through these programs for reciprocal licensure, it is important for each BEA and BEFA applicant to confirm to specific registration requirements, including those for reciprocity, with the individual jurisdiction in which they would like to be licensed.

Broadly Experienced Architect (BEA) Program

The BEA Program provides eligible architects registered in a U.S. jurisdiction an alternative to the education requirement for NCARB certification. Eligible architects can demonstrate their learning through experience by meeting the requirements of the *NCARB Education Standard*, which approximates the requirements of a professional degree from a NAAB-accredited program. The BEA Program requires establishment of an NCARB Record and preparation of an education dossier to demonstrate learning through experience, and may also require an education evaluation.

Broadly Experienced Foreign Architect (BEFA) Program

Architects credentialed by a foreign authority are eligible to apply for an NCARB Certificate through the BEFA Program. The multistep BEFA process requires establishment of an NCARB Record, preparation of a dossier to demonstrate experience, and a personal interview. An architect intending to pursue this alternative should complete and submit the BEFA Eligibility Verification form prior to applying for an NCARB Record.

Alternatives to the Intern Development Program (IDP)

Architects who did not complete the IDP may retroactively document the IDP for purposes of NCARB certification. This is the most prudent course of action and offers the best chance of securing future reciprocity, as many jurisdictions specifically require the completion of the IDP to gain reciprocal licensure.

A second alternative is available and fully explained in the NCARB *Certification Guidelines*; however, it is worth noting that some jurisdictions may not accept this alternative and may require formal IDP documentation for reciprocal licensure. To use this alternative, applicants must be licensed by a U.S. jurisdiction for five consecutive years, must verify that their experience as an architect met the intent of the IDP, and must have that experience verified by one or more other architects. This alternative does not apply to architects licensed after January 1, 2011.

For More Information

NCARB certification and reciprocity: www.ncarb.org or by contacting NCARB Customer Service at customerservice@ncarb.org.

NCARB *Certification Guidelines*: www.ncarb.org/en/Certification-and-Reciprocity/Certification-Overview/~/media/Files/PDF/Guidelines/Cert_Guidelines.ashx.

NCARB Education Guidelines: www.ncarb.org/Studying-Architecture/~/media/Files/PDF/Guidelines/EDU_Guidelines.pdf.

Registration requirements for each U.S. jurisdiction, including those for reciprocal registration: www.ncarb.org.

To study architecture is to study all things.

—John Ruskin

Architects are broadly qualified to practice in a wide variety of roles and settings within the architecture profession and building enterprise.

—David Haviland, Hon. AIA

The building of a career is quite as difficult a problem as the building of a house, yet few ever sit down with pencil and paper, with expert information and counsel, to plan a working career and deal with the life problem scientifically, as they would deal with the problem of building a house, taking the advice of an architect to help them.

—Frank Parsons, 1909

3.3   The Career Paths of an Architect

Lee W. Waldrep, Ph.D.

This article describes career designing—a process of developing a career that parallels the architectural design process—and the roles an architect can pursue both in the architecture profession and outside traditional practice. As well, it outlines those career paths beyond architecture, often referred to as nontraditional careers.

After the rigors of an architecture education, work experience, and examination, becoming an architect may seem the simple and direct path for a career. However, other paths exist not only for the new graduate but also for the experienced architect wanting or needing to make a change.

Currently the assistant director at the School of Architecture at the University of Illinois at Urbana-Champaign, Lee W. Waldrep has 20 years of experience in higher education. With degrees from American University, ASU, and Michigan, he is the author of *Becoming an Architect: A Guide to Careers in Design*, 2nd edition (Wiley 2010).

As the father of vocational guidance Parsons states, the building of a career—the process of career development—is a difficult but important task. Yet few individuals prepare for their careers in a thoughtful, careful, and deliberate manner. Instead, many often fall into a career, while others make random career choices that show little commitment to their occupation. This approach frequently leads to dissatisfaction.

CAREER DESIGNING

Deliberately designing one's career path maximizes career success at any point on a career. As with architectural projects, careers can be planned. Actually, designing a career is parallel to designing a building. Programming, schematic design, design development, working drawings, and construction are replaced in the career designing process with assessing, exploring, decision making, and planning.

Assessing

When an architect designs a project, programming is the first step in the process. As William Pena points out in *Problem Seeking*, the main idea behind programming is the search for sufficient information to clarify, understand, and state the problem. In a similar manner, when designing a career, the process begins with assessing.

Assessing involves learning about yourself. Assess where you want to be; analyze what is important to you, your abilities, the work you would like to do, and your strengths and weaknesses. Just as programming assists the architect in understanding a particular design problem, assessment helps determine what a person wants from their career. This ongoing process must be revisited throughout a person's entire career. The details of assessment include examining values, interests, and skills.

Values

Values are feelings, attitudes, and beliefs held close to the heart. They reflect what is important to a person; they tell you what you should or should not do. Work values are the enduring dimensions or aspects of work that are regarded as important sources of satisfaction. Values traditionally held high by architects include creativity, recognition, variety, independence, and responsibility.

As a quick inventory, circle which of the following you value most in your work:

- Social contributions
- Creativity
- Excitement
- Working alone or with others
- Monetary reward
- Competition
- Change and variety
- Independence
- Intellectual challenge
- Physical challenge
- Fast pace
- Security
- Responsibility
- Making decisions
- Power and authority
- Gaining knowledge
- Spiritual/Transpersona
- Recognition

Your responses provide insight on a career path within the profession. For example, an architect who valued contributions to society most highly might look for opportunities for work in public interest design.

Know thyself.

—Inscription over the Oracle at Delphi, Greece

▶ Socially Responsible Design Overview (4.1) addresses public interest design.

Interests

Interests are those ideas, events, and activities that stimulate enthusiasm; they are reflected in choices you make about how you spend your time. In simplest terms, interests are activities that an individual enjoys doing. Typically, architects have a breadth of interests because the field of architecture encompasses artistic, scientific, and technical aspects. Architects enjoy being involved in all phases of the creative process—from original conceptualization to a tangible finished product.

To determine your interests, complete the following exercise: In 10 minutes of continuous writing, never removing pen from the paper or fingers from the keyboard, answer the question: *What do I like to do when I am not working?*

Career development theory dictates that an individual's career path should follow their interests; if they do, they will see success.

Skills

Skills or abilities can be learned. There are three types of skills—functional, self-management, and special knowledge. Having a functional skill means being able to perform some specific type of activity, action, or operation with a good deal of proficiency. According to the Bureau of Labor Statistics, an architect needs the following skills: analytical, communication, creativity, critical-thinking, organizational, technical, and visualization. Self-management skills speak to one's personal characteristics, while special knowledge are skills you have that may not necessarily pertain to your career.

The importance of knowing one's skills is echoed by Richard Bolles in *The Quick Job Hunting Map*: "You must know, for now and all the future, not only what skills you have, but more importantly, what skills you have and enjoy." With respect to skills, think back over the past five years. What were your five most satisfying accomplishments? Next to each, list the skills or abilities that enabled you to succeed. Similarly review your failures to determine traits or deficiencies you want to overcome. Knowing your skill set is important as it helps you direct your career path.

A variety of techniques may be used to conduct an assessment. The few listed here are simply to get started; others include writing an autobiography and undertaking empirical inventories or psychological assessment with the assistance of a career adviser. Regardless of the method you choose, only you can best determine what skills you have acquired and enjoy using; the issues, ideas, problems, and organizations that interest you; and the values that you care about for your life and career. By assessing yourself, you will better be able to make decisions related to your career path.

Exploring

Schematic design follows programming in the design process. Schematic design generates alternative solutions; its goal is to establish general characteristics of the design, including scale, form, estimated costs, and the general image of the building, the size and organization of spaces. In addition, schematic design identifies major issues and makes initial decisions that serve as the basis of subsequent stages.

In career designing, exploring is parallel to schematic design. It develops alternatives or career choices. Career exploration is the process of accumulating information about the world of work. Its goal is to obtain career information on a plethora of careers or specializations within a particular career. Even if you already have chosen architecture as a career, it is still a valuable and necessary process. Instead of exploring careers, you can explore firms, possible career paths within architecture, and other areas that affect your architectural path; understanding exploration will help you be flexible and adaptable when the economy or other factors require it.

To begin, collect career information from a variety of sources, both people and publications. Conduct an *information interview*—interviewing someone to obtain

Students spend four or more years learning how to dig data out of the library and other sources, but it rarely occurs to them that they should also apply some of the same new-found research skill to their own benefit—to looking up information on companies, types of professions, sections of the country that might interest them.

—Albert Shapero

information. People to interview might include a senior partner in a local firm, a faculty member, a classmate or colleague, or a mentor. Other ways to explore are through attending lectures sponsored by the local AIA chapter or a university, volunteering time through a local AIA committee or other organizations of interest, becoming involved with a mentor program, and observing or shadowing someone for a day.

As Shapero states, use research skills to access any and all information on a career. Visit your local library and inquire about the following publications: *The Dictionary of Occupational Titles (DOT)*, *Occupational Outlook Handbook (OOH)*, *Guide to Occupational Exploration (GOE)*, and *What Color Is Your Parachute?* Ask a reference librarian to identify other resources that might find valuable. In addition, investigate resources at your local AIA chapter or the library/resource center at an area architecture program.

Decision Making

The heart of the design process is design development. Similarly, decision making is the heart of the career development process. Design development describes the specific character and intent of the entire project; it further refines the schematic design and defines the alternatives. Decision making means selecting alternatives and evaluating them against a predetermined set of criteria.

What most people want out of life, more than anything else, is the opportunity to make choices.

—David P. Campbell

How you make decisions? Do you rely on gut-level reactions? Or do you follow a planned strategy of weighing alternatives? Whatever your method of deciding, be aware of it. While some decisions can be made at the drop of a hat, others, including career designing, require more thought.

Decision making can be difficult and time-consuming, but knowing the quality of decisions is affected by the information used to make them, you quickly realize that making informed decisions is an important skill to learn. Decision making is making the decision based on what you learned from assessing and exploring.

Both exploring and decision making are critical steps to successful career designing. Once a decision is made and a path chosen, the next step, planning, is about taking action to realize your goals.

Planning

Planning is key to fulfilling your career goals. After the owner/client decides on a design for a potential building, the next step is the development of plans. These plans—construction documents, specifications, and construction schedules—all play an important role in realizing the design. As part of the career development process, planning ensures that a successful career will be realized.

If you do not have plans for your life, someone else does.

—Anthony Robbins

Planning is bringing the future into the present so that we can do something about it now.

—Alan Lakein

In his book *The 7 Habits of Highly Effective People*, author Stephen Covey states that a mission statement focuses on what you want to be (character) and to do (contributions and achievements) and on the values or principles on which being and doing are based. To start the planning process, draft your mission statement by asking yourself: What do I want to be? What do I want to do? What are my career aspirations? Review the mission statement example below:

> I desire to act in a manner that brings out the best in me and those important to me—especially when it might be most justifiable to act otherwise.

After you have crafted your mission statement, the next step is to develop goals that will lead to its fulfillment. Goals are future-oriented statements of purpose and direction to be accomplished within a specified time frame. They are stepping stones in achieving long-range aims and should be specific and measurable. Write down your goals. It has been said that the difference between a wish and a goal is that a goal is written down.

Once you establish your goals, you are ready to develop the action plan that will help you accomplish them. Action plans are steps on the path toward your goals; they

are stepping stones in achieving related short-range intentions. Look at your accomplished goals. What steps must you take to accomplish them? As with career goals, write down your action plan, including specific completion dates.

The final step in planning is to review your action plans and goals regularly. Cross out the goals you have accomplished and revise, add to, or delete others. Be honest with yourself. Are you still committed to achieving your goals? You can change them, but remember that the magic road to achievement is *persistence*. Abandon goals only if they have lost meaning for you, not because they are tough or you have suffered a setback.

Now that you understand the career designing process—assessing, exploring, decision making, and planning—you can implement it. This process is never-ending and cyclical as you progress through your professional career. As soon as you have secured an ideal position in a firm, you will wish to assess your new life situation and make adjustments to your career design accordingly. Designing your career is one of the most important tasks during your lifetime.

CAREER PATHS

Careers in Architecture

Pursuing architecture prepares an individual for a vast array of career possibilities. Many of these are within traditional architecture practice, but many are also available in related career fields.

Within the traditional architecture firm, graduates may obtain a beginning position as an intern and progress to junior designer, project architect, and, eventually, associate or principal. Getting to the top does not happen overnight; it can take a lifetime. Aspiring professionals may pursue their careers in traditional firms regardless of their size (small, medium, or large) or may choose to work in a different setting, such as a private corporation, a government agency, or a university—or, after obtaining professional licensure, may choose to start their own firms.

> Entrepreneurial Practice: Starting an Architecture Firm (5.2) discusses why and how to start one's own firm.

Architectural Practice

How does a career in architecture begin? How does a person progress from graduation to become an architect? Following the AIA Definition of Architect Positions, the path seems linear, progressing from an intern to architect; once licensed (and depending on the firm), the path continues to architect I (3–5 years) and architect/designers III (8–10 years). From there, the path progresses to project manager, department head or senior manager, junior principal/partner, and concludes with senior principal/partner.

> Intern Development (3.2) discusses the IDP in detail.

Of course, the path of a career in architecture is not strictly linear; however, it is helpful to understand these titles with the knowledge and responsibility associated with them, as outlined in Dana Cuff's *Architecture: The Story of Practice*. Upon entry into the profession, the intern is building upon their educational foundation through practical experience under the supervision of an architect; and the intern is tracking their experience in the Intern Development Program (IDP), an essential step in becoming an architect. Once licensed, the architect is demonstrating competence, gathering responsibility, and gaining autonomy and management tasks. When at the full-fledged stage, the architect is gaining fiscal responsibility on a widening sphere of influence.

The entering graduate does face challenges. Given the gap between education and practice, what happens in the studios of schools is much different than the studios of the firms. For this reason, architecture students are strongly encouraged to seek intern positions in architecture firms during their academic years.

Those seeking licensure will find it essential to secure employment within an architecture firm to gain the necessary experience under the direct supervision of an

- *Senior Principal/Partner:* Typically an owner or majority shareholder of the firm; may be the founder. Titles include president, chief executive officer, or managing principal/partner.
- *Mid-Level Principal/Partner:* Titles include executive or senior vice president.
- *Junior Principal/Partner:* Recently made a partner or principal of the firm. Title may include vice president.
- *Department Head/Senior Manager:* Senior management architect or nonregistered graduate; responsible for major department(s) or functions; reports to principal or partner.
- *Project Manager:* Licensed architect or nonregistered graduate with more than 10 years of experience; has overall project management responsibility for a variety of projects or project teams, including client contact, scheduling, and budgeting.
- *Architect/Designer III:* Licensed architect or nonregistered graduate with 8 to 10 years of experience; responsible for significant aspects of projects; responsible for work on minor projects. Selects, evaluates, and implements procedures and techniques used on projects.
- *Architect/Designer II:* Licensed architect or nonregistered graduate with 6 to 8 years of experience; responsible for daily design or technical development of a project.
- *Architect/Designer I:* Recently licensed architect or nonregistered graduate with 3 to 5 years of experience; responsible for particular parts of a project within parameters set by others.
- *Intern:* Unlicensed architecture school graduate under supervision of an architect.
- *Entry-Level Intern:* Unlicensed architecture school graduate in first year of internship.
- *Student:* Current architecture student working during summer or concurrently with school.

architect and meet the requirements of the Intern Development Program (IDP); however, in recognition of opportunities to go beyond traditional practice—such as working under registered professionals in related professions like landscape architecture, or working under an architect outside of a firm setting—interns can gain experience in other work settings.

When seeking employment, one should consider firm size as a factor when considering where to work; in large firms, an intern will be exposed to a broad scale of projects and a full-service firm, but may be limited in their exposure to aspects of practice. In a small firm, the intern will see the full spectrum of projects, but the projects may be limiting in scope and size. Where one works at the start of their career can have an impact on their future career trajectory in architecture.

Within what is typically referred to as traditional practice, there are firms that develop specialties. While they are still architecture firms, these specialties provide opportunities to showcase talent or strong interest. Examples of such specialties include programming, design, specifications, construction contract administration, or sustainability.

Some firms focus on particular building types, such as healthcare, religious, justice facilities, housing, interiors, sports facilities, educational, and institutional. One firm—for instance, Animal Arts in Boulder, Colorado—focuses on facilities related to animals, including veterinary hospitals, shelters, and pet resorts. As a specialist in healthcare, an architect can become a certified healthcare architect with the American College of Healthcare Architects (ACHA). Certain Knowledge Communities of the AIA that focus their energies on building types or specialties include the Academy of Architecture for Health, the Academy of Architecture for Justice, the Committee on Architecture for Education, and the Interfaith Forum on Religion, Art and Architecture, among others.

Another means to expand a career within the profession is through supplemental architectural services. Because of the recent economic downturn, the AIA created the Supplemental Architectural Services program, a series of detailed essays and slide presentations to offer assistance to architects in expanding their consulting services.

PART 1: THE PROFESSION

Supplemental architectural services can:

- Help architects generate income.
- Increase the value of the firm through diversification.
- Help attract new clients or keep the firm involved with existing patrons.
- Be used as special projects for young professionals to nurture their development.

The AIA has identified 48 supplemental architectural services, listed below. More information on each of these—required knowledge and skills, why clients need the deliverables, associated tasks, and the AIA Contract Document that can be used in conjunction with the service—can be found at the AIA Architects Knowledge Resource, Supplemental Architectural Services (http://www.aia.org/practicing/akr/AIAB089194).

- Accessibility Compliance
- Architectural Acoustics
- Building Measurement
- Code Compliance
- Commissioning
- Contract Administration/Construction Contract Administration/Design and Construction Contract Administration
- Construction Defect Analysis
- Construction Documentation—Drawings
- Construction Documentation—Specifications
- Construction Management
- Construction Procurement
- Demolition Planning Services
- Detailed Cost Estimating
- Digital Architecture Survey Technologies
- Energy Analysis and Design

- Energy Monitoring
- Environmental Graphic Design
- Expert Witness Services
- Facility Evaluation Services
- Facility Management/Facility Support
- Furniture, Furnishings and Equipment Services/FFE Design
- Geotechnical Services
- Historic Preservation
- Indoor Air Quality Consulting
- Interior Design/Architectural Interior Design
- Land Surveying Services
- Lighting Design
- Model Construction
- Move Management
- On-Site Project Representation
- Parking Planning Services
- Postoccupancy Evaluation
- Program Management Services
- Programming
- Project Financing and Development Services
- Record Drawing
- Regional or Urban Planning
- Renderings
- Research Services
- Security Evaluation and Planning Services
- Seismic Analysis and Design
- Site Analysis/Site Evaluation and Planning
- Space Planning
- Strategic Facility Planning
- Sustainable Building Design
- Urban Design Services
- Value Analysis
- Zoning Process Assistance

Outside Traditional Practice

Beyond traditional practice, architects work in a number of other settings. While no exact statistics are kept, it is estimated that one in five architects work outside private practice.

- *Corporations and institutions.* Do you want to work at McDonald's? It may come as a surprise that McDonald's hires architects, as do many businesses and corporations. Corporate architects may serve as in-house architects, but in most cases they represent the interests of the corporation to the outside architects they hire. Depending on the industry, they may be involved with all phases of a project.
- *Government and public agencies.* Federal, state, and local governments commission more than one-quarter of construction annually. As such, opportunities exist for architects in public agencies. Many departments of government, including the military, employ architects. In addition to traditional tasks, architects manage facilities and projects and oversee construction. Emerging professionals may find it difficult to start a career in a public agency, but such careers can be extremely worthwhile.

Employers of public architects (as represented on the 2012 Advisory Group of the AIA Public Architects Knowledge Community) include the State of Ohio, Texas A&M University, the U.S. Army Corps of Engineers, Thomas Jefferson National Lab, the City of Dallas, and the Judicial Council of California.

- *Education and research.* For some architects, a substantial career path is teaching and research. According to the National Architectural Accrediting Board (NAAB), there are over 6,064 faculty members within the accredited programs of architecture in the academic year 2011–2012, most of whom are adjunct faculty. Additionally, with over 300 programs in architectural technology at the community college level, many more opportunities exist for architects to teach at this level. In addition to teaching, architects serving as faculty will pursue research interests to test ideas that connect education and practice. Aside from teaching future architects, many faculty members also maintain a practice.

Beyond Architecture

An architecture education is excellent preparation for many career paths beyond architecture. In fact, the career possibilities with an architecture education are truly limitless. Anecdotal estimates suggest that only one-half of architecture graduates pursue licensure. By applying the ideas listed earlier in "career designing," one can launch a successful career beyond architecture.

Career paths beyond traditional practice tap into the creative thinking and problem-solving skills developed from an architecture education. The interest in these paths is growing; the results of the most recent AIA/NCARB Internship and Career Survey of interns and emerging professionals indicate that nearly one-fifth of the respondents do not plan on pursuing a traditional career in architecture, although they still plan to obtain their license.

Over the last four years, Archinect, an online forum for architecture, has featured over 25 architects who have applied their backgrounds in architecture to other career fields through its "Working Out of the Box" series. While most are still connected to design in some form, the range of career fields is quite diverse: filmmaker, organic farmer, artist, design director at a resort hotel chain, user experience designer, information designer, and design technology consulting. Also, the reasons for pursuing these are varied and typically not tied to the recent economic downturn.

For purposes of his doctoral thesis, Robert Douglas, FAIA, studied nontraditional careers (maverick architects) and found those that he studied credited "design thinking" as helpful in their careers beyond architecture. From his research, architecture graduates and architects pursued careers in law, investment banking and real estate development, computer software, lighting design, film production and set design, cultural policy, architectural criticism and journalism, facilities planning, land planning and management, industrial and product design, arts programming, structural engineering, highway design, public arts installation, architectural photography, painting and sculpture, and clothing design.

A June 2008 issue of *Columns*, the AIA Pittsburgh magazine, entitled, "It's a Wonderful Life," highlighted architects who built new careers after first having one as an architect. First, the article outlines the path of actor Jimmy Stewart, who graduated from Princeton University having studied architecture but instead pursued acting (hence the title of the article). Next, it highlights four individuals who, after successful careers as architects, moved to new career paths—development, needlepoint (fiber art), community design, and construction supervisor. In each case, they discuss how their education and background in architecture paved the way for their new chosen career.

- *Related design professional (landscape architecture, interior design, urban design).* Given the parallel education of design, it is clear why some architects pursue the related career fields of landscape architecture, interior design, and urban design. Many architects pursue careers in interior architecture or space designing, while other

▶ See Research in Practice (14.1) and Participating in Architecture Education (3.6) for further discussions of architecture research and education.

As a profession, architecture offers a myriad of possibilities for rewarding careers.

—Irene Dumas-Tyson

I am certain that architectural graduates who are in command of the powerful problem-defining and problem-solving skills of the designer will be fully capable of designing their own imaginative careers by creating new definitions of meaningful work for architects that are embedded in the social landscape of human activity and life's events.

—Leslie Kanes Weisman

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▶ Architect-Led Design-Build and its accompanying backgrounder Architects as CM for Small Projects and Small Firms (9.5) further address the architect's role in design-build project delivery.

Real estate. More recently, more architects have become involved with real estate development, the creation of communities, and the repositioning of land or buildings into a higher or better use. For architects wishing to expand their influence on the building process, real estate may be a good fit, as it connects multiple disciplines (engineering, architecture, planning, finance, marketing, law, and environmental impact).

pursue the profession of landscape architecture to design outdoor spaces. Still others combine their talents in design to focus on urban design.

- *Engineering and technical.* As architecture is both an art and a science, many architects will pursue careers in engineering or more technical fields. Many with a joint degree in architecture and engineering will pursue civil or structural engineering, but there are other opportunities that exist if there is an interest in the technical side of the profession.
- *Construction.* Because of the connection between design and construction, many architects have pursued careers in construction as construction managers, general contractors, and/or related associates. Architecture firms have expanded their services to include design-build and construction management, bridging the two disciplines.
- *Art and design.* Because much of what architects do is considered an art, it is no surprise that many architects pursue careers in art and design; this extends from fine arts (painting) to applied arts (graphic design and furniture design). Some will determine a way to combine their background in architecture more directly with art, while others truly move away from architecture to pursue their art.
- *Architectural products and services.* Perhaps less obvious are careers in architectural products and services. As these manufacturers market and sell their products and services to architects, who better to serve in these positions but those trained as architects? With an interest in and talent for sales, opportunities exist for a rewarding and fulfilling career.
- *Other.* As stated in the quote from Irene Dumas-Tyson, an education in architecture offers myriad career possibilities. But what other career paths are open to architecture graduates, emerging professionals, or architects? The true answer: There are over 25,000 occupations as defined by the Bureau of Labor Statistics that potentially highlight skills and fulfill passion. Truly, the only limitation to possible career paths is one's imagination.

Katherine S. Proctor, FCSI, CDT, AIA, former director of student services at the University of Tennessee, shares her perspective:

> For an individual interested in the career of architecture, the possibilities are endless. I have seen students graduate and become registered architects, professional photographers, lawyers, bankers, business owners, interior designers, contractors, and artists. The education is so broad, with a strong liberal arts base, that it provides a firm foundation for a wide array of exploration. This comes from the content of the curriculums but also from the methodology. The design studio, which is the core of the curriculum, provides a method to take pieces of intellectual information and apply it within the design process. The movement from thinking to doing is powerful. The ability to integrate hundreds of pieces of information, issues, influences, and form and find a solution is a skill that any professional needs to solve problems, whether they are building issues or life issues.

The future is not a result of choices among alternative paths offered by the present, but a place that is created—created first in the mind and will, created next in activity. The future is not some place we are going to, but one we are creating. The paths are not found, but made, and the activity of making them changes both the maker and the destination.

—John Schaar, Futurist

EMERGING CAREERS

Most would agree that the architecture profession is changing; as a result of this change, opportunities are being created to expand the profession beyond what it is now. For example, sustainability has already created new emerging career paths for architects.

Many within the profession have pursued becoming a Leadership in Energy Efficient Design Accredited Professional (LEED AP). As outlined by the Green Building Certification Institute, those credentialed as LEED APs are building industry professionals who have demonstrated a thorough understanding of green building and the LEED® Green Building Rating System™ developed and maintained by the U.S. Green Building Council (USGBC).

Technology such as building information modeling (BIM) will continue to play an increasing role within the architecture profession and will also create new career paths.

SUCCEEDING IN THE BUILT ENVIRONMENT

H. Alan Brangman, AIA

H. Alan Brangman is associate vice president of facilities, real estate, and university architect, Howard University, Washington, DC.

I became an architect because I have always had a fascination with building things. I initially went to school at the University of New Hampshire to study civil engineering. At the beginning of my sophomore year I met an art professor who had been a former instructor at Cornell University. He suggested that I transfer to Cornell. My degree is the Bachelor of Architecture.

My greatest challenge as an architect has and continues to be convincing other professionals that architects are capable of doing much more than just architecture. As the university architect at Howard University, my job responsibilities are more in line with those of a principal in a real estate development firm. I am responsible for implementing and monitoring programs and processes to achieve short-term and long-term Howard-wide strategic and operational goals as they relate to facilities and real estate. I am also responsible for the hiring of design and planning consultants and for providing program,

planning, and design oversight for all university facilities, as well as monitoring construction projects on campus.

Initially, I pursued a nontraditional career path because I had an interest in something more than just designing buildings. I spent nine years with the Oliver T. Carr Company, a real estate development company in Washington, D.C. That opportunity opened my eyes to the breadth of the built environment and provided me with a much more global perspective on place making.

When I started my career in real estate development, I had been counseled to consider obtaining an MBA. I did not want to commit the time required to return to graduate school. I decided to pursue the path of learning through experience. Since I had been schooled as an architect and architects are taught to solve problems, I was able to manage any of the issues that were part of my job responsibilities quite well. After getting a few years under my belt, I obtained the Real Estate Development Primer Certificate from Harvard Graduate School of Design and Wharton School of Business as a way of confirming what I had learned. It worked.

BEYOND ARCHITECTURE

OUTSIDE TRADITIONAL PRACTICE

Academic Dean/Administrator
Architectural Historian
Corporate Architect
Facilities Architect
Professor
Public Architect
Researcher
University Architect

RELATED PROFESSIONAL

Interior Designer
Landscape Architect
Urban Designer

ENGINEERING AND TECHNICAL

Architectural Acoustics
Building Pathologist
Cartographer
Civil Engineer
Computer Systems Analyst

Construction/Building Inspector
Illuminating Engineer
Marine Architect
Structural Engineer
Urban Planner

CONSTRUCTION

Carpenter
Construction Manager
Construction Software Designer
Contractor
Design-Builder
Estimator
Fire Protection Designer
Land Surveyor
Project Manager

REAL ESTATE

Property Assessor
Real Estate Agent
Real Estate Developer

ART AND DESIGN

Architectural Illustrator

Architectural Photographer

Art/Creative Director

Artist

Clothing Designer

Exhibit Designer

Filmmaker

Furniture Designer

Graphic Artist/Designer

Industrial/Product Designer

Lighting Designer

Museum Curator

Set Designer

Toy Designer

Web Designer

ARCHITECTURAL PRODUCTS AND SERVICES

Product Manufacturer Representative

Sales Representative

OTHER

Architectural Critic

Author/Writer

City Manager

Environmental Planner

Golf Course Architect

Lawyer

Preservationist

Public Official

Firms have emerged that are assisting architecture firms in creating virtual designed environments. Additional career options, such as BIM management and facilitation, are being created as a result of technology.

Other influences that are creating new career opportunities for architects are integrated project delivery (IPD) and other alternative project delivery methods; international practice; and public interest design.

To adequately prepare for your future in architecture or beyond, consider reading *The New Architect: A New Twist on the Future of Design* (Greenway Communications, 2007) by James P. Cramer and Scott Simpson.

CONCLUSION

As stated by David Haviland, Hon. AIA, "Architects are broadly qualified to practice in a wide variety of roles and settings within the architecture profession and building enterprise." To maximize one's path, the chapter highlighted "career designing"—the process of assessing, exploring, decision making, and planning.

Further, the chapter outlined the myriad possible career paths of an architect, both within traditional practice (extending from intern to architect to principal) as well as careers outside traditional practice and beyond architecture. Finally, emerging and potential trends for design professionals were listed.

For More Information

AIA Supplemental Services program, a series of detailed essays and slide presentations: www.aia.org/practicing/akr/AIAB089194.

Archinect: http://archinect.com/.

The New Architect: A New Twist on the Future of Design (Greenway Communications, 2007) by James P. Cramer and Scott Simpson.

Occupational Outlook Handbook: www.bls.gov/ooh/.

What Color Is Your Parachute? A Practical Manual for Job-Hunters and Career-Changers (Ten Speed Press, 2013) by Richard N. Bolles: www.jobhuntersbible.com/.

The Dictionary of Occupational Titles (DOT): www.occupationalinfo.org/.