacity of 6,000 gallons provide stormwater retention and serve as cisterns for landscape irrigation. FIRM AND PHOTO: GERDING COLLABORATIVE, LLC

new products and technologies that I can present to my colleagues at work and incorporate into our projects. The more I know, the more I can teach others, and the better off we all are. I have also been one of only a few LEED APs at work, so the work is steady and busy. I have been fortunate to share my knowledge of the green movement with people ranks above me and even been able to teach a few old dogs some new tricks.

Architectural Advocacy

**KATHERINE DARNSTADT, AIA, LEED AP
BD+C, CDT, NCARB**

Founder + Principal Architect

Latent Design

What made you choose green building as a career (or volunteer)?

› As an architect, sustainable design is synonymous with good design and is embedded in our development process. Advocacy for environmental equity drove me to volunteer with local sustainable organizations to understand their perspective and ultimately bring it back to the USGBC at the local and national levels.

Share a green building story.

› I have recently been fortunate to work on the design of a new community center in an economically depressed area of a city. Through close collaboration with the nonprofit client, we were able to integrate STEM [Science, Technology, Engineering, and Math] concepts into the after-school programming for the youth that attend the community center by using sustainable technologies incorporated in the building and architectural design process as the textbook. This changed the way I view the potential of buildings, from static to dynamic catalysts for community and living learning tools.

Classroom at Arabia Mountain High School (LEED NC Silver). Firm: Perkins + Will. PHOTO: DAN GRILLET



Who or what has been your biggest influence in green building, and why?

› I am impressed with the work of Enterprise Community Partnerships and how they continually strive to incorporate sustainable design into all their housing initiatives and continue to be an organizational leader in sustainable advocacy.

What advice would you give to a student who is considering the green building field?

› Collaboration. Whether you are considering the green building field from a developer or designer standpoint, understanding the roles and responsibilities of all the stakeholders on a project team will enable you to interface better and crystallize solu-

tions. Utilize various academic departments and peer resources during your education to create the foundation for a professional network, and volunteer with community organizations to experience how end users and communities understand sustainable design.

What inspires you the most about green building?

› The impact sustainable buildings have on the youngest and oldest end users. Increase in test scores from the children that are learning in sustainably designed schools and a decrease in days to discharge in health-care facilities. Those who spend the most time indoors have the most to gain from green buildings.

Service to Nation and Planet**HEATHER SMITH****City of Houston on the Green Office Challenge****VP of Program Development for Veterans Programs under The Bush Cares Project*****What made you choose green building as a career (or volunteer)?***

› When I was in junior high school and high school, in my free time I would spend hours drawing houses and looking through design catalogs. Then I went into the Army. I spent eight years on active duty and worked on some missions with people in the intelligence community. It was during my time spent overseas with the military that I saw a few things that really got me going green.

During my travels, I saw the quality of life that other cultures have and the different ways they measure it. For example, in Italy, they (generally speaking) tend to measure their quality of life by the food they eat and sharing it with loved ones over long, leisurely dinners. Americans (again, generally speaking) tend to count their possessions or job title as evidence of a high quality of life. The other stark reality I saw was the total lack that was commonplace in some of the countries I deployed to, such as the Congo and Haiti.

It was there that I felt such a sadness at the unfairness, frustration at the “haves and have nots” situations. I wanted to make a real difference but still wasn’t sure how.

I decided to get out of the military and began looking into architecture. While doing this I began working a temp job at a real estate firm. My boss, Tami Pearson, was an awesome lady who had previously owned one of the more successful architecture firms in Houston, then Pearson & English. She became a mentor, friend, and mother away from home to me. I got my real estate license and she taught me how to read plans and other architecture-related things, and we were meeting the right people to do projects when I got mobilized after 9/11.

I spent a year back on active duty, part of that time in the Middle East. When I returned to Houston, my job mentor had taken on a big retail client and asked me to work with her on that. It was a great experience and I learned so much, but I began to feel burned out and abject about what I was doing. I was helping to fill up more and more shopping centers and contributing to urban sprawl. It was then, about three or four years ago, that I became involved with the USGBC Texas Gulf Coast Chapter (USGBC TGCC) and things have been falling into place ever since.

Share a green building story.

› I became Chair of the USGBC TGCC Emerging Professionals for 2010 and we organized a 350.org rally in combination with GreenWeek Houston, an entire week of various green initiatives relating to green building and also about how we can live

our day-to-day lives more sustainably. This was a huge undertaking but we had great success because of the people in the green building community all pulling together with their support. This further proved to me that I am doing the right thing!

The International Living Building Institute is probably the end all, be all to me and the goal that I have my development career set on.

Who or what has been your biggest influence in green building, and why?

› When I think of this question, again I go back to the people who create the buildings, and these are the people who have influenced me. The experts in every area of green building and the other “extra projects” they are into that really create a holistic sustainable community, such as the guy who is a solar consultant and who has also created a green living co-op house of ten people. These are the people that influence our community simply by the way they live their day-to-day lives.

What advice would you give to a student who is considering the green building field?

› Get out there and get involved! Volunteer, meet people, ask questions, throw out ideas, put on an event, and follow your heart. Doing what you love is way more important than making lots of money, and the right amount of money will come to you if you follow your dreams.

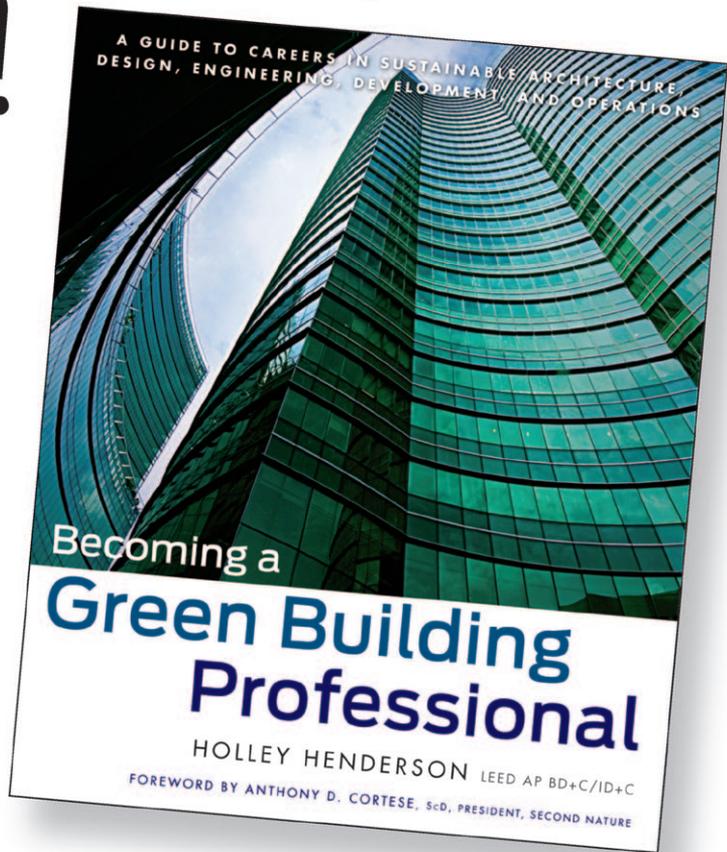
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