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UNIVERSITY OF CALIFORNIA SAN DIEGO

"A Spectrum of Influence: Finding My Voice in Lighting Design"

A Thesis submitted in partial satisfaction of the requirements for the degree Master of Fine Arts

in

Theatre and Dance (Design)

by

Vida Huang

Committee in charge:

Professor Christopher Kuhl, Chair Professor Ana Maria Alvarez Professor Victoria Petrovich Professor Pinar Yoldas

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University of California San Diego

2025

DEDICATION

Thank you to all the staff, faculty, friends, and family for the support.

謝謝所有的支持與陪伴!

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ABSTRACT OF THE THESIS

"A Spectrum of Influence: Finding My Voice in Lighting Design"

by

Vida Huang

Master of Fine Arts in Theatre and Dance (Design)

University of California San Diego, 2025

Professor Christopher Kuhl, Chair

This thesis examines how I went from carrying out technical plans to becoming a storyteller who uses light to create theatrical worlds, tracing my path from an aspiring performer to a lighting designer. Using my lighting designs from *The Rogue's Trial, Winterworks 24*, *The Promise*, and *900 Years* at the University of California San Diego, I applied the artistic and technical processes to bring a production to life.

Lighting design is significantly more complicated than just illuminating the space and actor. It requires extensive problem-solving, flexibility, and communication throughout creation. I encountered challenges like budgetary restraints and power limitations during my studies here. Those difficulties strengthened my problem-solving and communication skills.

Chapter 1 discusses the key factors that influence my choice of projects. Chapter 2 explores my primary lighting design style. Chapter 3 dives into the details of my creative process by introducing the tools I use in production. Chapter 4 focuses on the challenges I have encountered and the lessons I have learned. Chapter 5 explains how I integrate my drawings into lighting paperwork to make my work unique. The final chapter reflects on my journey at UCSD and discusses my future goals in lighting design.

By sharing my experience, I want to show how essential teamwork, cultural diversity, and flexibility are beneficial to the development of the arts. Ultimately, this thesis reflects how I have developed my technical proficiency and deeply personal creative voice, blending movement, emotion, and light into a unified storytelling medium.

Chapter 1 Defining My Voice

Before applying to the University of California San Diego, I had never had a chance to design a full production independently. My understanding of lighting design came from my experiences as a lighting assistant, where I helped designers update paperwork, take notes, and be in production to support. I also worked as a lighting technician, executing lighting plots, operating the lighting console, and recording cues based on the designer's direction. As I gained more experience and a deeper understanding of lighting design, I want to transition from supporting other people's vision to creating and designing my work.

Throughout my studies at UCSD, I have understood myself more as an artist. My design choices are primarily influenced by three key factors: personal connection, creative freedom, and personal interest. Personal connection is the most essential factor when selecting a play. In some of the plays I have worked on, I discover a personal connection, whether it is strict obedience to parents (*The Promise*), the complexities of sibling relationships (*The Half-Sibling Play*), or the fear of judgment from others (*Dead Girl's Quinceañera*). When a production resonates with me emotionally, I tend to have a deeper meaning to my lighting design. These connections guide my creative approach and allow me to contribute a personal perspective to storytelling.

I thrive in an environment where ideas and experimentation are welcomed, and I have creative freedom. When I work with flexible collaborators, their willingness to let me experiment has helped me strengthened my confidence in my design aesthetic. I highly value communication and teamwork with the creative team. I have learned that maintaining an open dialogue,

embracing new ideas, and having fun with the design process help me overcome many challenges, especially in high-pressure situations when I feel lost or uninspired.

One of my biggest goals during my MFA journey is to integrate my interests in movement and dance into my lighting design practices. My passion for dance, particularly in hiphop, has significantly influenced my artistic vision. I have been drawn to hip-hop's rhythm and energy since childhood, finding its beats more compelling than those of other dance styles. One skill I am eager to refine is the ability to synchronize lighting with music, creating a dynamic and immersive atmosphere. By incorporating these elements into my work, I aim to develop a distinctive artistic style that blends movement, rhythm, and light into a cohesive storytelling tool.



Figure 1- Winterworks 2024 Can we kick it?

Chapter 2 The Heart of My Design

Developing my artistic voice as a lighting designer has been a journey of discovery. I approach lighting design much like my drawing style. I prefer to begin with a blank canvas, then draw in the main character, and finally add the color. When I start my design process, I begin with darkness and gradually add elements to build depth and texture, keeping the stage clean and purposeful. Lee Watson, the author of the Lighting Design Handbook, encouraged lighting designers not to fear shadow and darkness, and the best tool for designers is contrast. Another well-known lighting designer, Brandon Sterling Baker, shared his opinion about lighting: "Less is more." If fewer lights are needed, I prefer to remove them, as simplicity often enhances the impact. I believe using one light to direct the audience's view will be clear and strong for an isolated moment.



Figure 2-The Promise Opening Moment

Typically, in theatre, the designers tend to hide the lighting equipment away; the scenic designer provides masking, leg, and border to help hide the fixture. Because of this, the stage can seem less messy and more magical since it's challenging to figure out where the lighting will come from. However, during *Winterworks 2024*, I had broken the rule of hiding the fixture. Since this piece does not have a main set on stage, I wanted to experience showing the fixture purposefully. So, I put five Mini Strips across the electric pipe and positioned it at people's height on stage. When the lighting turns on, the dancer are backlit onstage. The audience's pupil shrinks because of the direct bright lighting in their eyes; they may experience a slight blinding effect. After their eyes adjust, they see the dancers' movement flow between illumination, and the dancers' silhouettes becomes unified into one group.

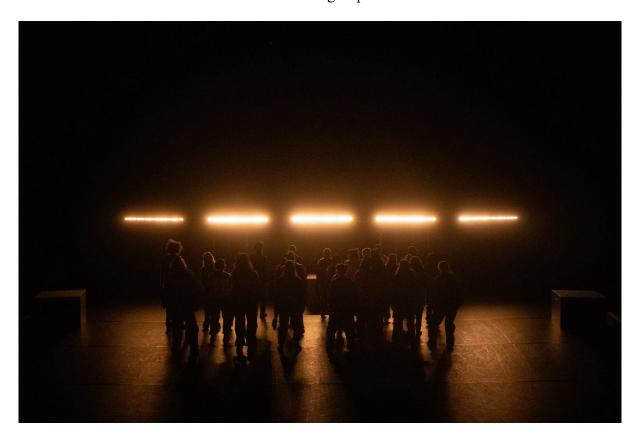


Figure 3-Winterworks 24 Can We Kick It?

Showing shadows on stage is another technique I like using in my lighting design. The size and angle of the shadow on the stage can create more depth in the space and add an unrealistic and dramatic feeling to the play. More shadows on the wall can create an atmosphere of being watched and surrounded. I usually mount the lighting fixture on the stage floor in the downstage area and focus it on the actor's face to create a shadow look. When lighting from a low angle, the shadow expands as the actor walks toward the light; as the actor moves in the opposite direction, the shadow shrinks. The low-angle lighting of the actor's face also creates contours, making their facial expression creepier and scary. When the shadow is larger than human size, it represents the power dynamics in a character's relationship. During my experience in *The Promise*, there was a scene in which the main character used his magical chicken to summon a curse on his daughter's boyfriend. In the summoning ceremony, I use footlights to create multiple shadows on the wall as the chicken dances. The audience will experience the increased power of the chicken and feel a sense of danger and magic.

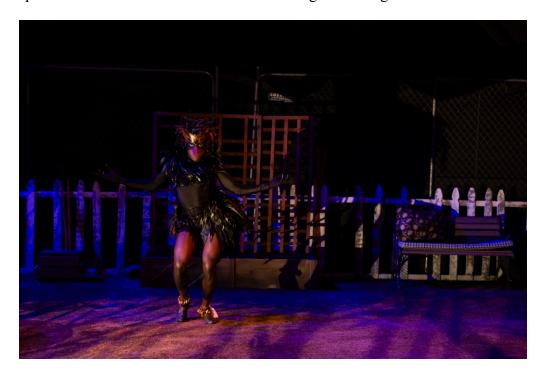


Figure 4-The Promise Summoning Moment

Chapter 3 Tools That Define My Style

I frequently incorporate tools and elements into my designs, including gobos and practical lighting. Each plays a crucial role in shaping the atmosphere and enhancing the storytelling on the stage.

Gobos are an essential part of my design approach. A gobo is a metal or glass template transforms the lighting fixture to project geometric patterns or textures onto the stage. In the final moments of Can We Kick It? of *Winterworks 2024*, the piece's central theme is celebration. I used a ripple gobo to achieve this look, which projected the effect of flowing water across the dancers. This subtle movement of light added a spiritual and dynamic quality to the scene, reinforcing the choreographer's vision.



Figure 5-Winterworks 24 Ending Moment

Practical lighting is the light source we usually see in our everyday life, such as lamps, candles, and flashlights. Using practical light can make the scene feel more realistic, and it is always helpful for me to enhance the storytelling. In my practice, I use a lot of LED tape throughout my production. It is a valuable tool with vigorous intensity, the ability to color change ability, and various way of shapes and geometry. I used LED tape to create a cross in 900 Years, a glowing heart and Mary statue in The Promise, and a florescent light tube in Dead Girl's Quinceañera. The convenience of transforming into different shapes and the easy ability to attach to the props make LED tape a handy light.



Figure 6-900 Years LED Cross

Another practical light I frequently use is a string light. String lights can usually be seen at an outdoor café or rooftop bar for decoration. In *The Half-Sibling Play*, the playwright set one

scene location in a rooftop bar. When I add the string light on the set piece, it creates a subtly warm and soft, which creates the aesthetic of an inviting and welcoming atmosphere to the space.

The other practical light is a sodium vapor fixture. This type of light is commonly used in streetlights in communities because it is a highly efficient light source that can improve visibility in fog and mist. Through my experience with this light, one of the most intriguing effects is its ability to wash out color from a person's face. The predominantly yellow hue creates a unique, stark, and desaturated look. In *The Rogue's Trial*, the main character, John Cricket, reaches a moment of utter despair and hopelessness. I used a sodium vapor fixture to flood the stage in a saturated yellow light to emphasize this emotional shift. When the light bounced from the floor, the actor's face appeared gray, unnatural, and lifeless, reinforcing the character's sense of giving up. This simple yet powerful choice effectively captured the atmosphere of giving up while in the underworld that the director and I envisioned.



Figure 7-Sodium Vapor Lighting Lab Test

Chapter 4 Overcoming Challenges and Learning New Skills

I encountered several challenges at UCSD that shaped my growth as a lighting designer. Coming from a background as a lighting technician, I often approached design with a realistic mindset, focusing on what was technically achievable rather than allowing myself to dream big. I hesitated to take bold creative risks, lacking confidence in my design choices due to my limited experience. However, my cohort and mentors have been incredibly supportive, encouraging me to trust my instincts and explore new ideas.

One of the most transformative experiences for me was working in the Light Lab. This hands-on experimentation deepened my understanding of how light interacts with space and emotion. Through trial and error, I gained more confidence in my creative decision-making and began embracing a more artistic approach to lighting design.

Additionally, I have never been someone who remembers the names of famous designers or follows specific artists for inspiration. However, during my time at UCSD, I have been introduced to many artists, such as Es Devlin and Olafur Eliasson, whose work has reshaped my artistic perspective. Seeing the work of other designers has helped me refine my creative voice, offering me new sources of inspiration whenever I feel creatively stuck. While searching for ideas for The Rogue's Trial, I saw a show, *Primary Trust*, in La Jolla Playhouse. The main character talks about his childhood memories in the show's climax. Masha Tsimring, the lighting designer, Flooded the stage with saturated yellow color, and I felt like I was joining him in his memory. That was the first time I was introduced to sodium vapor lamps, and then later, I had a chance to see Olafur Eliasson: Open's exhibition in LA. In one of his projects, he used sodium vapor in the installation. When we entered the installation, my friend's face turned

monochromatic yellow. At that moment, I felt a sense of losing hope, which inspired me to use this light in the production.

A defining moment in my journey was working on *Dead Girl's Quinceañera*, where I had the opportunity to laser-cut a gobo to replicate a window's intricate layout precisely and save some budget. The process required extensive testing, drawing, and experimentation, pushing me to refine my skills and problem-solving abilities. After countless trials, I finally achieved the exact look I envisioned. That moment instilled a sense of pride and accomplishment, reinforcing my confidence as a designer.

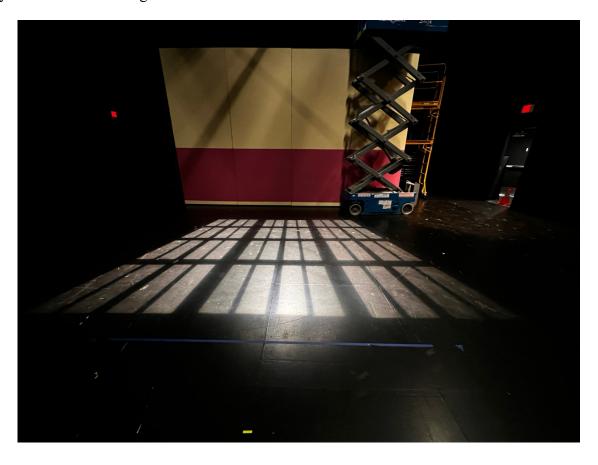


Figure 8-Dead Girl's Quinceañera's Lighting Focus of Window Gobo

Chapter 5 Making My Work Stand Out

One of the most significant challenges I encounter in lighting design is developing a distinctive style that represents my personality and makes my work recognizable to others. The challenges are finding my style in lighting design on the stage and creating a style in my paperwork. Establishing a signature style helps define my artistic identity and increases my chances of securing opportunities in the industry.

One of the main pieces of paperwork that a lighting designer needs to create is a light plot. Kevin Dreyer states, "A light plot is the ultimate record of how you want to design a production." It is a record that contains the designer's artistic concept and point of view. This documentation aims to communicate the design ideas and make them understandable to the electric shop staff.

During a lighting plot drafting class taught by instructor Avery Reagan, she encouraged us to infuse our personalities into our technical drawings. This advice has been beneficial to me. I always want to make my work stand out to reflect on my individuality. I have always enjoyed doodling and drawing after learning to use Vectorworks, lighting software. I started incorporating one of my favorite bookmark designs into my title block on a lighting plot, which I keep a close symbol I have cherished for years. This small but meaningful addition made my work feel uniquely mine, blending technical precision with personal expression. It was a defining moment in realizing how my artistic background could seamlessly integrate into my design process.

I also created a logo combining my blue and orange icons. I incorporated my name into the shape of a shining star, which also looks like a lamp. This star represents my aspiration to shine brightly in my future and career. The light in the logo is relating to my philosophy of

lighting design. Through all these artistic touches, I hope they can make my work stand out and be memorable to others.



Figure 9-Graphic Design for Bookmark



Figure 10-Logo Design

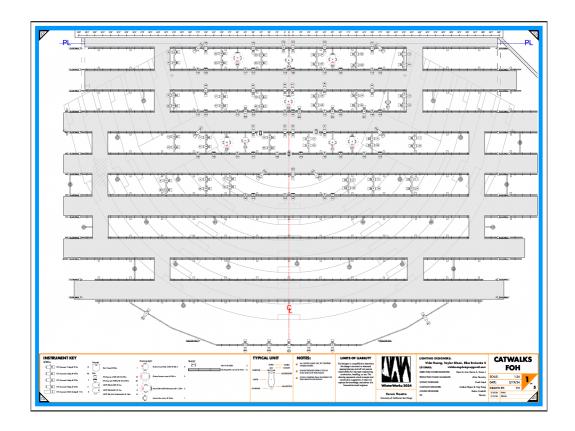


Figure 11-Winterworks 24 Light Plot

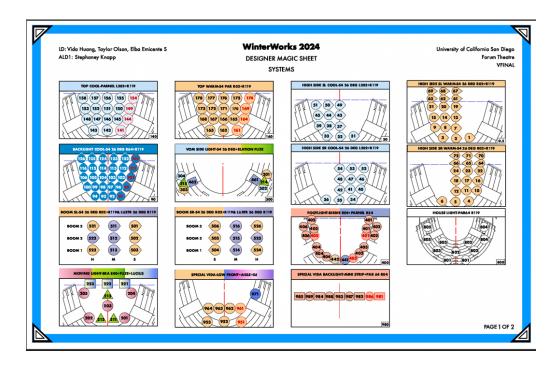


Figure 12-Winterworks 24 Magic Sheet

Chapter 6 Looking Forward

Throughout my MFA program at UCSD, I have gained invaluable experiences that have shaped me into a more confident and skilled lighting designer. The program has allowed me to explore new aspects of design, technical work, and collaboration, which has enriched my understanding of the field. Reflecting on my time here, I have evolved my technique and deepened my knowledge of theatre lighting far beyond where I was when I first entered the field.

When I began my studies, I aimed to become a lighting designer and develop a diverse skill set, including 3D drafting, Photoshop, and storyboard creation. I recognized that versatility is essential in this industry, and I wanted to avoid limiting myself to a single specialization. Over time, I am attracted to environments where I can continuously learn new things, which helps me quickly adapt to new challenges and apply my skills creatively and precisely.

My long-term goal is to become a creative director in immersive design. I envision myself leading a collaborative team where I can combine my technical expertise with a deep understanding of storytelling to shape innovative and compelling productions. I am particularly enthusiastic about finding new ways to integrate lighting, movement, and visual design elements to create unique, immersive audience experiences.

My time at UCSD has given me the tools, knowledge, and mindset to take the following steps in my career confidently. As I move forward, I remain committed to pushing the boundaries of lighting design, embracing new technologies, and continuing to evolve as an artist and storyteller.

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