

Design Directions

ASID MINNESOTA
Design Directions

SPRING 2017

DESIGNING DENTAL PRACTICES

AMERICAN
SOCIETY OF
INTERIOR
DESIGNERS



MINNESOTA



LONGERE CHEVRON



MATIGNON



MONTMARTRE



NAPOLEON PLANK

FRANÇOIS & CO.



TARAUX



SAINT AMOUR



NAPOLEON HERRINGBONE



PRAGUE

FRENCH OAK | DRIFT COLLECTION

275 Market Street, Suite #161 Minneapolis, MN 55405 612.375.9540

ATLANTA | SAN FRANCISCO | NORTH PALM BEACH | NASHVILLE | DENVER | NAPLES | CHARLOTTE | MINNEAPOLIS

FRANCOISANDCO.COM



ON THE COVER

ELM CREEK DENTAL

DESIGNER: Angela Parker, ASID

FIRM: Interior Spaces and Places, LLC

table of CONTENTS

ASID OFFICE: Minnesota Chapter

Brianna Klein-Onkka
275 Market Street, Suite 160
Minneapolis, MN 55405
PH: 612-339-6003
administrator@mn.asid.org • www.asidmn.org

ASID MINNESOTA BOARD 2016-2017

PRESIDENT Lola Watson, Allied ASID
PRESIDENT-ELECT Letitia Little, Allied ASID

MARKETING AND COMMUNICATIONS DIRECTOR

Nancy Nelsen-Flom, IP Rep for INTERSOURCE, Inc.

MEMBERSHIP DIRECTOR

Lori Berg, Allied ASID

FINANCE DIRECTOR

Keri Olson, Allied ASID

PROFESSIONAL DEVELOPMENT DIRECTOR

Susan Thayer, IP Rep for Hickory Chair

AT-LARGE DIRECTOR

Rena Feldman

STUDENT REP TO THE BOARD OF DIRECTORS

Jessica Blevins

DESIGN DIRECTIONS COMMITTEE

- > Colleen Slack, Allied ASID
- > Mark Ehlen, Industry Partner Rep for Ehlen Creative Communications
- > Katie Lewis, Allied ASID
- > Elizabeth Bland, ASID
- > Bonnie Birnbaum, ASID, CID

PUBLISHER

Red Leaf
Brian McCashin

DESIGNERS

Brian McCashin

IN THIS ISSUE

PG 2. **President's Message**..... Lola Watson, ASID

PG 4. **President-Elect's Message**..... Letitia Little, Allied ASID

CHAPTER NEWS

PG 6. **2017 Showcase Home Preview** By Bonnie Birnbaum, ASID, CID

FEATURE ARTICLES

PG 8. **ASID Tour: Vikings Stadium**..... By Katie Lewis, Allied ASID

PG 10. **2016 Holistic Healthcare Design** By Colleen Slack, Allied ASID

PG 14. **Healing Environment for Home, Work or Play**..... By Bonnie Birnbaum, ASID, CID

PG 17. **Health, Safety, Welfare and the Art of Designing Dental Practices** By Angela Parker, ASID

LIST OF ADVERTISERS

ASID Minnesota Chapter.....	Inside Back Cover
Builders Association of the Twin Cities (BATC).....	Page 20
California Closets.....	Page 3
Design Professionals.....	Page 7
Francis King Ltd.....	Back Cover
Francois & Co.....	Inside Front Cover
MN Standard/SPS Companies.....	Page 5
Red Leaf.....	Page 7
Unique by Design Ltd.....	Page 5

Design Directions magazine is published quarterly for the Minnesota Chapter of the American Society of Interior Designers by Red Leaf. Editorial content and the *Design Directions* magazine are controlled and owned by the Minnesota Chapter of ASID. Reproduction of this publication in whole, or in part, in any form is strictly prohibited without the written permission of the Minnesota Chapter of ASID.

“DESIGN IMPACTS LIVES! This is the ASID Mantra! We know this — but I don’t think we have ever considered the extent of that statement.”

A LETTER FROM OUR PRESIDENT

As I write this letter my thoughts keep circling back to an article I read in the recent Winter *ASID ICON* magazine, entitled “The Bullet Proof Environment,” written by Timothy A. Schuler. Mr. Schuler discusses a recent growing market in ballistic furniture — fabrics and furniture which are bullet proof and serve to “hopefully” save lives. I have to tell you that the shock of reading that article has not diminished over the past weeks. It has caused me hours and hours of reflection.



When I was studying design in school, my initial goal was simply to create lovely environments. As I continued in the field, I realized that an orderly, well-designed room became more lovely through its ability to function well, to improve the lives of my clients by truly servicing their needs. By making design choices with safety and function in mind, or space planning for efficiency, I was creating welcoming, comfortable spaces that restored their spirits, and sometimes their bodies. When my clients would rather be at home than anywhere else, I knew I had succeeded. While I selected tiles with sufficient traction so no one would slip and fall stepping out of a wet shower, or light sufficient to complete any task, yet flexible enough to create a soft and attractive mood, or a fabric that would hold up well with an active family or pets — I don’t believe for one instant I ever thought of how design might actually stop an assassin’s bullet. The world didn’t seem quite so mad!

In the same issue was another article that dealt with the impact of a crisis on the human inhabitant. Studies are focused on the most probable crisis events that might occur and design solutions that minimize their impact, similar to the fire retardants that were developed so many years ago.

DESIGN IMPACTS LIVES! This is the ASID Mantra! We know this — but I don’t think we have ever considered the extent of that statement. Cause and effect. According to the Washington Post, there have been 127 mass shootings in the past 50 years. Designers and manufacturers are answering by designing ways to minimize the devastation. I wonder what the next generation of designers will be motivated to do?

Lola Watson

**LOLA WATSON, ALLIED ASID
President, ASID MN Chapter**



CALIFORNIA CLOSETS®

New Design Studio now open in Southdale Center in Edina!

Experience a California Closets system custom designed specifically for you and the way you live.
Visit us online or in our new design studio today to arrange for a complimentary in-home design consultation.

EDINA 2770C Southdale Center 952.844.0004 californiaclosets.com

“Through education, knowledge sharing, advocacy, community building and outreach, we strive to advance the interior design profession, and in the process to demonstrate the power of design to positively change people’s lives.”

A LETTER FROM OUR PRESIDENT-ELECT

“Through education, knowledge sharing, advocacy, community building and outreach, we strive to advance the interior design profession, and in the process to demonstrate and celebrate the power of design to positively change people’s lives.” We have all heard these inspiring words before as part of the ASID mission statement, but do you ever wonder how our chapter is implementing these ideals?

Here are some of our chapter’s committees that are accomplishing these goals with upcoming events.

The **Programs Committee** has planned some exciting programs for each month in the form of Lunch and Learns, Distinguished Speaker, Business development meetings and more that both educate and share knowledge. Watch for these events throughout the year.

Committee chairs: Codie Donahue, Jennifer Ruis. Members: Penne Purdum, Kathleen Winter, Sharon Clasen, Katie Lewis, Sandi Weinand

As part of our dedication to community building and outreach the **Community Service Committee** has been hard at work for the past 14 months on redesigning and refurbishing 2 classroom spaces in the People Serving People shelter in downtown Minneapolis. This is a prime example of how design can positively change people’s lives. It has been an amazing transformation provided by many members giving of their time and resources. The open house will be April 13 and the Gala on the 29th.

Committee co-chairs: Jackie Millea, Lisa Antennoucci. Members: Jackie Colapert, Jackie Lyons, John Buraba, Kimberly Scanlon, Amy Ouradnik, Lindy Haglund

The PSP open house coincides with the **IP Committee**’s IP Networking Event on April 13th which will be held at the Radisson Red across the street from People Serving People, and they will give tours of the new space. This event also showcases IP members who will have a chance to promote their services and product to designers. A CEU is being planned as well. This is an excellent example of education and collaboration between industry professionals and designers.

Committee Chair: Carolyn Olson, Members: Scott Needham, Scott Zinns, Holly Bayer, Jennifer Ball, Mark Ehlen

The **Kitchen Tour Committee** has been putting together The Kitchen Tour for April 22 & 23, which is the perfect event to demonstrate and celebrate the power of design in people’s lives. 10 Kitchens designed by ASID designers will be showcased on the Tour, which is open to the public. What better way to convey what ASID designers can do?

Committee Chairs: Sheree Vincent and Rena Feldman. Members: Andrea Dixon, Angela Warner, Rosemary Merrill, Catherine Harrington, Erin Newton, Sara Soli



Letitia Little

LETITIA LITTLE, CID, ALLIED ASID
President-Elect, ASID MN Chapter

TOTO®

LIVING TOTO TAKE TIME FOR YOURSELF

Living TOTO is more than just brushing your teeth in the morning at a TOTO sink, or taking a restorative soak at night in one of our tubs. It's the experience of surrounding yourself with the beauty and superior functioning of the full range of TOTO products.

PEOPLE-FIRST INNOVATION™
totousa.com | 800-350-TOTO



**Minnesota
Standard**
Showplace
Division of SPS Company, Inc.

St. Louis Park (952) 920-1460 | St. Cloud (320) 252-3030
Mankato (507) 387-5691 | Bismarck (800) 735-1191

Product Shown | Connely® Widespread Faucet.

U NIQUE

by design ltd.

Fine Furniture Design



www.uniquebydesign.us info@uniquebydesign.us
275 Market Street Suite 188, Minneapolis, Minnesota 55405
Showroom 612-341-0388 Fax 612-341-0387

2017 Showcase Home Preview

By Bonnie Birnbaum, ASID, CID



The 2017 Showcase Home is a departure from the usual remodel, as this year is the first time the home is new construction. The new home is located on Crystal Bay, in Orono. If this sounds familiar, the reader would be correct as this home is built on same property as the Born home.

The original home was built by William J. Ulrich, who ran a coin investment scheme in the mid-1980s through his Security Rare Coin outfit that grossly overrepresented the worth of coins he was selling to investors. The FTC alleged in a 1986 lawsuit that Ulrich touted the coins as high-profit, low-risk investments that were being sold at or near their market value. Hundreds of investors lost about \$50 million in the scam, the FTC said. Ulrich was later prosecuted on federal racketeering charges and served a six-year prison sentence.

Rick Born bought the home after it was seized by the IRS. Born was the head of Born Information Services located in the Minnetonka Boat Works building. In 1999 this 25,000 sq. ft. home was the Showcase Home. Most people remember the

indoor pool, which was the largest in the entire state. This home had the highest attendance of any showcase — over 10,000 people viewed this home.

After the IT bubble broke, the home returned to the bank, and it was eventually torn down and the property was divided into two lots. This year's homeowners bought one of the parcels of land to build their dream home.

The almost 10,000 sq. ft. home is being built by John Kraemer & Sons, a three-time winner of the "Builder of the Year" award. The young couple who are the home owners are relocating to Minnesota as they love winter! The two-story home, with a walkout lower level, will feature two master suites, one for visiting family, a theater, a sport court and much more.

The scale of the home and the construction schedule means the Gala will be the latest ever and will not happen until mid-September. More information to follow as the home develops. • D •



CHAPTER ANNOUNCEMENT

Not hearing about things?

Check your contact information. Name Change? Job Change? Address change? If your contact information isn't correct, you are missing email and mail that is important to you about the chapter and for your business. Members can update their information online 24 hours a day at www.asid.org. Simply login to review your information and make any changes to your record.

CHAPTER ANNOUNCEMENT

Consider a planned gift

Through thoughtful planning we can ensure that future generations will experience and share that which we have found so valuable in our lives. Please consider remembering The Minnesota Chapter of the Association of Interior Designers when you are preparing your will, trust, or other estate plans.



introducing bloom® from Red Leaf

bloom® from Red Leaf is a simple concept. At its center is the idea that agency-level creative services should be accessible to small businesses. The accessibility comes not only from the value of services we offer, but also from the manner in how we approach and execute our work. Clean. Efficient. Effective. Professional. Creative.

That's Red Leaf. And that's bloom.®

Red Leaf

[design] [print] [web]

Graphic design. Creative development.
Identity and branding. Strategic planning.
Website development.

612-314-5260

www.redleafdesign.com

CENTURY®



DESIGN PROFESSIONALS INC.

International Market Square, Suite 308
612.336.7198 - Fax 612.339.0993
www.dproff.com

ASID Tour: Vikings Stadium

By Katie Lewis, Allied ASID

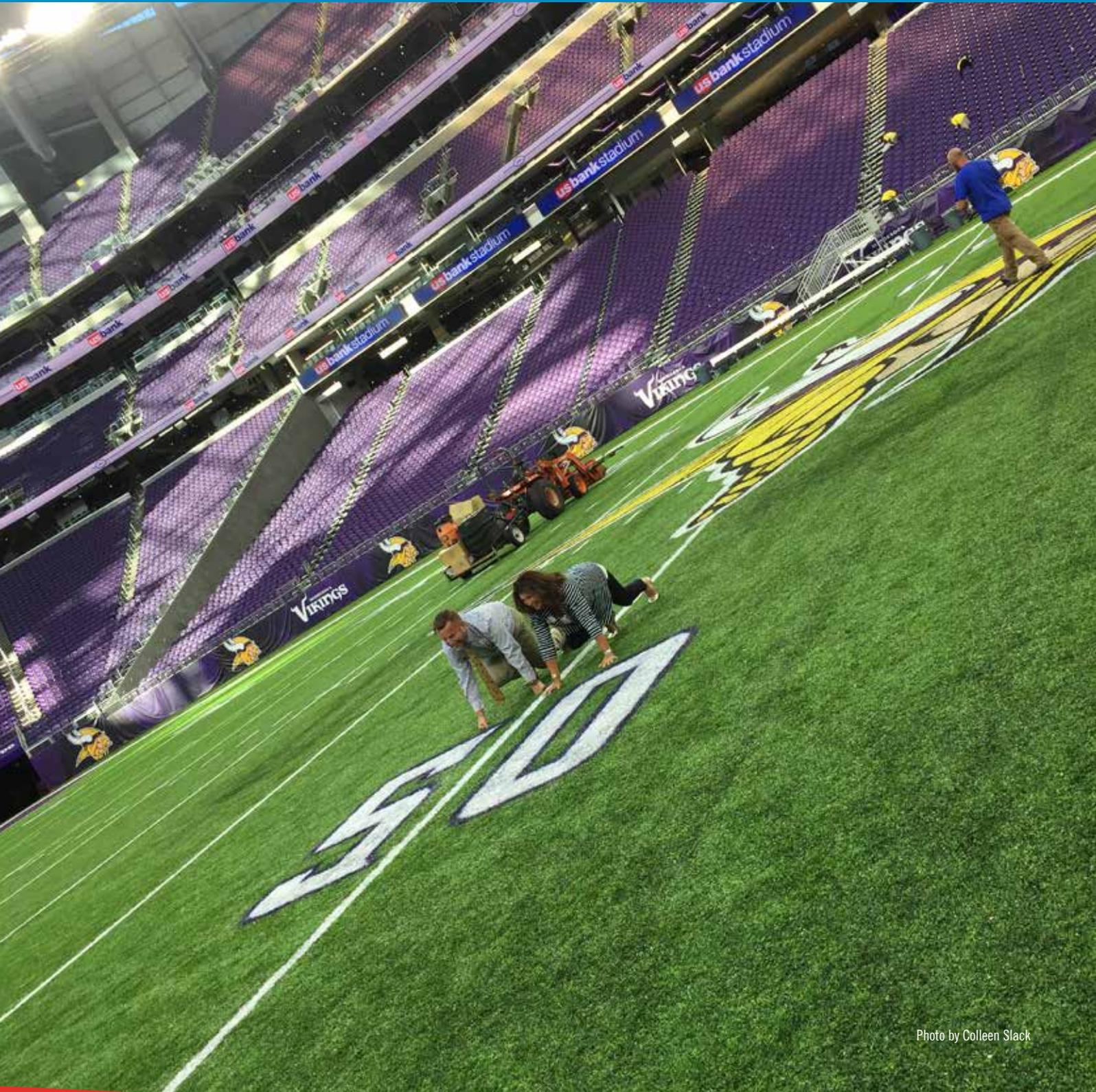


Photo by Colleen Slack



Football was in the air and it was a perfect autumn day for a private tour of the brand new U.S. Bank Minnesota Vikings Stadium. The ASID Industry Partner (IP) event on September 29th sold out quickly with 75 ASID Designers and IPs in attendance. They experienced a behind-the-scenes exploration of the football field, team locker room, premium clubs, private suites, stadium art collection and entertainment/restaurant venues. The knowledgeable tour guides educated the group on the architecture, innovative design and sustainability features of this state-of-the-art sports arena. “With its sleek and modern profile in the Minneapolis cityscape, the building was designed to resemble rock and ice formations in the Mississippi River, although some observers see an imposing Viking ship ferrying warriors across the frozen waters.”¹

As the tour group walked past the impressive main entrance, they witnessed the opening of the massive pivoting doors, which have a height ranging from 75 to 95 feet. These doors actually provide fans with a view of the Minneapolis downtown skyline and are considered one of the largest pivoting doors in the world.² They moved on past the giant Vikings horn, which blares in celebration when the team scores. The stadium floor has a square footage of 137,000 and is surrounded by purple and gold seats that provide a seating capacity of up to 66,200 for a football game.³ The field is lit using LED lights, and this stadium is one the first in the NFL to use LED field lighting. “Lights can turn on and off quickly and also change colors for concerts and other events. The lights provide a more brilliant view for TV cameras and use less energy than traditional bulbs.”⁴ Also impacting

the plentiful amount of light is the huge glass curtainwall at the northwest side of the building.

One of the most extraordinary features of the facility is the transparent fixed roof, which allows for an abundance of natural light all year round. It feels like being outdoors, but offers the warmth and comfort of being indoors. The roof material is made of a plastic called ETFE (ethylene-tetra-fluoroethylene), which is a transparent polymer used to build roofing material on NFL stadiums, specifically in those climates where weather changes largely impact the experience of watching and participating in sporting events. The U.S. Bank Stadium is the fifth NFL stadium built with this type of roof.⁵ This ETFE material also provides heat to melt snow on the roof, eliminating the possibility of the roof collapsing, which happened a few years back in the former home of the Vikings, the Metrodome.

Along with NFL football games, the building will be used for concerts, family shows, college and high school sporting events, conventions, trade shows, corporate meetings and community events. It has been selected as the site of the Summer X Games (2017 & 2018), the Super Bowl LII, and the NCAA Men’s Final Four (2019)⁶

We capped off the event with happy hour and some lively networking at the Crooked Pint Ale House, which is located a few blocks from the stadium. Many thanks to the sponsors of the event: Gabberts, Hickory Chair, Uson, Visual Comfort & Co, and Carolyn H. Olsen, Realtor for Coldwell Banker. • D •

¹<http://fortune.com/2016/08/27/nfl-minnesota-vikings-stadium/>

²<http://www.bizjournals.com/twincities/news/2016/07/15/us-bank-stadium-inside-look-photos.html>

³<https://www.usbankstadium.com/stadium-info/faq>

⁴<http://www.bizjournals.com/twincities/news/2016/07/15/us-bank-stadium-inside-look-photos.html>

⁵<http://fortune.com/2016/08/27/nfl-minnesota-vikings-stadium/>

⁶<https://www.usbankstadium.com/stadium-info>

Holistic Healthcare Design

By Colleen Slack, Allied ASID



Avera Cancer Institute Healing Garden. Photo by BWBR.

As the healthcare landscape evolves — and technology, budgets, patient demographics, and industry-specific challenges change — the effective application of holistic architectural and interior design can help facilities keep pace. Cancer treatment facilities and birth centers are two subsets of the healthcare industry where these new trends in design are being implemented with striking results.

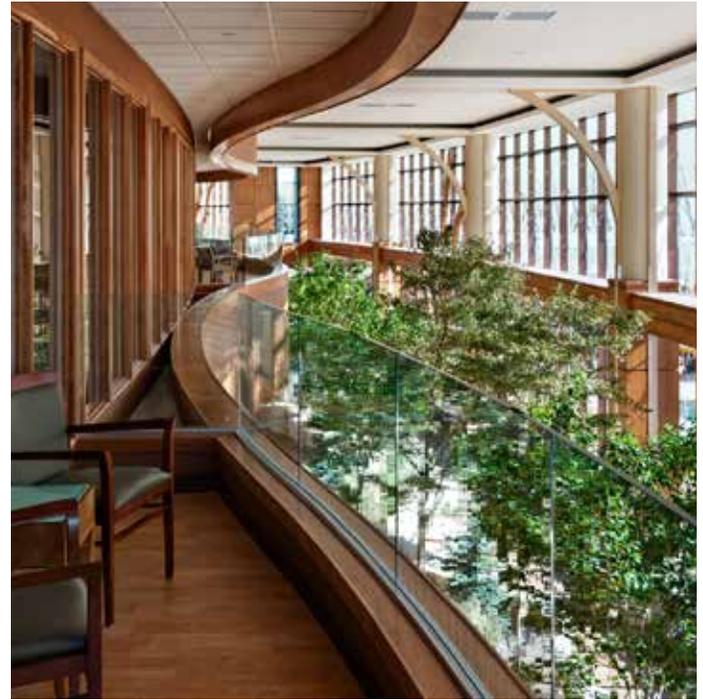
Throughout his 25-year professional career, Steve Busse, AIA, LEED AP, at BWBR, has used design as a tool that improves both how people heal and how medical staff can facilitate care. By seeing the person rather than the illness, Steve uses design to support the psycho-social needs of a patient and empower them to be active participants in their care through environments that are calm, inspiring, and human-centered.¹

When given a diagnosis of cancer, patients often experience a sense of loss of control and financial concerns. How can care providers help them through these feelings and concerns? New cancer centers are shifting the focus to treating the whole person in order to meet their behavioral, social, physical and mental health needs. New features and services being incorporated include offering patient advocates to help navigate them through the process, patient centered care where all the specialists come to the patient, and spaces within the care center for alternative medicine practices such as acupuncture and meditation.

Just entering a hospital can be a stressful experience, so the goal is to make the space feel like a place of wellness rather than where people go when they are sick. Key design features that help achieve this objective are creating strong connections to nature, lighting strategies, community integration and support



Avera Cancer Institute Dining and Art Walk. Photo by BWBR.



Avera Cancer Institute Garden Balcony View. Photo by BWBR.

for emotional and spiritual wellbeing. Labyrinths, views of nature and natural elements indoors, and community spaces for casual connections help support the healing process.

A key project by Busse that exemplifies these holistic principles is the Avera Cancer Institute — Prairie Center, in Sioux Falls, SD, where leaders requested a sustainable facility free of carcinogenic toxins. To this end, Prairie Center has set new benchmarks. Indoor air-quality measures include air exposure to UV light to kill airborne bacteria, as well as 7,500 sq. ft. of indoor plants, trees, grasses, ponds and waterfalls to balance humidity and air quality. Building materials included VOC-free paints, adhesives and fabrics.

The center features regionally quarried stone, design elements that evoke prairie grass and a sweeping, curved-glass facade that elicits the expansive South Dakota horizon. Indoor gardens with native plantings, waterfalls and indoor and outdoor water features capture a distinct South Dakota character. Elements on the exterior of the meditation room resemble the needles of the Black Hills, while rock from the Crazy Horse Memorial graces the west entry waterfall and outdoor meditation labyrinth; the center is only the second off-site location to receive the stones.²



Avera Cancer Institute Treatment Room. Photo by BWBR.



While having a baby is a very different experience than the process of treating cancer, the need for spaces that provide a patient focused experience and also function efficiently for the staff is the same. Alena Sakalouski, AIA, NCARB Project Architect, Women's Health Leader at HDR Architecture, Inc., specializes in birth center design, including the Mother Baby Centers at Abbott Northwestern in Minneapolis and United Hospital in St. Paul. The challenges Alena and her team faced in the design process included cultural interpretation of imagery and color palettes and terminology, limited space, way finding, serving different needs for patients and staff, and accommodating medical equipment and surface material requirements while creating a serene space for childbirth and the complications that can arise in a heart beat.

Both birth centers are located in urban areas, so site constraints challenged them both in terms of layout working around existing

hospital facilities and in their ability to build connections to nature and natural light. Floral super graphics in the United Hospital facility were dual purpose serving as both way finding and a natural element. At Abbott they utilized "a series of variously colored curved "circlets," symbolizing the continuity of family ... [which] on the interior serves to orient and guide expecting mothers and their families. These circlets also provide natural light deep into the building and enhance views from every patient room."³

The design team strove to balance then need to incorporate modern technology into labor and delivery rooms while creating a modern, residential feel more in line with a fancy hotel than a traditional hospital room. Designs must be classic and avoid trendy colors which can quickly date a space, and lead the patient to wonder if they are getting the most up to date care. Since the next generation of users are for the most part Millennials, who



The Mother Baby Center at United Hospital. Photos by HDR.



The Mother Baby Center at Abbot Northwestern. Photos by HDR.

desire a natural process they can be in charge of, it's important to consider their aesthetic and functional desires for these spaces. New features include birthing or deep soaker tubs, grab bars for support, storage for birthing aids such as birthday balls, and art to provide distractions near the tub and bed. There are also enhanced family zones with better beds for partners and space to accommodate visiting family in the recovery rooms, to help the patients feel comfortable and at ease during and after the delivery experience. Overall the goal is to hide the clinical components where possible to create a more residential feel.⁴

Just like the cancer centers, creating spaces for emotional and spiritual wellbeing was important since not all families have positive birth experiences. They needed space for those grieving or struggling with difficult situations who may not want to be around kids from other families. In Minneapolis this space was called a chapel, but they learned through feedback from

users that a name matters, and in St. Paul they call this place a meditation space, so more users would feel comfortable and welcomed there.

Both designers have been challenged working with health care professionals who may not see holistic design as an important requirement, but the competitive market place in the Twin Cities fortunately spurs on innovation as hospitals work to avoid losing market share to another hospital. That is partially what drives some hospitals and centers to integrate holistic design solutions. Fortunately, our market is at the forefront of this design trend nationally. The next trends they predicted for the field of holistic healthcare design are dynamic lighting that simulates the circadian rhythms and colors of light in the morning and night, and more inclusion of the needs of the care providers to create stress free work environments for them as well. • D •

¹ BWBR bio for Steve Busse

² <http://www.bwbr.com/portfolio/avera-cancer-institute-prairie-center/>

³ <http://www.hdrinc.com/alena-sakalouski>

⁴ "Little Things: Designing for Labor, Delivery, and Beyond," Jennifer Silvis, July 31, 2015, Healthcare Design



Healing Environment for Home, Work or Play

By Bonnie Birnbaum, ASID, CID





The information for this article was derived from a presentation given by Barbara Huelet AAHID, FASID, EDAC, IIDA at a Design Arts Seminar.

What is a healing environment? Health care costs are extremely high in the United States. One important way designers can address this issue is to create healthy places in which to grow, live, work and play. Places where people can be safe, healthy, thrive and reach full potential. The health of the individual can be linked to the health of the planet.

By taking a more holistic approach to the designed environment, designers then begin to consider issues like how does the public respond to the environment, and how to engender good health through the design process. Some questions that should be asked when planning a space are:

- Can stress-reducing environments contribute to positive health outcomes?
- Do healthier, safer homes contribute to personal health?
- Do positive work environments lead to employee health and productivity?
- Do fun places reduce stress?
- Does the built environment play a key role in health?
- What is a healthy building?

The brain affects human behavior. Research shows that multitasking increases the error rate by 50%. Working at a treadmill desk increases productivity and makes the worker 34.9% more accurate. People have more self-control and better attention span in the morning when the brain is most rested.

The design of the work environment can help with these issues by creating an environment that helps with productivity. For example: distraction shielding, access to natural light and views, ergonomics, social zones, encouraging physical activity with walk stations or treadmills.

The universal health needs for the human species include both physical and psychological needs. The physical includes clean air and water, natural diet, absence of harmful radiation, minimum pathogen contact, protection from climate extremes, physical activity, sleep and sunlight. The psychological need includes emotional support, sensory stimulation, interesting environment, aesthetically pleasing environment, creative opportunities, recreation, spontaneity, variety, purpose, belonging and love and absence of alienation and deprivation.

Reducing stress can improve any environment. There are many kinds of stress. EMF (electromagnetic fields) is stress caused by radio waves, electronic cables, televisions, microwaves, wiring, appliances and cell phones. These EMFs have been known to



interfere with sleep, mood swings, lack of concentration and even interfere with the immune system. Chemical stress comes in the form of VOCs. Toxic building materials, cleaning agents, pesticides, off gassing, air pollution and toxins in glues all contribute the VOCs in the air. Designers can counteract this toxicity by always selecting products with a low VOC. Mold is another stress — 30 million people get sick from molds each year, including allergies, respiratory or pulmonary infections, eye or skin irritation or wheezing and cough.

Concerns about safety is another form of stress. This can take the form of fears about your security to safety in the home for all ages, from infants to the elderly. Universal design principles should provide a basis for accommodating multigenerational living. Designers must create safe homes by taking into consideration prevention for falls, fire, poisoning and any other hazards.

Healthy sleep is extremely important for the overall wellbeing of people. The key to good sleep is a healthy environment. Lack of sleep is a key form of stress; it is not a luxury but a necessity. Besides resting the body, it also rests the brain and allows the body to repair and renew cells. Designing for good sleep includes sound, temperature and light control.

Physical inactivity poses one of the largest threats to public health. It is an independent risk factor for many chronic diseases.

Inactivity is the fourth leading risk factor for mortality. The built environment can promote a more active lifestyle by providing access to physical activities.

Biomimicry is doing something the way nature does it. It is nature based innovation. The challenge for designers is to design with the aesthetics of nature.

Biophilia, the love of nature, is an important concept in creating a healthy environment to work or live. Nature and people are closely intertwined. Nature recharges human's energy at a cellular level. Well buildings are sustainable because they address the human needs for safety and security but also provide an environment that works in concert with nature, most importantly the human need for sunlight.

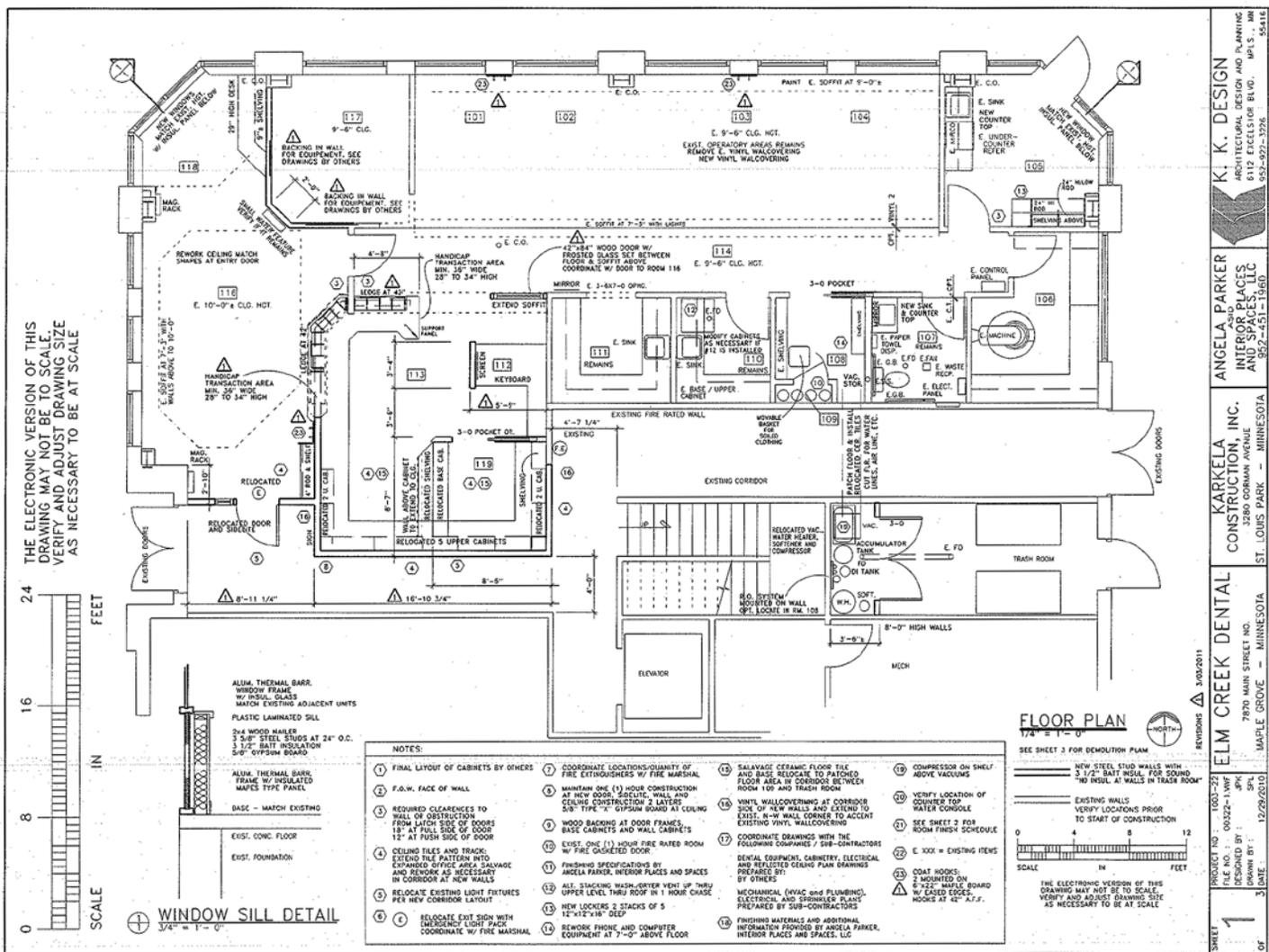
Humans, being sentient, have a direct connection between their brains and the world around them. The sense of pleasure is essential for the wellbeing of humans. Light, color, touch, temperature, noise, laughter, smells and taste all contribute to a pleasurable experience.

Healthy places promote health people. Health is not merely the absence of disease or infirmity. Health is a state of complete physical, mental and social wellbeing. Design can play a major role in creating healthy places. • D •

Health, Safety, Welfare and the Art of Designing Dental Practices



By Angela Parker, ASID



Floor Plan for Elm Creek Dental, by Interior Spaces and Places, LLC

Building, designing, and refreshing dental practices is an interior design specialty Interior Places and Spaces, LLC has grown to love and enjoy. While designing a furniture store in Minneapolis, I had a dental emergency and drove to the nearest dental practice. The interior of the practice was white and gray throughout the facility. While in the dental chair, I pondered, “why is this facility cold and sterile?” Much to my surprise, the doctor stated the image was exactly his desired outcome. A few years later, Interior Places and Spaces, LLC was consulted on the décor of this family owned practice. Thus began the research and design process of updating dental practices.

Unique to the design and layout of dental practices are the following components: vestibule, reception area, waiting room, private exam rooms, panoramic x-ray station, sterilization area, restroom and break room. Technology often is the driver for updating the internal components of the office. Interior Places and Spaces, LLC recommends an update every ten years. This not only keeps the office on the cutting edge of design and technology, but improves office productivity and moral. The health, safety and welfare of the public must be considered when designing and specifying commercial environments. The



Hallway, Elm Creek Dental



Operator, Elm Creek Dental



considerations are too many to discuss all in one article, so we will focus on the following topics.

Wall coverings are recommended to be Type II, Class A for flammability and durability in commercial applications. What does this mean? The American Standard Testing Materials (ASTM) is used to test materials to meet the criteria for each product. ASTM Standards are used worldwide to improve quality, enhance safety and facilitate trade.

“ASTM E-84 measures the flame spread and smoke index which are considered the surface burning characteristics of a material. Depending on test results, materials can have classifications of Class A, B, or C according to National Fire Protections Association (NFPA), ANSI/NFPA No. 101, “Life Safety Code,” or MBC (Minnesota Building Code), 2015 Edition, Chapter 8, Interior Wall and Ceiling Finishes.”

The test is conducted in a fire tunnel using a 22" x 24" sample of the material. The ignition source is 7 seconds in duration with the total test lasting 10 minutes. The flame front cannot exceed 24" during the test. Results are expressed as Flame Spread Index, and Smoke Developed Value.

Following are the criteria for each level of this test, regardless of whether NFPA or MBC.

- **Class A**, Flame Spread Index 0-25; smoke developed index 0-450
- **Class B**, Flame Spread 26-75; smoke developed index 0-450
- **Class C**, Flame Spread 76-200; smoke developed index 0-450

Interior Wall and Ceiling Finish requirements vary by occupancy, and are determined by whether the building has a sprinkler system. The MBC has specific criteria for interior exit stairways, interior exit ramps and exit passages. Wall finishes are extremely important in dental practices. Paint with a durable finish is acceptable for low traffic areas. Wall coverings are perfect for the sterilization, operator area, restrooms and hallways due to high traffic and ease of cleaning.

Interior floor finishes and floor covering materials shall comply with the MBC and are critical in any environment, especially a public one. The dental practice has unique considerations. The hygienist chair rolls around on casters and may cause damage to an incorrectly specified floor material. Bodily fluids, including human bacteria, blood, vomit and saliva come in contact with the hygienist, patient and doctor.



Operator, Edina Family Dental

Occupational Safety and Health Administration (OSHA) monitors the compliance of the blood-borne pathogens. The doctors and staff take “universal precautions” in handling of masks, goggles, gloves, lab coats or other personal protective equipment. Interior Places and Spaces, LLC often works with an architectural firm, contractor and flooring representative to ensure the product specified will meet the sanitary requirements of the practice and is code compliant.

The carpeting for the lobby, private offices and hallways may be required to be Solution Dyed, meet Flammability code ASTM 648 – Class I (glue down), Smoke Density code ASTM-662 Less than 450, Static Propensity code AATCC Test Method 134 – Less than 3.5 kV, and have a Green Label.

According to the Carpet Rug Institute, “Most carpet is available today with built-in static inhibitors. These control elements include specific fiber blends and specially engineered conductive fibers which can dissipate the static charge.”

“For commercial environments, 3.5 kV is the generally accepted maximum value as tested by AATCC Test Method 134. For more critical environments involving sensitive electronic equipment, more stringent requirements may be desirable. Personal computers have built-in protection systems to shield components from damage or disruption from electrostatic discharges and

would not fall into that category. In highly critical environments, such as the handling of semiconductors, the typical ‘antistatic’ carpet may not provide sufficient static protection and highly specialized carpets must be specified.”

Static Propensity

“The action of rubbing of two dissimilar materials together may generate static electricity. Walking across a carpet results in rubbing two materials together – the carpet face fibers and shoe sole materials.”

“Several variables affect the amount of static that is generated. These may include differences in environments, humans, shoe soles, fiber types, carpet constructions, carpet backing materials and carpet cushions. In-use wear, soiling, cleaning, temperature, relative humidity, etc. may alter the amount of static electricity generated in the carpet and, therefore, the level of shock. Studies have revealed that static electricity does not become a problem with most people until the relative humidity drops below 40 percent.”

Safety and preventing falls is another critical area in the built environment, especially in Minnesota. The climate has many seasons of wet (rain, mud or snow). Walk-off mats are required in most seasons for control of rain, mud, snow and chloride. The



tile underneath the matt is required to be slip resistant. Floor slip resistance testing is the science of measuring the coefficient of friction of flooring surfaces, either in a laboratory or on floors in situ (before or after installation).

ANSI A137.1

Coefficient of friction (COF) describes the ratio (F/W) between the force necessary to cause an object to slide across a surface and the weight of the object. When the object begins at rest, the ratio is the static coefficient of friction. When the object is already in motion, it is the dynamic COF (DCOF). Static friction applies to pedestrians who are standing still.

The specifier shall determine tiles appropriate for specific project conditions, considering by way of example, but not in limitation, type of use, traffic, expected contaminants, expected maintenance, expected wear, and manufacturers’ guidelines and recommendations. The latter is normally nowhere to be found,

as most manufacturers do not want a suggestion of liability. The International Building Code (IBC), by reference to ANSI A137.1, puts the burden of responsibility for slip safety on “the specifier.”

Always check with your local building code official, architect, contractor and MBC for code compliance. Each city or municipality may have their own restrictions and specific requirements.

In closing a few notes from our National Website.

- The American Society of Interior Design (ASID) believes that design impacts lives.
- Through education, knowledge sharing, advocacy, community building and outreach, we strive to advance the interior design profession, and in the process, to demonstrate and celebrate the power of design to positively change people’s lives.
- We showcase the impact of design on the human experience and the value interior designers provide. • D •

ADVERTISE WITH ASID MN

Attention IP Members

Design Directions offers the perfect opportunity to put your company in front of more than 400 industry practitioners. Plus, all ad insertions include a FREE advertiser listing on the ASID MN website. Email the publisher at bmccashin@redleafdesign.com, or call 612-314-5260, to request rate and specification information or to reserve your space.



ATTENTION

INTERIOR DESIGNERS!
Experience the newest and best products and services from more than 200 vendors at the largest building industry product show in the upper Midwest.

BRS
 BUILDERS & REMODELERS SHOW
 A PRODUCT AND SERVICE EXPO
 PRESENTED BY: **BATC**

Free Show Admittance!
BATCBRS.COM • TUESDAY, APRIL 11, 2017

HAVE YOU **HUGGED** A SPONSOR TODAY?

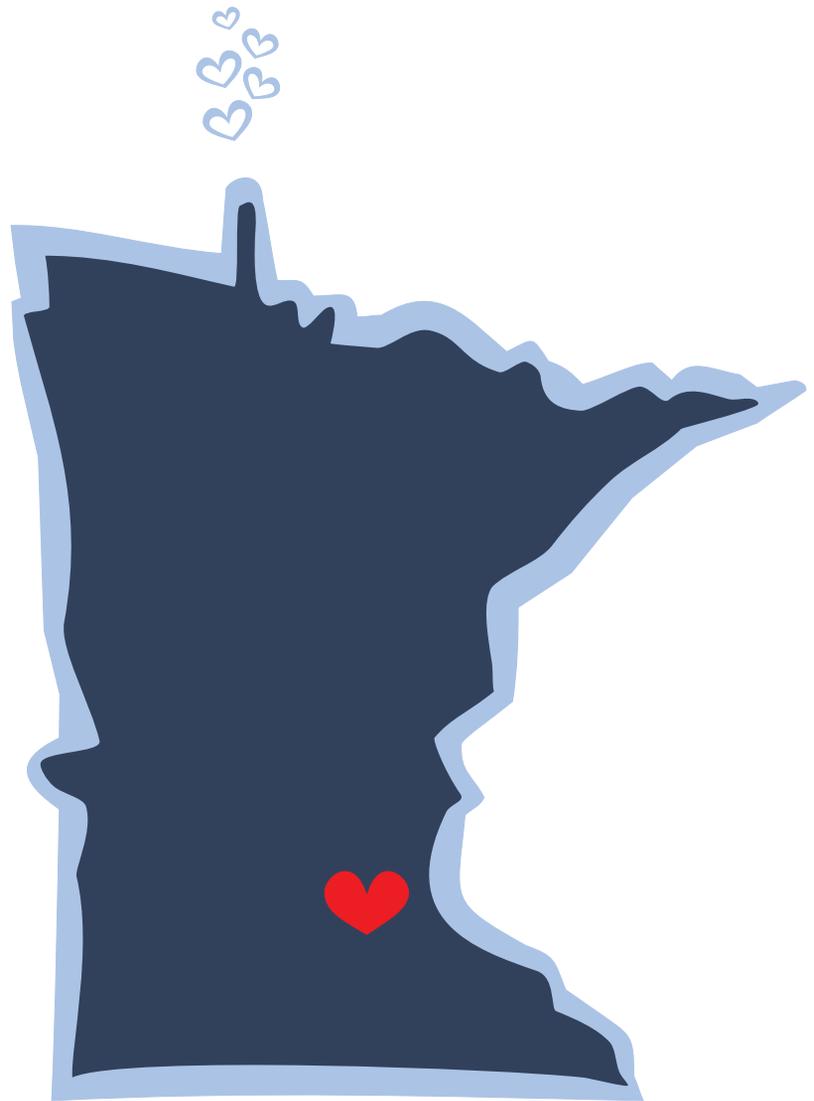


GIVE A SPONSOR SOME LOVE.

Sponsors play a huge role in keeping our chapter strong.
Say “thank you” to, and do business with, a sponsor today.



FK
15
YEARS
@IMS
 .



WE COULDN'T DO IT WITHOUT YOU

TRULY GRATEFUL • 15 YEARS @ IMS • SAWDUST IN OUR VEINS

Francis
King Ltd.

 www.francisking.com

275 Market St. Suite 465 Minneapolis, MN 55405 612. 604. 0033