Conversations with Landscape Architects and Artists

An Exploration of the Value of Creative Thinking in Landscape Architectural Design Process

by Emily King

A THESIS

submitted in partial fulfillment of the requirements for the degree

MASTER OF LANDSCAPE ARCHITECTURE

Department of Landscape Architecture/Regional & Community Planning
College of Architecture, Planning, & Design

KANSAS STATE UNIVERSITY
Manhattan, Kansas

2011

Copyright Emily A. King 2011

Abstract

Over time the conventional design process has minimally evolved from Hideo Sasaki's staged-design process, one of the original models of landscape architectural design process (Murphy 2005, 50; Sasaki 1950, 35). Different types of conventional design process, as it is called in this study, incorporate more stages, devoting more time to each; however, the stages are still completed in an exact order due to the focus on problem solving.

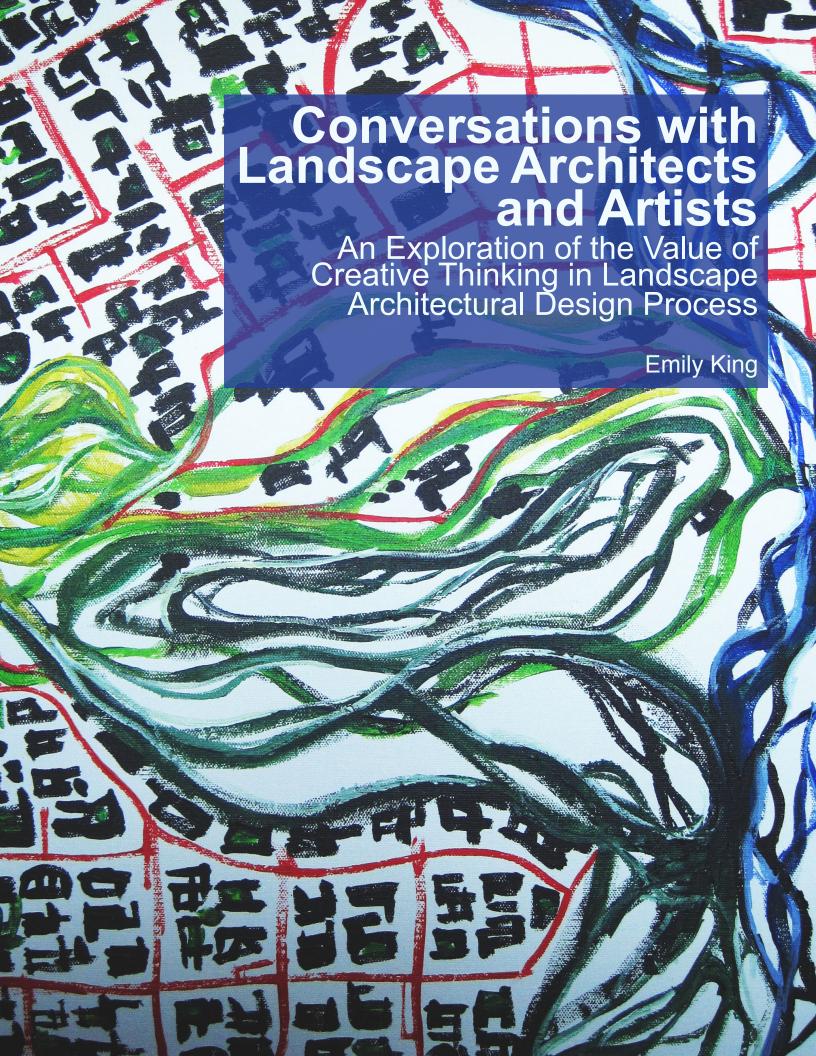
The lack of encouragement for personal creative thinking through an individual creative process within the conventional design processes used today is apparent in both the profession and the education of landscape architects today. Because a creative process does not simply solve problems but encourages creative thinking throughout design, the profession would see greater generation of new ideas if landscape architects began to embrace a more creative process, as identified by Graham Wallas in the 1920s (Lawson 2006, 149-150; Herrman 1995; Goswami and Goswami 1999, 43-44).

Interviews with highly creative, or avant-garde, landscape architects, such as Thomas Balsley, Claude Cormier, Mikyoung Kim and Peter Walker, and assumedly creative artists helped to provide answers to primary research questions: How does the design process of avant-garde landscape architects compare to the assumedly creative process used by artists? And how can the conventional landscape architectural design process be reframed to incorporate more creative thinking in landscape architectural practice and landscape architectural education?

Using a grounded theory approach, in-depth, open-ended interviews were completed with eight subjects. Initial coding themes were based upon broad categories from literature review. Substantial coding and analysis of interviews to find the creative and conventional design processes and characteristics of creativity for each subject resulted in emergent themes and sub-themes from the interviews. Analysis matrices were developed to document commonalities and discrepancies between initial themes from literature review and emergent themes from interviews.

Conclusions on findings from initial and emergent themes include:

- Highly creative landscape architects employ non-linear, creative processes throughout design.
- Confidence in personal creativity is imperative to creative thinking.
- Landscape architectural programs should allow students flexibility and creative license for developing personal design processes.





Copyright Emily A. King 2011

Conversations with Landscape Architects and Artists: An Exploration of the Value of Creative Thinking in Landscape Architectural Design Process

Thesis August 2011

Kansas State University

College of Architecture, Planning, & Design Department of Landscape Architecture / Regional and Community Planning

Thesis Committee

College of Architecture, Planning, & Design, Department of Landscape Architecture / Regional and Community Planning

• Katie Kingery-Page, Blake Belanger, and Jon Hunt

College of Arts and Sciences, Art Department

Dylan Beck

Abstract

Over time the conventional design process has minimally evolved from Hideo Sasaki's staged-design process, one of the original models of landscape architectural design process (Murphy 2005, 50; Sasaki 1950, 35). Different types of conventional design process, as it is called in this study, incorporate more stages, devoting more time to each; however, the stages are still completed in an exact order due to the focus on problem solving.

The lack of encouragement for personal creative thinking through an individual creative process within the conventional design processes used today is apparent in both the profession and the education of landscape architects today. Because a creative process does not simply solve problems but encourages creative thinking throughout design, the profession would see greater generation of new ideas if landscape architects began to embrace a more creative process, as identified by Graham Wallas in the 1920s (Lawson 2006, 149-150; Herrman 1995; Goswami and Goswami 1999, 43-44).

Interviews with highly creative, or avant-garde, landscape architects, such as Thomas Balsley, Claude Cormier, Mikyoung Kim and Peter Walker, and assumedly creative artists helped to provide answers to primary research questions: How does the design process of avant-garde landscape architects compare to the assumedly creative process used by artists? And how can the conventional landscape architectural design process be reframed to incorporate more creative thinking in landscape architectural practice and landscape architectural education?

Using a grounded theory approach, in-depth, open-ended interviews were completed with eight subjects. Initial coding themes were based upon broad categories from literature review. Substantial coding and analysis of interviews to find the creative and conventional design processes and characteristics of creativity for each subject resulted in emergent themes and sub-themes from the interviews. Analysis matrices were developed to document commonalities and discrepancies between initial themes from literature review and emergent themes from interviews.

Conclusions on findings from initial and emergent themes include:

- Highly creative landscape architects employ non-linear, creative processes throughout design.
- Confidence in personal creativity is imperative to creative thinking.
- Landscape architectural programs should allow students flexibility and creative license for developing personal design processes.

Acknowledgments

There are many people who deserve to be acknowledged for their continuous support and encouragement throughout the process of writing my thesis. I want to start by thanking the people in the Department of Landscape Architecture, Regional Community Planning who constantly challenged me without doubts that I would be able to live up to their challenges. First, I want to thank Katie Kingery-Page, the major professor for my thesis. My interest in my thesis topic began when taking the seminar paired with Katie's specialization studio "Art and Landscape". This seminar first introduced me to how artistic practices and creative thinking can be incorporated into landscape architectural design. In addition, without Katie's support and constant enthusiasm and interest in my thesis topic, I do not think it would have been possible. Next, I want to thank my secondary committee members, Dylan Beck, Blake Belanger and Jon Hunt, who provided me with continuous feedback and inspiration. Finally, thanks goes to Sara Fisher, research technician at Kansas State University, who graciously took the time to help with the organization and description of my methodologies, which was personally the most challenging part of writing my thesis.

In addition to the faculty at Kansas State University, special thanks go out to the subjects for my interviews who made my entire thesis possible. In a profession where work is constantly busy, especially as founders of their firms, Mikyoung Kim, Peter Walker, Thomas Balsley and Claude Cormier accepted my request for an interview with little hesitation. Words cannot express how fortunate I feel to have had the opportunity to speak with the people I have looked up to for the past four years as a landscape architecture student. Their wisdom about creativity and landscape architecture is something I will never forget. Although ultimately the four landscape architect subjects accepted my requests for interviews, it certainly would not have been possible without the help of their very patient assistants and office personnel, Hannah Morrow of Mikyoung Kim, Janet Beagle of Peter Walker and Partners, Giulia Mastrangelo of Thomas Balsley and Associates, and Liette Locas of Claude Cormier Landscape Architects, who schedule interviews and served as the liaisons between the interview subjects and myself.

I want to thank the four artist subjects who contributed to my study as well. Talking to artists enabled me to think about myself as an artist both in my personal paintings, which I work on for fun, and my design philosophy in landscape architecture. Having the opportunity to personally meet Ted Adler and Lisa Rundstrom at Wichita State University and learn about their careers as both artists and professors in art provided an excellent opportunity to learn about the creativity of artists. Interviewing Diana Cooper and Del Harrow about their

creativity and creative process enabled me to think about art and the relationships of art and landscape architecture in new ways too. Talking with these four artists proved to be refreshing and inspiring, helping me to remember why I was writing my thesis.

Finally, I must thank all the wonderful people in my life who have supported me not only throughout my thesis but throughout the past five years of life in the College of Architecture, Planning and Design. Without the loving support from my incredible family and close friends, I never would have made it through all the stressful and chaotic moments of my education. Always willing to lend advice and encouraging words, my family and friends helped me push through and ultimately led me to the education and experiences I have today. I want to thank my entire family, Stephen, Joni, Matt, Katie, Jason, and even Ben and Logan, my nephews, for all their supporting and loving vibes from Saint Louis. In addition, special thanks go to my closest friends, Krystal, Becky, Lauren, Jesse, and many more for all the laughs and stress-free moments both in and out of studio. Finally, special thanks to my best friend and cousin, John. Thank you for always supporting me in everything I do. I love and appreciate you all very much!

Table of Contents

Figures List	xv - xxii
Table List	xxii
Chapter 1: Introduction	2
The Shortfall of Landscape Architectural Education in Teaching Creativity	3
Effects of the Shortfalls on the Profession	3
Perceptions of the Relationship of Art and Landscape Architecture	4
Creative Thinking through Creative Process	5
Research Questions Primary Questions Thematic Research Questions	6 7 7
Chapter 2: Background	10
 Relationship of Landscape Architecture and Art Defining Landscape Architecture and Art Role of Art in Landscape Architecture The Separation of Art and Landscape Architecture Overlaps in Art and Landscape Architecture Value in Approaching Landscape Architectural Design as an Artistic Form 	11 11 12 13 14 16
 Landscape Architectural Design Process Evolution of the Design Process Model Staged-Design Process Model Design Process Models after Sasaki and Jones Design Defined Conventional Design Process Today Bryan Lawson's Six Characteristics of Design Lack of Creativity in the Design Process Today 	18 18 18 21 22 22 22 28 29
 Creativity and the Avant-Garde in Landscape Architecture Creativity Avant-Garde Relationship of Creativity and the Avant-Garde to Landscape Architecture Psychology of Creative Thinking in Landscape Architecture Encouraging Creative Thinking in Design Limitations on Creativity in Landscape Architecture Value of Creative, Avant-Garde Thinking 	30 31 32 32 33 34 35 36
Creative Process in Landscape Architecture • Creative Process Defined	37 37

•	 Kinesthetic Act of Creation in Landscape Architecture Value of Kinesthetic Activity to Design A Study of the Effects of the Computer on Creative Process 	40 40 42
Ed •	ucation in Landscape Architecture Meaningful Learning in Landscape Architectural Education	42 43
•	Limitations on Creativity in Landscape Architectural Education	44
•	Creativity in Landscape Architectural Education Changes to Encourage Creative Thinking	45 47
As.	sumptions and Initial Themes	49
Ch	apter 3: Methodology	52
Wc	orld View	52
Str	ategy	53
<i>Me</i> • •	thods Literature Review In-Depth, Open-Ended Interviews Coding Analysis Confidentiality	53 53 54 57 58 59
Ch	apter 4: Findings	62
La:	ndscape Architect Interview Subject Profiles Mikyoung Kim Thomas Balsley Claude Cormier Peter Walker	63 63 66 69 72
Art • •	ist Interview Subject Profiles Ted Adler Diana Cooper Del Harrow Lisa Rundstrom	75 75 78 82 85
Fin •	dings Overview Major Themes from Landscape Architects and Artists Shared Themes Weighted towards Landscape	88 97 99
•	Architects Shared Themes Weighted towards Artists Major Themes from Landscape Architects Only Major Themes from Artists Only Relationship of Emergent Themes and Sub-themes from Interviews to Initial Themes and Sub-themes from Literature Review	100 101 106 108

Chapter 5: Conclusions	114
Conclusions on Initial Themes	114
 Final Conclusions Creativity in Design Landscape Architectural Education Avant-Garde as Mode of Thought 	116 116 117 121
Unanswered Questions and Themes for Future Study	121
What would I have done differently?	124
Final Thoughts	125
References	126
Appendices	131
A: Categorical and Thematical Research Questions	132
B: Literature Review	133
C: Staged-Design Process Outline	146
D: Conventional Design Process Outline	147
E: Psychological Phases of Creative Process	148
F: Assumptions and Initial Themes Descriptions	149
G: Work Schedule	153
H: Example of Sampling Criteria for Interview Subjects	155
I: Contacted Landscape Architects for Interviews	157
J: Contacted Artists for Interviews	158
K: Contact Letter	159
L: Interview Questions	160
M: Original Coding Key	162
N: Original Coding Key with Interview Questions	163
O: Excerpt from Hand Coded Interview	166
P: Second Coding Key	167
Q: Coded Interview for Mikyoung Kim	169
R: Coded Interview for Thomas Balsley	180

S: Coded Interview for Claude Cormier	191
T: Coded Interview for Peter Walker	200
U: Coded Interview for Ted Adler	208
V: Coded Interview for Diana Cooper	218
W: Coded Interview for Del Harrow	227
X: Coded Interview for Lisa Rundstrom	235
Y: Example of Single Subject Matrix with Comparison Notes	243
Z: Color Coded Findings Matrix	247
AA: Informed Consent Form	253

List of I 2.01	"Staged-Design Process Diagram" adapted by Author	Sources Original Source Information: Murphy, Michael D. 2005. Landscape Architecture Theory: An Evolving Body of Thought. Long Grove, Ill.: Waveland Press Inc.; Sasaki, Hideo. 1950. Design Process. In Theory in Landscape Architecture: A Reader., ed. Simon Swaffield, 35. Philadelphia, Pennsylvania: University of Pennsylvania Press.
2.02	"Design Development Spiral"	Zeisel, John. 1981. Inquiry by Design: Tools for Environment- Behavior Research. The Brooks/ Cole Basic Concepts in Environment and Behavior Series. Monterey, Calif.: Brooks/Cole Pub. Co page 14
2.03	"Linear Conventional Design Process Diagram" adapted by Author	Original Source Information: Koberg, Don, and Jim Bagnall. 2003. The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals. 3rd ed. United States: Axzo Press page 17
2.04	"Circular Conventional Design Process Diagram" adapted by Author	Original Source Information: Koberg, Don, and Jim Bagnall. 2003. The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals. 3rd ed. United States: Axzo Press page 21
2.05	"Branching Conventional Design Process Diagram" adapted by Author	Original Source Information: Koberg, Don, and Jim Bagnall. 2003. The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals. 3rd ed. United States: Axzo Press page 21
2.06	"Feedback Conventional Design Process Diagram" adapted by Author	Original Source Information: Koberg, Don, and Jim Bagnall. 2003. The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals. 3rd ed. United States: Axzo Press page 21
2.07	"Aerial View at Night" by West 8 Urban Design and Landscape Architecture BV of Schouwburplein	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell:

	(Theater Square)	Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publishers page 35
2.08	"Rendering of Proposed New Park and Redevelopment of Broadway in Channel Area" by Alsop Ltd for Bradford City Centre Master Plan	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell: Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publisherspage 53
2.09	"Concept Plan of Shanghai Carpet" by Alsop Ltd for Bradford City Centre Master Plan	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell: Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publisherspage 65
2.10	"Rendering of Sculpture Garden and Park Pavilion" by Weiss/Manfredi Architects for Olympic Sculpture Park (Seattle Art Museum)	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell: Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publisherspage 119
2.11	"Lawn over Parking Garage with Limestone Walls for Fire Stairs" by Kathryn Gustafson with Paysage Land and Valode and Pistre Architectes for Shell Petroleum Headquarters	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell: Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publisherspage 91
2.12	"Concept Model, View from Above" by Gustafson Guthrie Nichol Ltd for Lurie Garden (Millennium Park)	Reed, Peter Shedd, and Museum of Modern Art. 2005. Groundswell: Constructing the Contemporary Landscape. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./Distributed Art Publisherspage 97
2.13	Artist Brain Profile	Herrman, Ned. 1995. The

		Creative Brain. 2nd ed. Kingsport, Tennessee: Quebecor Printing Book Grouppage 105
2.14	Entrepreneur Brain Profile	Herrman, Ned. 1995. The Creative Brain. 2nd ed. Kingsport, Tennessee: Quebecor Printing Book Grouppage 104
2.15	Strategic Planner Brain Profile	Herrman, Ned. 1995. The Creative Brain. 2nd ed. Kingsport, Tennessee: Quebecor Printing Book Grouppage 104
2.16	"Creative Process Diagram" adapted by Author.	Original Source Information: Goswami, Amit, and Maggie Goswami. 1999. Quantum Creativity: Waking Up to our Creative Potential. Cresskill, New Jersey: Hampton Press, Inc.; Herrman, Ned. 1995. The Creative Brain. 2nd ed. Kingsport, Tennessee: Quebecor Printing Book Group.; Lawson, Bryan. 2006. How Designers Think: The Design Process Demystified. 4th ed. Oxford; Burlington, MA: Elsevier/ Architectural.
3.01	Methodology Process Diagram	Created by Author
4.01	Moylan Elementary School" by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 22
4.02	"Koomin Life Insurance Training Facility" by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 112
4.03	Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingcover page
4.04	"LG Chemical Research Center Roof Garden" by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 46

4.05	Lucky Corporation Headquarters Garden" by Mikyoung Kim.	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 78
4.06	"Mikyoung Kim Design Process" Diagram	Created by Author based on Interview Findings with Mikyoung Kim
4.07	Gate City Osaki" by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker PressPage 43
4.08	"Queens West Parks: Gentry Plaza State Park" by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker PressPage 21
4.09	"Gate City Osaki" by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker PressPage 40
4.10	"Balsley Park" by Thomas Balsley Associates	Thomas Balsley Associates. in Thomas Balsley Associates [database online]. New York, 2010 [cited September 28 2010]. Available from http://www.tbany.com.
4.11	Thomas Balsley Process Design Process" Diagram	Based on Interview Findings with Thomas Balsley
4.12	"Blue Forest" by Claude Cormier	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/projects.
4.13	"Canada Museum of Civilizations Plaza" by Claude Cormier	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/projects.
4.14	"Solange" by Claude Cormier	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/projects.
4.15	"Sugar Beach" by Claude Cormier	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/projects.

4.16	"Claude Cormier Design Process" Diagram	Created by Author based on Interview Findings with Claude Cormier
4.17	"Sony Headquarters" by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editions page 93
4.18	"Toyota Municipal Museum of Art" by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editions page 35
4.19	"Saitama Plaza" by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editions page 80
4.20	"Circular Park" by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editions page 122
4.21	"Peter Walker Design Process" Diagram	Created by Author based on Interview Findings with Peter Walker
4.22	"No Title (Vase Form)" by Ted Adler	Adler, Ted. Ted Adler. 2010 [cited March 3 2011]. Available from http://tedadlerceramics.com/artwork/1087146.html (accessed March 3, 2011).
4.23	"Cups" by Ted Adler	Adler, Ted. 2008. Image Provided by Ted Adler
4.24	"Serving Dishes" by Ted Adler	Adler, Ted. Ted Adler. 2010 [cited March 3 2011]. Available from http://tedadlerceramics.com/artwork/1087146.html (accessed March 3, 2011).
4.25	"No Title (Vessel)" by Ted Adler	Adler, Ted. 2010. Image Provided by Ted Adler
4.26	"Ted Adler Creative Process" Diagram	Created by Author based on Interview Findings with Ted Adler
4.27	"Swarm" by Diana Cooper	Cooper, Diana. Diana Cooper. 2007 [cited March 3 2011]. Available from http://www.dianacooper.net/galleries/lg_construction/04_swarm/index.html (accessed March 3, 2011).

4.28	"The Wall" by Diana Cooper	Cooper, Diana. Diana Cooper. 2007 [cited March 3 2011]. Available from http://www.dianacooper.net/galleries/lg_construction/04_swarm/index.html (accessed March 3, 2011).
4.29	"The Site" by Diana Cooper	Cooper, Diana. Diana Cooper. 2007 [cited March 3 2011]. Available from http://www.dianacooper.net/galleries/lg_construction/04_swarm/index.html (accessed March 3, 2011).
4.30	"All Our Wandering" by Diana Cooper	Cooper, Diana. Diana Cooper. 2007 [cited March 3 2011]. Available from http://www.dianacooper.net/galleries/lg_construction/04_swarm/index.html (accessed March 3, 2011).
4.31	"Diana Cooper Creative Process" Diagram	Created by Author based on Interview Findings with Diana Cooper
4.32	"Untitled" by Del Harrow from "Fluid Geometry, Material Topology, Shades of Grey" at the Dolphin Gallery in Kansas City, Missouri, May – July 2010	Harrow, Del. Del Harrow. in Graph Paper Press [database online]. 2011 [cited March 3 2011]. Available from http://www.delharrow.net/?p=155. (accessed March 3, 2011).
4.33	"Untitled" by Del Harrow	Harrow, Del. Del Harrow. in Graph Paper Press [database online]. 2011 [cited March 3 2011]. Available from http://www.delharrow.net/?p=241. (accessed March 3, 2011).
4.34	Process Image by Del Harrow	Harrow, Del. Del Harrow. in Graph Paper Press [database online]. 2011 [cited March 3 2011]. Available from http://www.delharrow.net/?p=209. (accessed March 3, 2011).
4.35	"Coil Built" by Del Harrow	Harrow, Del. Del Harrow. in Graph Paper Press [database online]. 2011 [cited March 3 2011]. Available from http://www.delharrow.net/?p=262. (accessed March 3, 2011).
4.36	"Del Harrow Creative Process" Diagram	Created by Author based on Interview Findings with Del Harrow
4.37	"Long Hot Summers, Long Cold Winters"	Rundstrom, Lisa. 2007. Image Provided by Lisa Rundstrom
4.38	"Organic Energy Cloud"	Rundstrom, Lisa. 2009. Image Provided by Lisa Rundstrom

4.39	"Light Rain"	Rundstrom, Lisa. 2010. Image Provided by Lisa Rundstrom
4.40	"Divergence"	Rundstrom, Lisa. 2009. Image Provided by Lisa Rundstrom
4.41	"Lisa Rundstrom Creative Process" Diagram	Created by Author based on Interview Findings with Lisa Rundstrom
4.42	Final Analysis Matrix Develop by Author from Interviews	Created by Author
4.43	Sol LeWitt Museum Process Model by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 148
4.44	Kyobo Life Insurance Headquarters Process Model by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 63
4.45	Boston Wharf District Artery Project Process Models by Mikyoung Kim	Kim, Mikyoung. 2003. Mikyoung Kim: Inhabiting Circumference, Landscape Rituals, Urban Ground. Philadelphia, Pennsylvania: Grayson Publishingpage 55
4.46	Balsley Park Process Model by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker Presspage 70
4.47	Gate City Osaki Process Drawing by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker Presspage 38
4.48	Balsley Park Computer Model by Thomas Balsley Associates	Gillette, Jane. 2001. Thomas Balsley: The Urban Landscape. Land Marks. Washington, DC: Spacemaker Presspage 70
4.49	Sugar Beach Concept Drawings by Claude Cormier Landscape Architects	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/project/ sugar-beach/.
4.50	Sugar Beach Concept Plan by Claude Cormier Landscape Architects	Claude Cormier: Landscape Architects. Montréal, Canada, [cited

			September 28 2010]. Available from http://claudecormier.com/project/sugar-beach/.	
	4.51	Place D'Youville Concept Plan by Claude Cormier Landscape Architects	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/project/place- youville-en-/.	
	4.52	Jordan Winery Concept Drawing by Claude Cormier Landscape Architects	Claude Cormier: Landscape Architects. Montréal, Canada, [cited September 28 2010]. Available from http://claudecormier.com/project/ jordan-winery/.	
	4.53	Sony Center Process Model by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editionspage 89	
	4.54	Civic Park of Martin Luther King Jr. Promenade Computer Rendered Plan by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editionspage 71	
	4.55	Southwest Federal Center Diagram by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editionspage 204	
	4.56	Hand-Drawn Vignette for Clark Center for Biomedical Engineering and Sciences, Stanford University by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editionspage 204	
	4.57	Hand-Drawn Vignette for Clark Center for Biomedical Engineering and Sciences, Stanford University by Peter Walker and Partners	Walker, Peter. 2005. Peter Walker and Partners: Defining the Craft. San Rafael, Calif.: ORO Editionspage 204	
	5.01	Recommended Hybrid Creative and Design Process for Landscape Architectural Education	Created by Author	
List of Tobles				

List of Tables 1.01 Categories and Themes for Methodology Created by Author



Chapter 1 Introduction

"An idea which is fundamentally novel to the individual mind is still of great significance, even though it may not necessarily be new to the world"

-- Margaret Boden, Psychology Researcher (Lawson 2006, 146)

My primary intent for this thesis was to evaluate what aspects of design in the profession of landscape architecture and landscape architectural education both encourage and limit creative thinking throughout the conventional design process. Through a study of the issues with conventional design process, I wanted to communicate the value of incorporating creative process and artistic media into an individual's landscape architectural design process today. I wanted to learn about the benefits of creative process for designers, clients and built designs, as well as how the field of landscape architecture can learn from tradition while still creating avant-garde designs.

The thesis evolved from the idea that over time the conventional design process developed to incorporate more ways of thinking; however, it has minimally evolved from the staged-design process, one of the original models of landscape architectural design process. Different types of conventional design process incorporate more stages and devote more time to each; however, the stages are still completed in an exact order due to the focus on problem solving. The conventional design process does not acknowledge that design is an individual process that needs to evolve creatively. As a result, the conventional design process still lacks the freedom of creative thinking throughout every stage of the process.

This thesis also evolved from my desire to know more about the relationship of art and landscape architecture. I have always seen overlaps between the two fields, including working to create something unique or interesting places for people. Assuming artists embrace a creative process in their production of work, I wanted to see how their individual processes overlapped or compared to the design processes used by highly creative landscape architects.

The significance of this topic relates to my personal career and educational goals. I am not convinced the conventional design processes are adequate for anything beyond basic expectations of function and problem solving in design for clients. I found throughout

my education in landscape architecture that when students have more freedom, with little program presented, they developed their best and most avant-garde work. My research should help my readers understand that landscape architects are not limited to following the specific steps of a conventional design process model. Instead, landscape architect's can incorporate creative thinking throughout the conventional design process.

The Shortfall
of Landscape
Architectural
Education in
Teaching Creativity

Education in landscape architecture should teach students professional skills and nurture creative process. However, many students leave school without an understanding of how to develop their personal process and role in landscape architecture. Students who learn only one or two variations of the conventional design process lose the opportunity to find themselves as designers through their personal creative process (Kvashny 1982, 104). Students then enter the profession of landscape architecture using a similar conventional design process as the students who graduated before, leaving little room for creativity and idea variety (Kvashny 1982, 104). The conventional design process, as introduced by Koberg and Bagnall, authors of Universal Traveler: The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving, and the Process of Reaching Goals, incorporates multiple stages completed in a distinct overall order (Koberg and Bagnall 2003). Several iterations of the conventional design process exist; however, each iteration is still linear and does not incorporate specific stages of creativity.

In addition to teaching practices of process that minimize creative thinking, studio operations limit generation of avant-garde ideas. First, students are assigned a studio project with detailed programs and expectations for the end product (Kvashny 1982, 104; Lawson 2006; Hunt and Kingery-Page 2010; Krog 1983, 58). In addition, showing exemplary work according to class history causes students to strive for similar products to achieve a good grade. As a result, project examples and detailed project programming result in repetitive design solutions within the studio environment (Kvashny 1982, 104; Lawson 2006; Hunt and Kingery-Page 2010; Krog 1983, 58). Students design for their professors rather than for themselves. Students carry everything they learn in school with them when they enter into the profession. Therefore, some problems in the professional realm related to a lack of creative thinking and incorporation of creative process, result from landscape architectural education.

Effects of the Shortfalls on the Profession

Known to be a profession of service, landscape architecture traditionally neglects the value of creative thinking in order to incorporate problem solving throughout the design process (Lawson 2006; Krog 1983, 58; Sasaki 1950, 35). As a result, the use of a conventional design process by most professionals contributes to

a high focus on problem solving (Lawson 2006; Sasaki 1950, 35; Swaffield 2002, 265; Askland, Ostwald, and Williams 2010, 4). For this thesis, the conventional design process is defined as the contemporary by-product of the staged-design process. The stages of both the staged-design process and the conventional design process discourage creative thinking during the early stages of design development (Krog 1983, 58; Askland, Ostwald, and Williams 2010, 4). The conventional design process evolved minimally over the years because of little interest in personal design process; as a result, designers are less inclined to develop avant-garde solutions causing projects to be repetitive rather than avant-garde.

Computer use in design offices contributes to a lack of creative thinking by designers. The computer has become a primary form of communication and production causing designers to develop a reliance on technology (Lawson 2004; Tai 2003, 113). The formation of once apparent relationships between design and site are lost when designers develop a total reliance on the computer to help design (Hunt and Kingery-Page 2010; Pallasmaa 2009). For example, specific computer programs that are not intuitive for design inhibit creative thinking by allowing designers to become locked into the first design solution; whereas kinesthetic drawing and modeling practices could keep ideas flowing and encourage creative thinking (Askland, Ostwald, and Williams 2010, 4; Pallasmaa 2009). The limited amount of kinesthetic design development in an office through hand drawing, model building, and other artistic means of using different media results in less opportunity for creative thinking (Pallasmaa 2009: Corner 1992, 144).

Formerly innovative solutions become repetitive today. When looking at landscape architectural history, it becomes apparent that solutions to problems may be new to an individual firm, but actually reiterate past work. While limited development of creative thinking leads to repetition in design, the common misperception by landscape architects of the avant-garde inhibits creative thinking, too. If landscape architects showed more interest and understanding of vanguardist practices, it would result in greater creative thinking (Krog 1983, 58; Brown 1991, 136).

To many people, art seems a personal act strictly between the artist and their work. To the public, art does not embrace the public or focus on problem solving which relates art and landscape architecture. On the contrary, several relationships between art and landscape architecture exists that need to be acknowledged in order for landscape architects to see the value of approaching landscape as a form of art. Some of the overlaps in art and landscape architecture that will be introduced in Chapter 2 include: both professions have similar roles, both professions value expression and experience, both

Perceptions of the Relationship of Art and Landscape Architecture fields work in the public realm, and both fields focus on some form of problem solving.

If landscape architects fail to see relationships of art and landscape architecture, it prevents creative processes from being an important factor throughout design (Hunt and Kingery-Page 2010; Pallasmaa 2009; Brown 1991, 136; Amidon 2001; Richardson and Schwartz 2008). Kinesthetic activity, an important aspect of art, is minimally practiced in landscape architecture because many designers do not recognize its value to fields outside of art; however, kinesthetic activity can be considered one of the greatest contributors to creative thinking (Askland, Ostwald, and Williams 2010, 4; Tai 2003, 113; Pallasmaa 2009; Corner 1992, 144). A lack of kinesthetic practices throughout design development directly results in less avant-garde products in landscape architecture (Askland, Ostwald, and Williams 2010, 4; Tai 2003, 113; Pallasmaa 2009; Corner 1992, 144).

Creative Thinking through Creative Process

Incorporation of creative process could help solve the issues related to creativity in the educational and professional worlds of landscape architecture. The creative process is non-linear and acts as a guide to individual creative thinking (Lawson 2006; Herrman 1995; Goswami and Goswami 1999).

If landscape architectural education encouraged creative thinking, students would be free to develop personal design solutions (Marusic 2002, 95). Direction and instruction on the design process is necessary for students in their first year (Lawson 2004; Eckbo 1950, 9); however, freedom of development and design should be encouraged for upper classmen in the studios (Boyer and Mitgang 1996; Murphy 2005; Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 479). If given the opportunity, students could begin developing their personal design processes in school, giving them a better opportunity to become personally invested in their work.

Transitioning from the landscape architectural education to the profession, the value of creative thinking is still apparent. First, higher levels of creative thinking would allow designers to build on tradition rather than replicate tradition (Askland, Ostwald, and Williams 2010, 4; Amidon 2001; Marusic 2002, 95; Eckbo 1991, 9; Krauss 1985). Likewise, kinesthetic activity during the creative process results in strong relationships created between designers and the designed (Askland, Ostwald, and Williams 2010, 4; Pallasmaa 2009). This relationship would result in designers being personally invested in projects, yielding innovative design solutions for both firms and clients (Hunt and Kingery-Page 2010; Tai 2003, 113; Pallasmaa 2009). Kinesthetic thinking provides designers with new sources of design development. If creative process becomes inherent throughout the

conventional design process, the time spent on design development will be seen as an asset to designers and clients rather than a roadblock to production.

I followed an open-ended, grounded theory approach to develop broad categories and four types of themes. The grounded theory process used throughout the entire thesis can be seen in Figure 3.01. Broad categories were used to determine the necessary research subjects for understanding the study. From the broad categories, initial themes and sub-themes developed based on the findings in the literature review research. The initial themes can be seen on page 59 in Chapter 2. Emergent themes and emergent sub-themes were also developed based on the interview findings. These two types of themes will be further discussed in Chapter 4: Findings. For a brief summary of broad categories or the different themes, see Table 1.01.

Research Questions

Literature Review and Interview Design	Broad Categories	Categories developed for literature review in order to determine what information was important to research for understanding the study, as well as provide an organizational structure for the different themes developed from literature review and the study 1. Relationship of Landscape Architecture and Art 2. Landscape Architectural Design Process 3. Creativity and the Avant-Garde in Landscape Architecture 4. Creative Process in Landscape Architecture 5. Education in Landscape Architecture
	Initial Themes	Themes based on literature review that will be tested through the interview study
	Initial Sub-Themes	Specific themes found in literature review research that fall under either a broader initial theme or one of the five broad categories
Interviews		
Content Analysis	Emergent Themes	Themes that arose out of the interview study and were not previously determined or researched prior to the interviews
	Emergent Sub-Themes	Specific themes that fall under a broader emergent theme, as well as arose out of the interview study and were not previously determined or researched prior to the interviews

Table 1.01

The research questions for my study resulting from a grounded theory approach are broken up into two types: primary research questions and thematic research questions.

Primary Questions

How can the conventional design process be reframed to incorporate more creative thinking in landscape architectural practice and landscape architectural education? How does the design process of avant-garde landscape architects compare to the creative process used by artists? These two primary research questions call for personal information from artists and landscape architects. They cannot accurately be answered through literature review; therefore, the use of interviews proved the most appropriate solution for gathering information. Primary research questions are answered through analysis of interviews with landscape architects and artists. In addition, each interview is associated with a brief case study of the designer or artist's practice. Answers to the research questions are drawn from comparative analysis of the interview data (See Chapter 4: Findings).

Thematic Research Questions

Thematic research questions developed within the broad categories of literature review. Literature review breaks down into five broad categories: Relationship of Landscape Architecture and Art, Landscape Architectural Design Process, Creativity and the Avant-Garde in Landscape Architecture, Creative Process in Landscape Architecture, Education in Landscape Architecture. From these five categories, thematic research questions led to refinement of initial themes and initial sub-themes from the literature review research. These minor themes and sub-themes were then used as the starting point for analysis of the interviews. Once the initial themes and sub-themes were analyzed within the interviews, attention was drawn to emerging (new) themes and sub-themes, which will be discussed further is Chapter 4: Findings.

Investigating several thematic research questions helped me to refine the primary research questions. The information gathered from the thematic research questions provides operational definitions of key concepts, gathered from literature review. The thematic research questions can be seen in Appendix A: Categorical and Thematic Research Questions.

In order for landscape architecture to adopt creative thinking into the conventional design process, changes must be made within landscape architectural education and the professional realm of landscape architecture. While the physical changes, like kinesthetic development or studio format, seem simple, the traditional thinking behind why landscape architects work in a certain way is difficult to change. Through a study using interviews with avant-garde landscape architects and artists, this thesis will provide recommendations for changes to how the design process is carried out and taught in order to encourage greater creative thinking.

Chapter 2 will introduce the literature review research used to answer the thematic questions, as well as develop the five broad categories relating to creativity, landscape architectural design process, and landscape architectural education. Assumptions and initial themes are introduced at the end of Chapter 2: Background.



Chapter 2

Background

"A painter can paint square wheels on a cannon to express the futility of war. A sculptor can carve the same square wheels. But an architect must use round wheels"

-- Louis Kahn

(Pallasmaa 2009, 21)

Chapter 2 answers the thematic research questions identified in Chapter 1: Introduction, focusing on five broad categories for literature review: relationship of landscape architecture and art, landscape architectural design process, creativity and the avant-garde in landscape architecture, creative process in landscape architecture, and education in landscape architecture. Exploration of these five broad categories will clarify the role art, creativity and creative thinking can play in landscape architecture.

The findings from literature review begin with the relationship of landscape architecture and art by explaining what eras in landscape architecture have embraced creative thinking recently, as well as an overview on why art and landscape architecture separated and the value of seeing landscape architecture as an art form. Then, the evolution of the design process breaks down into five separate processes as a way of showing what limits creativity in the conventional design process today. Next, creativity and the avantgarde are defined and the role of both modes of thinking in landscape architecture is explained. Creative process and its value to landscape architecture are then discussed. Finally, a description of the advantageous and disadvantageous practices in landscape architectural education is provided in the literature review. Through the literature review staged-design process, conventional design process, creativity, the avant-garde, creative process and kinesthetic activity are defined. Finally, at the end of Chapter 2, assumptions and initial themes about creativity in landscape architecture are identified based upon literature review research.

As mentioned before, the background research questions were primarily addressed through the literature review research. The fundamental information necessary to understand the study is laid out in this section. For a detailed explanation of why and how the literature review process was used, see Chapter 3: Methodology and Appendix B: Literature Review.

Relationship of Landscape Architecture and Art

Landscape architecture was first publicly introduced and titled in the United States by Frederick Law Olmstead in 1862 (McCormick 1923). In 1893, Schuyler Van Rensselaer introduced the work of Frederick Law Olmstead in "Art of the Outdoors", praising Olmstead's work for its beauty and comparing it to the landscape methods of the French and English (McCormick 1923). Quickly, Olmstead's design and leadership became the underlying example for all landscape architecture (Maslyn 2002, 134). Since Schuyler Van Rensselaer first introduced landscape architecture, it has evolved as a profession of both design and art. In the 19th century, landscape architecture was thought of as art based on organizing principles (McCormick 1923). Later, esteemed landscape architect, Laurie Olin described landscape saying, "Art, and landscape architecture as a sub-field of art, proceeds by using a known body of forms, a vocabulary of shapes, and by applying ideas concerning their use and manipulation" (Crewe and Forsyth 2003, 37). Today, a relationship still exists between art and landscape architecture. Before explaining the evolution of the relationship between landscape architecture and art, it is important to define both landscape architecture and art.

Defining Landscape Architecture and Art

Landscape architecture has been defined by numerous people both in and outside of the field. According to Michael D. Murphy, author of Landscape Architecture Theory: An Evolving Body of Thought, landscape architecture is, "a discipline devoted to understanding and shaping the landscape," and a profession which provides, "Site planning, design, and management advice to improve the landscape for human benefit" (Murphy 2005, 2). Murphy continues defining landscape architecture as having three main purposes: to help guide environmental changes, to enhance and protect every quality of a site, and to create meaningful human experiences (Murphy 2005). Murphy's definition provides a realistic and straightforward understanding of landscape architecture.

While the definitions of landscape architecture are different depending on the author and context, most definitions include similar ideas. Art, however, is different. Defining art is difficult because every person has a different opinion on "what is art". For this thesis' purpose, the definition of art is drawn from Mark Rothko, prominent twentieth century painter and author of *The Artist's Reality: Philosophies of Art*. Rothko defines art as an entry into the world of imagination (Rothko and Rothko 2004). Rothko points out that art is not only a kind of action but a form of social action (Rothko and Rothko 2004). Rothko says art is a form of communication that effects any environment in which it is placed (Rothko and Rothko 2004). It is important that the definition of art remains broad; otherwise, art classification would quickly be narrowed down to certain products. That is not the purpose of art or this thesis.

Role of Art in Landscape Architecture

As mentioned before, Frederick Law Olmsted's landscape architecture was seen as a form of art. These original relationships to art, since the birth of landscape architecture, raise the question of whether or not art still plays a major role in landscape architecture today. Different movements in landscape architecture have embraced art and drawn inspiration from art. Brenda Brown, author of "Avant-Gardism in Landscape Architecture" discusses the influence of art in the new waves of landscape architecture saying, "It appears with varying subtlety, explicitness, consciousness, and acknowledgment. It shows in material and formal vocabularies and in underlying aesthetic and intellectual conceptions. It appears in allusions and quotations within works and in verbal and written references from designers" (Brown 1991, 140). The discussion of the role of art in landscape architecture begins with the 20th century movement of land art.

Emerging in the late 60s in America, landscape architecture closely linked to art was named "land art" (Weilacher 1999, 11). In the late 1960s, land artists became key players in both landscape architecture and art (Amidon 2001). Born in 1967, land art protested against traditional landscape architecture and the commercialization of art by museums (Weilacher 1999). When land art was becoming increasingly popular, it became clear that it was not about gallery objects but moved towards a form of art that, "Blurred the lines between art, environment and land design" (Amidon 2001, 8). The elements landscape architects focus on every day, like weather or topography, were becoming the primary media used in land art (Amidon 2001). Udo Weilacher, author of Between Landscape Architecture and Land Art, speaks of the ideals of land artists saying, "Sculptures are not placed in the landscape, rather the landscape is the very means of their creation" (Weilacher 1999, 11). Land art began reintroducing art in landscape architecture and inspired a new realm of "conceptualist" landscape architecture.

Tim Richardson, author of Avant-Gardeners: 50 Visionaries of the Contemporary Landscape, discusses conceptualism in landscape architecture as the first major break from functionalist Modern ideas in design, the decorative aesthetics of the 19th and 20th centuries and the naturalistic landscapes that were becoming increasingly popular in landscape architecture (Richardson and Schwartz 2008). Conceptualist landscape architects avoid falling into specific categories and focus on anything that encourages imagination and creativity (Richardson and Schwartz 2008). Like conceptual art, conceptualists landscape architects believe that landscapes can be about anything (Richardson and Schwartz 2008). By using color, artificial materials and humor, conceptualist landscape architects set the standards for projects by harnessing ideas as starting points for design relating landscape architecture to art (Richardson and Schwartz 2008). All three of these aspects of conceptualist design can be directly compared to different aspects of art. For instance,

Pop Art emphasizes color and artificial materials and conceptual artists, like Marcel Duchamp, who twisted everyday objects to create something surreal, embraced humor (Richardson and Schwartz 2008). Richardson not only talks about drawing inspiration from art movements but drawing inspiration from personal exploration of art practices using different media (Richardson and Schwartz 2008).

Overall, land artists and conceptualist landscape architects provide some of the greatest precedents and contributions to art in landscape architecture. Land art and conceptualist landscape architecture reintroduced art to landscape architecture in the 20th century. If landscape architecture was born in the late 19th century and both conceptualist landscape architecture and land art were born in the late 20th century, what happened to the relationship between landscape architecture and art in intervening years of the early 20th century?

The Separation of Art and Landscape Architecture

Art became separate from landscape architecture for a variety of reasons, many of which relate back to misconceptions about the differences between art and landscape architecture. To begin, it is important to look at the centuries old history behind the separation of art and science.

When architecture was born into the art world, it was unified between techne and poiesis (Corner 1990, 19). According to James Corner, "techne was the dimension of revelatory knowledge about the world" and did not distinguish between the theoretical and the practical, and "poiesis was the dimension of creative, symbolic representation" (Corner 1990, 19). With the almost perfect combination of the theoretical, practical and creative through techne and poiesis came a strong relationship between art and architecture. Unfortunately, this relationship fell apart in the 17th and 18th centuries when modern science or technology was separated from modern aesthetics or art (Corner 1990, 19). By the 17th and 18th centuries, techne began to focus around influential knowledge, like science; whereas, poiesis became entirely focused on creating subjective and aesthetic realities, like art (Corner 1990, 19). According to Murphy, sources which describe landscape architecture as science provide the largest obstacles to thinking of landscape architecture as art (Murphy 2005). While the previous changes in the relationship between art and science happened several centuries ago, the initial split began the domino effect that separated art and landscape architecture along a divide of functionality and aesthetics.

Several fundamental differences between landscape architecture and art have contributed to the separation between the two fields in recent years. The two differences addressed here include the thoughts that landscape architects are problem-solvers with clients, while artists work solely for themselves, and landscape architects work in the

real world, while artists have limited restrictions for design. While information later will dispel these two ideas as misconceptions, these differences precede the separation of art and landscape architecture.

First, landscape architects work for specific clients with detailed expectations, as well as time and financial constraints, while artists can concentrate on the issues they feel are most interesting, allowing them to shift their attention and explore a multitude of different problems and solutions (Lawson 2006; Brown 1991, 136; Smith 2010). In response to Steven Krog's article, "Is it Art?", author Norman Newton took this idea about artists to the extreme stating, "In the fine arts – as in painting or sculpture, for examples – the creator of the work is engaged primarily in solving his own problems – doing what he feels he must get out of his system or explode. The landscape architect, on the other hand, is trying primarily to solve other people's problems" (Krog 1983, 58).

Another major difference between landscape architects and artists is landscape architects work in the built environment, which requires realistic and functional design; whereas, artists are rarely focused on functional solutions. Louis Kahn summed up the difference between art and architecture saying, "A painter can paint square wheels on a cannon to express the futility of war. A sculptor can carve the same square wheels. But an architect must use round wheels" (Pallasmaa 2009). Landscape architects are distinctly different from artists because, in most cases, they do not start from a blank canvas with a blank mind (Maslyn 2002, 134). Landscape architects begin with a specific site with existing conditions and distinct environmental or social conditions (Maslyn 2002, 134).

The different roles of landscape architects versus artists contribute to the separation of art and landscape architecture. Landscape architects are concerned with dilemmas and solutions revolving around factors like clients and users; whereas, artists can create their own working realities (Maslyn 2002, 134). Many times, the role of artist versus landscape architect is taken too literally making it just one cause of landscape architects focusing entirely on reality and function, losing the inspiration of the unknown like art. This misconception sets conceptualist landscape architects apart from other landscape architects because they embrace the overlaps of art and landscape architecture to develop avant-garde and artistic landscapes.

In many cases, the built works of conceptual landscape architects, as well as factual research, support the idea that the assumed differences between art and landscape architecture are general assumptions, not fact. In addition, their work represents several overlaps between art and landscape architecture that addresses positive influences for incorporating art within landscape architecture.

Overlaps in Art and Landscape Architecture The overlaps between artists and landscape architects include: both fields focus on some form of problem solving, both practices depend on and grew out of tradition, both professions serve as tools for expression and experience, both fields work for an audience or clients, and both processes are directly affected by environment.

Artists and landscape architects both solve problems. Artists primarily solve problems that do not exist in the beginning of a project and start working with no concrete ideas of where a design is heading, while landscape architects face "unknowing" due to being unaware of what problems will arise throughout the entire process (Krog 1983, 58). Similarly, artists and landscape architects are both expected to address aspects of problem-solving throughout their design processes (Lawson 2006). Landscape architects and artists both not only solve problems but determine what issues need to be addressed throughout their process (Lawson 2006). It was Karl Kraus, an Austrian writer and journalist, who said, "The only person who is an artist is the one that can make a puzzle out of the solution" (Lawson 2006, 112). The roles of artists and landscape architects compare due to the ways both employ problem-solving processes.

Part of being a successful artist or landscape architect involves pushing the envelope and developing new ideas and strategies while focusing on traditional aspects of design. Every artistic form, whether it is art, music, landscape architecture or other forms of design depend on tradition to be successful. Without an underlying structure of tradition, many ideas in art or landscape would simply not work (Pallasmaa 2009; Eckbo 1950, 9). According to Juhani Pallasmaa, "Architecture turns...into mere aesthetics when it departs from its originary motives domesticating space and time, an animistic understanding of the world, and the metaphoric representation of the act of construction" (Pallasmaa 2009, 115). Art and landscape architecture not only relate back to tradition for design structure; they both traditionally developed from similar situations. According to Garrett Eckbo, art and landscape architecture grew out of practical or functional activities necessary for people to survive; they both grew out of the traditional process of "imaginative building" (Eckbo 1950, 9).

In some instances, landscape architects feel they cannot incorporate personal expression into landscape architecture; however, it is near impossible to avoid. For both landscape architects and artists, several outside sources of inspiration or interference can be discussed. First, regardless of the person or goal, every idea or concept develops based off the personal experiences and history (Smith 2010). The relationship between art and landscape architecture comes from the fact that both activities express the human condition or experience (Pallasmaa 2009; Eckbo 1950, 9).

Audience as an external factor influences both artists and landscape architects because the audience constantly seeks satisfaction. Krog talks about art as a direct product of society meaning as long as society continues to change, so will art (Krog 1983, 58). Like artists, landscape architects work in a world of programmed elements where the entire audience searches for similar experiences depending on what is happening in society and the surrounding environment (Krog 1983, 58).

The surrounding environment in which the audience exists influences landscape architects and artists. As time passes and designers investigate more fields of information, they become infinitely inspired by their surroundings (Rothko and Rothko 2004). On a larger scale, these surroundings range from the economic status of the societies to the environmental aspects of climatic or geographic conditions in which people work (Rothko and Rothko 2004). On a smaller scale, according to Krog, workspaces affect design by landscape architects and artists (Krog 1983, 58). For instance, for some landscape architects or artists, working in busy or chaotic offices or studios causes them to produce little work of genius, because some artists and landscape architects who work alone produce more creative and holistic designs (Krog 1983, 58). These surroundings relate back to personal experiences and audience as major influences on work produced by landscape architects and artists.

A focus on some form of problem solving, depending on and growing out of tradition, serving as tools for expression and experience, working for an audience or clients, and being affected by environment are overlaps between landscape architects and artists that frame the reasoning on why landscape architecture can be thought of as a form of art. More overlaps in art and landscape architecture will become apparent when discussing the design process and creative thinking in landscape architecture. Now that the evidence of landscape architecture as an art has been addressed, it is an appropriate time to discuss the value in approaching landscape architecture as art.

Approaching landscape architecture as an art form brings several layers of value to the designs of landscape architects. Three layers of value in art discussed here include: the value of personal expression that art embraces, the value in thinking of design as limitless, and overall public interest in art.

In order to see the value of personal expression in landscape architecture, landscape architects must abandon the notion that their designs cannot come out of personal expression. Artists portray parts of themselves through their work without ignoring personal expression. Pallasmaa says the only way an architect can truly design is by allowing his or her heart and mind to be in the work to relate

Value in
Approaching
Landscape
Architectural Design
as an Art Form

real life situations and experiences (Pallasmaa 2009). He argues that architects need to understand that the physical and mental world relate and should be thought of together (Pallasmaa 2007, 17). In addition, Pallasmaa believes when designers create physical models and places, they must simultaneously be creating mental realities (Pallasmaa 2007, 17). While landscape architects should incorporate personal experiences as inspiration like artists, Steven Krog is careful to mention one difference landscape architects need to express both personal genius and reality, but not personal opinions or attitudes (Krog 1983, 58).

Another important lesson to take from art to landscape architecture is that design is limitless. While outside factors prevent certain elements of design from occurring in both art and landscape architecture, artists do not allow limitations to keep them from thinking creatively (Krog 1983, 58). Landscape architects should be flexible in their understanding of the traditional design components and remember that despite limiting factors, solutions are endless for any design dilemma (Eckbo 1950, 9). "Design, like life, has no limits to its development" (Eckbo 1950, 9).

Finally, as an asset to design in landscape architecture, the public is increasingly interested in art. Udo Weilacher's book Between Landscape Architecture and Land Art provides several examples of the value of public art. Made up of interviews with land artists and landscape architects, this publication provides two examples of the increasing interest in public art in landscape architecture. Weilacher asked Hannsjorg Voth, a famous land artist, "Do you feel that interest in art in public spaces has increased tangibly?" Voth answered, "Yes, I would go as far as to say that there is a great interest. Increasing secularization of the world in which we live is accompanied by a growing demand for art in public space. Of course, politicians have acknowledged this deficit and have become more often willing to support artists, but only for as long as sufficient money is available. This attitude has made art a luxury. I find this regrettable as it reveals a lack of understanding that art is a vital part of our lives" (Weilacher 1999, 69).

In addition to Voth, Weilacher interviewed Dani Karavan, environmental artist, asking, "What is the function of art in public spaces today?" Karavan responded saying, "I don't think that its art in the outside space which is particularly important. Rather, I consider all kinds of art to be important. Every kind of creation is important" (Weilacher 1999, 82). While this only provides two matters of personal opinion, they are excellent glimpses into the importance of art not only in landscape architecture but society overall. Because landscape architects frequently serve the public, increasing art in design should be seen as an asset with the growing interest in public art.

The value of personal expression, thinking of design as limitless, and the ever-growing interest in art in the public realm are three reasons to incorporate art in landscape architecture. Because art and creativity closely relate, the value of art will be further discussed when breaking down the value of creative thinking to landscape architecture. Before discussing the relationship of creativity to landscape architecture, we must first understand the evolution, or lack thereof, of creativity in design process.

Similarly to the influence of art in landscape architecture, the design process of landscape architects evolved over the past decades for several reasons, the most prevalent being to keep up with the changing needs and demands of society (Swaffield 2002, 265).

Landscape Architectural Design Process

In the 20th century, from 1950 to 1970, the design process model was based on the development of staged-design with the primary role of design being a problem-solving endeavor; however, overtime, design process became more focused on the conceptualization of design through creativity and the fine arts (Swaffield 2002, 265). Simon Swaffield, editor of *Theory in Landscape Architecture: A Reader*, incorporates readings about design process from well-known figures in landscape architecture, like Hideo Sasaki, to portray multiple phases in the evolution of the design process. Through the readings, Swaffield moves from the problem-solving focused staged-design process to an ecological design process to creative and collaborative design processes where design became a tool for exploration. For the purposes of this thesis, which is primarily focused on the later 20th century, the timeline of processes provided by Simon Swaffield serves as the model for the evolution of design process.

Evolution of the Design Process Model

The evolution of the design process model begins around 1950 with the development of Hideo Sasaki's staged-design process (Sasaki 1950, 35). According to Sasaki, the staged-design process model represents a model for when design becomes a thinking process using critical thinking to understand and solve any problem (Sasaki 1950, 35). Staged-design process breaks down into three stages: research, analysis and synthesis (Sasaki 1950, 35; Murphy 2005, 50). These three stages represent modes of thinking where "research" includes investigation to understand context, "analysis" determines relationships within the context, and "synthesis" integrates all the relationships into an organized product (Murphy 2005, 50).

Staged-Design Process Model

In the 1960s, Christopher Jones elaborated on Sasaki's staged-design process in what he called the "systematic design method" (Murphy 2005, 50). Jones expanded Sasaki's design process model in hopes that it would reduce error in design while making more imaginative

designs (Murphy 2005). The three stages introduced by Jones incorporated updated versions of Sasaki's stages of "analysis" and "synthesis" and added an "evaluation" stage (Murphy 2005, 50). Jones defined his stages of "analysis" as the listing of design requirements in order to compose a list of performance specifications, "synthesis" as finding solutions to each performance requirement and developing designs from those solutions, and "evaluation" as evaluating how each alternative design meets the performance requirements before selecting a final design (Murphy 2005, 50). Overall, the goals of the design process for Sasaki and Jones were similar but Jones updated Sasaki's process to make it more relevant to design at that time. Sasaki and Jones' processes have been combined and diagrammed in Figure 2.01. An outline of the combined processes can be seen in Appendix C: Staged-Design Process Outline.

More recently, Katherine Crewe redefined the staged-design process of both Sasaki and Jones, to form the "staged-model process" (Crewe and Forsyth 2003). Crewe further expands on Sasaki and Jones' staged-process model saying the core approach to design incorporates synthesis at multiple levels (Crewe and Forsyth 2003). The synthesis approach involves bringing together unrelated elements to create solutions (Crewe and Forsyth 2003, 37). Similarly to Sasaki and Jones' staged-design processes, Crewe refers to this model of design as the "staged-process" model, moving from defining a problem to analyzing the problem to synthesizing a design to producing a design (Crewe and Forsyth 2003, 42). Overall, the staged-process model systematically works through a problem in order to synthesize a solution (Crewe and Forsyth 2003). While there are subtle differences between the staged design process models of Hideo Sasaki, Christopher Jones and Katherine Crewe, Crewe's process provides a more evolved version of Sasaki's process today.

There is no doubt the staged-design process was an important jumping off point for the conventional design processes used today. Within the staged-design process, there is minimal room for switching between different stages and the completion of each stage relies heavily upon the completion of the stages prior, making it a linear process. The process focuses on problem solving, working towards one final design goal. In the words of Sasaki, the staged-design process focuses on the idea that "designing is essentially a process of relating all the operational factors into a comprehensive whole" (Sasaki 1950, 35).

SAGED-DESIGN

- 1 Research:
 - Site Analysis
 - Historical Information of Place
 - Cultural Identity of Place

2 Analysis

- Diagrammatic Elements
- Ideal Relationships of all Factors
- Programming
- Design Requirements
- Analysis of the Site and User
- Finding the Problem

3 Synthesis

- Conceptual or schematic design based on all information collected
- Finding possible solutions for each problem and the elements required
- Problem Solving
- Design development
- Aesthetic considerations considered during design

4 Evaluation

- Final review of all designs
- All factors and solutions considered to chose the best suited design

Figure 2.01: "Staged-Design Process Diagram" created by author after Sasaki and Jones (Murphy 2005; Sasaki1950)

Design Process Models after Sasaki and Jones

Kevin Lynch and Gary Hack developed a more thorough and straightforward approach to site design that included the research aspects of Sasaki's model, as well as more specific and recognizable stages ranging from defining the problem to bidding and construction (Lynch and Hack 1984). The site design process seems to evenly focused on each stage making design development as important as construction documentation (Lynch and Hack 1984). It seems many firms today break down their process similarly to Lynch and Hack. As important pieces of the process, the specific stages of design, like bidding and construction, are frequently included in firm's descriptions of their design processes. While Lynch and Hack developed a unique set of stages for design, having a linear process focused on problem solving through completion of distinct stages relates the process back to Sasaki and Jones.

Unique to design processes up until his time, Ian McHarg developed a more scientific process relating to ecological factors. In response to the design processes developed by Sasaki or Lynch and Hack, Ian McHarg wrote about and introduced the concept that, "Ecology provides the single indispensable basis for landscape architecture and regional planning" (McHarg 1967, 38). McHarg believed that the ecological method, his version of the design process, provided a view of design as an evolutionary process that started with the beginning of time (McHarg 1967). McHarg focuses on how a place develops ecologically overtime to well past the actual construction of a built place. He concentrates more on the ecological state of the site in the past, present and future for design development rather than a distinct process driven by problems and solutions (McHarg 1967).

Laurence Halprin took McHarg's idea of evolutionary thinking about design further by being one of the first to openly recognize creative acts as vital aspects of design. In his RSVP cycles, Halprin saw design as a process of overlap moving in any direction and relating more to a creative process than to a stage-design process (Halprin 1969). Halprin discusses the goals of design process not as categorization or organization but as a way to free the process and make the entire process visible throughout design (Halprin 1969). Halprin sees the value in creativity saying, "We can be scientific and precise about gathering data and inventorying resources, but in the multi-variable and open spring process necessary for human lifestyles and attitudes, creativity, inquantifiable attitudes, and openness will always be required" (Halprin 1969, 48). It was Halprin's open attitude towards creative process that, in many ways, opened the doors for creative thinking in landscape architectural design process.

In addition to her staged-process model, Katherine Crewe presents the "cultivated expression" process as a variation of creative design process in landscape architecture today (Crewe and Forsyth 2003, 43). Crewe recognizes that very few practitioners in landscape architecture use the cultivated expression process because it requires a high degree of artistic and creative thinking (Crewe and Forsyth 2003). She believes those who use the cultivated expression process show a keen interest in doing things that are new and develop their own style of design (Crewe and Forsyth 2003). Personal and provocative, Crewe's model for cultivated expressions represents the type of design process model this thesis proposes for all landscape architects (Crewe and Forsyth 2003). Halprin's RSVP cycles and Crewe's cultivated expression model suggest avant-garde designers and creative thinkers would employ similar models for design.

Design is "a process of creating or reworking things or places in order to bring about improvement" (Murphy 2005, 17). Most simply, design focuses on making places more appealing by bringing forward specific uses, experiences, aesthetics, and drivers for economic growth in different areas (Murphy 2005). While the definition of design process varies throughout time, the common thread between most definitions of design process is a sequence of specific activities that occur in a particular overall cycle in order to bring designers from problem solving to solutions (Lawson 2006). A spiral process, as defined by John Zeisel, provides an appropriate means of seeing how all the elements of design process fit together (Zeisel 1981). The spiral process incorporates three common characteristics of design including: backtracking and cycling back and forth before coming to any final solutions to problems, repeating stages in the process, and the multi-directional ways of moving through the process that inevitably ends in a design solution (Zeisel 1981). A diagram of the spiral process, as proposed by Zeisel, can be seen in Figure 2.2.

Design Process
Defined

The most appropriate models of the conventional design processes used today come from Don Koberg and Jim Bagnall, authors of *The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals.* The four types of conventional design processes presented, linear, circular, feedback and branching, represent four variations of conventional design processes which evolved from the many processes discussed previously (Koberg and Bagnall 2003). Each process breaks down into seven stages: "accept the situation, analyze, define, ideate, select, implement and evaluate" (Koberg and Bagnall 2003, 17). The stages of the conventional design process are outlined to include further detail in Appendix D: Conventional Design Process Outline.

Conventional Design Process Today

The conventional design processes in landscape architecture today come in a variety of forms; however, each process draws inspiration from the original staged-design process model of Sasaki, as well as the process models of Jones, Crewe, the site design model of Lynch and Hack, the ecological process of McHarg, and the creative processes of Halprin and Crewe. The conventional design process

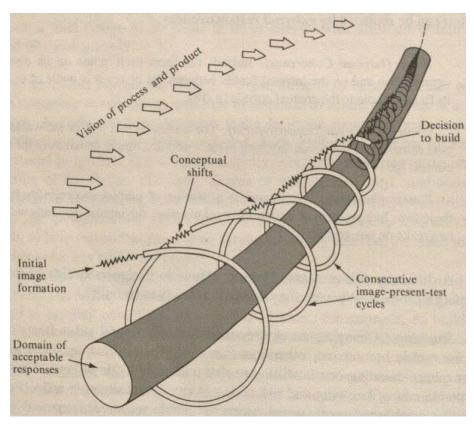


Figure 2.02: "Design Development Spiral" (Zeisel 1981)

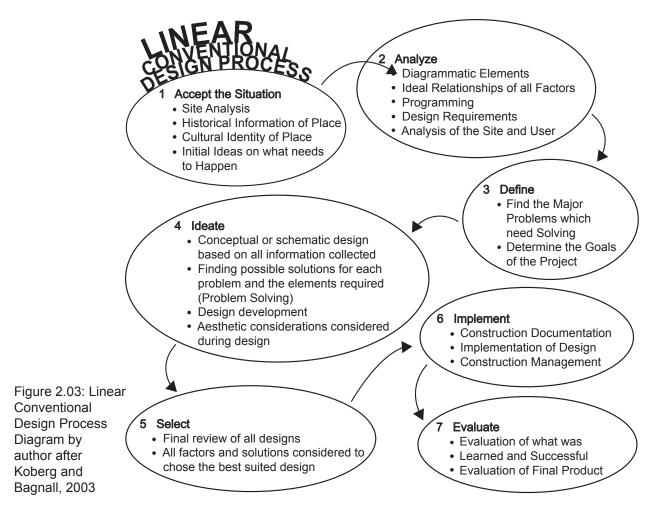
evolved to focus less on a timeline of specific stages until project completion; however, the process still revolves around a distinct overall framework. Although stages can be completed multiple times, each step in the design process must systematically be completed in a particular order in some way in order to be a successful problem-solving process for design (Koberg and Bagnall 2003).

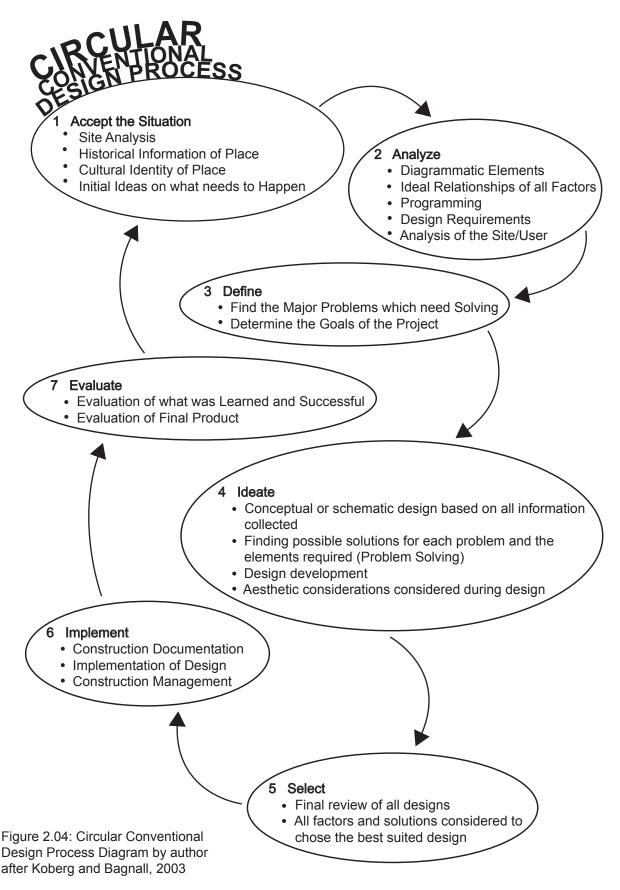
When looking at the four different models of conventional design process described by Koberg and Bagnall, flexibility comes from devoting more time to specific stages of the design process. In addition, unlike the staged-design models, repetition of each stage plays an important role in the four models. A diagram for each variation of the conventional design processes, linear, circular, branching and feedback, introduced by Koberg and Bagnall can be seen in Figures 2.3 to 2.6.

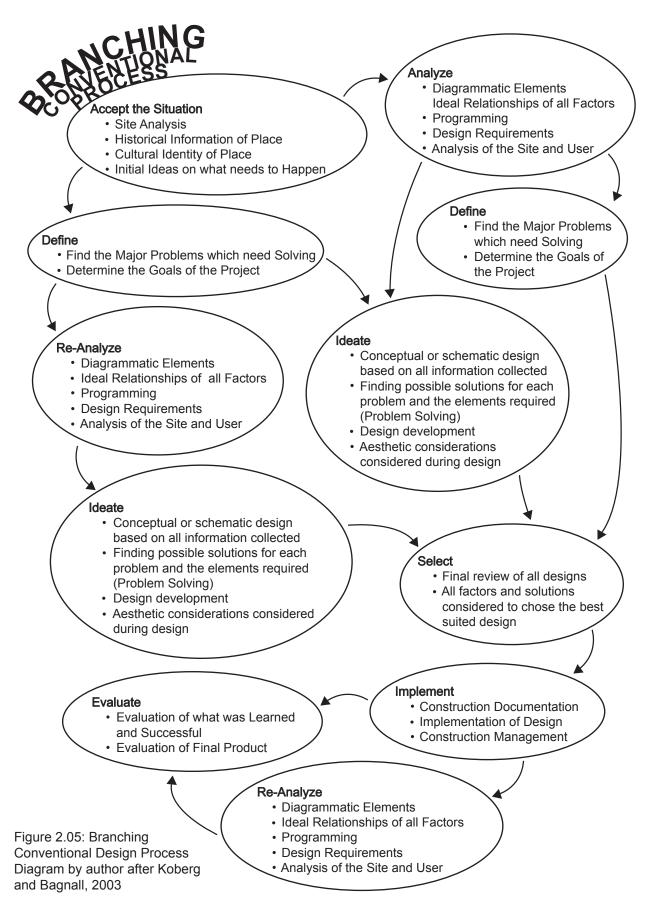
Most closely related to Sasaki's staged-design process model is the linear conventional design process. While it has more stages and allows for more time to finish each stage, the process is still linear (See Figure 2.3) (Koberg and Bagnall 2003). In the circular process, the stages are carried out in a continuous loop, in a specific order until completion of the project (See Figure 2.4) (Koberg and Bagnall 2003).

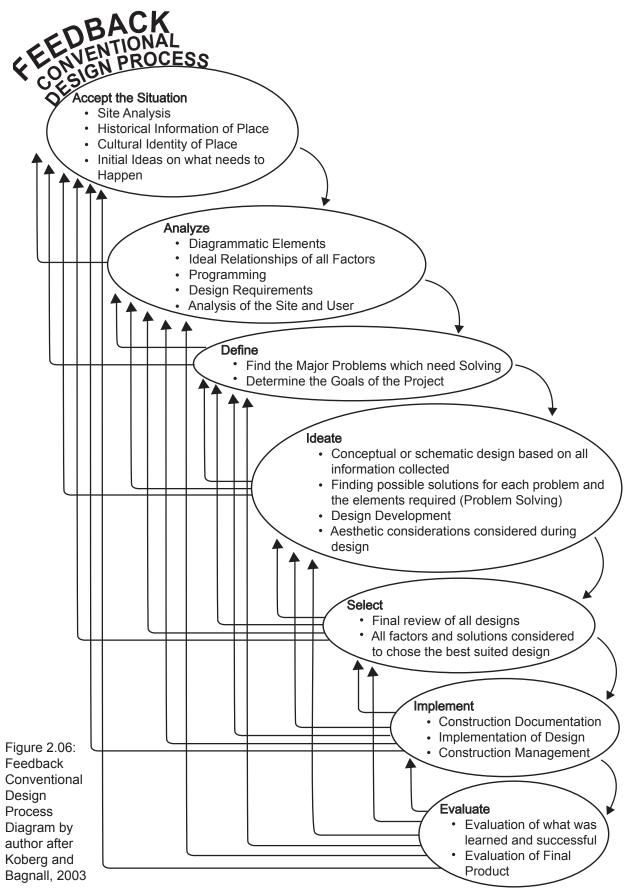
Contrary to the linear and circular processes, stages can be completed in multiple directions in the branching process; however, an overall order still exists (Koberg and Bagnall 2003). The branching process is more expansive, covers more ground and completes phases multiple times allowing for more flexibility in design (See Figure 2.5) (Koberg and Bagnall 2003). Perhaps the most flexible, during the feedback process, phases are revisited as many times as necessary to successfully complete each stage (Koberg and Bagnall 2003). The feedback loop focuses on checking work and looking backwards before moving forwards in order to ensure that each phase is completed to its maximum potential (See Figure 2.6) (Koberg and Bagnall 2003).

While these four branches of the conventional design process allow more freedom in design, the conventional design processes today still lack recognition of the importance of creative thinking and creative process in design.









Bryan Lawson identifies six common characteristics of design process. First, Lawson explains that "the design process is endless" (Lawson 2006, 123). Relating back to the ideas that design is limitless like art, Lawson explains design as an endless process where an infinite number of solutions to each problem and each solution can always be improved (Lawson 2006, 123).

Bryan Lawson's Six Characteristics of Design

Second, Lawson says that there is "no infallibly correct process" (Lawson 2006, 124). According to Lawson, simple logical outcomes from problems do not justify solutions, which makes it impossible to have a set sequence of events to guarantee an outcome; therefore, the ability of a designer to be flexible throughout the process becomes very important (Lawson 2006, 124).

Third, "the process involves finding as well as solving problems" (Lawson 2006, 124). Solutions and problems cannot be thought of separately throughout design and must emerge together throughout the process (Lawson 2006, 124). If designers should find the problems and solutions simultaneously, creative thinking becomes extremely important to the design process (Lawson 2006, 124). Like landscape architects, artists work with problems that do not exist in the beginning of a project and start working with no concrete ideas of where a design will end; however, artists still expect to solve the problems they create through design.

Fourth, "design inevitably involves subjective value judgment" (Lawson 2006, 124). This aspect of design process raises questions in landscape architecture. As mentioned before, landscape architecture does not widely accept personal expression in design; however, Lawson says that value judgment must be present in order to determine the vital problems and determine which solutions most successfully solve those problems (Lawson 2006, 124). In addition, these questions must be answered many times in a subjective manner, with little time to test every solution.

Fifth, "design is a prescriptive activity" (Lawson 2006, 125). Designers already try to answer questions about what might exist, not what exists. They "prescribe" and create the future (Lawson 2006, 125).

Finally, the sixth characteristic says, "designers work in the context of need for action" (Lawson 2006, 125). Basically, because one goal of design is creating change in a place beyond the built environment, design does not end with the building of the final product (Lawson 2006, 125). Design process should result in a need for change or action within a certain environment (Lawson 2006, 125).

While the characteristics and definition of design process have remained consistent overtime, the ways in which landscape architects have carried out the design process, and worked to reach the specific goals of the design process, has varied.

Lack of Creativity in the Conventional Design Process Today The conventional design process succeeds in finding problems within a specific project, then developing solutions for those problems; however, the process lacks important considerations for creative thinking in design. Let it be noted that Steven Krog speaks very strongly about his opposition to the design process in his article "Creative Risk Taking", making him a primary source of information for the problems with design process today. Two problems will be addressed here including fear of the unknown and a lack of opportunity for creativity in the design process.

To begin, many landscape architects depend on a set design process making it difficult for them to work through any and all major obstacles to their process (Krog 1983, 58). Design processes help form written programs, site analysis and other concrete factors; however, the process does not guide designers on where to take their projects throughout the process which is frequently perceived as an obstacle to design (Krog 1983). According to Krog, when designers try to avoid these obstacles and other unknowns, they lose creative thinking and only develop functional places (Krog 1983). Due to this fear of the unknown, even exceptional landscapes seem limited and designers become dependent on processes of "methodical analysis of program," site, and their fit" (Krog 1983, 59). Krog states, "When in doubt, we [landscape architects or designers] stoke the fire under design process, hoping it will produce one more alternative, one more flash of insight. But while, breeder rather-like, the design process often manufactures more information than it consumes, it has sadly never produced one gram of insight" (Krog 1983, 59).

The assumption that creativity is automatically engaged throughout a design process limits creative thinking. Rather than designers becoming actively engaged and involved in creativity throughout design, creativity is assumed to be indirectly or subconsciously incorporated throughout the design process and products (Askland, Ostwald, and Williams 2010). In addition, the conventional design process lacks creativity because the process is concerned with known goals and requirements more than using a creative process to develop new goals and requirements (Askland, Ostwald, and Williams 2010).

The discussion of creativity runs rampant throughout the history of art and landscape architecture, as well as design process. After laying a framework for the use and definition of design process throughout this study, the following section introduces creative thinking and the avantgarde as vital aspects to design innovation in landscape architecture.

The current popularity and interest in conceptual landscapes highlights creative thinking in landscape architecture. Since "most people would describe design as one of the most creative of human pursuits", it makes sense that creativity is becoming more recognizable in landscape architecture (Lawson 2006, 145). In addition, the major driving factor for creative acts, like design, is the creation of something for human experience or the creation of something entirely new (Lawson 2006). While creativity in its true form is frequently associated with the arts, it can be applied to any field requiring human thought like landscape architecture (Lawson 2006).

Creativity and the Avant-Garde in Landscape Architecture

While it is difficult to pinpoint the rise of creativity in landscape architecture, the value and success of creativity in landscape architecture is apparent in books like Groundswell: Constructing Contemporary Landscape by Peter Reed, the book produced in conjunction with the Museum of Modern Art's (MOMA's) exhibit of the same name (Reed and MOMA 2005). Reed introduces a variety of projects and landscape architects representing creativity in contemporary landscape architecture today (Reed and MOMA 2005). In each of the projects presented, some of which can be seen in Figures 2.7 to 2.12, designers worked to create unique visual identities for different places through incorporating creativity into their thought processes in a variety of ways (Reed and MOMA 2005). It is possible to identify avant-garde landscape architecture and see the involvement of creative thinking in projects; but what is creativity? According to Lawson, "No book on the thinking processes involved in design could be complete without some examination of the fundamentals of creativity and creative thought" (Lawson 2006).

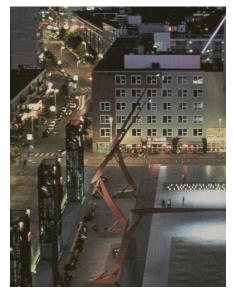




Figure 2.07 (left): "Aerial View at Night" by West 8 Urban Design and Landscape Architecture BV of Schouwburplein (Theater Square) (Reed 2009); Figure 2.08 (right): "Proposed New Park and Redevelopment of Broadway in Channel Area" by Alsop Ltd for Bradford City Centre Master Plan (Reed 2009)







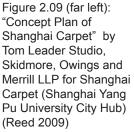


Figure 2.10 (top left): "Sculpture Garden and Park Pavilion" by Weiss/ Manfredi Architects for Olympic Sculpture Park (Seattle Art Museum) (Reed 2009)

Figure 2.11 (middle left): "Concept Model, View from Above" by Gustafson Guthrie Nichol Ltd for Lurie Garden (Millennium Park) (Reed 2009)



Figure 2.12 (bottom left): "Lawn over Parking Garage with Limestone Walls for Fire Stairs" by Kathryn Gustafson with Paysage Land and Valode and Pistre Architectes for Shell Petroleum Headquarters (Reed 2009)

Creativity

So far, creativity and the avant-garde are frequently mentioned as ways of defining specific modes of thought in relation to landscape architecture; however, the terms have yet to be fully defined. While creativity and avant-garde are not identical terms, due to several major overlaps between the two terms, they can be used synonymously in this thesis.

The most common definition of creativity in design states that creativity comes from any ideas or works that are both useful and original (Askland, Ostwald, and Williams 2010, 4). Margaret Boden, a researcher in psychology and several other fields of science, defines creativity as being significant even if an idea is only new to the individual mind and not to the world (Lawson 2006). There is not one correct way to define creativity; however, scientific research has been conducted to define creative thinking. According to the gestalt theory, creative thinking is a reconstruction of patterns that do not fit together (Kneller 1965). George Kneller, author of *The Art and Science of Creativity*, further describes creative thinking saying, "[It] usually

begins with a problematic situation, which is incomplete in some way. The thinker grasps this problem as a whole. Then, the dynamics of the problem itself, the forces and tensions within it, set up similar lines of stress within his mind. By following these lines of stress the thinker arrives at a solution which restores the harmony of the whole" (Kneller 1965, 27).

Creativity can be seen as synonymous with the avant-garde. Both are influenced by similar factors and strive for originality. Originality means doing something new that is not completely influenced or laced with tradition; it focuses on present experience rather than past traditions (Krauss 1985). While it has been mentioned that landscape architecture cannot succeed without the foundation of tradition, the important lesson to take from originality is an emphasis on creativity.

Historically, the avant-garde was associated with attacks on rising art and artistic institutions, as well as movements that demanded change (Brown 1991, 136). Avant-garde artists had numerous labels throughout history that range from revolutionary to anarchist; however, one thing that has remained consistent is their theme of originality (Krauss 1985). Like the landscape architect interview subjects for this thesis, the avant-garde is a group of highly creative or inventive people who are ahead of their times through a focus on originality (Brown 1991, 136). Today, the status of the avant-garde has changed from artists demanding revolution to highly creative individuals with original ideas. For the purposes of this study, creativity will be examined through the process of creative thinking and the concept of the avant-garde. For the remainder of this document, highly creative landscape architects will be referred to as avant-garde.

Avant-Garde

Landscape architecture has only recently begun to re-adopt "avantgarde" as a term to describe landscape architects who have started to take part in the art world (Brown 1991, 136).

The use of creative or avant-garde thinking in this study refers to the concept of invention, originality and application of new approaches and techniques into landscape architecture. Avant-garde thinking is not always about designing landscapes that appear radical or revolutionary, but rather defines an approach used by designers who want to bring about change in the ways people see, use, and understand landscapes. Brenda Brown, author of "Avant-Gardism in Landscape Architecture", describes the avant-garde artist as being "the foresighted creator who produces an 'advanced' and 'revealing' art, manifesting the most advanced social tendencies" (Brown 1991, 138). Brown claims this definition is actually more relevant to the role of landscape architects than to artists (Brown 1991).

Relationship of Creativity and the Avant-Garde to Landscape Architecture Creative thinking and the avant-garde in landscape architecture go hand-in-hand because it is impossible to be avant-garde without being entirely creative. Creativity is vital because the moment a design is implemented, it can no longer be avant-garde; therefore, copying past designs and traditions or using others' design solutions is not an option for the avant-garde. Avant-garde landscape architecture strives for complete creativity rather than design that is driven by past traditions. Garrett Eckbo related the avant-garde and creativity best when he said, "In concept, the avant-garde symbolized the human determination to conquer and reshape nature in terms of human concepts not directly related to it; that is, separate, pure, human creativity" (Eckbo 1991, 9).

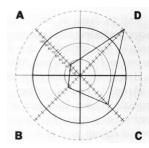
Psychology of Creative Thinking

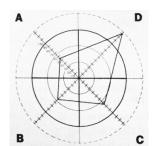
The presence of creative thinking in landscape architecture has been supported through psychological studies and interviews with landscape architects.

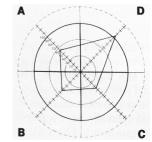
In *The Creative Brain*, Ned Herrman discusses the psychological aspects of creative thinking in relation to the four quadrants of the human brain. Herrman provides precedent on why creative thinking should play a major role in landscape architecture because artists and occupations related to landscape architecture use the same quadrant of the brain when problem solving and designing. These patterns and results come from a survey sent to hundreds of thousands of professionals over the past few decades in order to determine brain dominance profiles (Herrman 1995). Since people of different strengths and weaknesses respond to things differently, the profiles that correspond to different occupations were assumed to be different from one occupation to another (Herrman 1995).

According to Hermann, the brain breaks up into four quadrants where the right cerebral hemisphere is the "D Quadrant" (Herrman 1995, 104-105). Intuition, imagination, process, and artistic nature take dominance over other traits in the "D Quadrant" (Herrman 1995, 104-105). While Herrman does not specifically talk about landscape architects, he does discuss entrepreneurs, strategic planners, and artists as primarily employing the "D Quadrant (Herrman 1995, 104-105). In fact, their results are almost identical (see Figures 2.22 to 2.24). Undoubtedly, these three types of occupations relate directly to the profile of a landscape architect.

Brain Profiles Figures:
2.22 (left): Artist
2.23 (middle):
Entrepreneur
2.24 (right): Strategic
Planner
All Profiles from Hermann,
1995







Encouraging Creative Thinking in Design

While several sources speculate on what encourages creative thinking in landscape architecture, Jamie Maslyn presents evidence on creative thinking in landscape architecture through the results of a study completed with seven landscape architects deemed highly creative by professionals in the Denver area (Maslyn 2002, 134). According to fellow landscape architects, the seven selected landscape architects embrace the creative quadrant of the brain as discussed by Herrman. The professionals in Denver selected creative practitioners through peer-evaluation (Maslyn 2002, 134). The results of this study are revealed in "The Modern Landscape Architect and Creativity: What Creates it, Shapes it, and Inspires it" (Maslyn 2002).

Maslyn's study allowed for direct interviews with avant-garde landscape architects who use creative acts and experiences throughout design (Maslyn 2002, 134). This study is rare because it specifically addresses creativity in landscape architecture through questionnaires and interviews (Maslyn 2002, 134). The results of the two personal interviews and questionnaire brought forward seven similarities on what influences the landscape architects' personal creative process.

Maslyn's first finding was creativity occurs when landscape architects are in unstable, risky situations (Maslyn 2002). Next, the landscape architects felt that many times clients, collaborators, and colleagues provide positive opportunities for avant-garde designs (Maslyn 2002). The third aspect of creative thinking in landscape architecture discussed was creative thinking as a driver for self-actualization and growth (Maslyn 2002). Next, the interview subjects said they experience a spirituality of the avant-garde so intense during the creative act that many of the designers forget everything else in life and feel free (Maslyn 2002). This creates a relationship with the fact that each of the avant-garde landscape architects agreed, "Interested people do creative things because they enjoy it" (Maslyn 2002, 136). Finally, basic confidence allows the landscape architects not to follow a traditional linear design process. All seven subjects agreed that landscape architectural education and training alone are insufficient in developing an avant-garde landscape architect (Maslyn 2002).

Several aspects of Maslyn's study with avant-garde landscape architects contradict other findings from literature review on what truly limits or encourages creative thinking. For instance, the avant-garde landscape architects in Maslyn's study see risk as a positive influence on design but most designers think risk limits creative thinking in design (Maslyn 2002). In addition, the avant-garde landscape architects said that clients positively influenced creative thinking; conventional wisdom dictates that clients and legislation pose the biggest limitations on landscape architecture.

Another factor encouraging creative thinking in landscape architecture, separate from Maslyn's study, is level of expertise in design. When designers reach a point that they have developed an expertise in landscape architecture, it becomes easier to think creatively about design. If designers are "experts", they have mastered all aspects of design and therefore, can think through design solutions quickly, leaving more time for creative thinking. According to Lawson, experts have moved from beginner to competent to proficient to expert (Lawson 2004, 107). The expert can perform with little conscious effort (Lawson 2004).

Whether it is self-confidence or simply enjoying the creative act, each of the limitations and influences on creativity drawn from the interviews in articles and research provide experiences and examples that prove to inspire and aid landscape architects in understanding what needs to change and be embraced in order to develop creative thinking. Three limiting factors on creative thinking in landscape architecture found in the research come from specialization in landscape architecture, repetition of tradition in landscape architecture, and project clients or legislation.

Limitations on Creativity in Landscape Architecture In his study of avant-garde landscape architects, Maslyn determines one common limiting factor for creative thinking among the interview subjects: specialization in a specific field of landscape architecture (Maslyn 2002). Specialization in landscape architecture was addressed as a limitation on creativity because designers become too wrapped up in very specific interests (Maslyn 2002). Maslyn mentions Todd Siler, artist and author, who said, "Throughout life we tend to build mental barriers as we become specialized... in our interests. These self-imposed barriers disable our natural ability to... see relationships between things, thus causing our minds to work less efficiently and creatively" (Maslyn 2002, 136).

Additional research provides more examples of limitations on creativity in landscape architecture. To begin, at the beginning of the 20th century, the tension between all aspects of the traditional and the avant-garde grew rapidly causing many to think of the avant-garde in a negative light (Taylor 1995). This prevailing lack of interest in art and the avant-garde caused many design efforts to be less than average (Krog 1983). According to Steven Krog, designers continue to look to tradition when developing design solutions and as a result, landscape architects think, "If the public is to 'read' a building as a house, school, church, or whatever, the design should include those signs the public are most likely to interpret as indication of a house, school, or church" (Krog 1983, 61). The consistent use of known traditional metaphors in landscape architecture becomes one of the biggest limiting factors on creative thinking. Landscape architects limit themselves from thinking more creatively by strictly following past traditions.

In many situations, clients and legislators of a project greatly limit creative thinking. Lawson addresses the limitations that legislators bring to design saying even though they are not directly involved with the design process, legislators create constraints to creative thinking through codes, guidelines and recommendations for practice (Lawson 2006). While these codes and recommendations assure safety or "appropriate appearances" according to the tradition of a given place, they force legislators to see creative design as reckless or irresponsible (Lawson 2006). In addition to legislators, clients and the public frequently constrain creative thinking because they primarily focus on a single dimension of the design (Crewe and Forsyth 2003). The public sees avant-garde designs as being dangerous to society, dubbing designers who embrace the avant-garde as "outsiders" (Goswami and Goswami 1999).

According to at least one source, the highest achievement in design is the label of being creative (Askland, Ostwald, and Williams 2010). Creative thinking brings two additional values to landscape architecture: the opportunity to break from tradition and developing new ecological solutions to conserve the landscape.

Value of Creative, Avant-Garde Thinking

Tradition is said to be a vital part of landscape architectural design. Many argue that without an underlying structure of tradition within each project, the work would be unsuccessful. While this may be true, it should be balanced against the positive influence the avantgarde has on design (Askland, Ostwald, and Williams 2010; Murphy 2005; Eckbo 1991, 9). Garrett Eckbo discusses this duality as avantgarde versus the "status-quo" (Eckbo 1991, 9). According to Eckbo, the status quo or tradition only wants to maintain landscapes and establish meaning; whereas, the avant-garde wants to break from tradition to create new ideas (Eckbo 1991). Murphy describes the personality of a creative thinker saying:

"They are less inclined to conform to conventional views and less confined in their mental outlook; resourceful, they are effective due to their ability to conceptualize unusual and unconventional approaches to problem solving; industrious, hardworking and undaunted by the threat of failure, determined to succeed no matter what effort is required, it is likely they are passionate about the issue and thus willing to expend whatever effort is required; independent, they draw greater strength from personal accomplishment than from the approval of others, the social distance that is created by proposing a new idea is not threatening to them and does not inhibit their speculating with or expressing these ideas to others" (Murphy 2005, 220).

Murphy's description of creative thinkers represents the value of the avant-garde versus tradition for designers. Finally, creative thinking enables designers to worry less about the opinions of others and the traditions of landscape architecture; creative thinkers have the power to drastically change the current patterns of thinking (Askland, Ostwald, and Williams 2010, 4; Murphy 2005).

Landscape architects must begin seeking new solutions because the conventional solutions no longer effectively solve many problems of today. Garrett Eckbo called for a new marriage to be developed between the cultural process of the avant-garde and nature through an ecological process (Eckbo 1991, 9). Because the landscape continuously changes over time, the traditional design strategies for landscape in the past are no longer appropriate for the landscape today. Therefore, according to Eckbo, a combination of the avant-garde and ecological planning is vital in saving the planet for all people (Eckbo 1991, 9).

As one of the most critical concerns and focuses of landscape architecture, it is important for landscape architecture to recognize the value of creative thinking in order to successfully conserve the landscape. Ivan Marusic, author of "Some Observations Regarding the Education of Landscape Architects for the 21st Century", expands Eckbo's ideas relating to tradition by stressing the importance of developing strategies for conservation in creating the least harm to the environment (Marusic 2002). Marusic builds off Ian McHarg's book Design with Nature, which talks about how conservation can only occur through creative thinking (Marusic 2002). Similarly, Daniel Collado-Ruiz continues on the topic of creativity in relation to conservation saying sustainability cannot be attained unless radical changes occur in society (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). He calls these changes "eco-innovation" meaning any innovative process that works to reduce negative impacts on the environment (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 480).

Creative Process in Landscape Architecture

When looking back at models of design process, only two recognize creative thinking as an asset to the process; however, Halprin and Crewe's processes do not address when creative thinking occurs.

Creative Process Defined

After defining the stage-design process and conventional design processes in landscape architecture, it becomes obvious that creative process is a substantially different approach to design. Unlike the design process, the creative process is non-linear and acts as a guide to individual creative thinking (Lawson 2006; Herrman 1995; Goswami and Goswami 1999).

Creative process begins with first insight, the time when a person recognizes that a problem exists and needs to be solved (Lawson 2006). Following first insight, the creative process breaks into four phases. The creative process uses phases instead of stages because no rules are set for when activities need completion. Unlike the conventional design process, the creative process comes from human nature, not organization and planning. Graham Wallas, creativity researcher, first suggested the four phase of creative process as "preparation, incubation, illumination, and verification" (Lawson 2006, 149; Herrman 1995, 186; Goswami and Goswami 1999, 43-44). Appendix E: Psychological Phases of Creative Process outlines Wallas' creative process model. A diagram of the creative process can be seen in Figure 2.25. Lawson breaks down creative process saying, "Preparation is the conscious attempt at a solution. Incubation takes no conscious effort. Illumination is the sudden emergence of an idea. Verification is the conscious development of an idea" (Lawson 2006, 149-150). The preparation phase finds the problem and gathers information about the problem (Herrman 1995; Goswami and Goswami 1999). Preparation is frequently revisited throughout the creative process as the problem changes and takes different forms (Lawson 2006).

Incubation calls for relaxation and taking time to step away from the problem (Lawson 2006; Herrman 1995; Goswami and Goswami 1999). The most spontaneous thinking occurs during incubation when designers allow themselves to give their mind a break (Goswami and Goswami 1999). According to Herrman, both preparation and incubation potentially last from seconds to years (Herrman 1995); therefore, famous innovator, Alexander Moulton, suggests students and professionals who use a creative process work on multiple ideas at once so they can take time away from one idea to let it "incubate" without wasting time (Lawson 2006).

Illumination brings about inspiration and revelation during the process (Herrman 1995; Goswami and Goswami 1999). Illumination is known as the "ah-ha" moment when everything falls into place and consideration of resolutions to problems occurs (Lawson 2006; Herrman 1995; Goswami and Goswami 1999). Architect Arthur Erickson quotes Picasso saying, "'I do not seek, I find.' It is this moment of finding that is the 'Eureka' of the creative act; its source unknown. It is only when I am asked why, that some of the influences can be dredged up out of the unconscious" (Crewe and Forsyth 2003, 44). Erickson clearly describes the illumination phase when speaking about the moments of revelation.

The fourth possible phase in creative process, verification, occurs when verification and evaluation of solutions are considered (Herrman 1995; Goswami and Goswami 1999). Verification is an important phase in the creative process because creative thinking rarely

REATIVE PROCESS Finding the problem Resources: Gathering Facts and Existing ideas about the Problem (Site Analysis, etc...) · Looking at the Problem from every angle Mastering the Site Finding the Resources with which you have to Work Incubation Relax Taking Time to Step Away from the Problem Best Creative Thinking occurs · Scores ("symbolizations of processes which extend over time" (43 Halprin 1969)) Verification Verify and Evaluate what you have found · Check the Solutions to the Problems Design Illumination • The "ah-ha" Moment The Time of Inspiration Resolution of Problems Considered · One phase of the Scores leading up to the Designing Figure 2.25: Creative Process Diagram by Valuaction (term representing both action-oriented and author, synthesizing decision-oriented analysis in design (45 Halprin 1969)) Wallas (Goswami and Goswami 1999: Herrman. 1995; Lawson 2006) and Halprin (Halprin 1969)

includes only a single flash of insight (Kneller 1965). Creative thinking requires continuous analysis in order to find what is important or what is insignificant in design (Kneller 1965). According to Zeisel, "creative leaping" contributes to verification in both creative process and landscape architecture (Zeisel 1981, 11). "Creative leaping" comes from the continuous testing of design concepts (Zeisel 1981, 11).

According to Goswami, creative acts frequently consist of "many episodes of work, relaxation, and mini-discontinuous insights" until final illumination occurs and the design falls into place (Halprin 1969, 43; Herrman 1995; Goswami and Goswami 1999); therefore, the four phases of creative process function best as "performance" where the cycle operates in any direction and the phases overlap one another. Creative process involves going back and forth between phases until illumination occurs and the final design is developed.

As Lawson notes, the creative process and the design process need similar personalities to be successful; therefore, landscape architects already embody what it takes to use a creative process. Landscape architects should embrace their ability to use a creative process as a means of enhancing their design processes. Kinesthetic activity acts as one part of the creative process that could encourage creativity in design development. Kinesthetic activity derives from kinesthesis as the movement of the body (Gibson 1966). As an individual aspect of the haptic system, which connects an individual to both the environment and the body, making the individual completely in touch with their environment, kinesthesis presents itself in a variety of forms (Gibson 1966). A variety of kinesthesis, cutaneous kinesthesis, relates most closely to kinesthetic activity, as used in this thesis (Gibson 1966). Gibson, author of The Senses Considered as Perceptual Systems, defines cutaneous kinesthesis as "the movement of the skin relative to what it touches" (Gibson 1966, 97). If landscape architects embrace the haptic system through kinesthetic activity, the act of touch could bring great value to design.

Kinesthetic
Act of Creation
in Landscape
Architecture

Kinesthetic activity occurs in design development when landscape architects use the movement of the body through a site, or as hands on materials, to generate ideas rather than the computer; therefore, kinesthetic thinking is important for designers wishing to embrace a more creative process (Gibson 1966). Several assets come out of kinesthetic activity including: a stronger relationship between designer and site, more opportunity for avant-garde idea generation, and deeper understanding of technical skills.

When landscape architects use unintuitive computer programs during the stages of design development, they weaken their relationship with the project site. While forming a relationship between designer Value of Kinesthetic Activity to Design

and site might seem irrelevant to design, many positive aspects come out of that relationship. Adrian Stokes made the distinction between "modeling" and "carving" (Lawson 2004, 80). Stokes defines modelers as computer programs like CAD (Computer Aided Design) or designers who strictly rely on computer programs to generate ideas (Lawson 2004). Carvers use kinesthetic acts as reflective materials that influence the final product (Lawson 2004). Carvers truly form a relationship with their work while modelers treat all objects as equal and free of constraints (Lawson 2004). Similarly to Stokes, Juhani Pallasmaa, author of The Thinking Hand: Existential and Embodied Wisdom in Architecture, says designers need to develop relationships between "thought and making, idea and execution, action and matter, learning and performance, self-identity and work, pride and humility" because the character of a relationship between designer and site can be surprising (Pallasmaa 2009, 53). When designers form relationships with their sites, they personally invest in their work, allowing them to care more about the outcome of their designs.

Kinesthetic acts, such as drawing, ultimately allow designers to physically see the avant-garde possibilities in design (Corner 1992, 144). Similarly, two- and three- dimensional skills in representation of design emphasize and drive creativity too (Askland, Ostwald, and Williams 2010, 4). Physical models and design development pieces, which a designer can hold and inspect, continue to inspire designers throughout the process (Pallasmaa 2009). Artist Tapio Wirkkala said, "A drawing or sketch is an idea which provides the basis to start work. I make dozens – sometimes hundreds – of sketches... For me, it's important to see the object as a concrete thing before sending it on to the manufacturer... I don't make just one [model], but several models which I can compare and then select one to continue working on. In this way it becomes clearer and the mistakes more apparent" (Pallasmaa 2009, 57). Similarly, artist Kiki Smith talks about the relationship that kinesthetic action forms between herself and her artwork saying that the laborious parts of design incorporate her favorite moments because they make her feel the most free (Hunt and Kingery-Page 2010).

Finally, sociologist Richard Sennett makes two arguments for the interaction between the hand and the imagination. Sennett argues that all basic skills begin as kinesthetic practices and any understanding of the technical begins with imagination (Pallasmaa 2009). According to Sennett's argument, if landscape architects want to develop to their full potential as designers and become familiar with basic or technical skills, they should start by engaging in kinesthetic activity.

It is important that landscape architects adopt kinesthetic design development back into the design process as the dependence on the computer to develop ideas becomes increasingly dominant (Tai 2003). In fact, one survey showed that 99 percent of respondents in landscape architecture used the computer to draft and enhance design work (Tai 2003). While the computer, in some ways, works faster and frees more time, the same survey showed that 61.2 percent of the respondents took on more work to fill their free time rather than using the free time to engage in creative tasks (Tai 2003). The computer overshadows the traditional tools for design development of drawings or models. A study completed by Lolly Tai serves as evidence for why the computer can limit creative thinking in design.

A Study of the Effects of the Computer on Creative Process

In 2003, Tai published "Assessing the Impact of Computer Use on Landscape Architecture Professional Practice: Efficiency, Effectiveness, and Design Creativity", the results of a survey of over one hundred executive members of the American Society of Landscape Architecture (ASLA) in the United States (Tai 2003, 113). The immediate results of the study proved the dominance of computer in all areas of landscape architecture and improved drawing presentation and quality. However, the survey showed that the computer would never be able to replace artistic or creative aspects of design (Tai 2003, 113). Overall, while Tai's survey proved the computer would not replace artistic practices in design, it showed future landscape architects need to be educated on computer practices due to the computers increasing popularity in the profession.

The results of the survey presented positive feedback on using the computer but personal interviews with several of the landscape architects surveyed presented conflicting results. From the survey, it was determined that 25.5 percent believed the computer helped creativity, 45.1 percent said the computer had no affect on creativity but 29.4 percent said the computer hindered creativity (Tai 2003, 113). On the contrary, information gathered from the interviews said that many of the landscape architects thought the computer negatively affected creativity and the designers felt freer when drawing (Tai 2003). While there were no immediate relationships between the survey statistics and the interviews, Tai concluded that the computer hinders creativity because design should be intuitive and computer applications are not (2003). If the computer deters creative thinking, yet 60 percent of professional landscape architects look for computer and hand drafting skills when hiring (Tai 2003, 113), what should take precedent in the education of landscape architecture students?

The evidence for why change is needed in the education of landscape architects comes from practitioners schooled in the 1960s and 1970s (Richardson and Schwartz 2008, 101-102). These practitioners complain that their landscape architectural education focused on

Education in Landscape Architecture functionality and lacked creative thinking (Richardson and Schwartz 2008). While these practitioners were in school forty to fifty years ago, this section will begin to introduce the same restrictions on creativity in landscape architectural education today.

Educators in landscape architecture need to encourage creative process and creative thinking in order to prevent students from entering into the professional world without acknowledging the importance of personal process and creativity. The changes needed in landscape architectural education are not drastic (Kvashny 1982, 104). While non-traditional teaching methods have been thought of as creative teaching in the past, creative thinking in landscape architectural education can simply mean active involvement in design (Kvashny 1982, 104). Many educators in landscape architecture feel that talented design students will be driven to make design a personal endeavor (Richardson and Schwartz 2008).

Meaningful Learning
in Landscape
Architectural
Education

Meaningful learning has been investigated as having five different dimensions including: "the knowledge base, strategic processing, motivation, individual differences, and situation or context" (Lambert and McCombs 1998, 28). First, the" knowledge base" describes a student's existing knowledge that serves as the foundation of learning and guides organization of new information and new experiences in relation to a student's past (Lambert and McCombs 1998, 28). The second dimension, "strategic processing", relates to a professor's ability to regulate a student's thoughts and behaviors (Lambert and McCombs 1998, 31). Motivation, the third dimension, includes encouragement by professors in helping students achieve their personal goals and learning how to do different tasks (Lambert and McCombs 1998, 33). The dimension of individual differences relates to how each student learns in a way unique to the individual but students still progress through various stages of development affected by environmental factors too (Lambert and McCombs 1998, 36). The final dimension, "situation or context", states that while learning is an individual endeavor, it is still a "socially shared" experience (Lambert and McCombs 1998, 39). In summary, meaningful learning recognizes the importance of individual experiences, the importance of motivating students to reach personal goals, and recognizing how environment affects learning.

Each of these elements of meaningful learning can be directly implemented into landscape architectural education. First, the importance of recognizing individual experiences as making each student unique relates to the previous discussion on the importance of incorporating personal experiences into design. Next, motivating students to reach personal goals would aid students in becoming more comfortable and aware of themselves as designers, both important aspects of creativity. Finally, recognizing that different

students thrive in different environments relates to the affects different environments can have on individual creativity. If all students in landscape architecture were designing based on personal experiences and not expectations, motivated to achieve personal design goals, and given different environments to work creatively within, they would have greater opportunities to discover themselves as designers resulting in greater creative thinking.

Understanding new approaches to landscape architectural education and the characteristics of meaningful learning raises questions about how professors in landscape architecture approach landscape architectural education. Two problematic aspects of landscape architectural education are studio format and accreditation standards.

Limitations on Creativity in Landscape Architectural Education

Several issues arise from the current studio format in landscape architectural education relating to creativity. While not every landscape architecture program shares the same weaknesses. apparent limitations on creativity exist in many programs. A weakness in the traditional studio format is professors and students focus on the final products and not the process (Lawson 2006). Focusing on products limits creative thinking, as well as prevents students from learning a variety of different processes in order to discover themselves as designers. The number of students working in a single studio can limit creative thinking, too (Hunt and Kingery-Page 2010). In many ways, creative thinking is limited when working in groups because creativity can be a solitary activity (Hunt and Kingery-Page 2010). Another studio limitation comes from specific program and requirements given to students for each project (Kvashny 1982, 104). Because creative thinking requires broad thinking about selected problems in order to increase the overall understanding of the final project goals, students lose creative thinking when they are given the pre-defined problems (Kvashny 1982, 104). Finally, the consistent use of project examples from previous years to show students class expectations limits creative thinking (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 479).

Before delving into the limits accreditation standards impose on creative thinking in landscape architectural education, an explanation of what accreditation means to universities is necessary. Accredited landscape architecture programs at universities in the United States must follow guidelines authorized by the Landscape Architectural Accreditation Board (LAAB) (Murphy 2005). Curriculum requirements under LAAB include "landscape planning, design, and management, design implementation, landscape architecture history, and professional practice", as well as various other subjects related to landscape architecture (Murphy 2005). In addition to the requirements set by LAAB, several additional standards come from NAAB, the National Architectural Accrediting Board, that affect education in

landscape architecture (Boyer and Mitgang 1996). Four standards to ensure a well-balanced education that are set by the NAAB are "fundamental knowledge, design, communication, and practice" (Boyer and Mitgang 1996, 65). These standards serve a number of essential functions including ensuring quality landscape architectural education, helping determine which universities can participate in federal programs, and defining standards that protect the boundaries of the landscape architecture profession (Boyer and Mitgang 1996).

As a requirement for graduates to have attended an accredited university in order to receive licensure by taking the landscape architect registration examination (LARE), accreditation is important for universities with landscape architecture programs; however, accreditation today comes with a price for both students and professionals. Accreditation, indeed, provides valuable assets to the structure of landscape architectural education; however, it limits important factors of creative thinking and creative process. When looking over curriculum requirements set by LAAB, design process and development are rarely mentioned making them seemingly less important to accredited programs in landscape architecture. When universities strive to maintain accreditation, they potentially lose sight of the important elements of design process in landscape architecture not covered by accreditation standards.

Ernest Boyer, author of *Building Community: A New Future for Architecture Education and Practice: A Special Report*, wrote "the Boyer Report" in response to a study of accredited architecture programs in the United States (Boyer and Mitgang 1996). As one of the primary focuses of the report, "standards without standardization" provides a source for encouraging professors to emphasize design process while setting professional standards in landscape architectural education (Boyer and Mitgang 1996, 63). Standards without standardization encourages a framework of expectations for all students in architecture related programs in order to develop a common set of skills and knowledge before graduating and becoming part of the professional world (Boyer and Mitgang 1996).

Creativity in Landscape Architectural Education Two completed studies in landscape architecture that focused on improving creativity in landscape architectural education provide evidence of what limits creativity in landscape architectural education. The first study, by Alon Kvashny, focused on creative problem solving while the second study, by Daniel Collado-Ruiz, focused on how project examples for students negatively affect creative thinking.

Alon Kvashny conducted a study in 1976 at the State University College in Buffalo, New York (Kvashny 1982). Kvashny investigated how to improve creative thinking in upper classmen courses in landscape architecture and whether or not professors recognize

creativity in their students (Kvashny 1982). The study began by breaking a studio into two groups and each was given different amounts of information on creative problem solving (Kvashny 1982). The "control group" was given basic landscape architectural design problems and learning activities while the "experimental group" was provided large amounts of literature on creative problem solving (Kvashny 1982, 104). For the experimental group, the first half of the semester was directed towards teaching the students about creative problem solving rather than the traditional learning activities that were given to the "control group" (Kvashny 1982).

The results of the study were published in Kvashny's article "Enhancing Creativity in Landscape Architectural Education" (Kvashny 1982). The study proved students in the experimental group produced significantly higher creative solutions but both groups showed signs of improvement in originality following the readings and activities meant to enhance creativity (Kvashny 1982). These results support the value of teaching students how to develop original concepts and to elaborate effectively on their ideas. Three primary conclusions were drawn for Kvashny's study regarding education in landscape architecture. First, creativity training should be incorporated in design courses (Kvashny 1982). Second, creative problem solving should be adopted by studios in order to develop more solutions to site problems and finally, creativity, flexibility, originality and elaboration should be encouraged from students (Kvashny 1982).

The second study is not specific to landscape architectural education but the results directly translate to landscape architecture. This study was conducted by Daniel Collado-Ruiz and published in his article "Influence of Environmental Information on Creativity" (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). Collado-Ruiz conducted his studio in response to research that claimed exposure to project examples reduced creativity throughout the idea-generation process (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). Collado-Ruiz's study began by giving fifty-six students from a variety of majors ranging from architecture to different fields of engineering a particular assignment of coming up with design solutions for an office chair with minimal environmental impact (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 479). Then, the students were broken into five groups (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 479). Four of the groups received different amounts of environmental information, or details about the specification of the product and its requirements, as well as the goal and scope of the redesign process, while the fifth group received no information other than basic background about the product (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). The participants were then given 45 minutes to develop and document as many ideas as possible (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010).

The results of the study proved that students who were given environmental information were more inclined to develop conventional methods of idea-generation (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). Collado-Ruiz discusses the "fixation effect" that environmental information has on students meaning when students are given environmental information, they use it literally rather than creatively (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 489). When given environmental information, students worried more about being precise, locking the designers into current design solutions regardless of whether or not the current solutions were applicable to the project on which they were working (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). While the study shows giving students all the information necessary for a project reduces creativity, the study mentions too that after looking at the ideas generated by the group with no environmental information beyond background, it was clear that some amount of information is necessary for a studio project to be successful (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). The results of the studies by Kvashny and Collado-Ruiz introduce several changes that can be made in the curriculums of landscape architectural education, like presenting less environmental information and incorporating more information on creative problem solving, to encourage creative thinking.

Changes to Encourage Creative Thinking

In today's society, the freedom of creative thinking is becoming more scarce as discouragement of fantasy grows (Pallasmaa 2009). Educators in landscape architecture should stop diminishing the importance of invention and fantasy even as the field begins to understand natural processes and ecological principles of design (Marusic 2002). George Kneller, author of The Art and Science of Creativity, explains five ways professors in any field can encourage creative thinking from students including: encouragement of original ideas, encouraging students to pursue new ideas regardless of feasibility, encourage students to be spontaneous when working through ideas, stimulate curiosity from students through questioning and drawing their attention to the surrounding world, and aid students in learning how to verify themselves and their ideas as designers (Kneller 1965, 79-87). Kneller's guidelines for inducing creative thinking relate closely to landscape architectural education; however, three additional aspects of landscape architectural education need to change before creative thinking can play its appropriate role.

In an earlier section about the limitations of the computer on creativity in professional design, the conclusions evolved that the computer serves as an asset in several aspects of design; however, limit the necessary creativity that needs to be present throughout design development. The computer poses the same limitations on creative thinking in landscape architectural education. Landscape architectural education needs to shift its focus on computer use back

to the sensory realm of design so students can begin to rediscover themselves as designers (Pallasmaa 2009). This rediscovery of the senses includes encouraging the use of kinesthetic activity throughout design development in landscape architectural education. Assistant Professor Jon Hunt at Kansas State University recognizes the importance of hand graphics in his article "Looking at Art: Themes in Creative Process", which he wrote in collaboration with Professor Katie Kingery-Page of Kansas State University (Hunt and Kingery-Page 2010). Hunt and Kingery-Page quote Caroline Lavoie saying:

"[Drawing teaches students to] communicate their perception, and thus their interpretation, without first using computer renderings or photographs. Drawing on site allows them to become part of the third (depth) and fourth (time) dimensions: they will perceive the side planes rather than unique front planes; they will see and feel how a place changes with time, sun, and shadow. The rendering may or may not be what the students had in mind or what they think of as beautiful, but their knowledge of a particular area will increase the memory of what happened to their bodies as they drew. The actions prior to design thus become perception at first, interpretation as they draw—a form of analysis— and then reflection, what it meant to be there" (Hunt and Kingery-Page 2010, 1).

Overall, educators in landscape architecture can encourage creative thinking from students by supporting the use different media throughout design development and discouraging computer use during design development.

Educators can encourage creative thinking by educating students about the principles of art as well. Professors Jon Hunt and Katie Kingery-Page address art education within the curriculum of landscape architecture. Hunt and Kingery-Page believe designers need to have a broad range of knowledge about different contemporary aspects of fine art (Hunt and Kingery-Page 2010). They argue that having an understanding of art would deepen a student's understanding of culture, as well as expand a student's "sense of purpose and working process" (Hunt and Kingery-Page 2010, 1). In addition, by studying how an artist works, students gain a better understanding of how to document real places and things, a key factor in landscape architecture (Hunt and Kingery-Page 2010). Hunt and Kingery-Page present five themes of design process apparent in the successful work of artists: "observation, intuition, craft, play, and communication" (Hunt and Kingery-Page 2010, 1). The landscape architectural teaching methods that Hunt and Kingery-Page embraced through three art related courses at Kansas State University support the success of incorporating art in landscape architectural education as a means of encouraging creativity (Hunt and Kingery-Page 2010).

The changes that Boyer suggested in "The Boyer Report" to prevent standardization amongst all students include changing the accreditation standard of "fundamental knowledge" to "discovery of knowledge", paying higher attention to process, and changing "communication" to "sharing of knowledge" (Boyer and Mitgang 1996, 72). The discovery of knowledge stresses the importance of learning by doing and active involvement between the designer and site (Boyer and Mitgang 1996). Boyer emphasizes that students should not be continuously be bogged down with lectures and textbooks but should be actively engaged in learning (Boyer and Mitgang 1996). Recognizing the importance of process in architectural education, Boyer calls for more focus on the process itself as design education becomes increasingly about aesthetics and theory (Boyer and Mitgang 1996). Finally, Boyer believes architectural education should not revolve around basic communication skills; communication should be about shared knowledge where students have the ability to communicate concepts and designs to every person involved in the design process (Boyer and Mitgang 1996).

Assumptions and Initial Themes

As an important starting point for understanding this thesis, the background presented information on art and landscape architecture, design processes, creative thinking and the avant-garde, creative process, and education in landscape architecture.

Several assumptions and initial themes have been developed based on the background research. Paired with a relative initial theme, the assumptions come from the five categories presented in background literature review. The initial themes are tested by the interview study. The initial themes state the knowledge gained from literature review. For a list of assumptions and themes with detailed source lists, see Appendix F.

Design Process, Creative Process and the Avant-Garde in Landscape Architecture

- (1) Assumption: There are distinct differences between a creative process and a conventional design process.
- (1) Initial Theme: Avant-garde landscape architects follow a design process different than that of artists but both processes, whether a design process or creative process, show signs of the psychological phases of creative thinking.

Design Process, Creative Process, Creativity and the Avant-Garde

- (2) Assumption: Most landscape architects follow a conventional design process that has evolved since the staged-design process; however, their process is still linear and lacks creative thinking.
- (2) Initial Theme: The processes used by avant-garde landscape architects are non-linear, creative processes.

(3) Assumption: Most design programs in landscape architectural education focus primarily on conventional design processes and professionalism rather than the development of students' personal design processes.

Design Process and Education

- (3) Initial Theme: Avant-garde landscape architects use a personal design process that has evolved since being taught the conventional design process in their formal landscape architectural education.
- (4) Assumption: Kinesthetic use of media directly affects both the creative process and design process due to the interaction it creates between the designer and the designed.
- (4) Initial Theme: Avant-garde landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking.

Design Process, Creative Process, Creativity and the Avant-Garde

Literature review served as preparation for the study by providing the necessary background information to form assumptions and initial themes. Interview questions and coding for interview analysis was based upon these initial themes and is discussed in Chapter 3: Methodology. Literature review provides initial evidence for the current limiting factors to creativity in landscape architectural practice and landscape architectural education. Finally, the literature review supports recommendations for changes that can be made to improve or encourage creative thinking in landscape architecture. Recommendations will be made in Chapter 5: Conclusions.

Initial themes clarified which topics in design process and creativity needed to be explored further through interviews. After familiarizing the audience with the background information and terminology necessary for understanding the study and its relevance to landscape architecture, the methodology for the study can be discussed.



Chapter 3

Methodology

"It is like diving into the pond – then you start to swim. Once the instinct and intuition get into the brush tip, the picture happens, if it is to be a picture at all"

-D.H. Lawrence, Novelist (Goswami and Goswami 1999)

The primary intent of the study was to learn more about the creative processes of artists and design processes of avant-garde landscape architects. Because information about personal design process is not widely published, the methodology evolved from methods best suited to gathering information directly from creative individuals. Open-ended interviews with avant-garde landscape architects and artists provided direct information on the subjects' working processes and creativity.

Chapter 3 describes the methodology used throughout the thesis beginning with worldview and strategies. This chapter provides a breakdown of methods used for gathering information including literature review and open-ended interviews. In addition, Chapter 3 breaks down how the information obtained from the open-ended interviews became a part of the study through coding and analysis matrices, matrices developed to organize and analyze the coded information from the interviews. By explaining methodology, readers will develop an understanding of the underlying structure of the study and relevance of the methods. The full work schedule of the process used can be seen in Appendix G: Work Schedule.

The qualitative research for the study falls into the pragmatic worldview. Pragmatic worldview focuses on solutions to problems and determining what works in certain situations. One of the motivations for this study is improvement in the way educators and professionals in landscape architecture approach design process by increasing their understanding of creative process. When using a pragmatic worldview, researchers choose the methods, techniques, and procedures for researching that best accomplish their pragmatic goals (Creswell 2009). For this study, interviews were chosen as an appropriate technique for gathering the personal information needed to accomplish pragmatic goals, such as giving educators and professionals a hybrid conventional and creative design process model and teaching readers the value in employing the hybrid model. Finally, this study is typical of the pragmatic worldview because it employs multiple ways to collect and synthesize data: literature review, open-ended interviews, and content analysis (Creswell 2009). **Methodology** Worldview

Strategy

The primary strategy employed for the study was grounded theory. To begin, Creswell defines grounded theory as supporting a strong focus on general theory behind processes or interaction, as well as research grounded in the views of the participants of the study (Creswell 2009). For this thesis study, grounded theory proved an appropriate strategy because the study consisted of interviews with artists and landscape architects in order to develop an understanding of their views on a variety of broad categories, which were developed from literature review research. Interviewing two types of subjects in the study, artists and landscape architects, allowed for clearer, consistent comparisons of information found from the interviews, an integral part of grounded theory (Creswell 2009).

In addition, LeCompte and Schensul define grounded theory as "the continuous interaction between data and hunches or hypotheses until a stable cultural pattern appears" (LeCompte and Schensul 1999, 15). Similarly, grounded theory is based off "inductive analysis" and "deductive analysis" where inductive analysis uses specific resources to build general arguments and deductive analysis takes those general arguments and relates to them to ideas that are more specific (LeCompte and Schensul 1999, 15). The study began with a general focus on the design and creative processes of avant-garde landscape architects and artists, along with their views on landscape architectural education and creativity. Upon completion of interviews, the findings used deductive analysis to place specific themes within the interviews into the general categories determined from literature review research and inductive analysis.

Following a grounded theory approach, this study reveals evolving ideas that constantly changed as new information was gathered. Grounded theory proved to be the most creative method for gathering and analyzing data due to the freedom of changing approaches and the different interviews frequently bringing about new and more specific themes to be studied.

Interviews with artists and avant-garde landscape architects were used in order to hear a personal account of their creative or design processes. Once collected, the interview data was coded. Then, the data was qualitatively analyzed and interpreted through a series of matrices to identify the initial themes and emergent themes in relation to the study. The information gathered from the interviews was coded without using statistical analysis and computer software to ensure that specific details and nuances of the interviews were not lost in the coding process (Creswell 2009).

Methods Literature Review

Collection of information came from literature review and open-ended interviews. A diagram of the methodology process can be seen in Figure 3.01. The literature breaks down by the following topics

relevant to design process and creativity:

- (1) Design Process (Staged and Conventional)
- (2) Creative Process
- (3) Creativity and Avant-Garde
- (4) Artists / Art
- (5) Landscape Architectural Education
- (6) Landscape Architecture
- (7) Interview Methodology Guides

The study began with literature review in order to gain a general understanding of the thesis topics. The literature review consists primarily of journal articles, books, and published interviews with both landscape architects and artists. The general knowledge obtained from literature review proved important in formulating the interview questions, based upon assumptions and initial themes. Each section of the detailed literature reviews begins with the primary and subordinate topics noted. Each review offers a detailed summary, as well as important quotes from each source (See Appendix B: Literature Review).

Since the bulk of the study depended on learning about working processes used by avant-garde landscape architects and artists, the most important source of research for this thesis was in-depth, openended interviews. The information gathered from the interviews is not widely published or public knowledge. Open-ended interviews were appropriate because they allowed for flexibility in covering new ideas presented during the interviews (Schensul, Schensul, and LeCompte 1999). An explanation for open-ended interviews in grounded theory is clearly defined by Bob Dick, an action learning and action research professor at Southern Cross University. Dick explains the use of openended interviews saying, "As with grounded theory, the explanations emerge gradually from the data as the study proceeds. All interviews begin open-ended. In the later interviews there are more probe questions. And more of those probes are specific. The theory emerges from the data, from the informants. In the early stages it consists primarily of themes. These become more elaborated as the study develops" (Dick 2005).

By interviewing subjects who produce avant-garde designs, I hoped to gain an understanding of how the phases of creative thinking occur throughout design in landscape architecture. For instance, in what activities do artists and landscape architects engage to spark creative thinking? Another objective of my interviews, specific to landscape architects, was learning what the subjects feel prevents or encourages creativity and the value of creative thinking or process in landscape architectural education. Finally, the overlaps between the artists and landscape architects served as evidence for whether the

In-Depth, Open-Ended Interviews

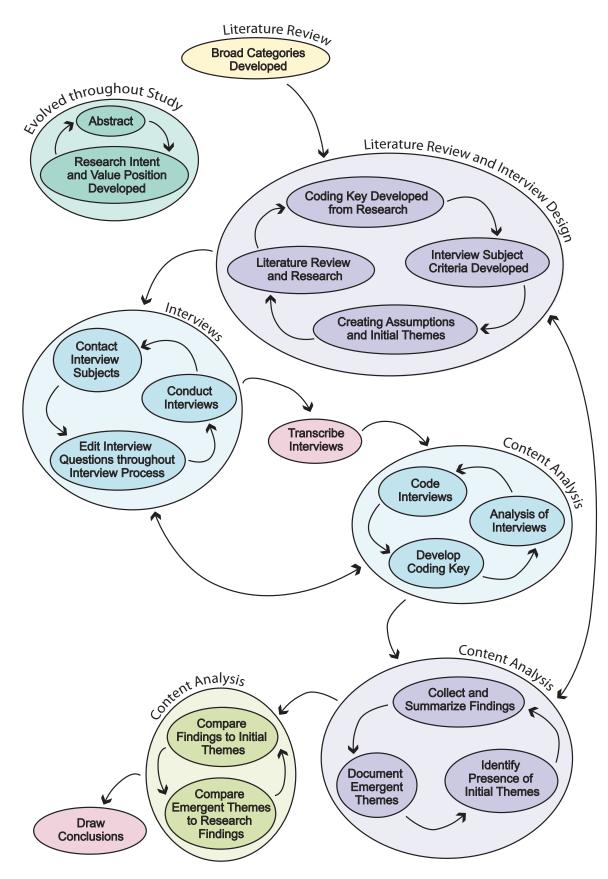


Figure 3.01: Methodology Process Diagram by Author

landscape architects were or were not avant-garde when compared to inherently creative artists.

Four landscape architects and four artists were interviewed for the study. The sampling process to determine which landscape architects would be interviewed began by developing specific criterion for selecting avant-garde landscape architects. This criterion is broken down into further detail later. Four artists were selected using a convenience sample of names provided by my thesis mentors, Professor Katie Kingery-Page and Professor Dylan Beck. An avant-garde criterion was not necessary to determine which artists would be interviewed because it can be assumed that professional artists are avant-garde, as defined for this study, and use a creative process. The contacted avant-garde landscape architects work both in the United States and internationally. The artists recommended by Professor Kingery-Page and Professor Beck work primarily in the United States.

Five specific criteria determined whether or not potential landscape architecture interview subjects were significant avant-garde practitioners. The sampling process began by looking at the built works of landscape architects. If the built works appeared avant-garde, I researched the principal landscape architect of the firm to see if they met at least three of five criteria. The five criteria are:

- (1) The landscape architect's work is evidently influenced by avant-garde art and theories.
- (2) The landscape architect has a degree, background, knowledge or keen interest in art.
- (3) The landscape architect has had frequent collaborations with artists.
- (4) The design process of the landscape architect is based in artistic and kinesthetic practices. The landscape architect goes beyond the conventional methods of design development by using varied artistic materials or media.
- (5) Either the work of the landscape architects themselves or their firm has been highly published.

The last criterion, whether or not the landscape architects were highly published, ensured that the landscape architects' practices were of the same status to keep some consistency among the samples. For a detailed example of the criteria process see Appendix H: Example of Sampling Criteria for Interview Subjects. The interviews completed with avant-garde landscape architects included: Mikyoung Kim, Thomas Balsley, Claude Cormier, and Peter Walker. The complete list of landscape architects who were contacted can be seen in Appendix I Contacted Landscape Architects for Interviews.

As mentioned before, artists were selected from a convenience sample and no criteria was used for the assumedly avant-garde artists. The interviewed artists were: Lisa Rundstrom, Del Harrow, Ted Adler and Diana Cooper. The complete list of artists who were contacted can be seen in Appendix J: Contacted Artists for Interviews.

Interview subjects were recruited using both hardcopy letters and e-mails. Potential subjects living in the United States were contacted with a hardcopy letter. The letter can be seen in Appendix K: Contact Letter. Subjects outside the United States were contacted using e-mails with the formal letters attached. The first contacts were sent on Thursday, November 4, 2011. Then, follow-up e-mails were sent on Monday, November 15 and thereafter until four interviews with both landscape architects and artists were scheduled or completed.

Interviews were conducted both face-to-face and over the phone, depending on the preference and location of the subject being interviewed. All of the interviews were recorded using a digital microphone and voice recording software. The majority of the interviews were carried out over the phone; however, two face-to-face interviews were conducted in Wichita, Kansas. Due to the information collected, the location is irrelevant.

I asked subjects a series of questions depending on whether they were landscape architects or artists. The questions broke down into two subgroups: questions about process, media, and overlaps in art and landscape architecture relevant to both samples, and questions related only to landscape architecture. Only asked of the landscape architects, the questions relevant to landscape architecture focused on dilemmas and education in landscape architecture. For the first interview, I used the original schedule of interview questions. For subsequent interviews, the questions were edited or altered spontaneously based on how well the subjects were understanding the questions. The complete list of initial interview questions can be seen in Appendix L: Interview Schedule.

Coding

Once all interviews were complete, I transcribed the content with minimal editing. Any edits were made strictly for legibility and clarity.

After being transcribed, I coded the information to document presence of initial themes. Codes represent terminology of the psychological phases of creative process and the stages of the staged and conventional design processes, as well as basic key words, like creativity or landscape architectural education. I used a holistic coding procedure by looking for specific terminology and cross-referencing to determine patterns and relationships between the interviews (LeCompte and Schensul 1999). The patterns and relationships coded for this study were: overlaps between artists' creative processes and

landscape architects' design processes, overlaps in the information on media and education in both design fields, the value of creative thinking in landscape architecture, overlaps between art and landscape architecture, the role of and dilemmas faced by landscape architects today, and evidence supporting the claim that the landscape architect subjects are avant-garde practitioners.

I began the coding procedure by printing hardcopies of each transcribed interview and assigning a color to each code in the original coding key. The color coding key was used to complete the first round of coding by hand (See Appendix M: Original Coding Key; Appendix N: Original Coding Key with Interview Questions). An excerpt from one of the color coded interviews can be seen in Appendix O. Codes were added, deleted and expanded through analytic induction depending on what was found during the first round of coding. Then, a second round of color coding was completed on clean hard copies of the interviews with the updated coding key (See Appendix P: Second Coding Key). Both coding keys broke down into three major categories: conventional design process, creative process and attitudes of landscape architects about creativity and landscape architectural education. All of the transcribed and coded interviews can be seen or listened to in Appendices Q to X.

Upon completion of the second round of coding, all of the information from each interview that corresponded with the coding categories was inserted into an analysis matrix. The analysis matrix took information straight out of the interviews and compiled all of the information in one cohesive place.

Then, a matrix was completed for each interview subject in order to clearly organize the information gathered. An example of one of the analysis matrices can be seen in Appendix Y: Example of Single Subject Matrix with Comparison Notes. After the matrix of coded findings from each interview subject was complete, major results were noted in order to find initial overlaps between the themes in each interview. Then, the interview subject matrices were analyzed and compared to find initial themes, expand these themes into subthemes, and identify previously unknown (emerging) themes and sub-themes.

Once two rounds of analysis were completed and themes were found, all of the information was inserted into a new findings matrix that broke down the findings from each subject side by side. The first version of the color coded findings matrix can be seen in Appendix Z: Color Coded Findings Matrix. The first findings matrix was color coordinated in order to show under what themes the five categories of findings occurred. The five categories of findings were: major themes from landscape architects and artists, shared themes

Analysis

weighted towards landscape architects, shared themes weighted towards artists, major themes from landscape architects only, and major themes from artists only. These five categories of themes will be discussed in more detail in Chapter 4: Findings. Relationship of emergent themes and sub-themes from interviews to initial themes and sub-themes from literature review will also be discussed in Chapter 4. Once color-coordinated, the findings matrix was checked twice against the interview data in order to ensure that all of the findings were adequate.

A final matrix was made that simply and clearly showed what topics each interview subject discussed at some point in the interview. The final analysis matrix can be seen in Figure 4.42.

In addition to the analysis matrices, the coded interviews were used to diagram the design and creative processes used by both the landscape architect and artist subjects. By diagramming the process, more findings were clarified relating to personal process. The process diagrams can be seen in Chapter 4: Findings.

Due to the fact that a small sample size was used and the coded information which was coded cannot correctly be presented through statistics, no computer coding software or statistical coding was used to present my results.

Confidentiality

All information obtained through the interviews is public information. The transcribed interviews are published both in Appendices Q to X: Coded Interviews and on the Kansas State University public database K-Rex (http://krex.k-state.edu). All of the subjects who accepted interviews signed an informed consent form which presented the relevant information regarding how the information would be used. In addition, all of the subjects were given the option of remaining unidentified via the signed informed consent form; however, each subject was willing to have their information made public. For more information regarding the confidentiality of the interview content and audio archive, see Appendix AA: Informed Consent Form.

Chapter 3 introduced the worldview, strategies, and methods used for gathering information from both the literature review and open-ended interviews. A grounded theory strategy that focused on constant comparison and analysis supported the use of open-ended interviews with both artists and landscape architects as the most appropriate means of gathering information.

While Chapter 3 presented the criteria used to determine which landscape architects and artists would be interviewed, as well as the procedure used to contact the subjects of the study, Chapter 4

introduces the interview subject profiles. The profiles show who the subjects are as designers and reinforce why they were chosen to interview. Following the profiles, findings are discussed in detail.



Chapter 4

Findings

"Regardless of...incredulousness related to nominations and discussions of a landscape architecture avant-garde, there remains a certain group...of landscape architects and a body of landscape architecture, seen as somehow different from the mainstream, that continues to attract attention from the professional media"

-- Brenda Brown (1991 page #)

Chapter 4 discusses the information obtained through the openended interview and coding methodology discussed in Chapter 3. This chapter introduces the initial findings of the interviews.

Chapter 4 begins with the interview subjects' background information, their personal work and philosophy, and built projects to help paint a picture of who they are as both people and professionals. The background information on the interview subjects comes from both literary sources and the interviews. The information introduces each subject as a highly creative individual, and demonstrates the selection criteria, outlined in Chapter 3, graphically. Any information in the subject profiles that is not cited came from the direct discussion between the interview subject and the author. For more information, the transcribed interviews can be seen in Appendices Q through X. The creative or design process of each interview subject is diagrammed based on how the subjects verbally described their process during the interviews. Each subject's profile section introduces the individual's process diagrams. After each description of the landscape architects and artists, the overlapping themes developed within each individual's interview are discussed. These themes only represent a fraction of the discussions contained in the interviews with each subject. However, the overlapping themes within each interview help to introduce the themes discussed most prevalently by each subject.

The final piece of Chapter 4 is an overview of the themes developed from the interviews. These themes are broken down into five separate groups depending on the number of subjects in each group of landscape architects and artists who discussed the same theme or sub-theme. The "Findings Overview" section (page 80) at the end of this chapter breaks down the five dominant themes.

Interview Subjects Profiles Landscape Architects Mikyoung Kim

Mikyoung Kim began learning about art, specifically ceramics, at a young age from her mother who was a ceramicist (Crandell 2001, 81). As a child, she was very involved in music and played piano from the age of six. Kim began her education at Oberlin College where she minored in piano and majored in sculpture (Crandell 2001, 81). Kim learned about environmental art as an undergraduate while working under environmental artist Athena Tacha (Crandell 2001, 81).

Mikyoung first learned about landscape architecture during a career discovery program at Harvard. She explored landscape architecture because she felt it greatly involved sculpture. Because Kim did not want to be a studio artist who works alone, she went into landscape architecture as a field of art in the public realm (Carlock 2008, 2). Kim's sculpture degree began her interest in a combination of sculptural form with public interface in landscape architecture. Kim believes her relationship with sculpture in landscape architecture is "less about the direct application of form than it is about an ethic of work – one that is studio oriented" (Crandell 2001, 81)

According to its philosophy, Kim's firm, Mikyoung Kim, is committed to the client's interest in relation to the interest of the firm in landscape architecture and art. They work in the private and public realm, specializing in urban parks and planning. Overall, Mikyoung is interested in making people aware of landscape architecture at the everyday scale. She is interested in landscapes that people inhabit 600 times a year; she is interested in the challenge of the everyday. She works to create poetics for people in the trajectory that they take every day in order to engage the user. She works to create transformation within a place in order to keep a space fresh for the visitors so they can continue to find new things and have new experiences. Project examples by Mikyoung Kim can be seen in Figures 4.1 to 4.5. In addition, Kim's design process diagram can be seen in Figure 4.6. Mikyoung Kim's entire interview can be seen in Appendix Q.

Key Interview Themes While Mikyoung Kim spoke on a variety of different themes, three specific themes developed more substantially throughout the interview. First, Mikyoung Kim reiterated the importance of invention with materiality to find what is most appropriate for a given project in her firm's working process. Next, Mikyoung Kim brought up the importance of finding the right clients when proposing creative and artistic design solutions. The final major theme developed in Mikyoung Kim's interview was the idea that instincts and concepts developed in the very beginning of a project are often the most meaningful.

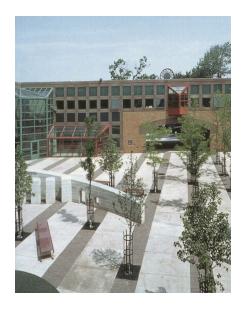










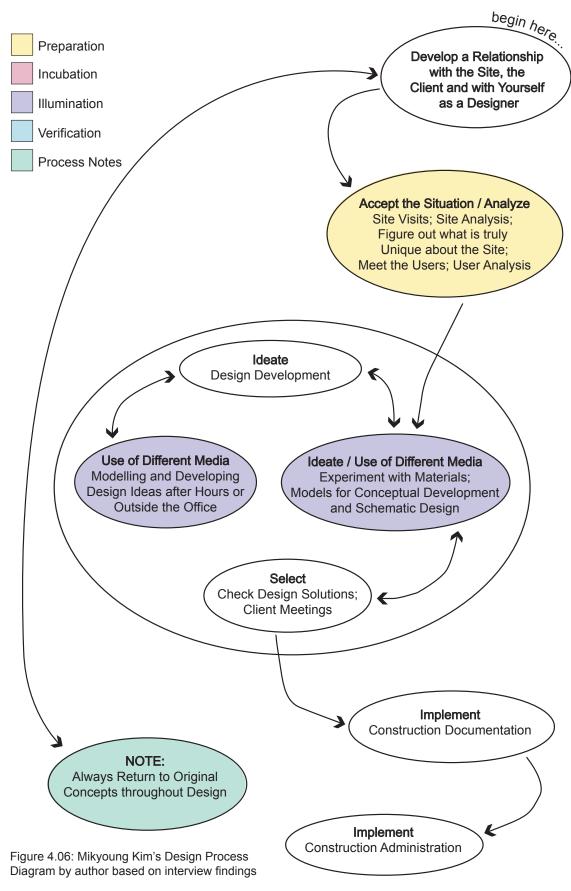
Figure 4.01 (top left): "Moylan Elementary School" (Kim 2003)

Figure 4.02 (top right): "Koomin Life Insurance Training Facility" (Kim 2003)

Figure 4.03 (left): Mikyoung Kim (Kim 2003)

Figure 4.04 (above left): "LG Chemical Research Center Roof Garden" (Kim 2003)

Figure 4.05 (above right): "Lucky Corporation Headquarters Garden" by Mikyoung Kim (Kim 2003)



Thomas Balsley

Thomas Balsley began studying landscape architecture through "following his artistic calling into the study of landscape architecture at SUNY at Syracuse" (Gillette 2001). Balsley is one of three brothers, all landscape architects who received their degrees from Syracuse University. His older brother stumbled into landscape architecture in the conventional way. He, in turn, told Thomas Balsley, who was pursuing another major, about landscape architecture, and Balsley switched over.

Today, Balsley's firms, Thomas Balsley Associates, focuses on a wide range of projects ranging from small, intimate landscapes like small public spaces, small courtyards, or roof terraces to large scale urban plans and the open space and streetscape systems that go hand in hand with new developments. His firm has a complete focus on landscape urbanism. Thomas Balsley Associates has developed a reputation for creating public spaces that "enhance and enrich the lives of individuals and communities who inhabit them" (Sivak 2006, 16). Project examples by Thomas Balsley Associates can be seen in Figures 4.7 to 4.10. Thomas Balsley's entire interview can be seen in Appendix R.

Balsley mostly enjoys working with urban parks and urban waterfronts. He feels these types of projects give him the greatest satisfaction because they represent the greatest challenges. He feels these urban spaces have the potential to touch millions of lives, as well as to enhance urban living. Most importantly, Balsley enjoys these projects because he feels they are an alternative to suburban sprawl. Within his designs, Balsley sets up a friction in design and creates a dialogue between opposing ideas. Balsley designs with a total focus on people. He believes one of the main roles of landscape architects is a combination of client and public responsibility with a "more individualistic vision of artistic expression" (Gillette 2001). He says his concepts begin only after talking with people (Gillette 2001). Balsley's design process diagram can be seen in Figure 4.11.

Thomas Balsley spoke over a wide range of topics; however, he specifically emphasized four themes in his interview. First, Balsley talked about risky and unknown situations as important drivers for his own creativity. Balsley described how he is not a "path of least resistance" type of designer and enjoys a good fight. In addition, Balsley frequently talked about his role in landscape architecture as revolving around urban revitalization. He spoke of working with urban spaces and revitalizing cities as his primary role and primary goal in design. Balsley provided more information regarding education in landscape architecture as well.

Balsley believes teaching students a variety of different processes in school is important in helping students find themselves as designers.

Key Interview
Themes

The final reoccurring theme described in Balsley's interview was an emphasis on forming trust in client relationships, as well as designers being tacticians in order to sell creative and unique designs.







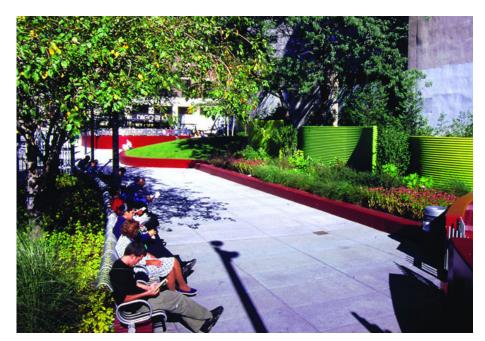


Figure 4.07 (top left): "Gate City Osaki" (Gilette 2001); Figure 4.08 (top right): "Queens West Parks: Gentry Plaza State Park" by Thomas Balsley Associates (Gilette 2001); Figure 4.09 (bottom left): "Gate City Osaki" by Thomas Balsley Associates (Gilette 2001); Figure 4.10 (bottom right): "Balsley Park" by Thomas Balsley Associates (Thomas Balsley Associates 2010)

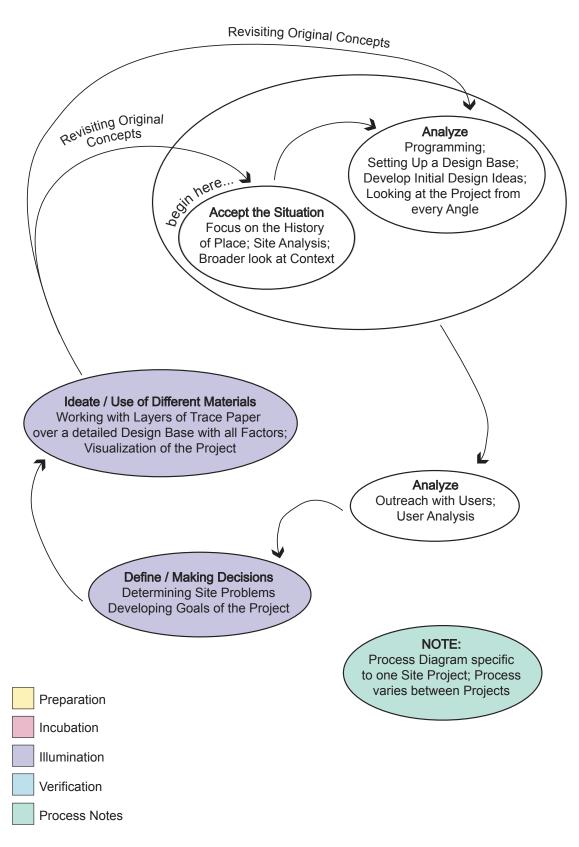


Figure 4.11: Thomas Balsley's Design Process Diagram by author based on interview findings

Claude Cormier

Claude Cormier was born on a farm, beginning his relationship with nature at an early age. Cormier received his first undergraduate degree in agronomy with an interest in becoming a plant breeder. After pursuing agronomy, Cormier quickly realized he did not enjoy the work he was doing at that time. He moved on to earn a degree in landscape architecture from University of Toronto after which he fell in love with design (Comotti, Avers, and Collin 2009). He began to love the notion of cities and drifting from nature and agriculture and culture within the city. Wanting to continue his education, Cormier went on to receive his master's degree in history and theory of design from the Graduate School of Design at Harvard. Cormier feels that studying plant breeding, which is crossing elements together to create something new, has influenced how he designs by taking elements which do not seem compatible and putting them together to invent something new. In addition, Cormier's graduate schooling helped connect theory and history with the fundamentals of design.

Claude Cormier's firm, Claude Cormier Landscape Architects, embraces design that works for "simplicity, boldness and artificiality in recognition of the constructed nature of man-made landscapes, while integrating nuanced historical response to their project's contexts" (Comotti, Avers, and Collin 2009). The work of the firm embraces the idea that the naturalistic approach creates dishonest landscapes and denies the artificiality of design process (Richardson and Schwartz 2008). The role of artificial materials plays a significant role in the work of the firm (Jacobs 2004, 85). All of the projects include an added element of bringing new energy into a place. The firm's use of color plays a major role in bringing that energy to a place. A major aspect of the firm's work is having little time for ecologically based, nature driven design (Richardson and Schwartz 2008). They are committed to exploring the history of a space through representation with artificial materials (Richardson and Schwartz 2008). Projects by Claude Cormier Landscape Architects can be seen in Figures 4.12 to 4.15.

Cormier classifies his work as contemporary landscape architecture (Ball 2009). He embraces a gradient of identity. He practices by taking cues from his background of growing up on a farm and his education through science and history and theory to form the reality of the project. Cormier enjoys projects done for people in general and seeks a more universal quality in projects. He works toward any projects were people can enjoy themselves tremendously. His work employs political agenda mixed with social agenda within a site regulated by different realities. Overall, Cormier enjoys projects that deal with history, ecology, and social structures. Finally, Cormier feels the more complex a project gets the better because difficulty is a strength for him. Claude Cormier's entire interview can be seen in Appendix S. Cormier's design process diagram can be seen in Figure 4.11.

Key Interview
Themes

Claude Cormier developed three themes within his interview that he spoke about on multiple occasions. One of the themes in Claude Cormier's interview was that he primarily designs for the people. He works to create spaces that are interesting and unique but still relatable to the public. In addition, like Kim and Balsley, Cormier talked about the importance of finding clients who respect your vision as a designer in order to be able to evoke more creativity in design. Finally, Cormier strongly embraced the idea that once students learn the conventional or traditional design process, they should break it in order to find their own process. Cormier felt individual process is important to develop because design is a personal process.



Figure 4.12 (above): "Blue Forest" by Claude Cormier Landscape Architects (Claude Cormier Landscape Architects 2010)

Figure 4.13 (top right): "Canada Museum of Civilizations Plaza" by Claude Cormier Landscape Architects (Claude Cormier Landscape Architects 2010)

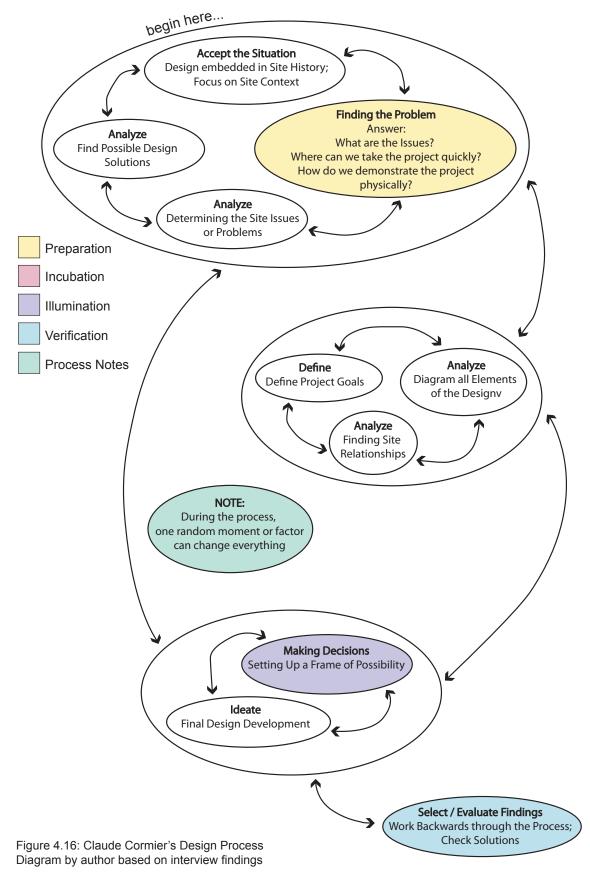


Figure 4.15 (bottom right): "Sugar Beach" by Claude Cormier Landscape Architects (Claude Cormier Landscape Architects 2010)









Peter Walker

Peter Walker has received three separate degrees in landscape architecture throughout his education. His first degree was a bachelor of science in landscape architecture from the University of California at Berkeley. He then went on to complete a graduate study in landscape architecture at the University of Illinois. Finally, he received a master of landscape architecture from Harvard University Graduate School of Design. Before making the decision to study landscape architecture, Walker was going to school to study journalism; however, he quickly learned journalism only incorporated writing, while he wanted to be a publisher. Then, looking through the catalogues at Berkeley, Walker found a major that was 1/4 art, 1/4 architecture, 1/4 landscape architecture and 1/4 general career. While he did not know what landscape architecture was, he decided to take the course. He has been devoted to landscape architecture ever since.

While Walker does not have an "official" background in art, he had always drawn as a kid. Later on in life, he went to several schools including California College of Arts and Crafts where he took courses in different art practices. His interest in art, photography and visual things influence his overall designs. Walker sees his work as being visual research rather than program-dominated (Walker 2005). Practicing for over 50 years, he views the landscape as both "functional space, which is used, and sculpture, which is seen'" (Walker 2005). In addition, Peter Walker is a major player in the relationship between landscape architecture and art (Weilacher 1999).

Walker believes that in the 1970s through the 1990s, his firm, Peter Walker and Partners (PWP), was the most avant-garde in practice. PWP is interested in any kind of landscape. 1/3 of the firm's work is in brownfields. They take old industrial sites and bring them back for recreation and other uses in large parks. Another 20 to 25 percent of their work is in doing rooftops gardens. Finally, the other large portion of work is redoing primarily urban campuses: college campuses, medical campuses, places degraded overtime. Clients hire the firm to go in and redo degraded places and bring them back to a place "where someone can walk around and call it a campus". Overall, the firm is interested in sustainability through design tactics such as making the best use of water, reducing heat with shade, or water circulation. Their work is highly influenced by the climate and lifestyle of the people living in a site area. Project examples by Peter Walker and Partners can be seen in Figures 4.17 to 4.20. Peter Walker's entire interview can be seen in Appendix T. Walker's design process diagram can be seen in Figure 4.21.

The importance of paying attention to the work of other landscape architects, as well as studying general culture was the primary theme mentioned by Peter Walker. Walker presented several reasons why paying attention to the work of other people in your profession is

Key Interview Themes

important. First, looking at the work of others helps determine what works and what does not within projects. Next, it prevents the copying of ideas by increasing awareness of built work and accomplishments in landscape architecture. Finally, awareness gives designers a reference or precedent to learn from in their own work. Walker brought up the theme of awareness of items that effect landscape architecture and creativity on a variety of levels throughout the interview.

Figure 4.17 (top right): "Sony Headquarters" by Peter Walker and Partners (Walker 2005)

Figure 4.18 (middle right): "Toyota Municipal Museum of Art" by Peter Walker and Partners (Walker 2005)

Figure 4.19 (bottom left): "Saitama Plaza" by Peter Walker and Partners (Walker 2005)

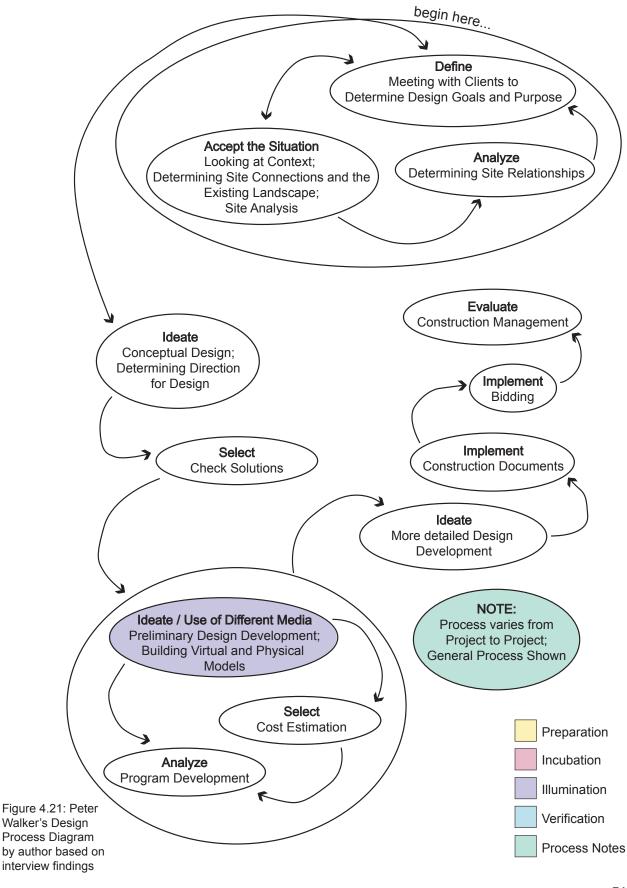
Figure 4.20 (bottom right): "Circular Park" by Peter Walker and Partners (Walker 2005)











Interview Subjects Profiles Artists Ted Adler

Ted Adler admits he became interested in art because he was never good at anything else. He was interested in art from an early age and his friends and family gave him positive feedbacks making him feel like he could do art. He did not start art because of any natural talent but because he was interested in the way of engaging himself and playing with stuff. In high school, art was more a lifestyle choice in that he could be in studio away from certain crowds and teachers. The art studio, for Adler, was a haven from things about life that he was not interested in, helping to reinforce his own formation of what he was interested in doing.

Adler was taught by a variety of types of professors ranging from professors who were very strict and taught that form followed function to those who were more abstract and expressionist. Adler tends to lean towards more abstract and expressionist art in his own work. He received his bachelors from Lewis and Clark College in Portland, Oregon and his master's degree from Ohio University. While doing his post-baccalaureate work, he absorbed many perspectives, selecting what he felt seemed appropriate.

Adler has exhibited work, conducted workshops, and served as visiting artist at numerous ceramic centers and universities in this country and internationally" (Anonymous 2008). Ted Adler is currently the Assistant Professor of Art and Area Head of Ceramics Media at Wichita State University (Anonymous 2008).

Today, Adler classifies himself as a potter. He mainly works with sculptural vessels but his projects take on a range of things. He has explored installations, print-making, and painting, but, in the end, he is a vessel maker. Adler says when thinking of the vessel container there is a relationship with the body and self. Beyond that, Adler's work is about how things come to be, including transformation and metamorphosis. His work includes ideas of fragmentation and being incomplete. Adler believes in portraying life experiences as they truly are, meaning, not so fluid and quite fragmented. Overall, Adler tries to stay grounded in tradition but finds ways to push the envelope. Project examples by Ted Adler can be seen in Figures 4.22 to 4.25. Ted Adler's entire interview can be seen in Appendix U. Ted Adler's creative process can be seen in Figure 4.26.

Key Interview
Themes

Ted Adler developed three reoccurring themes in his interview. The first two themes related to education while the third dealt with overall design. First, like Walker, Adler mentioned the importance of students getting a diverse education. He felt that the diverse education in art he received throughout his schooling helped him to grow as a designer and find his niche in art. Next, Adler spoke of problem solving verses creative problem solving in both education and the professional world. Adler broke down these two types of problem solving saying







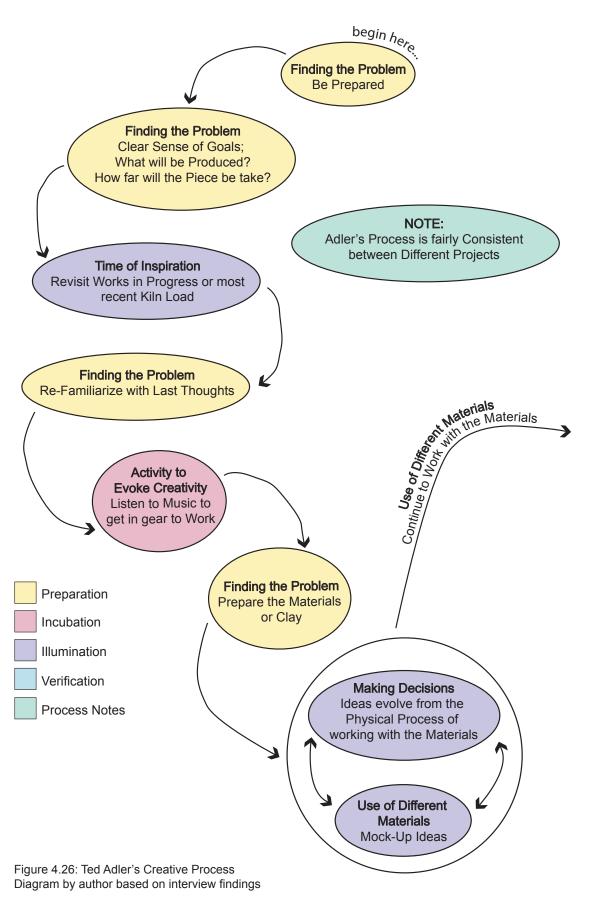


Figure 4.22 (top right): "No Title (Vase Form)" by Ted Adler (Adler 2010)

Figure 4.23 (top left): "Cups" by Ted Adler, 2008 (Provided by Adler)

Figure 4.24 (middle): "Serving Dishes" by Ted Adler (Adler 2010)

Figure 4.25 (left): "No Title (Vessel)" by Ted Adler, 2010 (Provided by Adler)



they are very different. First, he said general problem solving leads to adequacy in design resolutions. Adler believes teachers who educate students through general problem solving only allow those who can excel on their own move ahead and leave other students to find their own way. On the contrary, Adler said creative problem solving leads to design that goes beyond the standard solutions. He said teachers who educate students about creative problem solving engage students on a higher level. Finally, the third theme developed in Adler's interview was how a designer's personal experiences influence every design decision. Similar to Cormier, Adler said even if a designer copies the work of someone else, the work is always going to feel and work differently because experiences of the individual designer drive decisions.

In the beginning, Diana Cooper resisted art because she grew up in an artistic family. She learned about contemporary art and the history of art at a young age because of her parents. At the time, Cooper focused on dance and eventually choreography; however, due to injuries, she had to stop dancing. Art did not replace dance but she increasingly became more and more interested in and aware of the visual arts.

Cooper's education began with a degree in history of literature from Harvard. Then, she started out as a master's student in painting at New York Studio School after taking a break from school following her undergraduate schooling. Later, she moved on from the New York Studio School to Hunter College where she received her master's degree. Overall, Cooper's education was not typical of most art degrees. Because she originally went to school for history of literature, she entered into graduate school without receiving the art education where technical skills were taught. As a result, she finds herself learning through mistakes or figuring an alternative route out for herself because she never learned the proper way of working. She jokes about being allergic to group mentality and the idea that "if you want to get to there this is how you do it". She has found, as she has gotten older, that she has never been that attracted to learning the proper way of doing things.

Cooper's interest in art came from art allowing you to use your imagination, as well as the idea that art has the potential for an emotional depth. Cooper's art focuses on anything that engages the viewer in the decision making process. Her art does not present itself as a closed, impenetrable object. Another thing that comes out of her work is use of different materials, like scotch tape or pipe cleaners, which viewers see as being fragile (Cooper 2007). Cooper's work focuses on experimentation and improvisation using different forms and materials (Cooper 2007). Part of Cooper's work deals with juxtaposing materials to create something seemingly absurd (Cooper

Diana Cooper

2007). Finally, photography increasingly intrigues Cooper as a way to create abstract forms (Cooper 2007).

Throughout her career as an artist, Cooper has been involved in multiple group exhibitions, as well as numerous solo exhibitions both within the United States and abroad. Her work has received a great deal of awards throughout her art career. Finally, she has taught at Columbia University, Cornell University, School of Visual Arts, Virginia Commonwealth University, Princeton University, and New York University (Cooper 2007). Project examples by Diana Cooper can be seen in Figures 4.27 to 4.30. Diana Cooper's entire interview can be seen in Appendix V. Diana Cooper's creative process can be seen in Figure 4.31.

Key Interview Themes

Two themes developed in Diana Cooper's interview including the importance of being aware of and drawing inspiration from the surrounding environment. Environmental effects fell into a variety of different sub-themes within Cooper's interview. For instance, Cooper provided multiple examples of how breaking from studio or paying attention to the elements within the world around you helps to free her mind and inspires her work. Cooper spoke of work environment as having an effect on her as well. In addition, like Mikyoung Kim, Diana Cooper developed the idea that experimentation with materials in design is important. She mentioned experimentation with materials as being an important driver for creativity in her own work because it prevents her from working with materials and forms with which she is already comfortable.





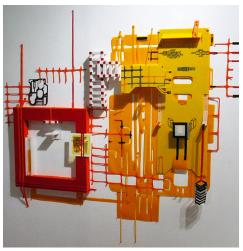




Figure 4.27 (top): "Swarm" by Diana Cooper (Cooper 2007)

Figure 4.28 (middle left): "The Wall by Diana Cooper (Cooper 2007)

Figure 4.29 (middle right): "The Site" by Diana Cooper (Cooper 2007)

Figure 4.30 (bottom left): "All Our Wandering" by Diana Cooper (Cooper 2007)

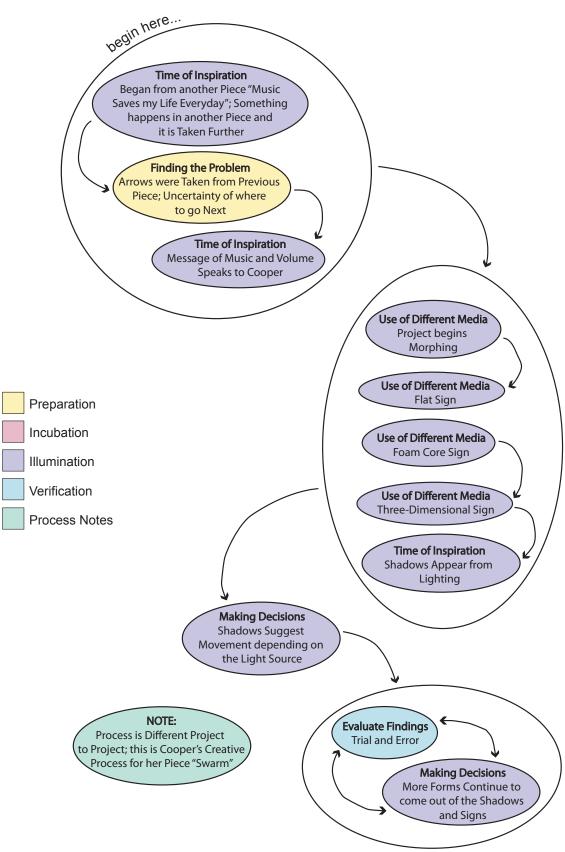


Figure 4.31: Diana Cooper's Creative Process Diagram by author based on interview findings

Del Harrow

Del Harrow first began working seriously n art in high school. He began his art career by taking a ceramics class, learning the activity of throwing on the wheel. In the beginning he found the physical activity and working with his hands very engaging. Harrow received his bachelors at the University of Oregon. He then went to Alfred University where he received his masters in fine arts.

Harrow trained in ceramics but makes sculpture and installations as well. He is very engaged in speculative research, traditional forms, and how things develop. Through his art, he works to create experiences and physical space. He focuses on how simple materials were complicated ideas historically. His work has ranged from reproductions of artwork to pieces about distinct historical movements or figures. Overall, Harrow's art focuses on geometry and different mathematical systems. Within Harrow's work, individual objects are born from form, material, and process (Harrow 2011). In much of his work, it begins as digital models as a tool for developing forms. He believes that subtle textures and marks on an object reveal information about methods of fabrication, as well as the meaning behind different objects. Harrow's Installations draw from both art historical compositions and vernacular spaces. The final installations are "a diagrammatic construction built within the gallery" (Harrow 2011). Projects by Del Harrow can be seen in Figures 4.32 to 4.35.

Harrow is currently an Assistant Professor of Art at Colorado State University. He has also taught at Pennsylvania State University. Del has been an adjunct faculty member at the studio school at Oregon College of Art and Craft. He worked as a Ceramics studio technician at Pacific Northwest College of Art and the Cleveland Institute of Art, as well as been a ceramics studio manager at the Oregon College of Arts and Craft. In addition, Harrow has completed around twenty exhibitions, as well as served as a guest lecturer on multiple occasions (Harrow 2011). Finally, Harrow has worked on collaborative research projects with architects. He worked with a colleague at Penn State University and they researched production methodologies or moving from digital computer models to physical ceramic materials. Del Harrow's entire interview can be seen in Appendix W. Del Harrow's creative process can be seen in Figure 4.36.

Del Harrow discussed three themes multiple times throughout his interview. First, through his experience in working on research projects in collaboration with architecture professors, Harrow emphasized that collaboration between artists and designers yields more creative processes and results for the designers. In addition, Harrow feels it is important to do something physically when trying to get ideas flowing. For instance, Harrow gave the example of going to studio and physically making something or leaving studio and allowing yourself to go for a run or do something besides work on the

Key Interview
Themes

project in order to think through ideas and concepts. Finally, Harrow believes creativity is about making something new and not trying to have everything fit in an existing box. Harrow believes creativity is about trying to see what is really in front of you without simplifying everything and while staying flexible.





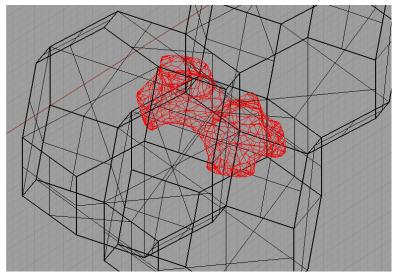


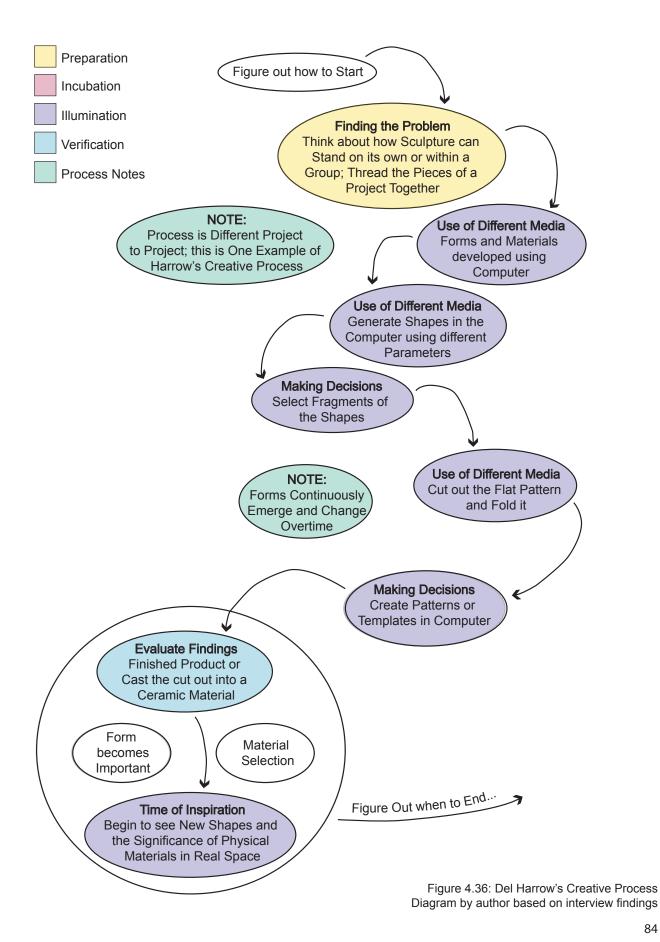
Figure 4.32 (above): "Untitled" by Del Harrow from "Fluid Geometry, Material Topology, Shades of Grey" at the Dolphin Gallery in Kansas City, Missouri, May – July 2010 (Harrow 2011)

Figure 4.33 (top left): "Untitled" by Del Harrow (Harrow 2011)

Figure 4.34 (middle left): Process Image by Del Harrow (Harrow 2011)

Figure 4.35 (below): "Coil Built" by Del Harrow (Harrow 2011)





Lisa Rundstrom

Lisa Rundstrom has always done art since her earliest memories of making and creating things. Lisa believes art and creativity are inherent in all children because they are acting out and playing with things they do not understand. For Rundstrom, art is intuitive. She started out drawing and painting in school, working with whatever medium was available. She remembers growing up in the Midwest in a blue collar family and being very impacted by a cor-ten steel sculpture by Richard Serra that she saw on television; she said she did not understand the sculpture but wanted to know more.

For Lisa, art is about finding the things that are working in life and choosing to invest in those things. Rundstrom has always been interested in process as well. Art was not an immediate decision for her but a narrowing of paths that led her to art. Starting out as an engineering student, she did one semester because she was good at math and science; however, she could not see herself doing engineering for the rest of her life. While she thinks engineering is very creative, she missed a visual aspect of creativity that she feels is not apparent in engineering. After deciding not to continue in engineering, she guit school and worked before going back to school for sculpture. She began by fabricating metal because she sees herself as a structuralist. Rundstrom received her bachelor of fine arts in sculpture at Wichita State University. She then went on to receive her masters in fine arts in sculpture and extended media at Virginia Commonwealth University (Rundstrom 2011). Lisa is currently a fulltime Visiting Faculty at Wichita State University (Rundstrom 2011).

One of the key aspects of Rundstrom's art is a play between structure and deconstruction. Overall, Rundstrom believes there are many ways to address art making. For her, she looks through the guides of different systems of logic and different perspectives by focusing on decay and rebirth because she believes it runs rampant in everything. Rundstrom is concerned with things that have been going on as long as human beings have been alive but with new ideas, new technologies, and new quantities of information that are available. She creates a system just to disrupt it; she makes her work fun and less serious because she is interested in an anti-heroic nature of work. Lisa thinks of process as an investment in research and wanting to understand something and communicate those ideas. She approaches process as encountering a problem and solving it. Project examples by Lisa Rundstrom can be seen in Figures 4.37 to 4.40. Lisa Rundstrom's entire interview can be seen in Appendix X. Lisa Rundstrom's creative process can be seen in Figure 4.41.

Key Interview Themes

Lisa Rundstrom repeatedly discussed three themes in her interview. First, Rundstrom believes personal experience and audience experience is a major part of art making. She said, just as when someone walks into a gallery or looks at a piece of art, when she

walks into a room, she cares about the experience and how the space makes her feel. Next, Rundstrom had similar feelings as Ted Adler in relation to problem solving. She believes problem solving is about figuring out a new equation all together rather than fitting the formula into an existing equation. She is not interested in coming up with something that she already knows. Finally, Rundstrom gave examples on how risks drive creativity. She said that for her personally she can only be creative once she "gets herself out of the way". If there is fear, she said designers have to get rid of it because it is the enemy to creativity beyond anything else.

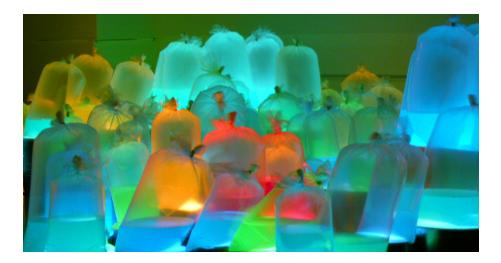




Figure 4.37 (left): "Long Hot Summers, Long Cold Winters" by Lisa Rundstrom, 2007 (Image Provided by Rundstrom)

Figure 4.38 (middle left): "Organic Energy Cloud" by Lisa Rundstrom, 2009 (Image Provided by Rundstrom)

Figure 4.39 (middle right): "Light Rain" by Lisa Rundstrom, 2010 (Image Provided by Rundstrom)

Figure 4.40 (bottom): "Divergence" by Lisa Rundstrom, 2009 (Image Provided by Rundstrom)





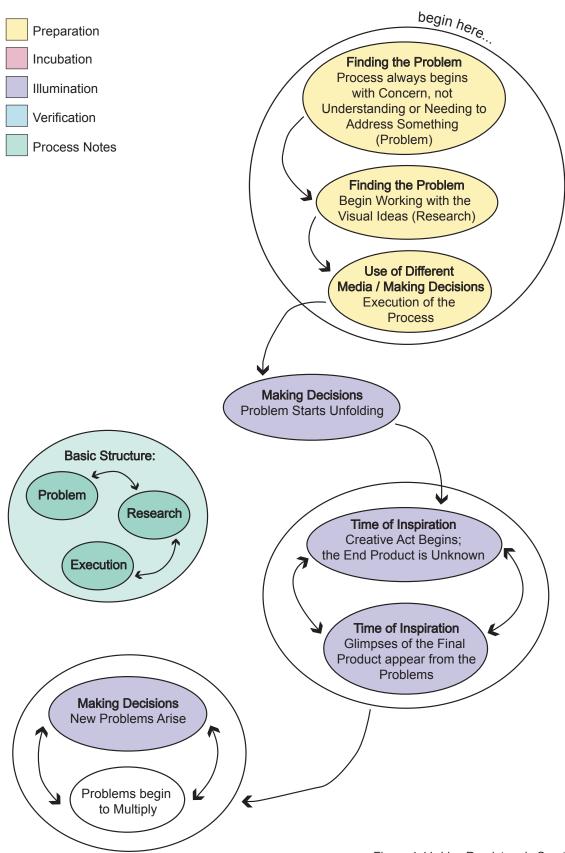


Figure 4.41: Lisa Rundstrom's Creative Process Diagram by author based on interview findings

Findings Overview

Before breaking down the overlaps in themes between the different interview subjects, it is important to draw attention to the methodology used in order to develop the findings. As mentioned in Chapter 3: Methodology, once transcribed, the interviews were coded twice then the coded information was placed in a matrix that broke down the literature review categories, emerging and initial themes and emergent sub-themes. A matrix was developed for each individual interview subject in order to look at the findings side by side. Overlaps between the information provided by the subjects were recorded and checked repeatedly before creating a final matrix of all the overlaps. This final matrix clearly showed which interview subjects had discussed the same ideas, as well as the major overlaps in the information provided by the two separate respondent groups. The steps of analysis taken in order to break down the interview information can be seen in Figure 3.02. In addition, pieces of the individual steps taken during analysis can be seen in Appendices X and Y, as well as the final findings matrix in Figure 4.42.

The findings from the study are broken down into five emergent theme groups. First, major themes from landscape architects and artists represent themes from three to four respondents in both groups. These are sub-themes from the interviews that a majority, or three to four, landscape architects and artists discussed. Next, shared themes weighted towards landscape architects is themes from five or six respondents weighted towards landscape architects. Three or more landscape architects and two artists discussed these sub-themes. Similarly, there are shared themes weighted towards artists which represent five or six respondents weighted towards artists. Three or four artists and two landscape architects discussed these sub-themes. Emergent themes developed that three to four landscape architecture respondents discussed and less than two artists discussed. These are major themes from landscape architects only. Like the themes only discussed by landscape architects, there are themes discussed by three to four artists and less than two landscape architects. These are major themes from artists only. Finally, findings from the relationships between the emergent themes and sub-themes from the interviews and the initial themes and sub-themes from literature review are introduced. Conclusions from the initial or emergent themes and subthemes will be presented in Chapter 5: Conclusions.

Before presenting initial findings, several notes should be made. First, the results of the study do not represent whether or not the subjects agreed on certain topics. For instance, although two of the four landscape architects did not mention the importance of traditional and technical teachings in education, it does not mean they do not see value in both approaches to teaching. The findings represent that two of the landscape architects spoke of the value of the traditional and technical, while the two remaining landscape architect subjects mentioned other aspects of education that they felt were relevant.

			Landscape Architects				Artists			
Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Conventional Design Process	Assumptions and Initial Themes	The creative processes of artists and design process of avant-garde landscape architects are different but both show signs of the psychological phases of creative thinking								
		The design process used by avant-garde landscape architects is a personal process that has evolved since their formal education in conventional processes								
	Assumptions and Initial Themes	The processes used by avant-garde landscape architects are non-linear, creative processes								
Creative Process	Emerging Themes	The creative process consists of many episodes of work, relaxation, and minidiscontinuous insights until final illumination occurs and the design falls into place								
		The creative process is driven by human nature, not organization and planning								

Figure 4.42: Final Findings Matrix by author

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Creative Process Emerging Themes		The idea is to go back and forth between phases until illumination occurs and the final design is developed.								
	Emerging Themes	Creative process is how it revolves solely around the process, not the product								
		Design is not a singular process and changes with each project								
	Emerging Themes	Kinesthetic activity in design development								
Activity to Provoke Creative Thinking		Any activities that allow the mind to think creatively and freely are integral parts of creative process								
Media Used in Design Development	Assumptions and Initial Themes	Avant-garde landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking								
	Emerging Themes	Designers feel freer when drawing								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
		Kinesthetic thinking is important for designers wishing to embrace a more creative process								
Media Used in Design Themes		When designers physically work through problems within a project, rather than immediately entering the information into the computer, their minds stay open								
Role of LA	Emerging	Place making / Making Landscapes								
	Themes	Stop Sprawl / Urban Design								
Dilemmas	Emerging Themes	Sustainability								
		Passion and Personal Interest in Design								
		Confidence in Design								
		Client Trust								
Creativity in Design	Drivers for Creativity	Education and training along are not enough in developing an avant-garde landscape architect; Must be Challenged once Learned								
		Level of Expertise								
		Working Alone								
Creativity in Design	Limitations on Creativity	Traditional or Conventional Thinking								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
		Criticism of Clients and the Public								
		Dependence on a Set Design Process								
	Limitations on Creativity	The computer negatively affects creativity								
		Emphasis on Sustainability								
Creativity in Design		Some People are Creative and Some People are not								
	Factors Affecting Creativity	Environment								
		Reputation or specialization in a specific field								
		Fear of the Unknown and Failure/ Risky Situations								
		Awareness of the Culture, the Profession, and other Subjects								
		Studio Format								
		Accreditation Expectations								
Creativity in Design Education	Limitations on Creativity in Education	Students given environmental information are more inclined to develop conventional methods								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
	Limitations on Creativity in Education	While the computer is a great asset in several aspects of design, it limits the creativity that needs to be present throughout design development								
Creativity in Design Education	Changes to Encourage Creativity in Education	Creativity, flexibility, originality and elaboration should be encouraged from students								
		Direct changes to the accreditation standards expected of accredited landscape architecture programs								
Creativity in Design Education	Changes to Encourage Creativity in Education	Teaching students about the principles of art and other Disciplines								
		Shift focus on computer use back to the sensory realm of design so students can begin to rediscover themselves as designers; Bringing back and encouraging the use of kinesthetic								
		Introduce students to many process perspectives								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Creativity in Design Education	Changes to Encourage Creativity in Education	Encouragement of original ideas; Encouraging students to pursue new ideas regardless of feasibility; Encourage students to be spontaneous when working through ideas								
		Aid students in learning how to verify themselves and their ideas as designers								
		Adopt Creative Problem Solving								
	Emerging Themes on Education	The design process is a personal process that evolves even after formal education								
		Traditional and Technical Aspects of Education are Important								
		Design education needs to better prepare students for working with real clients in selling their designs								
Relationship of Art and Landscape Architecture		Artists and landscape architects are both problem solvers								
	Similarities between Art and Landscape Architecture	The primary role of both artists and landscape architects is developing or finding something that has never been done before								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
		Focusing on traditional aspects of design is imperative to both groups								
	Similarities between Art and Landscape	Both incorporate personal expression in design								
Relationship of Art and Landscape Architecture	Architecture	Both are influenced by the audience surrounding the designers that constantly pushes and pulls seeking satisfaction								
	Differences between Art and Landscape Architecture	Landscape architects have clients with expectations and time and financial constraints; artists can concentrate on what they feel is most interesting								
		Landscape architects must work in the real world, making things realistic and functional and artists do not								
Avant-Garde	Emerging Themes	Avant-garde refers to the concept of invention, originality and application of new approaches and techniques								
		Creativity is vital because the moment a design is implemented, it can no longer be avant- garde								

Categories from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Avant-Garde		Copying past designs and traditions or using others' design solutions is not an option for the avantgarde								
	Emerging Themes	Avant-garde strives for complete creativity over design that is driven by society and past traditions								
		Avant-Garde as a form of Rebellion								
Value of Artistic and Creative Thinking	Value of Creative Thinking and Process	A Hybrid Creative and Conventional Design Process would be Valuable to Landscape Architecture								
	Value of Approaching Landscape Architecture as Art	Personal expression and experiences embraced to understand real life experiences								
		Overall thinking that design is limitless; Artists do not allow basic dilemmas to keep them from thinking creatively								
	Value of Creative Thinking and Process	Creative thinking would help spawn new design solutions								

The results of the study assumedly show what the subjects feel are important aspects of the initial themes.

Secondly, on several occasions, the same emerging sub-themes came up as both a driving factor for creativity and a limiting factor for creativity. For the purposes of the study, the emerging sub-themes that fell into both emerging themes will be referred to as "factors that influence creativity". In several instances, both the artists and the landscape architects felt certain sub-themes could either limit or drive creativity depending on the individual circumstances of the project.

Major Themes from Landscape Architects and Artists: Creative Process, Design Process, Kinesthetic Activity, Fear of Unknown, Tradition Themes from three to four respondents in both groups include:

- All but one subject employed the psychological phases of creative process, although each subject's process was very different.
- The processes used by the landscape architects showed several similar elements of a traditional design process; however, each person carried out the stages of the design process in different orders and spoke specifically about the stages that they felt were most important in design.
- The design process changes from project to project.
- Any activities which allow the mind to think creatively and freely, even beyond kinesthetic activity during design and in studio, are integral parts of creative process.
- Fear of the unknown, as well as failure, limit creativity for many professionals but their personal creativity grows from fear of the unknown and failure.
- It is important to teach both the traditional and technical aspects of design in both landscape architectural and art education.

The first set of emergent themes were found after diagramming the design process or creative process of each subject. After diagramming the process of each subject, the results showed that all but one subject employed the psychological phases of creative process, although each subject's process was very different. The individual process diagrams can be seen in the subject profiles at the beginning of this chapter.

Next, the processes used by the landscape architects showed several similar elements of a traditional design process; however, each person carried out the stages of the design process in different orders and spoke specifically about the stages that they felt were most important in design. Overall, the artists had a more difficult time talking about their creative processes. While they were able to give a general overview of their ideas, Diana Cooper was the only artist who could clearly define her design process (see process diagrams).

Similarly, three to four of the subjects in both groups stated that the design process changes from project to project. In addition, while pieces of the process are obligatory for design and apparent in each project process, the overall process and the way it is approached is different for each project, and more importantly, each individual.

Furthermore, most agreed that activities which allow the mind to think creatively and freely, even beyond kinesthetic activity, during design and in studio, are integral parts of creative process. Ted Adler said he primarily uses music to evoke creativity saying, "...A little music always helps. Usually if I have a hard time getting started it's... something a little more hardcore and then once things really get going I will switch over to jazz... Something that keeps the thinking going". Activities to evoke creative thinking ranged from going to museums to listening to music to simply being aware of the world around them.

Two major themes developed directly from the analysis of the interview dialogue. One ironic overlap from the study was more than five of the respondents feel fear of the unknown, as well as fear of failure, limit creativity for many professionals, but their personal creativity grows from fear of the unknown and fear of failure. For instance, Thomas Balsley said, "I'm not a path of least resistance kind of person, so I think my personality comes out where I enjoy a good fight". Similarly, artist Lisa Rundstrom discussed how she used to see fear of the unknown and confusion as a block to creativity; however, today she sees the value saying, "The idea is to not stop myself. If there is fear, get rid of it. It's the enemy beyond anything else... I used to not know what was going on with my work. I was really confused about it sometimes... [Now] I wish I was more confused because sometimes I think I want to make something and I feel like I know exactly how to make that because I have made so many things now..." Most of the respondents agreed that when they are working through a design and ideas or solutions come too easily, they are not making something new.

Another sub-theme discussed by more than five of the respondents was the importance of teaching the traditional and technical aspects of design in both landscape architecture and art education. The two groups of subjects had different opinions on what is "traditional" and what is "technical". Artists used the term "technical" and landscape architects said "traditional"; however, they mean the same thing across different disciplines. When artists spoke of the technical process; they were talking about the actual act of making. When artists were speaking about the traditional, it was in terms of final products. For instance, Lisa Rundstrom explained the value of her education saying, "I was taught a very technical process. I was taught design principles... the formal elements of design and the elements of form in painting or sculpture. I believe that gives us language more than anything else. Then I learned craft... I learned how to weld every

kind of metal that I know about that is weld-able. I learned building processes and then... I could make anything I wanted".

Landscape architects, on the other hand, spoke of their education in terms of whether or not the process they learned was a traditional or creative and answers were more theory based. Balsley spoke of the importance of more traditional or conventional teaching saying, "Certainly, the more conventional aspects of the design process, of the creative process, have to be there. That's the foundation of it all. It wouldn't be the conventional approach if it didn't have a reason for being what it is. But it does not mean to say that it can't be improved upon and made better." Similarly, when asked about process in education, Peter Walker said, "I don't think you do things on your own. In a way, there's nothing new under the sun. It may seem new but it has reference to something and I think it's important that you know what those references are".

The majority of both the artist and landscape architect subjects acknowledged and discussed a variety of similar topics. As described, the overlaps in the thoughts of landscape architects and artists including emerging sub-themes in design process, kinesthetic activity, fear of the unknown and failure affecting creativity and the importance of teaching technical or traditional aspects of design in education.

Shared Themes
Weighted towards
Landscape
Architects:
Awareness

One emergent sub-theme came out of the interviews on which three to four landscape architects acknowledged and two of the artist subjects acknowledged. Although using the results of only two of the artists does not represent a majority, it does represent an overlap from artists about what landscape architects feel drives creativity. This sub-theme is:

Awareness of culture on a variety of levels drives creativity.

One emergent sub-theme came out of the interviews on which three to four landscape architects acknowledged and two of the artist subjects acknowledged. Although using the results of only two of the artists does not represent a majority, it does represent an overlap from artists about what landscape architects feel drives creativity.

The emergent sub-theme that three to four landscape architects acknowledged and two of the artist subjects acknowledged as driving creativity is awareness of culture on a variety of levels. First, the landscape architects frequently discussed the importance of paying attention to culture in the surrounding world in order to inspire creative thinking. Part of the awareness of culture related directly to being aware of what is happening or has happened in landscape architecture. Walker and Cormier both believe when students and professionals are not aware of the work of other designers, they

are likely to repeat something that has already been accomplished. Walker and Cormier both believe designers must pay attention to culture and landscape architecture, as well as anything that informs or educates about design. Cormier said, "Pay attention to general culture other than just landscapes. I would say even better is to pay attention to [general culture], but pay attention to the outside world of landscape, it's great, absolutely". In addition, the landscape architects expressed the importance of art in design. Similarly, Cormier and Walker both discussed the role of art in directly influencing or inspiring their designs.

Three to four landscape architects acknowledged and two of the artist subjects agreed on only one emerging sub-theme; general awareness of culture, landscape architecture and a variety of subjects drives creativity. Next, the themes that evolved from a majority of respondents weighted towards artists will be discussed.

On the opposite end, two emerging sub-themes developed from the interviews that three to four artists acknowledged and only two of the landscape architect subjects acknowledged. As mentioned before, although using the results of only two of the landscape architects does not represent a majority, it does represent an overlap between the thinking of artists and landscape architects.

Shared Themes
Weighted towards
Artists: Hybrid
Process, Avant-Garde

- A hybrid creative and conventional design process for both landscape architects and artists would be valuable for designers because it allows for more flexibility and creativity in design.
- The avant-garde refers to the concept of invention, originality, or application of new approaches and techniques.

First, three to four of the artist interview subjects agreed that a hybrid creative and conventional design process for landscape architects and artists would be valuable because it allows for more flexibility and creativity in design. Diana Cooper spoke of the value of a creative process to her own design saying, "Visual art and drawing... led me into the work and into a different mind set. It created a connection between how my mind works and wanders and drawing or mark or form making". Adler too spoke of the importance of creative process in everyday life saying, "Anybody who does what they do and does not have the occasional gift of having those 'ah-ha' moments... well... it's that feeling that the metaphor describes. It's a shame for anybody who goes through life without having that feeling". Thomas Balsley, one of the two landscape architects who agreed that a hybrid creative and conventional design process would be valuable, said, "What your describing, this hybrid... or a new, more progressive approach... if everyone were introduced to that and plugged into it, I think we'd see extraordinary results... It seems to me it can only just get better".

The fact that the avant-garde refers to the concept of invention, originality, or application of new approaches and techniques is the second emerging sub-theme resulted from the artists. The responses when asked about the avant-garde were quite different and varied across the board; however, one aspect of the avant-garde that three to four of artists and two of the landscape architect subjects did mention was the concept of people who worked toward originality and new ideas.

Three to four of the artists' and two of the landscape architects' interviews contained two emerging sub-themes about a hybrid conventional and creative process being of value to design students and the avant-garde referring to concepts of originality. The next group of themes that will be discussed are themes occurring in only three to four landscape architect interviews.

Major Themes from Landscape Architects Only: Design Process, Creative Process, Roles, Clients, Studio Format Changes, Education Sub-themes emerged from the study that did not always overlap with both groups. Distinct lines developed between emerging sub-themes that three to four the landscape architects clearly mentioned and only one or no artists mentioned.

- The design process used by avant-garde landscape architects is a personal process that has evolved since their formal education in conventional processes.
- The processes used by avant-garde landscape architects are nonlinear, creative processes.
- Landscape architects see the value in kinesthetic activity or any activities that evoke creative thinking throughout design process.
- The landscape architects feel their role revolves around placemaking or simply making landscapes.
- Clients affect creativity.
- Clients who will not think creatively or work towards unique products limit creativity.
- The studio format used by many universities limits creativity.
- Changes need to be made to the way students are taught the design process.

Part of the division weighted to only three to four of landscape architects was due to questions in the interviews asked specifically to landscape architects and not of the artists; however, several of the differences were a result of differing opinions. To begin, three of the initial themes from literature review, introduced in Chapter 2, were supported by the interview results with the landscape architects.

First, three to four landscape architect subjects thought they used a personal process that has evolved since their formal education in conventional processes. Balsley spoke of his process education saying, "I would say, 'No we were not taught the process' and one can say, 'Well you weren't taught it because it is a very personalized process'. In addition, Cormier said, "I guess I was taught a very traditional process which I think has merit because once you've got it, you can break it. It's a starting place and I think process is important and you have to be aware of it and you need one and you have to understand it". Mikyoung Kim, on the other hand, acknowledged that she learned "pieces of it [the process] in school", while Peter Walker said everyone has to start somewhere in school because everything that is done refers to something else.

The second emergent sub-theme is that processes used by avantgarde landscape architects are non-linear, creative processes. While each landscape architect did not directly say they used a non-linear process, after diagramming out each subjects' process, it was apparent that their processes were non-linear and employed the psychological phases of creative process.

Next, landscape architects see the value in kinesthetic activity or any activities that evoke creative thinking throughout design process. The avant-garde landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking. Mentioned earlier, a variety of media ranges from hand graphics to computer modeling to landscape architects, like Mikyoung Kim, who use any materials that most clearly represent the site and project. Mikyoung Kim discussed her use of different materials saying, "I think we're always trying to invent with materiality. Trying to find new materials, more innovative materials to experiment with and that is the role that a lot of our art projects play... when I'm making models, when anyone is making models, we really try to figure out what is the best material to use to represent what we are doing... We just try to find the most appropriate materials for the materials we are actually using". While Mikyoung Kim gives a detailed overview of how they choose their materials throughout the design process, Claude Cormier spoke more vaguely about the different materials his firm uses saying, "[We use] just the normal tools that we have which is all the programs that you have in your computer, sketches, using precedents, and also mixing precedents together; that shows where you start and where you're going" (see process images for each landscape architecture subject in Figures 4.43 to 4.50).







Figure 4.43 (above top): Sol LeWitt Museum Process Model by Mikyoung Kim (Kim 2003)

Figure 4.44 (above bottom): Kyobo Life Insurance Headquarters Process Model by Mikyoung Kim (Kim 2003)

Figure 4.45 (left): Boston Wharf District Artery Project Process Models by Mikyoung Kim (Kim 2003)



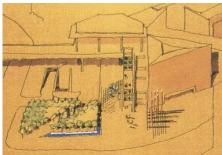


Figure 4.46 (left): Balsley Park Process Model by Thomas Balsley Associates (Gilette 2001); Figure 4.47 (right): Gate City Osaki Process Drawing by Thomas Balsley Associates (Gilette 2001)







Figure 4.48 (left): Balsley Park Computer Model by Thomas Balsley Associates (Gilette 2001); Figure 4.49 (right): Sugar Beach Concept Drawings by Claude Cormier (Claude Cormier Landscape Architects 2010)





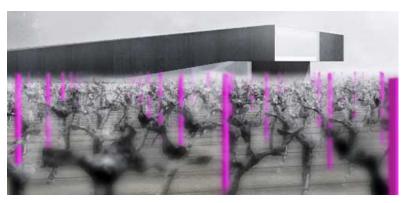


Figure 4.50 (above left): Sugar Beach Concept Plan by Claude Cormier

Figure 4.51 (above right): Place D'Youville Concept Plan by Claude Cormier Landscape Architects

Figure 4.52 (left): Jordan Winery Concept Drawing by Claude Cormier Landscape Architects (Images from Claude Cormier Landscape Architects 2010)



*O*O*

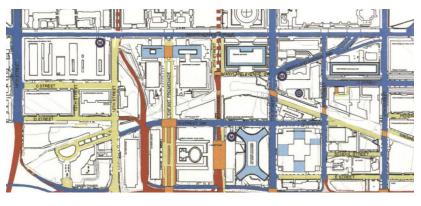




Figure 4.53: Sony Center Process Model by Peter Walker and Partners (Walker 2005)

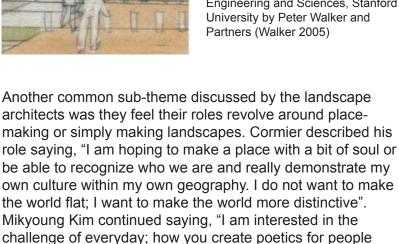
Figure 4.54: Civic Park of Martin Luther King Jr. Promenade Computer Rendered Plan by Peter Walker and Partners (Walker 2005)



Figure 4.55: Southwest Federal Center Diagram by Peter Walker and Partners (Walker 2005)

Figure 4.56: Hand-Drawn Vignette for Clark Center for Biomedical Engineering and Sciences, Stanford University by Peter Walker and Partners (Walker 2005)

Figure 4.57: Hand-Drawn Vignette for Clark Center for Biomedical Engineering and Sciences, Stanford University by Peter Walker and



when they are going to work in that trajectory that they take every day". Finally, Peter Walker said, "My role, as I see, is making landscape. I'm interested in making landscapes

that are memorable and can last through time, they are important to the institutions that mission them. They make the place important". While this seems an obvious answer, only one of the four landscape architects mentioned sustainability or environmental concerns as part of their role. In fact, "social sustainability" was mentioned on more occasions than "environmental sustainability". The fact that a majority of these landscape architects did not mention the stereotypical role of landscape architects as "saving the planet" through environmental and ecological services will relate later to how half of the landscape architects felt too much focus on sustainability and LEED limits creative thinking. While each landscape architect described their role differently, all three mentioned spoke of making places or landscapes.

Another emergent sub-theme between only the landscape architects was clients having an effect on creativity. The landscape architects felt client trust specifically drove creativity. Furthermore, three to four of the landscape architects felt that without the trust of clients, they would not be able to be creative in their design solutions. The landscape architects felt one aspect of client trust was being able to sell a project by building relationships with clients. Thomas Balsley spoke of the need for landscape architects to be tacticians to be able to convince clients that their creative ideas are worth building. In addition, Balsley spoke of his firm's strategy for developing client trust saying, "For us, we really put together a task force and committees are setup so we can develop a dialogue with the people and earn their trust and show them we are listening... and want to hear everything they have to say. We have found that when we do that, they, in turn, give us the trust and artistic license that we need to really turn it into an excellent design space".

Related to client trust, the landscape architects discussed clients who will not think creatively or work towards unique products as limiting creativity. More specifically, the criticism of clients, as well as the public who are focused only on aesthetic concerns was brought forward as a limiting factor for creativity. Claude Cormier spoke of clients and general people who are "afraid of everything" and the difficulty in selling new ideas to those clients. Mikyoung Kim explained client relationships as being either limiting or driving factors for creativity best saying: "We have clients who we go to for projects and they are very impatient and say, "We just want something, we don't want to go through all the stuff". And we know right away that it is not the right match and it's nothing personal on either end. We are just very straightforward upfront in who we are and how we work and some people really love it. They love being a part of it and they feel like they're creative too and that is a lot of fun for us."

Emerging sub-themes about education were discussed by three to four landscape architects on a variety of different levels. Most commonly, the landscape architects discussed what needed to

change in order to encourage creativity in design education, limits upon creativity, and the development design processes used by students. The first emergent sub-theme on limiting creativity was the studio format used by many universities. Mikyoung Kim showed concern for the strategy professors or programs use for grading or judging student work. She said studios with strict regulations that result in every student's work looking the same still represent an old-fashioned way of teaching. Overall, this old fashioned program relates to a standardization in the way students are taught rather than creativity within studio formats. Cormier said he believes in structure along with an open studio format in education saying, "I am sure there is a kind of way to have an open format in which you can have your creative impulses, as well at the same time, that you're learning the ABCs of the landscape architecture world. I think that is a more open format. I would hope that you would start right in the beginning with doing that but I think it needs a certain structure". Balsley talked about this personal experience in hiring newly graduate students for his firm saying it is apparent that most studios in school are not interested in design process but rather focus on final products. He said that emphasis on design is becoming less apparent as time passes.

Also related to studio format, emergent education sub-themes focused on the way design process is taught to students. To begin, Cormier said the traditional format in school is for students to move from analysis to defining a problem to concept development to design. Three to four of the landscape architects agreed that most students are only taught one process, similar to that described by Cormier. Furthermore, three to four of the landscape architects believed introducing students to a variety of design process would result in more creative thinking because, as both Walker and Cormier stated, by teaching students multiple processes, they can more quickly find their place as designers in landscape architecture. Each of these emergent sub-themes relate back to the initial theme that the design process is a personal process that evolves after formal education.

The themes that rose out of the discussion with landscape architects provided more overlapping themes than any other category. The emergent sub-themes consistent among three to four of the landscape architects covered a range of categories and showed overall that the landscape architect subjects had similar thoughts overall. Next, the themes that emerged from the interviews that only three to four of the artists brought up is presented.

In addition to the themes discussed only by three to four landscape architects, two sub-themes emerged that only three to four artists discussed. These themes from only three to four of the artists related to factors affecting creativity and the relationship between art and landscape architecture.

Major Themes from Artists Only: Environmental Influences, Roles

- Work environment affects creativity in some way.
- Both artists and landscape architects work to solve problems.

To begin, three to four of the artists stated that the work environment affects creativity in some way. Either three to four of the artists spoke of a distinct working environment in which they thrive or simple aspects of a work environment that affect overall creativity in design. Related to specific work environments, Lisa Rundstrom acknowledged that she has to be alone when working because if she is in an environment with any distractions, she cannot work. Similarly, Diana Cooper discussed an instance when she was working on her project "Swarm" and the room she was working in was large making it very intimidating at first; however, then the room became very inspiring. Finally, Ted Adler addressed specific elements within a working environment as affecting creativity saying, "There's a [professor] in Ohio. John Balistreri... and he took out all of the shelves in his studio. You think, 'We have shelves everywhere,' and if you look into the ceramics studios, there are shelves everywhere. Well he cleared them out because if you have shelves that are 9 inches tall then you're going to make things that are 9 inches tall. Whereas, if there are no shelves, you might make something 9 inches or you might make something 9 feet. We are affected by the choices we make about our environment." Overall, three to four of the artists agreed that both the physical and mental aspects of their work environments affect them.

Another emergent sub-theme that three to four of the artists discussed was both artists and landscape architects work to solve problems. To begin, Del Harrow defined art as "really good problem solving without necessarily having a problem". Rundstrom agreed saying that artists are problem solvers; however, many times, they create the problems themselves. Rundstrom approaches all art as encountering a problem and solving it. She related problem solving in art to science because art problem solving is not about having an answer and trying to fit the formula into the equation, it is about creating a new equation all together in both art and science. Adler too related problem solving in art to researchers saying both look for existing knowledge and apply it in a new way. He continued saying artists do not have a distinct set of operations for problem solving. He specifically speaks of creative problem solving as being more beneficial to an individual's success over basic problem solving. According to Adler, both artists and landscape architects, as well as any other profession, can do an adequate job through basic problem solving but if they want to go above and beyond, creative problem solving is key.

Few themes unique only to artists rose out of the interviews. The only two consistent themes that emerged out of the artist interviews, and were not also found in landscape architect interviews, were how environment can affect creativity and that landscape architects and artists share a common role in problem solving.

The final set of themes that will be broken down are emergent themes not described by more than two respondents but Introducing relevant or surprising results. The final analysis is the relationship of emergent themes and sub-themes to initial themes and sub-themes from literature review. While these findings are not discussed in terms of how many of each respondent group discussed the topics, the themes reveal what information is new to the study and was not previously found in literature review and discussed in Chapter 2: Background. In some cases, these relationships provide further support for the information found in literature review based on similarities between what the interview subjects discussed and what was found through the background research. The themes that will be discussed include: fear of the unknown or fear of failure and creativity, the role clients play in limiting or encouraging creativity, the affect of specialization or reputation on creativity, the role of the computer in design development, the affects of environment on creativity, and general thoughts on education in landscape architecture.

Relationship of Emergent Themes and Sub-Themes from Interviews to Initial Themes and Sub-Themes from Literature Review

Fear of the unknown or fear of failure have been discussed as both limitations and assets to creative thinking. In the interviews, three or four respondents in both the artists and landscape architect groups felt fear of the unknown, as well as failure, limit creativity for many professionals but their personal creativity grows from fear of the unknown and failure. Similarly, in Maslyn's study with creative landscape architects in the Denver area, one of the findings said creativity occurs when landscape architects are in unstable, risky situations (Maslyn 2002, 134). Murphy said challenges stimulate creative thinkers who enjoy a good fight (Murphy 2005). On the contrary, fear of the unknown as a limitation on creativity was discussed by Steven Krog. Steven Krog writes about how design process does not guide designers on where to take their projects throughout the process which is frequently perceived as an obstacle to design (Krog 1983, 58). According to Krog, when designers try to avoid these obstacles and other unknowns, they lose creative thinking (Krog 1983, 58). Krog argues that the process of avoiding the unknown only works for functionality and will never work to create innovative, exciting places (Krog 1983, 58). When looking at these precedents for fear of the unknown or risks as affecting creativity, the landscape architects deemed creative by either their peers, as well as artists and highly creative landscape architects used for the study embrace the unknowns as drivers for creativity; however, sources used in literature review perceive the unknowns as obstacles to creative thinking.

Another emergent and initial theme frequently discussed by the subjects and found in the literature review is clients as either limiting or encouraging creativity. The landscape architect interview subjects felt client trust specifically drove creativity because without the trust of clients, they would not be able to be creative in their design solutions.

Again, in Maslyn's study, the landscape architects felt that many times clients, collaborators, and colleagues provide positive opportunities for avant-garde designs (Maslyn 2002, 134).

The landscape architects, as well as the sources used in literature review, also discussed clients who will not think creatively or work towards unique products as limiting creativity. More specifically, the landscape architect subjects felt criticism of clients, as well as the public who are focused only on aesthetic concerns, limits creativity. Similarly, according to the research, the criticism of clients and the public frequently constrain creative thinking because they primarily focus on a single dimension of the design (Crewe and Forsyth 2003, 37). For instance, the public sees avant-garde designs as being dangerous to society, dubbing designers who embrace the avant-garde as "outsiders" (Goswami and Goswami 1999). Both the interview subjects and the sources used in literature review support clients as both limiting and driving factors for creativity in design.

Thoughts on the affect of specialization or reputation on creativity were brought forward in both the interviews and the literature review sources as well. According to some interview subjects, a positive reputation or specialization in a specific field drives creativity because their work is embraced more freely by the public; however, other interview subjects felt specialization or reputation limit creativity because the artist or landscape architect becomes too comfortable in their work making them lose the unknowns and challenges that drive their creativity. In addition, interview subjects felt with specialization or reputation brings forward clients who begin to assume too much about design and design products looking for replicas of work that has already been accomplished by an individual or firm which limits the opportunity for creative thinking. In Maslyn's study, specialization in a specific field of landscape architecture was determined as the only limiting factor discussed by the creative landscape architects (Maslyn 2002, 134). Specialization was addressed as a limitation on creativity in Maslyn's study because designers become too wrapped up in very specific interests (Maslyn 2002, 134). As introduced earlier, Maslyn guotes Todd Siler, artist and author, who said, "Throughout life we tend to build mental barriers as we become specialized... in our interests. These self-imposed barriers disable our natural ability to... see relationships between things, thus causing our minds to work less efficiently and creatively" (Maslyn 2002, 134).

The role of the computer in design development also emerged in both the interviews and the research. The landscape architect interview subjects use a variety of media through both kinesthetic and technological design development. Several of the subjects believe anything that allows an individual's mind to think freely, especially kinesthetic activity, is vital in creative design and kinesthetic activity is important in developing creativity. This is not to say that the

landscape architect subjects think the computer limits creativity, they simply all saw the value in working with their hands during conceptual design. The results of the Tai's survey with over a hundred landscape architects also presented feedback on the use of the computer including 25.5 percent believed the computer helped creativity and 45.1 percent said the computer had no affect on creativity and 29.4 percent said the computer hindered creativity (Tai 2003, 113).

Three of the interview subjects felt use of the computer limits creativity in design. These limitations ranged from designers losing ides about design from working solely in the computer, to the time commitment needed when trying to work design concepts into the computer, to the value of seeing materials and concepts in real scale over looking at materials and concepts in the computer. The literature review presented several arguments for why the computer can limit creativity as well. According to the research, the computer has become a primary form of communication and production causing designers to develop a reliance on technology (Lawson 2004; Tai 2003, 113). The formation of once apparent relationships between design and site are lost when designers develop a total reliance on the computer to help design (Hunt and Kingery-Page 2010; Pallasmaa 2009). The limited amount of kinesthetic design development in an office through hand drawing, model building, and other artistic means of using different media results in less opportunity for creative thinking (Pallasmaa 2009; Corner 1992, 144). In addition, Tai's personal interviews with landscape architects said that many of the landscape architects thought the computer negatively affected creativity and the designers felt freer when drawing (Tai 2003, 113).

The affects of different types of environment on creativity was discussed in both the study interviews and the research. The interview subjects believed work environment affects creativity in some way. These environments ranged from distinct working environment in which they thrive or simple aspects of a work environment that affect overall creativity in design. Two of the interview subjects spoke specifically of the importance of being alone when they work. The research also supported the importance of individual work mentioning that in many ways, creative thinking is limited when working in groups because creativity is a solitary activity (Hunt and Kingery-Page 2010). According to Krog, workspaces affect design by landscape architects and artists (Krog 1983, 58). For instance, if a landscape architect or artist works in busy or chaotic offices or studios, they produce little work of genius, while artists and landscape architects who work alone produce more creative and holistic designs (Krog 1983, 58).

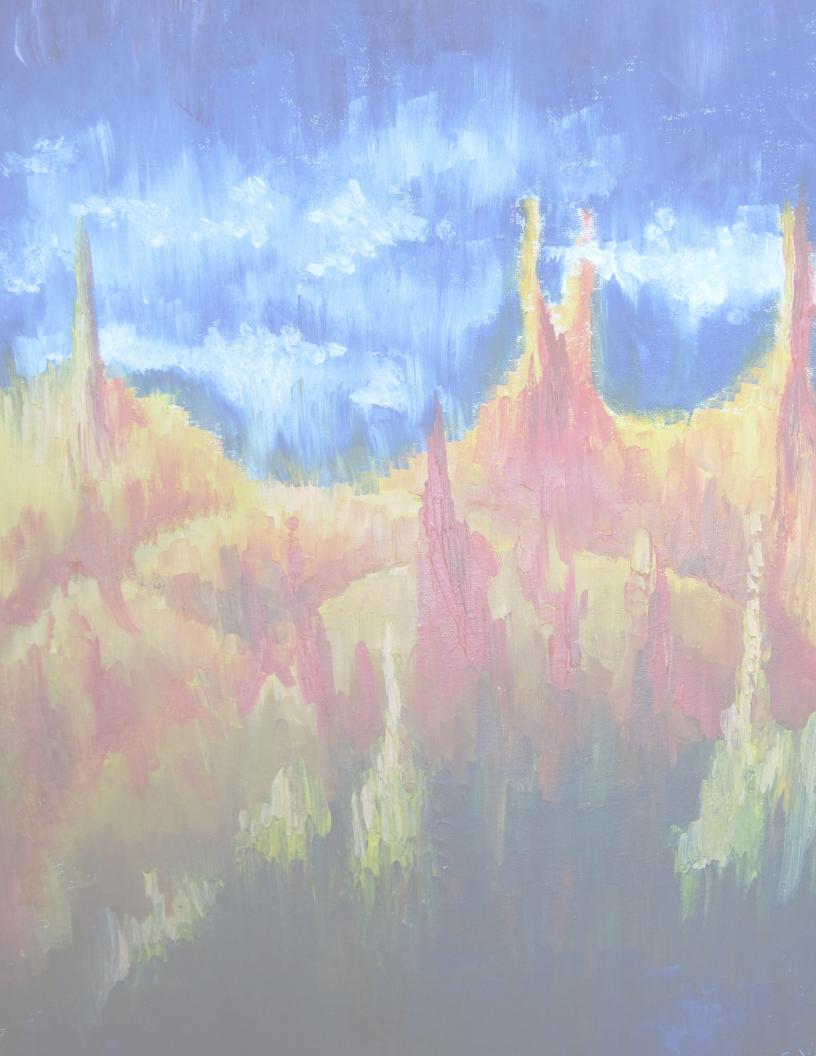
The interview subjects and the research discussed environment in terms of the larger context of surrounding environment. The interview subjects spoke about the affect of environment related to how the surrounding social structure or culture within the environment can

inspire design and creativity. For instance, as time passes and designers investigate more fields of information, they become infinitely inspired by their surroundings (Rothko and Rothko 2004). The literature review spoke of environment ranging from economic status of societies to the environmental aspects of climatic or geographic conditions in which people work (Rothko and Rothko 2004).

The final overlapping theme between the interview study and the literature review research related to general thoughts on education in landscape architecture. To begin, both the interview subjects and the research supported the idea that landscape architectural education needs to focus more on the process students use rather than solely on the final products. Landscape architectural education needs to shift its focus on computer use back to the sensory realm of design so students can begin to rediscover themselves as designers (Pallasmaa 2009). This rediscovery of the senses includes bringing back and encouraging the use of kinesthetic activity throughout design development in landscape architectural education. Recognizing the importance of process in landscape architectural education, Bover calls for more focus on the process itself as design education becomes increasingly more about aesthetics and theory (Boyer and Mitgang 1996). According to the literature review sources, educators in landscape architecture can encourage creative thinking from students by supporting the use of different media and discouraging computer use during design development.

Finally, both sources of information introduced the importance of teaching students about the principles of art and other disciplines to encourage creativity. This aspect of education relates back to the importance of awareness in design. The research spoke more specifically to the principles of art. For instance, designers need to have a broad range of knowledge about different aspects of fine art (Hunt and Kingery-Page 2010). Hunt and Kingery-Page argue that having an understanding of art would deepen a student's understanding of culture, as well as expand a student's "sense of purpose and working process" (Hunt and Kingery-Page 2010).

From the interview findings, it was determined that a majority, or more than two of the respondents' interviews in both groups, supported several of the initial themes from literature review. After breaking down the findings from the interviews, it became apparent overall that the landscape architects had more overlaps in their interview discussions than the artists. Chapter 5: Conclusions introduces conclusions recommendations for educators based on the findings.





Chapter 5

Conclusions

"[A] subject both of science and art, the landscape functions as a mirror and a lens: in it we see the space we occupy and ourselves as we occupy it"

-Jane Amidon (Amidon 2001)

For this study, general conclusions about the profession of landscape architecture were difficult to draw due to the small sample size used for the study. The addressed conclusions relate only to the four landscape architects interviewed and not all landscape architects. General ideas can be pulled out of the study about landscape architecture, design process, and landscape architectural education; however, no conclusions about the profession overall can be determined with certainty.

Based on the literature review research presented in Chapter 2, four initial themes informed the interview questions. One of the goals of the study was to see if once analyzed, the information gathered supported or disproved the initial themes.

Conclusions on Initial Themes

The first initial theme introduced in Chapter 2 was processes used by highly creative landscape architects are non-linear, creative processes. The results of the interviews with three out of four of the landscape architect interview subjects supported this initial theme on several levels. First, as seen in Chapter 4, after diagramming all of the subjects design processes based on the information provided about process during the interviews, all the landscape architects. except Peter Walker, described a non-linear or creative process. Because every project brings about new challenges, the exact same design process cannot be used for every project. Similarly, personal experience affects every decision made within the design process making every person's process and decisions unique. Even if two landscape architects make the exact same decision, the individual's person experiences are what drive the decision. While it cannot be determined with complete confidence that linear design process cannot yield creative results, it can be concluded that non-linear process are what led the interview subjects to creating original designs like the projects seen in Chapter 4, Figures 4.1 to 4.5, 4.7 to 4.10, 4.12 to 4.15 and 4.17 to 4.20.

The second initial theme introduced in Chapter 2 was highly creative landscape architects will follow a design process different than that of

artists but both processes will show signs of the psychological phases of creative process. Interview findings supported this initial theme. Again, after diagramming the processes, each of the landscape architects incorporated distinct phases on the creative process within their design processes. In addition, the landscape architect processes were not only very different from each other but they were very different than the processes of the artists. To some degree, creative process is apparent in all design process. Creativity develops through the psychological phases of creative process; therefore, because design solutions and problem solving require at least a minuscule amount of creative thinking in order to develop solutions, all design processes incorporate aspects of the creative process. The first conclusion drawn from the initial theme is that landscape architects need to encourage and create a hybrid creative and conventional design process.

The third initial theme was the design process used by highly creative landscape architects is a personal, creative process, which has greatly evolved since learning the conventional design process through formal education. Related to the same conclusions that all the design processes of avant-garde landscape architects incorporate creative process is the conclusion that after formal education, the design processes of avant-garde landscape architects continues to develop. The results of the study that supported this initial theme are similar to that of the first initial theme. As mentioned earlier, according to the subjects, personal experiences and higher expertise in design affect and evolve design process; therefore, the conclusions can be drawn that over time, as designers learn more about themselves and have more experiences, their process would continue to evolve. In addition, most of the landscape architects acknowledged that they had learned a traditional or conventional design process in school with distinct stages; however, the process they described as using today were far from conventional, showing evolution since education.

The final initial theme was highly creative landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking. After interviewing the landscape architect subjects and analyzing the information, this initial theme was highly supported. While the study only speaks for four landscape architects, it was clear among those four subjects that they use a variety of media through both kinesthetic and digital design development. Other conclusions drawn from the interviews include anything that allows an individual's mind to think freely is vital in creative design and kinesthetic activity is important in developing creativity. This is not to say that the landscape architect subjects think the computer limits creativity, they simply all saw the value in working with their hands during conceptual design. Overall, according to the subjects, any kinesthetic activity throughout the design process helps evoke creative thinking for the individual designer.

Several conclusions can be drawn based on the relationship between information gathered from the interviews and literature review. First, for designers to not be limited by unknowns or fear of failure, they must develop an understanding of what limits their personal creativity in design. Once designers know their limitations and can more fully understand themselves as designers, fear of the unknown or fear of failure will begin to drive their creativity rather than limit creative thinking. Part of the journey for designers to embrace the unknowns includes developing a personal design process that the designer understands and can use to encourage personal creative thinking. According to the interview results, if designers develop a personal process, they will stop avoiding the unknowns and be able to work towards solutions that are not only functional but creative.

Final Conclusions Creativity in Design

Similarly, through the study, it became apparent that both the highly creative landscape architect subjects and the artist subjects portrayed a level of expertise both in their personal interests and goals as designers and the process they use to develop ideas (Adler, Cormier 2011). From the study, it can be concluded that the reason certain designs appear to be creative while others do not relates to a designers own level of confidence in personal creativity. Due to the individual designer's confidence in their personal creative thinking, they are able to fight the limitations on creativity and more fully embrace the things that drive their creativity. Overall, being aware of the activities that spiral creative thinking for the individual designer is imperative to creative design.

Conclusions can be drawn about the relationship of clients to creativity. The first conclusion relates to the importance of developing a relationship and trust with clients in order to encourage creative thinking (Balsley, Cormier, Kim, Rundstrom 2011). When designers gain client trust, the client becomes more open to avant-garde solutions making it imperative that landscape architects learn to work with clients and lead them to new ideas. If landscape architects can learn how to be tacticians at an early point in their careers, the limiting factors brought on by the criticism of clients can be handled without jeopardizing the creativity within a project. The limiting factors that develop from clients who do not see the value in avant-garde design solutions can also be diminished if more landscape architects begin to work towards avant-garde solutions and provide built precedents for the value of the avant-garde.

From the research and interview findings, conclusions evolved about work environment in relation to creativity. The first conclusion is work environment affects creativity in ways which are different from person to person (Adler, Cooper, Kim, Rundstrom 2011). Since creativity is a personal act, the environment in which one most successfully works will be different for each individual. Interviews revealed that the ideal work environment is different for each person. Related to work

environment, designers can be infinitely inspired by their surrounding world. Anything from culture to social structure to other landscape architecture can inspire creativity.

Finally, when asking the landscape architects about the relationships between art and landscape architecture, few agreed that the roles of both groups are the same. In addition, on several occasions, the landscape architects felt art could serve as inspiration for landscape architecture but landscape architects cannot work like artists because the work of landscape architects must be functional and realistic (Balsley, Kim, Rundstrom 2011). These opinions lead to the conclusions that landscape architects need to understand clearly the role art can play in landscape architecture.

When speaking with the artists, they spoke of their role in similar terms as the landscape architects, relating it to problem solving, aesthetics and audience. More importantly, the artists spoke a great deal about problem solving in art. If landscape architects were more aware of the way artists work to solve problem through creative solutions, the stereotypical assumption that art and landscape architecture are separate due to the functional and realistic elements of landscape architectural design would seem less relevant. As a result, landscape architects might embrace creative problem solving rather than shying away from it. In other words, artists help support the conclusions that landscape architecture design can be functional and realistic while being highly creative.

Landscape Architectural Education

Conclusions related to education in landscape architecture can be drawn based on the findings from literature review and the interviews. Based on these conclusions, several recommendations for landscape architectural programs will be made relating to defining and nourishing the individual creativity of students.

According to both literature review and interview findings, the studio environments in which students work throughout their education needs more variation (Balsley, Cormier, Harrow, Kim 2011). While every program does not have the facilities necessary for each student to have their ideal working environment, programs could provide different types of studio environments for students throughout their education. As a result, students would be given an equal opportunity to work in environments that suite their creativity most, as well as learn how to work in different environments since each professional office environment differs.

In addition, educational programs need to begin to shift their sole focus away from final products and begin to spend more time on teaching students about process (Adler, Balsley, Cormier, Kim 2011). Developing a student's personal process will yield more

creative design solutions rather than an entire studio of designs that incorporate all the same spaces, programs or layouts. If programs became more concerned with design process rather than the products students are creating in studios, the results would be more creative. There are several ways programs can improve in order to encourage the development of personal process.

The first recommendation for encouraging personal process and creativity in education is changing the studio format currently in place at a multitude of universities. According to several of the interview subjects, students enrolled in landscape architecture programs only learn one or two processes that are given to them from the beginning (Adler, Balsley, Cormier, Kim 2011). Because design processes are unique to each individual, as seen in the interview results, the creativity of students is limited when students are not given any opportunity to discover their personal process. When landscape architects find their process which they are confident in using, design becomes more intuitive rather than structured. If students can become more confident through development of personal process in school, their confidence will develop quicker opening more doors for creative design solutions. As imperative elements of creativity in landscape architectural design, educators need to nourish a student's confidence and awareness of themselves as designers.

Next, in order to encourage avant-garde results and prevent repetitive design solutions from year to year and student to student, more thought should be put into how students are introduced to project examples and precedents. Based on literature review, students should be allowed to use precedent images of professional work for inspiration; however, no elements within a design should be precisely mimicked (Rundstrom 2011). In addition, while professors should provide students who are new to landscape architecture more information and programming for projects while they are learning design, students farther into the program should be provided little to no information. Because students who have been in the program longer have had more time to develop a personal process and understand their personal creativity, these unknowns of a design project will help instead of hurt their creativity.

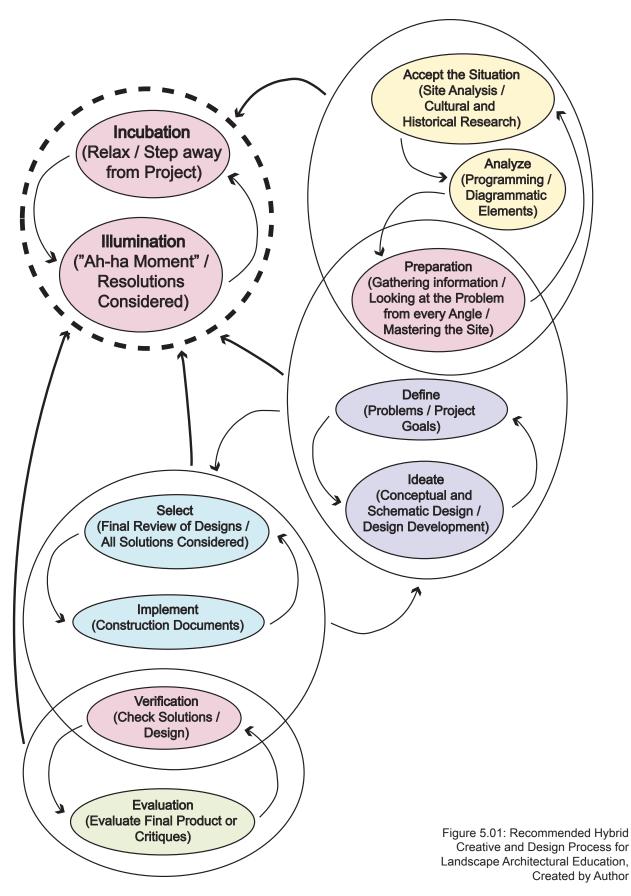
Another suggested change to programs, specific to how processes are carried out and introduced in order to encourage creative thinking, is to give students the appropriate time to "incubate" throughout studio projects (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010). For example, forcing students to participate in group or individual activities during studio time. These incubation sessions can last as long as available or seemingly necessary. Projects should also begin with creativity building activities. For instance, providing students with materials on creative thinking or creativity in design to help them understand creativity before trying to employ creativity in design. In

addition, more abstract activities for idea generation should be used with students at the beginning of a project in order to let students take the project where they want from an abstraction of space, not a program of parts. Abstract activities would both provide students with a freer base to work and spark creative thinking from the earliest stages of the project.

Another important element of landscape architectural education that needs improvements in order to encourage individual creativity and design relates to the current design process being taught to students at every level. Landscape architectural programs need to find a balanced conventional and creative design process to introduce to students. Based on what was learned throughout the study, an example of a hybrid conventional and creative design process that could be taught to students can be seen in Figure 5.01. In addition, more advanced students within the program should be given the stages of a design process without being shown a specific order in which they are completed. Let students figure the order out according to their personal process.

In relation to the focus on process, programs should encourage more kinesthetic activity in order to encourage creative thinking from students. If programs shift their focus away from the computer and allow students to work with kinesthetic practices and different media more frequently, they will encourage creative thinking from students during design development. One way that programs can encourage and even require more kinesthetic activity is through mandatory process pieces in which students use more varied materials in design development. The actual materials used throughout the process should be the decision of the student; however, making process pieces a percentage of a grade or part of a pass/fail assignment would force students to think about their process and learn the value of kinesthetic activity in design development. Kinesthetic activity is one method of design that would allow students more flexibility and creative license to be able to develop their personal design processes (Balsley 2011).

Landscape architectural education should require programs to teach students how to sell their designs. One major finding from the interviews was landscape architects wishing to be avant-garde in the real world must learn how to be tacticians and sell their design to clients (Balsley, Cooper, Cormier, Kim 2011). If educators do not work to teach students the art of selling their designs, teaching and encouraging highly creative design would be pointless because most clients do not immediately accept avant-garde solutions. The designs of students should be discussed during critiques as always; however, how well a student "sells" their design should be critiqued and advised as well during studio critiques.



Finally, the conclusion can be drawn that educational programs in landscape architecture should make students more aware of art and other disciplines to encourage creative thinking. Students need to either be given more options for electives or required to take courses in other design or art oriented majors. Taking courses in art or design environments outside of landscape architecture will provide students with a greater understanding of art, as well as a variety of disciplines. That awareness will broaden their understanding of culture and different working processes. Overall, greater awareness of art and varied disciplines outside of landscape architecture would encourage creative thinking (Adler, Cormier 2011).

Avant-Garde

Due to the minimal amount of overlapping information about the avant-garde from the study, the only conclusions drawn relate to what was not said about the avant-garde. The first conclusion drawn is people with differing educations and professions understand the avant-garde in different ways. When talking to the artist subjects, they had a clear understanding of the avant-garde according to art, which made them seem more appreciative of the avant-garde; whereas, the landscape architects knew very little about the avantgarde and even less about the avant-garde in relation to landscape architecture. Because researching the avant-garde thoroughly came before asking the interview subjects about the avant-garde, I could only think of the avant-garde as being a very positive way of thinking about design. Although I knew of the history of the avant-garde and differing opinions about the success of those periods, I felt the radical ideas behind avant-garde of originality and breaking tradition, as mentioned in Chapter 2, were highly appropriate to creative landscape architecture.

In conclusion, because individual groups of people think of the avantgarde differently, it is important to teach and clarify the values of the avant-garde in landscape architecture. If landscape architects tried to understand the ideals of the avant-garde more fully, they would have a better understanding of the value in avant-garde design and creativity.

Unanswered
Questions and
Unresolved
Themes for
Future Study

Upon completion of the findings and conclusions of the study, several topics arose that could be researched and developed further in the future. Due to time constraints, which resulted in smaller sample sizes and a narrow topic, I found that there were several questions I would have liked to learn more about but was only able to skim the surface. While this thesis does open up many new questions for research and begs for more information about a wide range of subjects, it brings about higher awareness of the interaction between the psychological creative process and the conventional design process.

The first topic that needs more exploration is creativity in education, specifically landscape architectural education. I think there is more to learn about how creativity can be encouraged from students. In addition, I think landscape architects could learn more from art education for landscape architectural education. My thesis committee member, Dylan Beck, who is a professor in College of Fine Arts at Kansas State University, sparked my interest in learning from art educators because he said it is his job everyday to encourage creativity and teach students about personal creative process.

Knowing more about other creative disciplines could influence studio setups, programs, and environments and help those involved in landscape architectural education encourage students to evoke creative thinking. Landscape architecture educators could also gain an understanding of what outside knowledge is necessary for students to learn in order to more fully understand their own creativity. Information about creativity in education could not only be learned from art programs and professors but also from education programs and professors. Speaking with education professionals about how students learn at different levels and what can be done to encourage creativity from students over a range of subject areas, would help influence creative thinking in landscape architectural education too.

The last aspect of creativity in landscape architectural education that needs further exploration relates to how teaching a variety of different design processes would affect creativity. Upon completion of the study analysis and beginning to writing my conclusions. I had the opportunity to speak with Anna Wiehe, an elementary school art teacher in Manhattan, Kansas (Wiehe 2011). Anna shows a keen interest in creativity in education, directing my attention to the "loose parts theory" that was introduced in the book Last Child in the Woods by Richard Louv (Wiehe 2011). Anne briefly described the loose parts theory as relating to nature-based education where children learn through nature giving them a great variety of inspiration, like rocks, trees, grass, or any element other natural element (Wiehe 2011). According to Anna, nature-based education and the loose parts theory encourage creativity because it gives children many choices (Wiehe 2011). I think this translates to teaching students a variety of processes giving students different choices. This translation made me even more interested in learning how teaching multiple processes to students would truly affect creativity, not only because of Louv's theory but because several of the interview subjects recommended teaching multiple processes as well.

The questions raised about education that need further exploration include: how can landscape architecture learn from art and other creative majors? What environments do students need to think creatively? Are some students not creative, as suggested by a few of the interview subjects? Would teaching a variety of design processes

in landscape architectural education actually encourage creativity?

Related to creativity in education, another subject that needs further exploration is how the design process evolves from education and throughout the career of landscape architects. If time allowed, following landscape architects from their educational years to well into their professional careers and having them diagram their processes throughout would provide greater conclusions on differences between process in their education and careers. Even by simply speaking with both students and professionals about their processes, I could have learned more about their similarities and differences and if landscape architectural education programs have evolved to incorporate more freedom in process and creativity.

Further questions raised about process include: What factors encourage creative process within design process as expertise develops? Can those factors be introduced during formal education? How do landscape architecture programs today teach process versus landscape architecture programs when the interview subjects were in school? Are landscape architectural programs more interested in the final product or process?

This thesis spoke a great deal about highly creative landscape architects but it does not provide information on any other types of landscape architects, which leaves certain topics unclear. It leaves me wondering if all landscape architects actually think and work like the highly creative landscape architects interviewed or if there is actually a distinct difference between different types of landscape architects. In addition, it makes me wonder if design solutions that seem very typical evolved from a more creative and free process. Do the employees working under the interview subjects at their firms use similar processes as the firm principals? Do individuals working at the same firm produce similar design solutions and graphics? Or do employees have more freedom to work the ways they want to work?

Determined earlier in conclusions, kinesthetic activity does add value in creative process and evoke creative thinking; however, why does it evoke creative thinking? This topic was touched on in Chapter 2 but I feel more can be learned about kinesthetic activity in creative process. In addition, this study focused mostly on kinesthetic activity but how has technology evolved to aid in creativity and creative thinking? Can the computer help evoke creativity rather than primarily limiting creativity as this study supported? How realistic is it for any firm, beyond the firms who are highly stable financially, to use a variety of media and methods for creativity and concept development? What are other media and materials landscape architecture firms use to develop concepts?

Finally, I feel the whole concept of the avant-garde needs further explanation in landscape architecture. When researching I learned limited current sources exist on the avant-garde in both art and landscape architecture today. It was difficult to determine whether most landscape architects think about the avant-garde in design. The study showed landscape architects are timid about talking about the avant-garde, but I am still curious why they hesitate. What is the true history of the avant-garde in landscape architecture? Is the avant-grade always considered a product or can it be considered a mode of thought as it is in this study? How is the avant-garde apparent in landscape architecture today? What does it take to be avant-garde in both art and landscape architecture? Many of the subjects felt tradition was an important layer of design in both art and landscape architecture, but can design be avant-garde while still staying grounded in tradition?

The three primary things I would have changed about my study based on the information gathered and the conclusions drawn include: interviewing more people in each subject group, focusing less on well-known landscape architects and sampling a greater variety of landscape architects, and take more time to do pilot interviews before conducting interviews used for the study.

What would I have Done Differently?

First, if time had permitted, the opportunity to interview far more people than four subjects in each group would have provided greater results. Since a small sample size was used, overlaps on specific information were rare and more of the conclusions and findings focused on broad subjects. In addition, interviewing more people would have given me more time to rework my interview questions and analyze findings during the interviewing process. If I accomplished more analysis before all the interviews were completed, I could have altered and expanded on the interview questions in order to gather more information.

Next, a broader sample of landscape architect subjects would have provided more substantial and relatable results. Relating to needing more subjects, interviewing a wider variety of landscape architects would have provided more information. After drawing the conclusions for highly creative landscape architects, it would have been interesting to compare those results with interviews from landscape architects who do not necessarily fit the criteria as being highly creative and avant-garde.

Finally, I would have spent more time developing interviews through pilot interviews. If time and higher interest from contacted subjects would have allowed me to do several pilot interviews before completing the final eight interviews, the interview questions could have been developed more thoroughly. Due to the constraints of

this thesis, the interview questions evolved from the initial themes developed in literature review. Because the knowledge gained from the literature review about each category aided in writing the questions, the themes developed in findings were not substantially different from the information found in literature review. Results would have been more thorough and more complete if exploratory interviews could have been used rather than basing questions entirely off literature review themes.

Final Thoughts

Overall, the information I gathered and learned throughout the writing of this thesis was inspirational and informative. The findings and conclusions were encouraging to me because they gave me confidence that landscape architects are beginning to take the necessary steps in encouraging creative thinking and creative process in both the profession and education. While there are many questions that I would like to study further for both myself and landscape architectural professionals and educators, I feel my thesis has provided the necessary framework for others to expand and study the value of both creative thinking and art in landscape architecture. I hope to be able to continue to research and expand upon my findings and conclusions in the future.

References

Ted Adler. in College of Fine Arts, Wichita State University [database online]. Wichita, Kansas, 2008 [cited 4/19/2011 2011]. Available from http://webs.wichita.edu/?u=fa_ceramics&p=/adler (accessed 4/19/2011).

Amidon, Jane. 2001. *Radical Landscapes: Reinventing Outdoor Space*. New York: Thames & Hudson.

Askland, Hedda Haugen, Michael Ostwald, and Anthony Williams. 2010. *Changing Conceptualisations of Creativity in Design*. Paper presented at DESIRE '10: Proceedings of the 1st DESIRE Network Conference on Creativity and Innovation in Design, Aarhus, Denmark.

Ball, Greg. "Interview: Claude Cormier". in MoCo Loco Ltd [database online]. 2009 [cited September 12 2010]. Available from http://mocoloco.com/archives/003317.php.

Boyer, Ernest L., and Lee D. Mitgang. 1996. *Building Community: A New Future for Architecture Education and Practice: A Special Report*. Princeton, New Jersey: The Carnegie Foundation for the Advancement of Teaching.

Brown, Brenda. 1991. *Avant-Gardism and Landscape Architecture*. Landscape Journal 10 (2): 136.

Carlock, Marty. 2008. "Visual Fugue". Landscape Architecture.

Collado-Ruiz, Daniel, and Hesamedin Ostad-Ahmad-Ghorabi. 2010. "Influence of Environmental Information on Creativity". *Design Studies* 31 (5): 479.

Comotti, Francesca, Ian Ayers, and Catherine Collin. 2009. *Sketch Landscape*. Barcelona, Spain: Loft.

Cooper, Diana. "Diana Cooper". 2007 [cited March 3 2011]. Available from http://www.dianacooper.net/ (accessed March 3, 2011).

Corner, James. 1992. "Representation in Landscape". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 144. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Corner, James. 1990. "Origins of Theory". In Theory in Landscape Architecture: A Reader., ed. Simon Swaffield, 19. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Crandell, Gina. 2001. "Seoul Sculpture" on Artist Mikyoung Kim. LandFORUM. Creswell, John W. 2009. *Research Design: Qualitative, Quantitative, and Mixed Methods Approaches*. 3rd ed. Thousand Oaks, California: SAGE Publications, Ltd.

Crewe, Katherine, and Ann Forsyth. 2003. "LandSCAPES: A Typology of Approaches to Landscape Architecture". *Landscape Journal* 22 (1): 37.

Dick, Bob. "Grounded Theory: A Thumbnail Sketch". in Southern Cross University [database online]. Australia, 2005 [cited May 17 2011]. Available from http://www.scu.edu.au/schools/gcm/ar/arp/grounded.html#a_gt_data (accessed May 17, 2011).

Eckbo, Garrett. 1991. "Avant-Garde and Status Quo Landscapes: How do they Relate?". *Landscape Journal* 10 (1): 9.

Eckbo, Garrett. 1950. "Landscape for Living". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 9. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Gibson, James J. 1966. *The Senses Considered as Perceptual Systems*. Boston, MA: Houghton Mifflin Company.

Gillette, Jane. 2001. *Thomas Balsley: The Urban Landscape*. Land Marks. Washington, DC: Spacemaker Press.

Goswami, Amit, and Maggie Goswami. 1999. *Quantum Creativity: Waking Up to our Creative Potential*. Cresskill, New Jersey: Hampton Press, Inc.

Halprin, Lawrence. 1969. "The RSVP Cycles". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 43. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Harrow, Del. Del Harrow. in Graph Paper Press [database online]. 2011 [cited March 3 2011]. Available from http://www.delharrow.net/(accessed March 3, 2011).

Herrman, Ned. 1995. *The Creative Brain*. 2nd ed. Kingsport, Tennessee: Quebecor Printing Book Group.

Hunt, J. D., and Katie Kingery-Page. 2010. "Looking at Art: Themes in Creative Process". Paper presented at University and College Designers Association, proceedings of Design Education Summit, held June, 2010, Lawrence, Kansas.

Jacobs, Peter. 2004. "Folklore and Forest Fragments: Reading Contemporary Landscape Design in Quebec". *Landscape Journal* 23 (2): 85.

Kneller, George F. 1965. *The Art and Science of Creativity*. New York: Holt, Reinhart and Winston, Inc.

Koberg, Don, and Jim Bagnall. 2003. *The Universal Traveler: A Soft-Systems Guide to Creativity, Problem-Solving and the Process of Reaching Goals*. 3rd ed. United States: Axzo Press.

Krauss, Rosalind E. 1985. *The Originality of the Avant-Garde and other Modernist Myths*. Cambridge, Mass.: MIT Press.

Krog, Steven. 1983. "Creative Risk Taking". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 58. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Kvashny, Alon. 1982. "Enhancing Creativity in Landscape Architectural Education". *Landscape Journal* 1 (2): 104.

Lambert, Nadine M., and Barbara L. McCombs. 1998. *How Students Learn: Reforming Schools through Learner-Centered Education*. Washington, DC: American Psychological Association.

Lawson, Bryan. 2006. *How Designers Think: The Design Process Demystified*. 4th ed. Oxford; Burlington, MA: Elsevier/ Architectural.

Lawson, Bryan. 2004. *What Designers Know*. Oxford England; Burlington, MA: Elsevier/Architectural Press.

LeCompte, Margaret D., and Jean J. Schensul. 1999. *Analyzing and Interpreting Ethnographic Data (Ethnographer's Toolkit)*. Walnut Creek, California: AltaMira Press.

Lynch, Kevin, and Gary Hack. 1984. "The Art of Site Planning". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 37. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Lynch, Kevin, and Gary Hack. 1984. "Site Design". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 57. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Marusic, Ivan. 2002. "Some Observations Regarding the Education of Landscape Architects for the 21st Century". *Landscape and Urban Planning* 60 (2): 95.

Maslyn, Jamie. 2002. "The Modern Landscape Architect and Creativity: What Creates it, Shapes it, and Inspires it". *Landscape Journal* 21 (1): 134.

McCormick, Harriet Hammond. 1923. *Landscape Art, Past and Present*. New York, N.Y.; London: C. Scribner's Sons.

McHarg, Ian. 1967. "An Ecological Method". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 38. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Murphy, Michael D. 2005. *Landscape Architecture Theory: An Evolving Body of Thought*. Long Grove, III.: Waveland Press Inc.

Pallasmaa, Juhani. 2007. "New Architectural Horizons". *Architectural Design* 77 (22): 16-23.

Pallasmaa, Juhani. 2009. *The Thinking Hand: Existential and Embodied Wisdom in Architecture*. AD primers. Chichester, U.K.: Wiley. Ramljak, Suzanne. 2009. "Richard Sennett on Making". *American Craft*.

Reed, Peter Shedd, and Museum of Modern Art. 2005. *Groundswell: Constructing the Contemporary Landscape*. New York: Museum of Modern Art: Distributed in the United States and Canada by D.A.P./ Distributed Art Publishers.

Richardson, Tim, and Martha Schwartz. 2008. *Avant Gardeners: 50 Visionaries of the Contemporary Landscape*. New York: Thames & Hudson.

Rothko, Mark, and Christopher Rothko. 2004. *The Artist's Reality: Philosophies of Art*. New Haven, Conn.: Yale University Press.

Rundstrom, Lisa. "Lisa Rundstrom". [cited 4/19/2011 2011]. Available from http://lisarundstrom.com/ (accessed 4/19/2011).

Sasaki, Hideo. 1950. "Design Process". In *Theory in Landscape Architecture: A Reader.*, ed. Simon Swaffield, 35. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Schensul, Jean J., and Margaret D. LeCompte. 1999. *Designing and Conducting Ethnographic Research (Ethnographer's Toolkit)*. Volume 1. Walnut Creek, California: AltaMira Press.

Schensul, Stephen L., Jean J. Schensul, and Margaret D. LeCompte. 1999. *Essential Ethnographic Methods (Ethnographer's Toolkit)*. Volume 2. Walnut Creek, California: AltaMira Press.

Sivak, Cathy. "Watching People Enjoy the Space Created by Urban Landscape Architecture is among the Field's Biggest Rewards". in *The Environmental Education Directory* [database online]. 2006 [cited September 29 2010]. Available from http://www.enviroeducation.com/interviews/thomas-balslev.html.

Smith, W. Gary. 2010. From Art to Landscape: Unleashing Creativity in Garden Design. Portland: Timber Press.

Swaffield, Simon, ed. 2002. *Theory in Landscape Architecture: A Reader*. Philadelphia, Pennsylvania: University of Pennsylvania Press.

Tai, Lolly. 2003. "Assessing the Impact of Computer Use on Landscape Architecture Professional Practice: Efficiency, Effectiveness, and Design Creativity". *Landscape Journal* 22 (2): 113.

Taylor, Brandon. 1995. *Avant-Garde and After: Rethinking Art Now.* New York, New York: Harry N. Abrams, Inc.

Walker, Peter. 2005. *Peter Walker and Partners: Defining the Craft*. San Rafael, Calif.: ORO Editions.

Weilacher, Udo. 1999. *Between Landscape Architecture and Land Art*. Basel, Switzerland: Birkhauser.

Wiehe, Anna. Personal Communication. April 26, 2011.

Zeisel, John. 1981. *Inquiry by Design: Tools for Environment-Behavior Research*. The Brooks/Cole Basic Concepts in Environment and Behavior Series. Monterey, Calif.: Brooks/Cole Pub. Co.



Landscape Architecture

- What is landscape architecture?
- · How has the role of landscape architects changed overtime?

Design Process

- · What is the conventional design process?
- What is the staged-design process?
- How has the conventional design process and focus of design evolved from the staged-design process?
- What are the current problems with the conventional design process?
- How have the goals of design changed throughout history?

Creative and Avant-Garde Thinking

- What is creativity?
- What is avant-garde?
- What is the relationship between creative and avant-garde thinking?
- How has the avant-garde been perceived throughout history?
- How does creativity influence the design process of landscape architects?
- What limits creativity in landscape architecture?
- What is the value of creative, avant-garde thinking in landscape architecture?
- What is the role of avant-garde thinking in landscape architecture today?

Creative Process

- What is creative process?
- What role does creative process play in landscape architecture?
- What is the value of strengthening the use of creative process within the conventional design process?
- What is kinesthetic design?
 - What is the value of kinesthetic design?
 - How do the computer and drawings limit creativity in the design process of landscape architects?
- What are the major differences between the inspiration, phases or stages and goals of creative process and conventional design process?

Education in Landscape Architecture

- How has the education of landscape architects changed over time?
- How do students learn?
- What limits creativity in education?
- What changes the education would encourage creativity?

Relationship of Art and Landscape Architecture

- What is art?
- What are the overlaps in the themes of art and landscape architecture?
- What are the differences between art and landscape architecture?
- Why is there a separation of art and landscape architecture?
- What role has art played in landscape architecture?
- What is the value of approaching landscape architecture as art?

Appendix A:
Categorical
and Thematical
Research
Questions

Appendix B: Literature Review

Avant-Garde

Brown : Avant-Gardism and Landscape Architecture
 Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology
Brown thoroughly discusses the role of avant-garde in landscape architecture. She talks about the role of avant-garde not only in landscape architecture today but also in the past. In addition, Brown defines avant-garde through the use of several different sources. She is an important source of information about the avant-garde which is directly related to landscape architecture. Finally, Brown gives specific examples of landscape architects who embrace the avant-garde and detailed descriptions of why they specifically are avant-garde (Brown 1991).
Eckbo : Avant-Garde and Status Quo Landscapes: How do they relate?
 Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology
Eckbo discusses the relationships between the avant-garde and landscape architecture, as well as the importance of incorporating history into landscape architecture. He discusses past relationships between landscape architecture and the avant-garde and reminds readers of the important role that the avant-garde played throughout history in landscape architecture (Eckbo 1991).
Creative Process and Creativity
Askland, Haugen, Ostwald, and Williams : Changing Conceptualisations of Creativity in Design
 ☐ Avant-Garde ☐ Creative Process and Creativity ☐ Design Process (Staged and Conventional)

☐ Artists / Art ☐ Education ☐ Landscape Architecture History ☐ Landscape Architecture Today ☐ Methodology This article provided a great source for defining creativity within the design professions. It introduces approaches to creativity in both design and creative processes (Askland, Haugen, Ostwald, and Williams 2010).
Goswami : Quantum Creativity: Waking Up to our Creative Potential
 Avant-Garde Creative Process and Creativity Design Process (Staged and Conventional) Artists / Art Education Landscape Architecture History Landscape Architecture Today Methodology
This book provides excellent insight into creativity. It covers almost every realm of creativity, creating a clear understanding of creativity. The book gives definitions of creativity, talks about why creativity is rejected, and breaks down the creative process. In addition, Goswami also discusses the role of artists and what they are most commonly trying to portray through their work. Media is discussed in talking about whether or not the computer and other types of media can be creative and still successfully complete certain phases of design (Goswami and Goswami 1999).
In speaking about creativity: "It is like diving into the pond – then you start to swim. Once the instinct and intuition get into the brush tip, the picture happens, if it is to be a picture at all" (177).
"Think of the writing in terms of discovery, which is to say that creation must take place between the pan and the paper, not before a thought or afterwards in a recasting" (178).
Herrman : The Creative Brain
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology

Herrman discusses the physical processes that the brain goes through to generate creativity. He discusses which parts of the brain both artists and planners use, allowing me to compare the ways in which those two types of people think. Hermann also provides a breakdown and definitions of the creative process. Finally, he talks about how when people are solely focused on problem-solving, it completely blocks any kind of creative thinking because the two tasks use completely opposite sides of the brain (Herrman 1995).

Hunt and Kingery-Page : Looking at Art: Themes in Creative Process

	Avant-Garde
\times	Creative Process and Creativity
	Design Process (Staged and Conventional)
\boxtimes	Artists / Art
\boxtimes	Education
	Landscape Architecture History
	Landscape Architecture Today
	Methodology

Hunt and Kingery-Page introduce tactics for teaching students about creativity through art education. They talk about creative process and ways of evoking creative thinking by looking at the work of famous artists. Hunt and Kingery-Page also discuss the importance and role kinesthetic thinking can play in landscape architecture and more specifically, landscape architectural education.

Kneller: The Art and Science of Creativity

	Avant-Garde
\boxtimes	Creative Process and Creativity
	Design Process (Staged and Conventional)
	Artists / Art
	Education
	Landscape Architecture History
	Landscape Architecture Today
	Methodology

Kneller discusses the traits of creative people and students. The discussion of creative students gives an interesting perspective on how creative students' work which aided in my understanding of education when drawing conclusions.

Kneller gives a thorough breakdown of the four phases of creative thinking. He provides quotes from other scholars about the different phases and evidence for how the phases of creativity work. There is a detailed discussion of the Gestalt theory on

creative process which has been my primary means of understanding creative process (Kneller 1965).

Maslyn : The Modern Landscape Architect and Creativity: What Creates it, Shapes it, and Inspires it	
 Avant-Garde Creative Process and Creativity Design Process (Staged and Conventional) Artists / Art Education Landscape Architecture History Landscape Architecture Today Methodology 	
This article presents the results and overlaps between seven landscape architects in Denver who were deemed most creative by fellow landscape architects in the area. The landscape architects were interviewed about how they use creativity. As part of the data analysis, overlaps in what the landscape architects said were broken down into "emerging themes". Some of these themes included: risk, persistence, the role of others, openness, understanding self, bliss, creative urge, and more. The article breaks down each of these emerging themes and uses the findings to draw conclusions about creativity in landscape architecture. The conclusion I found most interesting was that throughout the study the participants revealed that landscape architecture is unlike other creative professions (Maslyn 2002).	
"While they are performing artists, they must effectively communicate ideas. They are not inventors but with every project they create new solutions" (137).	
"All agree that education and training alone would not suffice in the development of a good landscape architect. Each participant has distinct design processes, not the traditional linear design process that is sequential and logic-based" (137).	
Pallasmaa : The Thinking Hand: Existential and Embodied Wisdom in Aesthetics	
 Avant-Garde Creative Process and Creativity Design Process (Staged and Conventional) Artists / Art Education Landscape Architecture History Landscape Architecture Today Methodology 	

Pallasmaa covers several great aspects of creative media, including the value of using your hands to create in relation to architecture. He discusses in detail that by using your hands to create you form relationships with your work, evoke personal feelings, evoke imagination and allow yourself to work through a problem using creativity until it is solved. Pallasmaa discusses the limitations which computers bring to designers and a need for change in the education of architects. Pallasmaa discusses creative thinking and how it challenges designers to go beyond their limits, opens up questions for users, and strengthens the powers of using emotions in design. This entire book is a great source on media and the power of creativity in design (Pallasmaa 2009).

Design Process (Staged-Design and Conventional)

Crewe : LandSCAPES: A Typology of Approaches to Landscape Architecture	
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology 	
This article provides a breakdown of design process as: design as synthesis, cultivated expression, landscape analysis, plural design, ecological design and spiritual landscapes. The way Crewe breaks down design process in a way which relates it not only to conventional theories but also theories which could be related to creative process. When discussing cultivated landscapes, it provides insight into creativity in landscape architecture (Crewe and Forsyth 2003).	
Koberg and Bagnall : The Universal Traveler: A Companion for those on Problem Solving Journeys and a Soft-Systems Guidebook to the Process of Design	
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology 	

This book provides excellent and simple breakdowns of design process. It gives multiple examples of different types of design processes and provides great diagrams for each process. The book discusses design process as a "problem solving journey". It breaks down the design process into seven stages: accept situation, analyze, define, ideate, select, implement, and evaluate. In addition, the book has a great discussion on creativity and what limits creativity in landscape architecture. Finally, the book defines who a creative problem solver is when designing and gives a brief introduction to creativity in design (Koberg and Bagnall 2003).

Lawson : How Designers Think: The Design Process Demystified

	Avant-Garde
	Creative Process and Creativity
\boxtimes	Design Process (Staged and Conventional)
	Artists / Art
	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

Lawson gives several different models of the design process. In addition, he further discusses the staged-design process as a model for design. He defines the design process saying that "the design process is endless, has no infallibly correct process, is about finding as well as solving problems, involves subjective value judgment, is a prescriptive activity and that throughout the process, designers work in the context of a need for action." Overall, the book is an excellent source of information about the design process.

Lawson talks about creative process and creativity in education. One of the main themes he talks about when discussing creativity in education is that no student can truly be creative until they have experience in the field they are studying. This is another source of information about the importance of expertise (Lawson 2006).

Murphy: Landscape Architecture Theory: An Evolving Body of Thought

П	Avant-Garde
=	Creative Process and Creativity
	Design Process (Staged and Conventional)
	Artists / Art
\boxtimes	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

Murphy defines: landscape architecture, landscape, design, and design process. He provides another opinion on the phases of design process and he provides insight into the primary values of landscape architecture, such as human experience and aesthetics. In addition, Murphy talks about education in landscape architecture.

Another topic which Murphy delves into is the relationship of art and landscape architecture. He talks about architecture as both a science and an art. Finally, in Murphy's conclusions, he talks specifically about the importance of creative thinking in landscape architecture (Murphy 2005).

architecture (Murphy 2005).	
Sasaki : Design Process	
 □ Avant-Garde □ Creative Process and Creativity ☑ Design Process (Staged and Conventional) □ Artists / Art □ Education ☑ Landscape Architecture History □ Landscape Architecture Today □ Methodology 	
Sasaki thoroughly breaks down staged-design process. This is meaning primary source for information specific to staged-design process rather than design process in general (Sasaki 1950).	ıy
Artists / Art Rothko and Rothko : The Artist's Reality: Philosophies of Ar	
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) ☑ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology 	
Education Boyer: Building Community: A New Future for Architecture Education and Practice: A Special Report	
☐ Avant-Garde☐ Creative Process and Creativity☐ Design Process (Staged and Conventional)	

 ☐ Artists / Art ☑ Education ☐ Landscape Architecture History ☑ Landscape Architecture Today ☐ Methodology 	
The Boyer Repost draws conclusions about what needs to change in the accreditation programs in education at schools of architecture. After completing the study, the Boyer Report gives seven goals which are fresh ideas that architecture schools need to think about when developing curriculum.	;
Goal 3 discusses the idea of "standards without standardization". The four major topics this goals focuses on are: fundamental knowledge, design, communication and practice. They propose ideas for curriculums which are more focused on the actual	

Collado-Ruiz and Ostad-Ahmad-Ghorabi : *Influence of Environmental Information on Creativity*

designs being developed within the programs (Boyer and Mitgang

	Avant-Garde
\boxtimes	Creative Process and Creativity
	Design Process (Staged and Conventional)
	Artists / Art
\boxtimes	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

1996).

This paper discusses a completed study which revolved around what limits creativity in design education. The basic idea of the study was that a group of students were broken up into five different groups, each of which was given a different amount of information about a design project. Once the groups were given a chance to look over the information provided, the groups were mixed together to complete a design charette. Throughout the charette, it was proven that the students who were given little to no information about the project developed more creative and "out of the box" ideas than those students who were given most of the project information (Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010).

"Research in the field of creativity, however, has shown that the exposure to examples can provoke fixation and reduce the overall creativity of the idea-generation process" (479).

Kvashny: Enhancing Creativity in Landscape Architectural Education

	Avant-Garde
\boxtimes	Creative Process and Creativity
	Design Process (Staged and Conventional)
	Artists / Art
\boxtimes	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

This article is somewhat outdated but focuses entirely on the value of teaching creativity in education. The article starts out with a discussion of what professors thought were educational needs for creativity in the past and what they think now. Then, he discusses the value of teaching creativity. Finally, Kvashny discusses the issues with the way landscape architecture is taught today. He focuses on the problems with students receiving problem statements that give them a specific site, users and requirements rather than making them think for themselves. He says that the issue with education is that students are not given any real challenges.

The article focuses around a study which was conducted with a variety of different senior students in landscape architecture. The students were broken up into two groups and given different materials. The experimental group was given information entirely on creativity before starting their project. Rather than the usual readings and exercises which were given in studio, they were focused on learning about creativity. The other group was given the same materials which the studios are always given; however, they also received just a few readings on creativity. After the projects were completed and rated based on creativity, the evidence showed that the students who were actually taught about creativity developed more creative ideas (Kvashny 1982).

"The results of this study seem to provide major implications for the training of landscape architectural students: (1) creativity training should be included in courses of design in landscape architecture, (2) Creative Problem Solving process should be adopted to help solve site design problems, (3) creativity variables, fluency and flexibility, originality and elaboration, should be stressed in a context of content presentation" (109).

Marusic : Some Observations Regarding the Education of Landscape Architects for the 21st Century

☐ Avant-Garde
□ Creative Process and Creativity
☐ Design Process (Staged and Conventional)

	Artists / Art
\boxtimes	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

This article focuses on education and the practice of landscape architecture in relation to conservation and sustainable practices. It stresses that landscape architecture is primarily based off of scientific analysis; however, in today's society, landscape architects much start using more creativity because it is key to finding alternatives to design which are least harmful to the environment. Marusic stresses that conservational efforts cannot solely rely on political or financial data and must, in fact, occur through creativity. In relation to creativity, Marusic emphasizes that uncertainty is key to creativity. Creativity opens up a world of unknown solutions. Finally, Marusic ends with talking about the need for creativity in education (Marusic 2002).

"This presents the schools of landscape architecture with an important task. They have to reinforce the creative potential of their students, they have to stimulate their creativity without regard to their specialization into design or planning, they have to develop their capabilities for resolving all the conservation aspects of today and the developmental needs of the future" (102).

"Do not diminish the importance of invention, the importance of students' fantasy, despite the rapid development of natural sciences and despite the ever deepening understanding of the ecological principles that govern natural processes" (102).

Landscape Architecture Today

Krog: Creative Risk Taking

	Avant-Garde
\boxtimes	Creative Process and Creativity
\boxtimes	Design Process (Staged and Conventional)
\boxtimes	Artists / Art
	Education
	Landscape Architecture History
\boxtimes	Landscape Architecture Today
	Methodology

Krog was my original source of inspiration for my thesis. Krog discusses detailed issues with the design process. In addition, he sets straight all of the negative connotations about artists being self-centered or self-involved. He addresses these common stereotypes about artists in a way which argues the importance of designers putting a little bit of themselves into the work they do for

others. Creativity within the design process is another topic Krog talks about passionately. He emphasizes a need for change in the way designers constantly look towards traditional concepts. Krog is an advocate for avant-garde and creativity in landscape architecture (Krog 1983).

"Let the seeing be documentary but the feeling enlightening. Our designers will be better for it" (64).

Lawson : What Designers Know
 Avant-Garde Creative Process and Creativity Design Process (Staged and Conventional) Artists / Art Education Landscape Architecture History Landscape Architecture Today Methodology
Lawson covers a broad range of topics ranging from the role of technology in design to landscape architectural education to kinesthetic activity. He discusses the importance of teaching students about design process and technical skill in the beginning in order to help them discover expertise in design. In addition, Lawson breaks down the importance of kinesthetic activity in design for developing creativity as the role of technology becomes more apparent in landscape architecture. Overall, Lawson provides different perspectives on a several major topics for this thesis.
Reed : Groundswell: Constructing the Contemporary Landscape
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology

Reed provides excellent examples of contemporary landscape architecture. The landscape architects and projects he introduces provided evidence that artistic and creative landscape architecture can be successful and functional. These landscape architects were also a major part in developing my list of highly creative landscape architects to contact for interviews.

Richardson and Schwartz : Avant Gardeners
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today □ Methodology
Richardson and Schwartz also provide excellent examples of contemporary landscape architecture. The landscape architects and projects they introduce provided evidence that artistic and creative landscape architecture can be successful and functional. These landscape architects were also a major part in developing my list of highly creative landscape architects to contact for interviews. Finally, this book relates contemporary landscape to aspects of the avant-garde.
Methodology
Creswell : Research Design: Qualitative, Quantitative, and Mixed Method Approaches
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education □ Landscape Architecture History □ Landscape Architecture Today ☑ Methodology
Creswell has been my guide for methodology throughout my entire proposal. Creswell introduced the first layer for understanding my worldview, qualitative methodology and the value of interviews. In addition, Creswell lays out the structure for literature reviews, overall data collection and literature maps. Finally, the initial structure and content for my proposal came from the information presented by Creswell (Creswell 2009).
LeCompte and Schensul : Analyzing and Interpreting Ethnographic Data (Ethnographer's Toolkit)
 □ Avant-Garde □ Creative Process and Creativity □ Design Process (Staged and Conventional) □ Artists / Art □ Education

Landscape Architecture History
Landscape Architecture Today
⊠ Methodology
Schensul, Schensul, and LeCompte: Essential Ethnographic
Methods (Ethnographer's Toolkit)
Avant-Garde
Creative Process and Creativity
Design Process (Staged and Conventional)
Artists / Art
Education
Landscape Architecture History
Landscape Architecture Today
X Methodology

(1) Research

- a. Site Analysis
- b. Historical Information of Place
- c. Cultural Identity of Place

(2) Analysis

- a. Diagrammatic Elements
- b. Ideal Relationships of all Factors
- c. Programming
- d. Design Requirements
- e. Analysis of the Site and User
- f. Finding the Problem

(3) Synthesis

- a. Conceptual or Schematic Design based on all Information Collected
- b. Finding Possible Solutions for each Problem and the Elements Required
- c. Design Development
- d. Aesthetic Considerations Considered during Design

(4) Evaluation

- a. Final Review of all Designs
- b. All Factors and Solutions Considered to Chose the Best Suited Design

Appendix C: Staged-Design Process Outline

Appendix D: Conventional Design Process Outline

- (1) Accept the Situation
 - a. Site Analysis
 - b. Historical Information of Place
 - c. Cultural Identity of Place
 - d. Initial Design Ideas

(2) Analyze

- a. Diagrammatic Elements
- b. Ideal Relationships of all Factors
- c. Programming
- d. Design Requirements
- e. Analysis of the Site and User

(3) Define

- a. Find the Major Problems which need Solving
- b. Determine the Goals of the Project

(4) Ideate

- Conceptual or Schematic Design based on all Information Collected
- Finding Possible Solutions for each Problem and the Elements Required
- c. Design Development
- d. Aesthetic Considerations Considered during Design

(5) Select

- a. Final Review of all Designs
- b. All Factors and Solutions Considered to Chose the Best Suited Design

(6) Implement

- a. Construction Documentation
- b. Implementation of Design
- c. Construction Management

(7) Evaluate

- a. Evaluation of what was Learned and Successful
- b. Evaluation of Final Product

(1) Preparation

- a. Finding the problem
- b. Gathering Facts and Existing Ideas about the Problem
- c. Looking at the Problem from every angle
- d. Mastering the Site
- e. Finding the Resources

Appendix E: Psychological Phases of Creative Process Outline

(2) Incubation

- a. Relax
- b. Taking Time to Step Away from the Problem
- c. Best Creative Thinking Occurs

(3) Illumination

- a. The "ah-ha" Moment
- b. Time of Inspiration
- c. Resolution of Problems Considered

(4) Verification

- a. Verify and Evaluate what you have found
- b. Check Solutions to the Problems

Appendix F: Descriptions of Assumptions and Initial Themes Design Process, Creative Process and the AvantGarde in Landscape Architecture

(1) Assumption: There are distinct differences between a creative process and a conventional design process.

The conventional design process focuses on problem solving (Krog 1983, 58; Koberg and Bagnall 2003). Each stage in the process unfolds in a particular overall order because each stage relies heavily on the completion of previous stages to be successful (Lawson 2006; Krog 1983, 58; Murphy 2005; Zeisel 1981; Lynch and Hack 1984, 37; Lynch and Hack 1984, 57). For instance, many times in the conventional design process, one cannot begin designing until completion of analysis.

On the contrary, while the creative process acknowledges problem solving, completion of phases does not occur in any set order allowing complete freedom of thought (Lawson 2006; Zeisel 1981; Halprin 1969, 43; Koberg and Bagnall 2003; Kneller 1965; Goswami and Goswami 1999). Distinct psychological phases in the creative process exist but these phases are not expected to arise at a specific time. During the creative process, the mind roams, relaxes and waits for revelation. Not determined to complete particular stages or meet distinct goals, the creative process allows individuals to think freely and creatively.

(1) Initial Theme: Avant-garde landscape architects follow a design process different than that of artists but both processes, whether a design process or creative process, show signs of the psychological phases of creative thinking.

Inherently creative, art practice does not follow a staged process. While the psychological phases of creative thinking are apparent in artists' personal process for idea generation and creative thinking, no major consistencies exist between the processes of different artists.

Avant-garde landscape architects follow a process unique among landscape architects because of their interest in kinesthetic activity, art and avant-garde design. Like artists, the design processes of avant-garde landscape architects incorporate the psychological phases of creative thinking; however, since obligated to clients and problem solving, the processes of avant-garde landscape architects will still incorporate aspects of the conventional design process.

Design Process, Creative Process, Creativity and the Avant-Garde (2) Assumption: Most landscape architects follow a conventional design process that has evolved since the staged-design process; however, their process is still linear and lacks creative thinking.

The conventional design process evolved from a staged-design process which encompassed three primary steps: research, analysis

and synthesis (Lawson 2006; Sasaki 1950, 35; Murphy 2005). Overtime, the addition of more stages to the conventional design process allowed for more incorporation of stages of thought and development throughout the process (Lawson 2006; Lynch and Hack 1984, 37; Halprin 1969, 43; Koberg and Bagnall 2003; Lynch and Hack 1984, 57). While each of the conventional design processes still follow a staged order for problem solving, the evolution of the orders in which steps are completed allows greater flexibility and repetition of steps for more holistic thinking (Swaffield 2002, 265; Crewe and Forsyth 2003, 37; Zeisel 1981; Lynch and Hack 1984, 37; Halprin 1969, 43; Koberg and Bagnall 2003; Lynch and Hack 1984, 57)

(2) Initial Theme: The processes used by avant-garde landscape architects are non-linear, creative processes.

The processes used by avant-garde landscape architects incorporate creative thinking by using a more creative process rather than strictly following conventional design processes. While their processes embrace the underlying structure of the conventional design process, they incorporate kinesthetic activity, as well as creative thinking throughout their entire design process. Maslyn's interview study with seven avant-garde landscape architects determined that none of the design professionals used "the traditional linear design process that is sequential and logic-based" (Maslyn 2002, 134).

(3) Assumption: Most design programs in landscape architectural education focus primarily on conventional design processes and professionalism rather than the development of students' personal design processes.

Design Process and Education

Students need to learn the fundamentals of the profession and the primary elements of design (Boyer and Mitgang 1996; Murphy 2005); however, once a student begins to develop more expertise in and familiarity with the design vocabulary and elements, they should be given freedom to explore their place as designers (Kvashny 1982, 104; Lawson 2004; Eckbo 1950, 9; Kneller 1965). Students should not be limited to specific conventions for design representation (Hunt and Kingery-Page 2010; Pallasmaa 2009; Marusic 2002, 95; Kneller 1965). By showing fewer examples of projects and giving experienced students less project information, students will be able to think more creatively (Kvashny 1982, 104; Lawson 2006; Hunt and Kingery-Page 2010; Collado-Ruiz and Ostad-Ahmad-Ghorabi 2010, 479). Finally, one set process model should not be used throughout the entirety of a student's landscape architectural education.

(3) Initial Theme: Avant-garde landscape architects use a personal design process that has evolved since being taught the conventional design process in their formal landscape

architectural education.

A landscape architect's design process evolves as they develop expertise in landscape architecture. Typically, students are not taught their personal design process in school; however, as in art education, professors can encourage students to explore and find their personal students must be taught the fundamentals of landscape architecture in school. Again, according to the Boyer Report, it is vital that students learn the framework and common expectations of design; however, landscape architectural education must encourage diversity within their curriculums too (Boyer and Mitgang 1996). Being an accredited program in landscape architecture means having a well-balanced curriculum in which students learn about the fundamentals of practice. Many landscape architectural education curriculums cover the "basics" but could deepen their focus on design (Boyer and Mitgang 1996).

Avant-garde landscape architects learned a conventional design process in school then transformed the process to make it unique. If given an opportunity to explore different design processes, students could develop a personal design process before graduating that can continue to evolve throughout their careers.

Design Process, Creative Process, Creativity and the Avant-Garde (4) Assumption: Kinesthetic use of media directly affects both the creative process and design process due to the interaction it creates between the designer and the designed.

When landscape architects allow themselves to experiment with different media throughout the design process, they create a more personal relationship between themselves, the site, and the overall project (Hunt and Kingery-Page 2010; Lawson 2004; Pallasmaa 2009; Ramljak 2009, 46). Similarly, they become more personally invest in their work. Finding artistic means of design development encourages greater creative thinking through the kinesthetic act of creation. In addition, by using more hands-on tactics, ideas keep flowing and concepts develop throughout the entire project rather than immediately working designs into the computer (Askland, Ostwald, and Williams 2010, 4; Pallasmaa 2009; Corner 1992, 144). By limiting computer use in the early stages of design development, landscape architects become less inclined to lock into their first design ideas (Tai 2003, 113). These "hands-on" tactics for landscape architects can range from model building to using a sketchbook.

(4) Initial Theme: Avant-garde landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking.

When looking at the built projects of avant-garde landscape

architects (see Chapter 4) it becomes apparent that each avantgarde landscape architect approaches design differently than most landscape architects. The design process of avant-garde landscape architects plays a key role in their development of both functional and avant-garde spaces.

The process of avant-garde landscape architects incorporates both the psychological phases of creative thinking and a more physically engaged design process. The avant-garde landscape architect focuses on kinesthetic development in order to form relationships with sites, explore appropriate materials, and learn the true character of the site. Each avant-garde landscape architect represents design in different ways and understands the importance of both the computer and artistic media.

Appendix G: Work Schedule

Semester 1:

August – September:

- Literature Review Research
- Abstract
- Background and Intent
- Research Questions

September – October:

- Methodology
- · Literature Review Research
- Assumptions and Initial Themes

October - November:

- · Bibliography Work
- Interview Questions
- Criteria Developed for Subject Selection
- Literature Review

November 4: First Contact for Interviews

November 15:

- Follow-Up E-Mails
- Interview with Thomas Balsley

November 17: Interview with Mikyoung Kim November 18: Practice Final Presentation November 19: Follow-Up Phone Calls

November 22 to December 9: Continue Work on Proposal

December 2: Final Proposal Presentation

December 9:

- Interview with Del Harrow and Diana Cooper
- Final Proposal Due

December 10: Interview Lisa Rundstrom and Ted Adler

December 13: Updated Abstract due to CELA

Semester 2:

December 12 - February 14:

- Transcribe Interviews and Coding Round 1
- Proposal Edits

January 29: Interview Claude Cormier

February 3: Interview Peter Walker

February 14 - February 20: Chapter 2 Background Information

February 20 – February 25: Edit Chapters 1 – 3

February 26 – February 28: Coding Round 2

February 28 - March 2: Landscape Architect Matrix of Findings

March 3 – March 5: Artist Matrix of Findings

March 5 – March 15: Multiple Rounds of Analysis of Matrices for Emergent and Initial Themes

March 16 - April 6: Reiterations of Matrix of Findings and Themes

March 24 - March 28: CELA Preparation

March 30 - April 2: CELA

April:

- · Proofreading
- Edits

April 2 – April 6: Subject Profiles
April 7 – April 18: Findings Write Up
April 18 – April 25: Conclusions

April 25 – April 30:

- Appendix and Figure Organization
- Work Schedule
- Acknowledgments

Semester 3:

May - July: Final Book Layout and Edits

May 1: Rough Draft of Document May 10:

- Approval to Schedule Final Defense Presentation
- Rough Draft of Book to Committee

June 10: Final Draft of Book to Committee

July 6: Final Defense Presentation

August 12: Book Uploaded to Graduate School

Appendix H: Example of Sampling Criteria for Interview Subjects

Martha Schwartz (Martha Schwartz Partners)

Work is evidently influenced by avant-garde thinking and art:

- Bagel Garden: Inspiration came from Manet's "Dejeuner sur l'Herb" painting and what he was also trying to represent through his art work (Brown 1991)
- Cubist: Gris, Picasso, and Rauschenberg, "who have taken materials which have little or no dollar value and through composition created works which transcend the material to become a thing of great beauty" (Brown 1991)
- Minimalist Inspiration: Morris, Andre, and Judd, who "rigorously strive to pare down an idea to the quintessential and simplest element while maintaining the strength of the idea" (Brown 1991)
- Pop Art Influence (Schwartz 2004)
- Work portrays allusions to contemporary movements such as Pop Art, Minimal Art and Land Art (Weilacher 1999)

Background in art:

- Background in both the fine arts and landscape architecture
- Installed numerous art exhibits around the world since 1980
- "They [Walker and Schwartz] have an outstanding knowledge of modern art and their collection of modern works is impressive" (Weilacher 1999)
- Works directly in the field of art and sees her work as being directly related to Pop Art and Land Art of the sixties (Weilacher 1999)

Frequent Past Collaboration with Artists:

 Not much collaboration because she does all of the art work design herself

Process based in Artistic Practices:

- Schwartz emphasizes the importance of the visual as opposed to programmatic elements of landscape architecture (Brown 1991, 140, 144-145)
- Promotes the idea of landscape architecture as art from the idea of landscape architecture as an art form to the idea of the individual landscape architects as an individualistic artist (Brown 1991, 140, 144-145)
- Began the first wave of new landscape architecture through her "Bagel Garden" (Brown 1991, 140, 144-145)
- Promotes the idea of landscape architects as individual artists and landscape architecture as an art form (Brown 1991)
- Argues for a broader exploration of materials that are contemporary on their own times (Herrington 2007)
- No limits to materials and colorsin her designs (Weilacher 1999)

Highly Published:

 According to Martha Schwartz Partners website, Schwartz and her works have been published over 100 times in the 2000s alone

Quotes from Schwartz on Art and Landscape Architecture:

- "Landscape architecture must finally be judged as a form of fine art" (Brown 1991, 145)
- "We've gone beyond the earthworks artists. The people doing the
 most interesting work in the [landscape architecture] profession
 are beyond where the earthworks artists are, in that they [earthwork
 artists] are still involved in making forms and sculpture. The next
 step is to get beyond that into manipulation of space" (Brown 1991)
- Believes the medium for landscape is the contested ground where the typical materials used by landscape architects since the profession formed over a hundred years ago can be challenged (Herrington 2007)

Appendix I: Contacted Landscape Architects for Interviews

Thomas Balsley (Thomas Balsley Associates)

Claude Cormier (Architecture de Paysage)

Adriaan Gueze (West 8)

Kathryn Gustafson (Gustafson, Guthrie + Nichols)

George Hargreaves (Hargreaves Associates)

Walter Hood (Hood Design)

Eelco Hooftman (Gross.Max.)

Mary Margaret Jones (Hargreaves Associates)

Mikyoung Kim (Mikyoung Kim)

Peter and Anneliese Latz (Latz and Partners)

Ken Smith (Workshop)

Martha Schwartz (Martha Schwartz Partners)

Michael Van Valkenburgh (Michael Van Valkenburgh Associates)

Peter Walker (PWP Landscape Architecture)

Ted Adler (Professor at Wichita State University)

Barry Badgett (Professor at Wichita State University)

Diana Cooper (Brooklyn, New York)

Patrick Duegaw (Wichita, Kansas)

Del Harrow (Professor at Colorado State University – Fort Collins)

Judy Pfaff (University of Wisconsin – Madison)

Lisa Rundstrom (Visiting Professor at Wichita State University)

Paul Sacaridiz (University of Wisconsin – Madison)

Appendix J: Contacted Artists for Interviews

Appendix K: Contact Letter

November 4, 2010



Emily King Kansas State University XXXX Fremont, Apt X Manhattan, Kansas 66502

Martha Schwartz Martha Schwartz, Inc. 147 Sherman St., Suite 200 Cambridge, MA 02140

Dear Ms. Martha Schwartz:

My name is Emily King and I am a graduate student in landscape architecture at Kansas State University. I am currently studying creative process in design and art. I am interested in interviewing you as part of my study to enhance my understanding of creative process. Using the information discovered through a series of interviews, I hope to develop a way to enhance the teaching of design process.

Information extracted from your interview will be used as the raw data of my study. The information will be coded in order to identify specific phases of creative process and to identify when key steps or activities in design process are carried out, as well as what triggers creative thinking. Then, it will be compared with coded information gathered from other landscape architects and artists who will also be interviewed about creative process. Results of my study will be published in my masters thesis.

Two examples of the types of questions I will be asking are:

- What are some keys ideas, themes, or content in your work?
- Please describe your most recent work.

I hope that you will find time to talk with me and allow me to ask you some questions about your creative process. Please do not hesitate to contact me for more specific information.

I will contact you the week of November 15 with a follow up e-mail to ensure that you have received my letter and to see if you are willing to set up an appointment to talk. If you have questions, please contact me by phone at 314.807.7636 or by e-mail at eking@ksu.edu. I appreciate your time in considering my request.

Sincerely,

Emily King, MLA Candidate 2011 314.807.7636 eking@ksu.edu

Artists and Landscape Architects

- 1. What made you interested in art/landscape architecture?
- 2. Please describe the types of landscapes/art you design or what are your favorite types of landscapes/art which you design?
 - a. Why do you consider yourself a _____ artist/designer?
- 3. What are some key ideas, themes, concepts or content in your work?
 - a. Why do you choose to incorporate these ways of thinking into your work?
 - b. How do these themes or concepts set you apart from other artists/landscape architects?
- 4. Please describe your most recent work.
 - a. How did you begin working?
 - b. What was the source of inspiration for you last project?
 - i. What about ____ inspired you?
- 5. In the beginning of the project, or any project, do you have any particular habits or working spaces that you use in order to spiral creative thinking?

a.	Why do you need to	or go to
	to get your brain working?	

- 6. Describe the media you used throughout your most recent project.
 - a. Do you have any specific reasons for choosing certain medias during certain phases in your process?
 - b. How do you think the media you use throughout the development of your project affects the final outcome?
- 7. Were you taught a working process or a series of steps for creation in school?
 - a. Do you still use the entire process or any part of the process you were taught?
 - b. How is your process different from what you may have learned as a student?
 - c. Now that you have begun to master a personal design/ creative process that suites you, is there anything you would change about the way you were taught process in school?
- 8. Would you define your work as being avant-garde?
 - a. Does the term "avant-garde" have any role in your work?
 - b. Does your working process have an impact on the avantgarde quality of your work?
 - c. Do you see the idea of avant-garde as being a positive or negative way of thinking about design?
- 9. How would you define creativity?

Landscape Architects Only

- Have you personally ever faced obstacles to creative thinking or freedom of expression in your practice?
 - a. Can you please describe these limitations?
 - b. Why do you think these limitations on creativity are placed on landscape architects?

Appendix L: Interview Questions

- 2. What value do you feel a conventional design process with more emphasis on creativity and creative process would bring to landscape architecture?
- 3. In today's society, what do you feel are the most common dilemmas landscape architects help to solve?
- 4. What do you feel your role is as a landscape architect?

Coding Key: Conventional Design Process

Appendix M: Original Coding Key

CDP – Conventional Design Process

- **RS** Research Stage of Design Process
 - a. **RSIP** Identity of Place (History, Culture)
 - b. **RSSA** Site Analysis (Research, Preparation)
- **AY –** Analysis Stage of Design Process
 - a. **AYA** Analysis
 - b. **AYD –** Diagram
 - c. **AYP -** Program
 - d. **AYR** Relationships
 - e. AYU Users
- **SY –** Synthesis Stage of Design Process
 - a. SYD Designs
 - b. SYM Media
 - c. **SYP** Production
 - d. **SYPS** Problem Solving
 - e. **SYS –** Solutions
- **EV** Evaluation Stage of Design Process
 - a. **EVBW** Built Works
 - b. **EVR** Review
 - c. **EVS** Suitability

Coding Key: Creative Process

CP – Creative Process

- **PR –** Preparation Phase of Creative Process
 - a. **PRA** Analysis
 - b. **PRE** Expertise
 - c. **PRP** Problems
 - d. **PRR** Resources
- **IN –** Incubation Phase of Creative Process
 - a. **INA** Activity
 - b. **INB** Breaks
 - c. **INH** Habits
 - d. **INR** Relaxation
- **IL –** Illumination Phase of Creative Process
 - a. **ILI –** Inspiration
 - b. **ILM –** Media
 - c. **ILMD** Making Decisions
 - d. **ILRS** Resolution
 - e. **ILRZ** Realization
 - f. **ILTA** Taking Actions
- **VF** Verification Phase of Creative Process
 - a. **VFD** Design
 - b. **VFE** Evaluation
 - c. **VFS** Solutions

d. VFV - Verify

Coding Key: Attitudes of Landscape Architects about Creative Process and Landscape Architecture

RO - Role of Landscape Architects

DL – Primary Dilemmas Landscape Architects Face

CH – Changes Needed

CR – Creativity

ED - Education

OB - Obstacles

LM – Limitations on Creativity

VL - Value of Creative and Conventional Design Processes

Appendix N: Original Coding Key with Interview Questions

Artists and Landscape Architects

- 1. What made you interested in art/landscape architecture?
 - CR Creativity
 - ED Education
 - RO Role of Landscape Architects
- 2. Please describe the types of landscapes/art you design what are your favorite types of landscapes/art which you design?
 - a. Why do you consider yourself a _____ artist/designer?
- 3. What are some key ideas, themes, concepts or content in your work?
 - a. Why do you choose to incorporate these ways of thinking into your work?
 - b. How do these themes or concepts set you apart from other artists/landscape architects?
 - CDP Conventional Design Process
 - CP Creative Process
 - PR Preparation Phase of Creative Process
 - IN Incubation Phase of Creative Process
 - IL Illumination Phase of Creative Process
 - RO Role of Landscape Architects
 - VL Value of Creative and Conventional Design Processes
 - CR Creativity
- 4. Please describe your most recent work?
 - a. How did you begin working?
 - b. What was the source of inspiration for you last project?
 - i. What about ____ inspired you?
 - CDP Conventional Design Process
 - CP Creative Process
 - RS Research Stage of Design Process
 - AY Analysis Stage of Design Process
 - SY Synthesis Stage of Design Process
 - PR Preparation Phase of Creative Process
 - IN Incubation Phase of Creative Process

- IL Illumination Phase of Creative Process
- 5. In the beginning of the project, or any project, do you have any particular habits or working spaces that you use in order to spiral creative thinking?
 - a. Why do you need to _____ or go to _____ to get your brain working?
 - CP Creative Process
 - PR Preparation Phase of Creative Process
 - IN Incubation Phase of Creative Process
 - IL Illumination Phase of Creative Process
- 6. Describe the media you used throughout your most recent project.
 - a. Do you have any specific reasons for choosing certain medias during certain phases in your process?
 - b. How do you think the media you use throughout the development of your project effects the final outcome?
 - c. Do you think there is anything especially unique about the media you use or how you use different medias?
 - · CDP Conventional Design Process
 - CP Creative Process
 - IL Illumination Phase of Creative Process
 - VF Verification Phase of Creative Process
 - SY Synthesis Stage of Design Process
 - EV Evaluation Stage of Design Process
- 7. Were you taught a working process or a series of steps for creation in school?
 - a. Do you still use the entire process or any part of the process you were taught?
 - b. How is your process different from what you may have learned as a student?
 - c. Now that you have begun to master a personal design/ creative process that suites you, is there anything you would change about the way you were taught process in school?
 - CDP Conventional Design Process
 - CP Creative Process
 - ED Education
- 8. Would you define your work as being avant-garde?
 - a. Does the term "avant-garde" have any role in your work?
 - b. Does your working process have an impact on the avantgarde quality of your work?
 - c. Do you see the idea of avant-garde as being a positive or negative way of thinking about design?
- 9. How would you define creativity?
 - CR Creativity

Landscape Architects Only

- 1. Have you personally ever faced obstacles to creative thinking or freedom of expression in your practice?
 - a. Can you please describe these limitations?

- b. Why do you think these limitations on creativity are placed on landscape architects?
 - LM Limitations on Creativity
 - OB Obstacles
- 2. What value do you feel a hybrid creative and conventional design process would bring to landscape architecture?
 - VL Value of Creative and Conventional Design Processes
- 3. In today's society, what do you feel are the most important dilemmas landscape architects help to solve?
 - RO Role of Landscape Architects
 - DL Dilemmas Landscape Architects Solve
- 4. What do you feel your role is as a landscape architect?
 - a. How do you go about fulfilling this role you have created for yourself?
 - b. Do you think the role of all landscape architects is the same?
 - RO Role of Landscape Architects

Appendix O: Example Excerpt from Hand Coded Interview

the door and want to hear everything they have to say. We have found that when we do that, they, in turn, give us the trust and artistic license that we need to really turn it into an excellent design space. It doesn't just have the things they want but they give us the ability to give it very contemporary forms and we get to play with these notions of friction and provocative kinds of gestures which they might not otherwise appreciate had we not gone through the dialogue with them. That's the second part of it. Then, in terms of a designer or artists, somebody has to go back into their office. and roll out some paper and begin to imagine this space. For me, I do a lot of visualization, I do a lot of layers and layers of tracing and scribbling but the key to it is that I am always working over a design base which has all of the critical site analysis factors on that design base. Often times you see people just designing with a piece of paper over a blank slate. They have gone through the whole process but it's in a file or in another stack of drawings in the other room. Every moment of their thinking which went into that design is not right in front of them. I want it in front of me because I want it to have been a meaningful process and I want it to influence my visualization. I have a method where I try to create a compilation of all of the factors which should be influencing my design and they are on the underplayed design base sheet which I lay tracing paper over. It's always there and it can be reproduced constantly. Whenever I need it, it's always there, it's always with me. I think that is why we have developed a reputation. Our designs have been very powerfully embraced by the public in a very sustained way. They are not just a little "flash-in-the-pan" ideas from artists. They really seem to have a deeper meaning with them and really seem to touch the cord of the public they are intended to serve. That's a little method that I have found is a very effective way to make sure everybody is

Appendix P: Second Coding Key

Conventional Design Process (Sasaki and Koberg's Stages)

Conventional Design Process – CDP

- (1) Research RS
 - a. Accept the Situation RSAS
 - i. Site Analysis
 - ii. Historical Information of Place
 - iii. Cultural Identity of Place
 - iv. Initial Design Ideas
- (2) Analysis AY
 - a. Analyze AYA
 - i. Diagrammatic Elements
 - ii. Ideal Relationships of all Factors
 - iii. Programming
 - iv. Design Requirements
 - v. Analysis of the Site and User
 - b. Define AYD
 - i. Find the Major Problems which need Solving
 - ii. Determine the Goals of the Project
- (3) Synthesis SY
 - a. Ideate SYI
 - i. Conceptual or Schematic Design based on all Information Collected
 - ii. Finding Possible Solutions for each Problem and the Elements Required
 - iii. Design Development
 - iv. Aesthetic Considerations Considered during Design
- (4) Evaluation EV
 - a. Select EVS
 - i. Final Review of all Designs
 - ii. All Factors and Solutions Considered to Chose the Best Suited Design
 - b. Implement EVI
 - i. Construction Documentation
 - ii. Implementation of Design
 - iii. Construction Management
 - c. Evaluate EVE
 - i. Evaluation of what was Learned and Successful
 - ii. Evaluation of Final Product

Creative Process

Creative Process - CP

- (1) Preparation Phase PP
 - a. Finding the Problem PPF
 - Looking at the Problem from Every Angle
- (2) Incubation Phase IN

- a. Activity to Evoke Creativity INA
 - i. Breaks from Design
 - ii. Habits
- b. Relaxation INR
- (2) Illumination Phase IL
 - a. Time of Inspiration ILI
 - i. The "ah-ha" Moment
 - b. Use of Different Media ILM
 - c. Making Decisions ILMD
 - i. Resolution/Solutions to Problems Considered
- (3) Verification Phase VF
 - a. Evaluate and Verify Findings VFE
 - i. Check Solutions

Attitudes of Landscape Architects about Creative Process and Landscape Architecture

- (1) Landscape Architects LA
 - a. Role of Landscape Architects RLA
 - b. Dilemmas faced by Landscape Architects DLA
- (2) Creativity CR
 - a. Limitations to Creativity LCR
 - b. Drivers for Creativity DCR
- (3) Education ED
- (4) Art and Landscape Architecture ALA
 - a. Relationship of Art and Landscape Architecture RALA
 - b. Avant Garde AG
- (5) Value of Creativity in Design VCD
 - a. Value of Creative Process within Conventional Design Processes **VCP**

Appendix Q: Mikyoung Kim		What made you interested in landscape architecture?	
		Let's see, that's a good questions, I started in sculpture and I	
		have a sculpture degree from my undergraduate studies. I think that I	
BBP		was really interested in a combination of sculptural form with public	
DDF		interface, like public media, public space, and environmental issues. I	
		think it was a hybrid of issues that brought me to landscape architecture.	
			
		Can you describe the types of landscapes that you design?	
Γ		We design a really wide range of landscapes. We do some work	
		with public art commissions. They tend to be environmental art pieces	
BPF		and, at the other scale, we do urban planning and landscape planning.	
		We have a firm, my firm is one in which we do a wide range of work. We	
		do work in Abu Dhabi, which is very large scale, to last night I was in	
		Washington D.C. where we have developed a lighting kaleidoscope	
Γ		piece that is on the Potomac River. And so it's just an interesting eclectic	
225		mix of work. In the end, we think of design as anything that is creative,	
BPF		anything that you are making for the public realm, and anything that you	
		can engage with your body.	
		Would you say this idea of having elements where you are really engaged and having the whole overall idea of creativity, are those some of the key ideas and factors that go into your work? And are their other	
_		major factors and ideas which you consider when you are working?	
		I think we're always trying to invent with materiality. Trying to find	
BPF		new materials, more innovative materials to experiment with and that is	
DCD		the role that a lot of our art projects play. We can take on even very small	
DCR Experimentation		art commissions but only if they're very interesting or exciting, we'll take	
Project Choice Freedom		them on because we think it is an opportunity to explore a material that	
		we do not know very much about. Then, we take that knowledge and	
LCR		bring it to our landscape projects, which, basically, in terms of	
Budget Constraints		investment, landscape projects have less room for that kind of research	
L		or less expectations for that.	
		How do you think your use of art and sculpture and having that	
		background, how do you think that sets you apart from other landscape	
		architects who might be going for the same jobs as you?	
		You know, that's a really broad questions and I think it really	
BPF _ Art is Commissioned		depends on which landscape architects were competing against. As a	

generalization, I think many landscape architects know the field where they deal with the ground. Sometimes they work in teams with other LCR Art is Commissioned artists and with architects who will design the objects or the architectural features in projects. What we offer when we go into interviews and we talk to clients is that we offer an integrated approach within our firm where we're interested in designing both. We're interested in designing **DCR** architecture and we're interested in designing sculpture and we're Interest in Art and Landscape interested in the field and landscape. We see all of that as landscape Architecture architecture. Maybe it's that we're not interested in designing what only ILM takes Podium; but we are also interested in designing things that emerge Variety in Materials from the surface and from the ground. Can you describe one of your most recent works and go through the process you used beginning with the absolute earliest phases of idea generation through the final product? Okay. Well each project is different. When you start a project, it's like developing a relationship. You develop a relationship not only with the project itself but with the client and with the client groups and the site and with who you are creatively at that time. It is a very complex thing. There isn't a fixed, unfortunately, there isn't a fixed set of operations that we take to get to something that we think is a project that we would want to build. Even currently, for example, we are doing a project at the Dallas airport, it's an interiors project, versus we're doing a project we are doing at a university. Were doing a couple of institution projects, and different projects have different demands from the clients. That does affect how **BPF** you work through a project. I would say, generally, the way we work is to go and see the site **RSAS** and meet people who are going to be using the site and we really get a Culture sense of what is truly unique about that place and build upon that to Site Analysis bring a new vision to that place. Then, we come back and I try to figure AYA Users out what some materials are that we are interested in and which Relationships materials are appropriate to that project and research that. Then we SYI come back and we build probably 40 to 50 models for a project during Conceptual Design schematic design. We really try to work iteratively through that project in ILM Media order to figure out conceptually what that project is about. It's very much like school, like studio, we keep pushing, we keep

doing it until it's right. And maybe that's another thing that makes our

LCR

Bottom Line

LCR office unique against, say, maybe a larger office which is really reliant on **Bottom Line** the bottom line. We really do work like a studio, almost like an artist RALA studio where we keep pouring things until we really decide that this is the DCR Constant Idea Generation way we should go. And then, once an idea is set in motion, we share it SYI with a client, we try to integrate issues with the client but we've been very **EVS** Review fortunate in our projects in that clients really hire us for the work we've DCR done in the past. They generally respect the vision we bring to the table. Reputation So we don't have, I think since we started off listening, we really don't Clients can be Positive have a lot of pushback throughout the project in general. Then, we go through the standard process of design SYI development, construction documents, and then construction EVI administration. Those are all phases of design, just more and more detailed phases of design. We're currently doing a job in Chicago at the Crown Sky Garden in the new children's hospital there and we're in construction administration right now but we're still doing design work. We are still figuring out details and we are still trying to figure out the concrete details, like "is it colored concrete," and we are getting samples and so we're very involved in every phase. In the beginning of your personal process, do you have any places you go or habits that you partake in that help you to start your creative thinking and be able to sit down and generate ideas? That's a good question. I think that it is hard for me to work in the office during office hours, I think, just because the phone is ringing and **LCR** Office Environment you're dealing with the administrative side of what an office entails and you're also working with a team. I think it's always on the weekends or **DCR** Less Distractions later on at night when we sit down with our team and brainstorm and we go back and forth and things are quieter and there's just more time to **INR** Quieter Places focus. Usually the best time, and the place is less important. I find often, I have a family, and I find, I have a desk setup in a private room in my home and most often, after my son is in bed, it's often a very fruitful time INA for me from 11pm to 2am because no one is going to bother me and I Mikyoung's Creative Habits really can focus on the one task at hand. I'm a night person so I'm really awake at that time and it's a really creative time for me. So as I'm talking,

I guess that's the place I feel most creative.

SYI Cycle of Development until it Works But, it's not a singular process though. What happens is I'll often bring in a clay model or a sketch and we'll pin it up and we'll have a discussion about it. Then, maybe there will be part which I cannot quite figure out and I will ask someone on the team to try three different ideas for it. And then, we'll meet again and sometimes it's, "Great, this will really work" and sometimes it's, "No, it's still not quite right." So I'll take the model that one of the team members has done and take that home and go back to my space at home and try again. So it's very, we really just do whatever works.

You mentioned that you work with clay models or sketches or other forms of models, are there any other media you use during the beginning phases of your creative process?

Sure, we use, basically when we're making models, when I'm making models, when anyone is making models, we really try to figure out what is the best material to use to represent what we are doing. So when we're working with ground, clay is a great material because it talks about topography, it's very fluid. What we're trying to find is the closest materials that mimics the fabrication of the actual materials itself. If we're working with stone and were stacking it, we might work with chipboard. If we're working with steel, we might get paper and fold it. We just try to find the most appropriate materials for the materials we are actually using.

In terms of drawing, we use a lot of technology in the office. I think Illustrator and Photoshop are incredibly powerful tools but we still hand draw and sketch. It's just a combination of whatever is most appropriate. If we're doing something that is a modular system and we are trying to figure that out, we will use the computer rather than drawing everything by hand. So it's really about trying to figure out which different tools in the toolbox are best and finding the most appropriate tools for the appropriate task.

With the specific materials that you are using and picking materials based on the projects and the process, how you do you think that affects your final outcome or design?

Can you ask that questions again, I want to make sure I understand it.

ILM Material Choices

DCR Specific Material Selection

DCR Specific Material Selection ILM Models as Continuous Inspiration

DCR

First Instincts
Remember Initial Ideas
Value in Concrete Models
Client Trust

AYD Goals Requirements

> LCR Clients

DCR Client Trust Sure. When you are picking the very specific materials for model building, and really thinking about your process and the materials you are using, how do you think that affects your final project? Or what value does that have in the creation of the final project?

Well, I would say that often, well as I said earlier, we can make up to 40 models in a given project, that the first couple of things that are made in the office are often things that we go back too. Just seeing that as a pattern is that we can figure out, we go through different details and different materials but in the end, that first instinct is often the right one either on the larger scale or on the smaller scale.

So the first models we make are often very important throughout the processes; they're also a reminder as you move through more and more detailed work on the project, it is easy to forget what the original intent of the project was and get caught up, a lot more people get involved as you move through the later phases of design. You keep those in the back of your mind and remind yourself that it is what the project is really about and try to maintain the essence of that, especially since there are some decisions which need to be in projects where you are doing value engineering in a project. That's a great exercise in teaching you how to really decide what is important in your work and what's a deal breaker for you. What is a time that you have to walk away from a project because you are working with a group of people who say, "We don't want this portion of your project?" I think it is important to always remember that, "This is what your project is about and without this, there is no project." It's always very easy to forget that when you are working through these things. The initial conceptual models which are made are really important in that respect.

In this process that you are discussing, where you start with more conceptual models then move forward, was this a process that you were taught in school, when you were studying landscape architecture, or is it more of a process that you have developed and made personal over time?

Yes, I think I learned pieces of it in school. I struggled when I was in school because you would think that the fine arts or the applied arts, which is sculpture in design, would be a really easy transition but my experience was that it was not. In fine arts, you are basically making things directly with your hands and there is a lot of decision making

ED Landscape Architectural versus Art Education

RALA

ED Landscape Architectural versus Art Education

RALA

ILM Value of Materials Materials for Reality which happens. There is less planning and less design and more intuitive action on a material. That transition to something where you have to preplan without the actual materials was a very difficult process for me to figure out how to do. I think the compensation that I have made and that our office has made through the many years that we have been here is that we do a hybrid. We'll always when we do specialty items, we will do a hybrid where we will make larger, specialty items, well we do not make them but we work closely with fabricators who do and we see them and it slows down for us to actually see things at full scale and understand the materiality is.

It is a constant struggle to understand scale and precision of materiality. When we are working with light, it's always very tricky because you can do a lot of computer renditions and studies with computer programs but there's nothing like having the actual light there on the actual materials, there is always something unexpected. It's always a combination.

When thinking about creative process, and you just mentioned a more artistic way of thinking in creative process is a difficult thing to carry out in landscape architecture, from my research I have found that many landscape architecture firms do turn to a more conventional design process and a lot of times this makes them lose a more creative process and the things which really spiral this creative thinking. What value do you think a strong hybrid of creative process and conventional design process that starts out being taught in education, what kind of value do you think that could bring to landscape architecture?

I don't know. I don't feel I am in any position to judge the profession, I just know what works for me and for my office. I think you're right, that the way we operate is probably different than 80 percent of the firms in the country; but I don't know what their internal workings are so I feel reluctant to give advice because I think everyone has a different agenda and I think that's what's so great about the profession. You can operate and if creativity has a certain scale, then you can decide where you place yourself on that scale.

I think there is room for many different ways of working and many different ways of making a project happen in an innovative way. I don't know, I guess I was traveling with one of my team members to D.C. yesterday and they were saying to me that they felt the office is very

DCR
Opportunities for Landscape
Architects to be Creative are
Everywhere

am also on academics and I think a lot of really good things come out of that exploration, not only at work but also for the designers at hand.

I think that the thing I fear the most is that the longer you do

I think that the thing I fear the most is that the longer you do something, the more classified you can get. Clients can also say, "Well we like that project you did ten years ago, can you do that for us?" And we always tell them, "No, we'll show you previous work but you are not going to get something quite like that. It might be something different.

You're different, your place is different, and I'm different now." That is the way it should be. We don't believe in franchising design but when you want to make a unique voice for each project, it's like raising a child, it's very hard and very arduous but you have to maintain an ethic about what you think the work should be and how you think it should be done.

much like school. I think that is a model that I have taken just because I

It's not to say that we are not a financially viable structure, we are. It is just that in the past two years when things have been very financially difficult for many firms, we have maintained a certain stability. I think that maybe the advice I can give is not that you should be like us, but that you should be unique and be true to what you believe in. You should be authentic because people trust authenticity. We don't really do much marketing, we do a lot of work through people see something and they thought that's interesting. Typically marketing is like online dating, you are trying to find the people who appreciate what you want to do.

And ideally that's what you want to do as a practitioner, find the people who like what you do well, what your office does well and if you can find a client that does that then... We have clients who we go to for projects and they are very impatient and say, "We just want something, we don't want to go through all the stuff." And we know right away that it is not the right match and it's nothing personal on either end. We are just very straightforward upfront in who we are and how we work and some people really love it. They love being a part of it and they feel like they're creative too and that is a lot of fun for us. If you want to just make money you should be a stockbroker, not a landscape architect and if you want to be a landscape architect, you might as well enjoy what you are doing and try to get what you can out of it.

Would you say the specific clients that you go to, is their attitude about the type of work you do the biggest limitation to creativity and freedom of

LCR Client Expectations

DCR
Ability to Choose Projects
Personal Ethics

DCR Financially Stable

> LCR Clients

DCR Honesty Good Clients expression or are their other things, which influence how creative you can be and how free you are to do a design that is very artistic?

I think that landscape architects also are business people and they are salesmen. You have to learn how to make people believe in designs that you believe. It's really a series of people getting up and convincing an audience. The more your work looks distinctive and out of the norm, the harder you have to work at fulfilling your ideas. Different people have different styles on that. We persuade. We bring people to the full and persuade them to get on our bus and join the journey.

Ask your original questions again.

It was asking about what the biggest obstacles are to creative thinking in landscape architecture?

Different clients have different kinds of requirements and we have different kinds of clients. We work for the federal government and we work for the state and we work for individual private clients and there are different parameters for each client group but we always try to find something interesting within the project which makes it worthwhile for us to be doing that I think as we are emerging as a younger firm, that is what we are doing; we are investing and figuring out who we are as a firm. You know you are going into your thesis and we are still working on our thesis and figuring out what the work is about. Not to depress you but it takes a long time to figure out what it is and not what is in the magazine. It's very hard because there are always these trends and you think, "Okay, I like that but it's not really me," and you just have to stay try to what you believe in and figure out who you are throughout the process.

In terms of clients, it is not necessarily that private clients are the most free, there really isn't an equation. I do believe that a good client makes a good project. And a bad client, or a very intrusive client, they can make a project very difficult. That's both in terms of the design process itself but also in terms of how the long term strategic planning of landscape is made in an area. If a client breaks up a project, like if you look at the greenway here in Boston, if a client breaks that up into too many pieces, it is inevitable that a project like that won't be as successful as you would hope because the overall vision of the client is not confident enough, not bold enough.

LCR Creativity is Hard to Sell

> DCR Client Trust

> > **DCR**

DCR and LCR Clients Because you do make an effort to make sure that you are not doing anything which is cookie cutter or something that has already been done or that you have already done, would you consider your work to be avant-garde?

AG

I don't really think it is my place to judge that. I don't know. I don't know what avant-garde means. I think that what we just try to do is just make things that are new, that are new to the people who engage with it and it creates excitement. I think we are interested in all of the layers in landscape: ecological, topographic, and cultural; but, ultimately, we are also interested in creating sculptural vision. And somehow, those layers frame that sculptural vision.

LCR Trying too Hard Not Thinking Freely I don't really know, I don't think that I'm, well I think that as a creative person it is very dangerous to do too much self-analysis. It's kind of hypocritical for me to say that as an academic but I do believe that if you spend too much time worrying about what category you fit in or who you are, I think that can be very dangerous. It is important to figure out what your work is at hand and understand where it is going.

How do you, as both an artist and a landscape architect, define creativity?

I think it's a feeling. You know what I mean, maybe in a small way it's in the process. It's a kind of verb, no it's not a verb but it's something. Children do it quite often and we as a society often pound that out of young children; but, it's an internal world that you create that's defined by external conditions. You're imagining something, you're doing something in your mind's eye and you have these tools like drawings and models to basically communicate that to other people.

ILM Media to Communicate Ideas

So when you read about other great designers, like Frank Lloyd Wright or great composers, different people have different ways of presenting their ideas. I was just reading that Frank Lloyd Wright and Mozart are similar in that they basically composed the whole thing in their mind and then sat down and wrote it out. That's a brilliant mind and that's a brilliant imagination that they had. And others are like Beethoven, and I don't know a corollary architect or landscape architect but if you look at his manuscripts, there are pages torn through because there are so many iterations and so many ways of trying and it goes back to your question about application of typologies for firms and as a profession or the definition of avant-garde, that imagination is an individual endeavor

and it is something that emerges from a mind and then is shared with the general public.

Do you think helping people find their creativity and develop their own personal ways of designing is something that can be taught in education or do you think that's something that simply takes time and experience?

I think that teachers can open doors. I think that teachers can create exposure. I think there are different ways of designing. It is hard to say what's successful and what's not; but, I think that process can be taught. Someone can teach how to get in tune with each individual's creativity rather than a kind of standardized way of teaching. I think that can be very difficult for people to figure out what their own process is; but, I don't think that someone can tell someone else what their vision should be. That's a different system, a very old fashion system, and in that system, creative people rose out of it and had to prove themselves that they weren't just a staff member and they were beyond that.

We have a different educational system now where everyone is more democratic and people have the opportunity to really go in and try to find who they are through their work in the institution of thinking: however, I think sometimes grades are given based on success and how that is defined currently changes, like in the 80s that was different than what it is now. We look back at people who were very successful in the 80s now with less interest and that will again in twenty years from now and those are fads and I think that's very dangerous to judge someone's work or to create, like when you see a studio and all the work looks the same. I think that's just a very different type of teaching that is not necessarily a creative process but is more about skill building.

What do you feel your role is as a landscape architect?

I think it is to make people aware of the landscape at the everyday scale. I'm interested in landscapes where people inhabit that landscape 600 times a year. I'm not interested in Disneyland. I'm not interested in places you go once a year or once a month. I am interested in the challenge of everyday; how you create poetics for people when they are going to work in that trajectory that they take every day. How they take their kids to a park, and how art can performative like music where it can transform as people engage it and that can keep it fresh for people so they can continue to find new things in a place.

ED

RLA

BPP

RLA

When thinking about the conventional design process and even creative process in landscape architecture, a lot of times it is about experience and the user or the general perception of the place, but a lot of times a big part of landscape architecture is problem solving, so my question is what do you think are some of the biggest dilemmas which landscape architects are faced with today?

I think that the perceived limitations are what make incredible opportunities. I think landscape architecture is moving into a realm of becoming more and more important in the designs of cities and towns. So I think that in a way which it wasn't when I was first starting in the profession.

Can you ask your questions again, I'm sorry.

Yes, it was just what do you think are the biggest dilemmas which need to be solved by landscape architects?

I think there are safety and code systems which we deal with all the time and those are integrated into our thinking now. We just try to find an inventive way to make those things happen.

Maybe the biggest challenge I see is the globalization of the profession, that there is not as much work in the United States right now and a lot of work internationally so we have a lot of professionals going overseas to work in the Middle East, China, and Korea and doing work in places which they know less about. I think that's the biggest danger, making sure that the globalization of the profession doesn't create a homogenization of landscapes around the world. It's not to say that I am against landscape architects working in regions which they did not grow up in, but like I said it's just really important for people to be open and be like a sponge when they go to a new place.

I think often there is a disconnect from a connection, which I think, is wrong to make between real creativity and well I don't know what the word is. I think it is important to think that from the modernist era there was this direction of applying a vision despite where the site is and where you are. And I think that there should be a more flexible language of creativity that landscape architects develop that would allow them to be more open and work in these different places and push back and enhance the visions that landscape architects have rather than it being a one way conversation; rather than landscape architects going to a new place and bringing their vision there instead of figuring out what could really be different.

RALA

DCR

Appendix R: Thomas Balsley

What originally made you interested in landscape architecture?

Oh man, you can't ask that question. I ask that question whenever I give lectures and I can tell you that the stories are all over the map, aren't they? Very few people grow up aspiring to be landscape architects. We stumble and roll into it from one place or another. And mine was that I am one of three brothers who are all landscape architects and we all went to Syracuse and up until a few years ago we all lived in New York. My older brother stumbled into it in the conventional way of hearing about something, or this or that; but it was after he was in school already. And then, he in turn told me about it, I was in a different major for my first year, and I became very interested in it and so I gravitated into it. Then low and behold, our youngest brother, whose ten years younger than me or us, took an interest in it watching his older brothers and then he enrolled. It was one following the other in this case.

BPP

Can you describe the types of landscapes you design?

I'll try. We really design everything from very small intimate landscapes, small little public spaces and small little courtyards, and roof terraces all the way to very large scale urban plans involving hundreds or thousands of acres and the whole open space and streetscape systems that go hand and hand with new developments at that scale. So really the work that we do covers an entire range of scales from large to small to public to private.

BPF

What are your personal favorite projects to work on?

DCR
Accepts Risks and Challenges
BPP

BPP

That would be, I do not have to hesitate on that. It would be urban parks, urban parks, and urban waterfronts. They give me the greatest satisfaction, represent the greatest challenges, as one might expect with this direct correlation with the challenge and census satisfaction and gratification. I really get myself to stay focused and energized by those types of challenges and those kinds of projects. Mostly because they have the potential, in fact, they do touch literally thousands to millions of lives in ways, which enhance urban living and urban lifestyles and the model for urban living and it being an alternative to the suburban sprawl model. There's a lot of other things which go with urban parks, in terms of the kind of impacts it can have on our society and sustainability that also peaked my interest and have held my interest for the past thirty-five

BPP

or more years. So I've been pretty consistent with that, <u>especially since I</u> was one of the few landscape architects who really had a total focus on landscape urbanism but now it has begun to pick up a little steam and more and more people are interested in it and hopefully the profession will become more focused on that type of thing.

In your urban parks and waterfronts, do you have any key themes, ideas or concepts that you use when you are designing?

RSAS Looking at the History of a Site

Well, a few things come to mind. One is with waterfronts they are almost always postindustrial waterfronts and, or course, with that comes a lot of challenges. Environmental implications from the previous use so we have to deal with mitigation and all of that; but, also, with those waterfronts comes an extraordinary amount of history. It typically is the history and heritage of a city in its early inception. And so along those waterfronts we actually have a chance to uncover that history and celebrate it as a reminder of the meaning of that place and why New York's west side was New York's west side and why it was so successful and why it grew and all of these places where we're standing there and imagining a park where we should also feel like we're almost on hollow ground. And almost all waterfronts and postindustrial waterfronts have that quality and potential. So one of the themes, and I don't like the word themes, so ill just say one of the factors which influences it is the uncovering of that history, in other words giving that site meaning. It certainly will have meaning as we move into the 21st century and how it touches our lives and all of that but also the meaning from its past. We want that part of that experience, not in a theme park kind of way, but in a way, which it can be felt as one moves through the spaces. That's a very big part of my work. If you look at the waterfront work we have done, you'll typically see that.

DCR Accepts Risks and Challenges BPP

DCR Non-Traditional Thinking Another part, I enjoy, I'm not a path of least resistance kind of person, so I think my personality comes out where I enjoy a good fight, by that I mean I like to, in my design, I like to setup a friction and actually have a dialogue between what appears to be opposing ideas, like a very, powerful architectural contemporary form rubbing up against a very powerful landscape or a very natural element. I'm constantly setting up those points of friction that, I think, provides sustained interest for the visitor. They're almost provocative, in a way, you don't just go to a park and sit there and stare up at the leaves. Yes, you can do that, but I can

DCR Non-Traditional Thinking also drop down and be inspired and be stimulated by these other kinds of dialogues that I try to setup and frame within that spatial experience.

Obviously that plays out in a lot of different ways but it seems to be very successful in making these, taking them beyond just park making and moving them into place making that really involves the psychology of the experience.

For one of the most recent projects, which you were highly involved in, can you describe what the project was and how you began working?

You mean the design process?

Yes, beginning from the very beginning with how you generated ideas?

A good one might be, we just finished a brand new downtown park in Tampa, Florida. Actually it was on this site that was occupied by an old museum who turned its, it was on a riverfront site, which is where downtown Tampa is right on the river, and it was on a riverfront site that had turned its back on the water, the museum had turned its back on the water and a parking garage was there. So the core of downtown did not actually have any connection with its waterfront or access to it in any kind of meaningful way. We were hired to do that park but my instinct was that we really had to step back and really take a broader look at the urban context and imagine that, "This can't just be a pretty park. It has to be a park that was really revitalized with activities throughout the day and there are certain activities or uses which can happen in this park and ensure that those activities happen." So we proposed that the museum, that the parking garage get torn down. We proposed that a new museum be built and a new children's museum be built against the edges of the park that would frame the park with those kinds of activities. Then, we proposed a waterfront rest down on the other edge of the park along the water that would also provide activity for that edge. Then, we proposed a park pavilion with little bicycle shops, etc along the far edge of the park. So we really did a lot of urban design, urban planning work.

Beginning to setup and frame the space with activity and urbanism before we ever actually begin to have an image of what the actual park would look like because those things had to be in place and those things had to have an overall influence on the design of the park.

We went through an awful lot of contextual, well in school they're teaching it to you as site analysis, but for us in an urban setting it really is

RSAS
Initial Design Ideas
PPF
Look at the Project from every
Angle

AYA
Project Requirements and
Program

ILMD
Solutions to Problems
Considered
AYD
Setting Project Goals
Problems and Solutions

RSAS Site Analysis RSAS Site Analysis

AYA User Analysis

AYA
User Analysis and Program

DCR Building Client Trust and Public Outreach

SYM
Schematic Design
ILM
Materials Used in Process

LCR
Lack of Expertise on the Project and Site

DCR Expertise on the Project and Site

SYI
Design Development based on all Site Factors

DCR Client Trust, Positive Public Opinion and Meaningful Projects an understand of the urban systems which are going to be at work around these open spaces and make them vibrant spaces. So when we do urban work, we really have to go through that process.

The second part is outreach. Some people just have a meeting with the public and the public is a few people who might have the courage to actually get up and speak and say a few works and that's the extent of the outreach. For us, we really put together a task force and committees are setup so we can develop a dialogue with the people and earn their trust and show them we are listening and really give them the idea that we do not have a preconceived notion, that we are actually coming into this process as a blank slate, we've left our design egos out the door and want to hear everything they have to say. We have found that when we do that, they, in turn, give us the trust and artistic license that we need to really turn it into an excellent design space. It doesn't just have the things they want, we have to prove that it does, but they give us the ability to give it very contemporary forms and we get to play with these notions of friction and provocative kinds of gestures that they might not otherwise appreciate had we not gone through the dialogue and the outreach with them. So, that's the second part of it.

Then, in terms of a designer or artists, somebody has to go back into their office and roll out some paper and begin to imagine this space. And so, for me, I do a lot of visualization. I do a lot of layers and layers of tracing and scribbling but the key to it is I am always working over a design base, which has all of the critical site analysis factors on that design base. Often times you'll see people just designing with a piece of paper over a blank slate. They have gone through the whole process but it's really in a file or in a pile of drawings in the other room. It's not part of their every moment of their thinking about that design is not in front of them. I want it in front of me because I want it to have been a meaningful process and I want it to influence my visualization. I have a method where I try to create a compilation of all of those factors which should be influencing my design are on the under-laid design base sheet which I lay tracing paper over. It's always there and it can be reproduced constantly. Whenever I need it, it's always there with me.

I think that is why we have developed a reputation. Our designs have been very powerfully embraced by the public in a very sustained way. They are not just a little "flash-in-the-pan" ideas from artists. They really have a deeper meaning with them and they really seem to touch

DCR Client Trust, Positive Public Opinion and Meaningful Projects

the core of the public they are intended to serve. That's a little method that I've found that is a very effective way to make sure everybody is always on the same page when it comes to that important criteria which should influence our design thinking.

You said a lot of what you use is trace and a great base to work from but are there any other media you use throughout your process? Or is it primarily trace paper?

ILM Process Materials We use models. We model physical models. We do computer modeling. We obviously lose some trace to computer and back and forth and play around in that way. We use Form Z. We don't use Sketch-Up much but we use those models.

Thinking back to where you started, when you were in school, would you say you were taught a specific working process in a series of steps or was it more of a free process, was that something you developed more on your own?

Well I don't want to give Syracuse a bad reputation, and I don't think I will be, I just think that that process I described is personalized. It's not one size fits all. So I would say, "No we were not taught the process," and one can say, "Well you weren't taught it because it is a very personalized process." But on the other hand, if I had one suggestion to programs it would be that they expose students to a number of different processes that people have used and found successful so they can find which one might fit them. It is a way of accelerating their ability to plug into something that seems to be accepted or well suited for them.

It's like if you went into a store and bought a suit and the only thing you can chose from is to say, "Well they are going to measure me for the suit and I can get it in four weeks." You would really like to see it and try a few on very quickly to get a feel for how they look. That's the best analogy that I can draw but I think it gives students something to dig their hooks into and I think sometimes when you're a student, I'm sure you relate to this, sometimes you feel like you're just wandering and you're a little bit lost and don't really have any solid ground. You really just need something to stick your hooks into.

It's just like drawing. For example, I could sit with students and in about a week have them walk away with extraordinary drawing skills for

CDP

ED

ED

LCR
Computer as a Limiting Factor to Creativity

ED

ED

AG
Thoughts on the Avant-Garde

VCP

Creative Process to aid in Moments when the Avant-Garde is Important

LCR

If Designers do not think their Projects should ever be Avant-Garde, it would limit Creative Thinking drawing plans and sections because I have developed a method for that. You do not have to have a lick of artistic talent to be able to do it and those drawings look extraordinary. It's just a method. Well they should be given those kinds of opportunities so they can begin to, so they can communicate their ideas quickly. Yes, the computer, to a certain extent, is designed to help them, in that regard, but it can't move as quickly as a moving hand across a piece of paper. Typically, it can't anyway.

Anyways, I think that we need to give students some real, something to get their teeth into, something that's very useful to them at the same time that they're being exposed to a great education in all other respects. I think design process would be one great way of doing that; to see what you're interested in here.

Yes, I completely agree. That's quickly becoming a major focus for the thesis work I am doing right now.

Well, you know, <u>not a lot of schools are interested in the design</u> <u>process. Not in a creative, artistic kind of way. I'm finding there's less</u> and less emphasis on that so hats off to you.

Thinking about your interest in this very creative and artistic design process that you use yourself to develop your contemporary, designs that challenge the site and look for that potential, would you say that overall your final designs could be thought of as being avant-garde?

Some more than others. It really depends on the situation and the client and what I think is called for. I guess someone would say, "Martha Schwartz is avant-garde"; but, if I were a city and I only had one urban park space in my downtown to be designed and we were hinging our whole future and the quality of our life downtown on that one park, I would probably not want to be avant-garde in that situation. It's just too important and precious and can't be experimented with; whereas, there are other situations when absolutely it's almost, I think it's imperative that people are innovative and provocative and avant-garde to push the profession and push the edges; but, we don't all get a chance to play like that. Not everyone is supposed to be avant-garde and not everyone's projects should be avant-garde in all situations. I think it's just a matter of being very responsible and selective about when you do that and when you don't do that.

How would you personally define creativity as a landscape architect?

RALA

LCR Clients and Audience

RALA

DCR Being Tactful

ED

Well it's different than creativity as a fine art. Creativity as a landscape architect, we have an awful lot of masters, and they are constantly talking to us. The natural environment is talking to us, the environment is talking to us, the urban context and that environment and that habitat of people, humans, is talking to us, communities are talking to us, neighborhoods are talking to us, different constituents and groups who have different interests are all talking to us. Constantly talking to us. It's almost to the point where you feel like no one cares about your voice or your artistic muscle so your creativity has to be redesigned and find a way to express itself within that barrage of demands. As opposed to fine art when you can just sit in your studio and just, "How do I feel today" and "Let's just see if I can express it." That's not what landscape architecture is and never was. It's a different kind of creativity.

Quite honestly, I had a conversation with Michael Van Valkenburgh the other day and he and I were having lunch and comparing notes, which we do sometimes, and one of the things we both came upon was this notion that one of the keys for each one of us with our own relative success has been our ability to be very creative and very tactful. Tacticians. We have to be tacticians, no one is teaching that in school. But what good is a great idea if you haven't figured out a way to lead hundreds of people to that watering hole and then ask many of them to write checks to pay for it to get built? You have to be very, very tactful, very diplomatic and that's part of the creative process also. Schools do not like to talk about that. Students come out of school thinking they are just going to design something and someone's going to build it. But I think it's better to get an idea that it's not going to be that easy and here are some other things you might learn about how to actually get your ideas built. That word creativity really covers a lot of ground going all the way up to things like being tactful or a tactician.

We talked about this when thinking about education, but in the professional world, what value do you feel a very strong hybrid creative and conventional design process could have for landscape architecture? Thinking that all landscape architects and every process is in a lot of ways a creative process, I'm talking about having more of a focus on design process and the beginning phases of design and the creativity and developing the creativity that's involved in that process?

You'll have to break that down for me. I'm not sure I understand what the questions is. Can you try again?

Sure, from the research I've done, I've found that, in many ways, because of the ground base education, which is in many ways based off of a more conventional design process with specific phases and things that have to be accomplished with less of a focus on unique ways of generating creativity and really getting your mind thinking about creativity in design, the questions was: thinking about those two types of processes and what you get out of them, what do you think the greatest value would be if everyone was taught this creative process, with the conventional design process too? Just a hybrid of those two things, what value do you think that hybrid would have for landscape architecture if everyone was able to think that way and had that base of education?

Well, everybody would be better, wouldn't they? I'm teasing you. What your describing, this hybrid, if you will, or a new more progressive approach, I don't know what you want to call it but if everyone were introduced to that and plugged into it, I think we'd see extraordinary results. Certainly, the more conventional aspects of the design process, of the creative process, have to be there. That's the foundation of it all. It wouldn't be the conventional approach if it didn't have a reason for being what it is but it does not mean to say that it can't be improved upon and made better. I think that's the hybridization you're talking about. It seems to me it can only just get better.

You know, for example, although not always you see, for example, I was having this little thing about, now do you start your design process with a computer and a mouse or a tablet or do you do it with a piece of paper and a pen or a pencil? Which one of those is progressive?

I guess you could see that in either way.

Is the person that's pushing the pencil on a piece of trace automatically seen as conventional and old fashion or are they doing that but with very progressive ideas in their mind? This is a very interesting thing I run into with the generational gap between the young students that come in and start working here and my methods. I don't think anybody would look at my designs and think "some old fart, Frederick Law Olmstead wannabe is putting work out of that office." They would think it's all being done by some young landscape architect. What I am saying is, and I think its what you are saying to actually, that the old and more conventional method and the newer more progressive methods

VCP

CDP

VCP

VCP

VCP

can be brought together and that mix, I think, would be better for everybody.

Yes, that's exactly what I'm talking about too.

DLA

LCR Fear of the Unknown or Failure

DCR
Expertise in Design, Experience, and Embracing the Unknown

LCR Fear of the Unknown

RLA

In landscape architecture today, what do you feel are some of the biggest dilemmas that landscape architects are helping to solve?

Biggest dilemmas? O I guess I'm supposed to say, "A way to make the world more sustainable." right? Isn't that what I am supposed to say? Because that's what maybe too many of them are focusing on at the expense of some other important things that they should be doing. I would say, and I am prejudice this way, but I would say that as a whole, the profession of landscape architects has subconsciously ignored or run away from the challenges of making our cities rich and vibrant and healthy and livable. And there are a few reasons for it.

Back in the 60s and 70s and even 80s, our cities were on the decline, they were going bankrupt, and they were dangerous places to be. The parks, you couldn't even talk about doing a park in New York City. They would say, "Okay that's fine, do a park but don't put a park bench anywhere in it." It was horrible, and you are guys are too young to have even been there but it was just horrible.

So to take on the huge challenges of going into a city and doing that kind of work, it involves extreme amounts of energy and patience and knowledge and now you have to be as smart as the planner, as smart as the engineer and as smart as the architect. You can't just say, "I'm a landscape architect, I don't know how to do those things." To do that work, you have to know as much about those subjects as you do landscape architecture and this is a real challenge. And so subconsciously we have just avoided it.

We've gone off to do wetlands and storm water management and green roofs and anything that would allow us to stay in our little corners and play by ourselves. The real hard work and the real major contributions that landscape architects are supposed to be making are in those places. There is really no one else better suited, as a generalist, than a landscape architect to address the urban situation. Architects are object oriented people, engineers are just what they are, and planners are too broad and can't really take it all on. In fact, read a blog by Charles Birbal, it just came out yesterday or the day before and he talks about how landscape architects are supposed to be leading this charge

RLA

RLA LCR Gaps in Training but we are not prepared. The profile of landscape architects is not a scrappy person willing to bump heads with architects. That just isn't the profile, ilf you think about the kids in your class, just think about them, where they came from, why they came to school, why they wanted to be landscape architects, I can tell you it wasn't because they wanted to bump heads with engineers and understand traffic radiuses and waterproofing membranes and things like that.

We all say, "Yes, we want to do that," but then no one gets into the ring and fights for it. That's what landscape architects should be doing, if you ask my opinion, but they're not. And they are not being trained to do that either. So there we are. A few of us are out there doing it but it's lonely.

What do you feel your role is as a landscape architect?

I think I've answered that question. My personal role is just that. Our profession is very obsessed almost, or focused I'll say, on sustainability but it's the sustainability of natural systems, it's not social sustainability. If you just think about, and I've lost the statistic but if you just think about the thousands of acres of land that are lost every hour in the United States to suburban sprawl, why do we have suburban sprawl? Because somebody believes that we all want to live out in the suburbs. Why would we all want to live out in the suburbs when we can live in a city with great parks and great museums and great infrastructure and public transportation and exciting life in the street and meet our neighbors and blah, blah, blah? Why? Because that's what we've been brainwashed to believe we can do. Saint Louis was a million people in 1910 or 20. Now it's less than 400,000 people. And you can look at downtown Detroit, and you can look at a lot of these cities. These cities are there. They have the infrastructure, the streets, the roads, and the schools. All we have to do is infill housing and we are being the most sustainable people we can possibly be. If you think about sustainability, the most sustainable way that humans can live together is in a city model and yet our profession is busy, busy, busy trying to figure out how to do a wetland mitigation. Why aren't we busy, busy, busy trying to figure out how to keep people in the city and offering them a better alternative to the suburban lifestyle?

So, I believe my role is to stop suburban sprawl, to save the environment through my work, and the urban environment, to make sure

RLA

RLA

it's a better alternative to suburban living. That's a big challenge but that's what I see my role as.

Appendix S: Claude Cormier

Could you tell me a little bit about yourself and what made you interested in landscape architecture?

BPP

Well my first degree is in agriculture. I have a degree in plant science and then, at that time, I was interested in becoming a plant breeder. After I finished my undergraduate in science, I realized that I did not really enjoy it at all. Then, I entered landscape school at the University of Toronto and loved it completely. I fell in love with the notion of cities and drifting from this idea of nature and agriculture and culture in the city. I did that and completed that and then after a few years of practicing. I went back to do my masters in history and theory of design. There is kind of this gradient of identity and now practicing and actually taking cues from my background where I grew up on a farm, and science, and I would say, some of the history and some of the theory and combining all of that within the reality of the project. It's a mixture of things combined in my background.

Although I have looked at the projects you have worked on, I was wondering if in your words you could describe the types of landscapes you design or even your favorite types of projects to work on.

I like projects that are done for a collective, for people in general. I can't do residential work; it bores me completely. I am not interested in that. I am much more interested in that kind of, I would say, when there is a kind of political agenda mixed with a social agenda within the site that is regulated by many different realities. I like the notion of dealing with history, with ecology, and social structures. I would say the more complex, the better the project gets. I think the notion of difficulty is a strength to me. For me, those are my favorites.

Maydayay say bassyayayay

Would you say because you are more interested in the design for people and the social agenda, do you think that contributes to why many of your projects do look more artistic?

No, I do not actually know where that comes from. It comes from

within. I guess I embrace my intuition, it's very much the process. I like to work for a more universal quality of things. I like things that can be registered by the general public and are not just for academics. Actually, maybe I am reacting to it a little bit because I think the world is so not general in a sense. And I think when I see, for example Sugar Beach or

projects like that, and when I see people who are enjoying themselves

BPP / BPF

BPP

DCR

Complex is Better

BPP / BPF

tremendously in a city, by sitting under a pink umbrella in kind of a recycled plastic terrace in white sand, that brings me a lot of pleasure. It becomes very extreme, it becomes difficult in that sense and there are not that many places in cities that do that for the common user.

I would say that for me, when we see a project, it is thinking

fundamentals of reading historical maps and being able to translate that

into design and that can transcend or elevate those aspects of a site.

And, of course, embedded with an added element of bringing new

energy into a place and I think the fact that we work in color; it's an

added layer to it. By using color, it's always very embedded and

not just a decoration per say.

about all that can really enjoy it and that the academics also pay attention to it and I like that double reality. I think that probably my graduate school helped me connect theory and history back to the

BPP / BPF

DCR Use of Color

> RSAS History

> > With your use of color and the other elements, which go into your designs, have you ever considered your work to fall into the category of avant-garde or has that idea ever played a role in your work?

connected back to some idea of a site or a place or even the history. It's

Maybe. Some of them maybe, Blue Stick or Lipstick Forest, could be. But what is avant-garde? Maybe it is, I guess.

A British writer found it as a school of thought in landscape conceptualism. I think it defines what we do quite well. Sometimes with just one singular large move, or singular idea, the whole project is shaped around it and it has a very conceptual approach. That conceptual mind we develop, that language, we selected material and plants and grading and it all works towards that singular idea where the world of conceptualists becomes a place. He has that book *Avant Gardeners*, so I guess he does define that as a movement but I do not know how seriously that thing is staged; but I appreciate it because I think it's a really clear way of defining how we works, as well as others in the practice of landscape architecture work, around the world with that commonality. That is how I would link the avant-garde but I do think the avant-garde is much broader or complex than that.

Are you doing your work in theory?

I am actually focusing on the creative process and using avantgrade or creative thinking in general as being components of creative process. I have been studying how incorporating creative process and

AG

DCR Embrace the Avant-Garde

192

the activities which encourage creative thinking can have a positive influence on the conventional design process that is used by many landscape architects and education.

I think the creative process is either you have it or you do not.

Some people will try all their life to find it. I think it's something that you acquire and it's something you can learn but I think there is something within the individual. It does not come with all individuals. Some other people have better quality in delivering and managing the complexity but maybe can't elevate it. That is a very funny way that the mind works.

I think there is one rule that could completely flip the whole process around and when that things flips, then you can have the whole thing working with you in building it; but its how do you trigger it? I do not know and I know some people, they would try to and they just cant and don't know why. Some people just have that naturally. I think it's delayed but I think it needs to be developed and it needs to be nourished and you need to trust it too. You have to be smart enough, while rational, to sell it as a civil servant as well.

So that becomes a notion of strategy and how do you bring it forward in projects to be able to sell it into public territory because usually people are afraid of everything and selling something new to those people, you have to be really well prepared to do it. Otherwise, it does not happen. Somewhere along the road it gets killed because of the fear and also the notion of "if you haven't seen it before, it's probably not good." In that process, in your career, you define the highlights and in order to make something happen, you also need a client that respects and understands that unknown of designers that makes them particular. And if you don't want something that has been done before than that notion of trust is so important between the two. And if its not there, I don't think it's possible to happen. If the client is a good sport, that thing will involve a project from beginning to end.

I find that the more advanced I get in my practice, the more I search for those clients; otherwise, it goes nowhere or it's very, very difficult. Maybe in the residential world, maybe, but I have not seen it that much because all of the residential work is actually very boring. It's more about a stylistic move than working with fundamental ideas but I am sure there could be some pretty fantastic private commissions.

ED
Can Teach Creative Process

LCR Embracing the Process

ILI Changes Everything

ED Nourish Creativity

DCR Embrace the Process

LCR
Bad Clients
Fear of New Ideas by the Public

DCR Good Clients Sell Ideas to the Public

> DCR Expertise Client Trust

LCR Stylistic Design So do you think that the clients that you are going to for projects, would you say that they become the biggest limiting factor when it comes to how creative you can be for projects or do you think there are other limiting factors as well?

How creative you can get in their project?

Yes, and when I say how creative, I mean how different or avantgarde you can get on a project? What limits those ways of thinking on a project?

I would say I approach all projects within the same framework and it's more of an attitude that the designer has and that attitude, well it's like a fashion designer or a film maker, you have a language, your mind is set in a certain way and you respond to given problems by a process.

I think that is it, and it's not always linear in that sense, but I know for me it goes very quickly at the beginning. If we have an idea it is, "Where are we going to go quickly?" I think I have the ability to transcend all the kinds of issues related to a project and distill it quickly. Then, it's how do you demonstrate the physical and that kind of thing. I think that creative process is a flash that is able to condense that quickly and compute a solution quickly very, very quickly and then after that the process is working backwards.

There are other layers with that same intuition at work to start breaking it down into layers and site issues instead of obsessing about one after the other and developing it further down into detail design and while working in detail design, going back to the biggest idea and working it into the cycle.

While you did just explain a great deal of your process, I was wondering if you could choose a project that you are working on now or one that sticks out to you and go through the process you used beginning with the earliest stages of inspiration or idea generation through the final product?

Sugar Beach could be one. I know when we were doing that we were at the meeting at the beginning when we were competing for it. The site was not that great but at the same time it was fantastic. This is where the notion of the painting of the rocks came into place and quickly the idea of that beach came up, instantly. I do not know why. I had the idea that we could actually develop this in relationship with the bigger refinery that was next to us and lay off with that notion of being in the city

DCR Attitude

PP Looking from Every Angle **DCR** Expertise in Representation ILI Flash of Ideas ILMD All Problems / Solutions Considered **VFE** Check Solution and Move Backwards **RSAS** Site Analysis **ILMD** Solutions / Problems

> Considered AYA

> > Big Idea

RSAS Site Analysis

ILI Inspiration AYA Relationships

AYA and creating a kind of place that did not exist. That would actually Relationships become a place that everybody wanted to come along because the city. AYD right downtown, is facing the edge of the lake; it was working with the Goals idea of the beach and that idea of becoming an urban beach. By adding the word urban, you start creating other possibilities and it starts to be a place that has the beach phenomena and also has certain urban AYD Goals qualities combined together. The fact that I did study genetics and I was interested in plant breeding, which is actually crossing elements together to create something new, I think that is how I work in design as well. I take elements that may not seem compatible on the first site and put them SYI together to invent something new. So you get this notion of urban beach, the quality of taking two **PPF** Finding Every Possible Angle different things and starting to put them together; then, the notion of the pink umbrellas came together with the notion of the light pink, with the notion of sugar and sweetness and the notion of the big boulder as a AYA hard rock candy and also as a big boulder like the ones that set north of Diagrammatic Elements Ontario in cottage company with the mix of phony lakes and all that stuff. AYD It's making reference to something else in combining them with each Define the Project other, like the notion of sugar as a kind of candy that became a big boulder like boulders at the beach. It's just setting up a frame until you **ILMD** can create possibility. So when you write down the final detail design, each object and SYI each place within that park was always with that kind of mindset. That is Solutions Found Aesthetics how we build the whole thing and once you're there, you do feel it. I think people feel it. It has an incredible spatial quality and there is that notion of sweet and sugar. It sells. And when the sugar is unloaded at the sugar refinery next to the beach, it creates quite a beautiful place while you're in the city and while the industries are working next to you. I would say this is the notion of inter-place, instead of being at a normal park that is green and in tact and has benches. I think it's adding **DCR** a narrative into a project and into the process that starts to work. It's a Original Ideas Revisited New Ideas about Parks storyline from which a project is about. It's a narrative by which you Narrative design the project. And this is the narrative by which you're able to sell the project and then you start naming it. That is where the name "Sugar Beach" came up and just with that name you can start building a mental image. Everybody in the city knows the beach and what it is now. So it's

a mindset by which you approach the project.

When you are working on projects and developing your designs, what types of media do you use when coming up with different concepts and ideas?

ILM Mixed Media

DCR Precedent to See what had been Done Just the normal tools that we have which is all the programs that you have in your computer, sketches, using precedents, and also mixing precedents together; that shows where you start and where you're going. Sometimes with very few images, you can express where you want to go. So that's using precedents in a very direct endeavor. Not copying one place, but using it as a stepping board of where you want to get.

In the beginning of projects that you're doing, do you have any particular places you go or things you do to help you get your mind going and get ideas flowing?

Not really. I wish I did. Not really but I guess it's just being aware of where you are and paying attention to places and how people interact. Pay attention to general culture other than just landscapes. I would say even better is to pay attention to that but pay attention to the outside world of landscape, its great, absolutely. It's very general. You always have to keep a little subversive mind as well, you can't take it for what it is always but also being critical of things.

INA
Outside Comfort Zone
Look at other Things

DCR Make a Name for Yourself

> LCR Hesitation

RALA Example from Fashion Do not take everything for granted. It's very wide open. I don't go see them but I know when I do I love it because its just getting into someone's mind and getting into a new scenario which is just great and that's what we do in the design professions, we are creating a story. So then its how do you do it? It's very much like a narrative. I think art is phenomenal as well for that. Publicity is great, passion is good. I also like the notion of advertising because that is where the notion of bending, what I think, what something looks or feels like and showing what are our intentions other than being good and green. It's about being a little bit stronger and a little bit louder with our idea. We are polite and we are a little bit conformist. That is why I think the landscape has room, lots of room but we are too shy and too polite to use it. You look at fashion designers who are pushing the envelope, they take risks and they stay critical on what their position is and sometimes they are not projecting it but challenging it.

Thinking back, you talked a little bit about your education in theory and design, and you said that you took a lot of what you learned about theory and pulled that into design; but I was wondering, when you were in school, were you taught a lot of design process and if so, was it more of a structure process that you were taught or was it more free?

No, I do not think I was taught. Well, I guess I was taught a very traditional process which I think has merit because once you've got it, you can break it. It's a starting place and I think process is important and you have to be aware of it and you need one and you have to understand it and it is only when you do have it that you can start challenging it. Everyone works differently with it but the process implies that you start somewhere and you end somewhere. The danger of always using the same one is that kind of linear thing.

I think when you learn it in school, you learn more of a traditional format, which is good with the analysis of a given problem and moving from there to define the problem and then you come up with an idea and then you start coming up with a concept and then you start designing, right?

That is how we work as well but sometimes we mix it upside down. Sometimes, you skip analysis and go straight to the concept and then go back to analysis to prove that the concept works within the set of conditions on the site. But if you do it in the mindset that I am going to have an idea after I do analysis, no not necessarily; but, I think that process you learn in school is pretty much the same as all schools. Once you know it, then you challenge it. I think sometimes by doing that, it defines you as doing things differently than the process. You define your own process by doing. So that is something that, then, you can develop your style, your language as you do it. After a few years, it becomes your methodology for how you do projects.

Do you think anything would change positively in landscape architecture if when students who were in school, if they were given more freedom to take the process where they wanted to and develop ideas in whichever creative way they would want too? What value do you think having a creative process rather than a conventional design process would have?

Well that is a very good question. <u>I do not know but I would say</u> that maybe there are better schools than others because they may have a different format in learning your bag of tricks. Then, there are certain

ED Merits in Teaching Process

CP

LCR Assumptions

ED

VCP Value of Hybrid / Personal Process

> ED Structure Thoughts

ED Structure Thoughts

> DCR Expertise

> > **DCR**

DLA Sustainability

LCR Too Much Time on Sustainability LEED

LCR Too Much Time on LEED things which may not be fun and interesting but here are basic things which you have to learn, that are part of what you do. And in this, when you do it, I am sure there is a kind of way to have an open format in which you can have your creative impulses as well at the same time that you're learning the ABCs of the landscape architecture world, I think that is a more open format. I would hope that you would start right in the beginning with doing that but I think it needs a certain structure.

I believe in structure and I believe that within the structure there is a place which may not be seen as a structure that would allow each student to develop their own selves in design. I think that's what each school has; it's a curriculum of the ABCs of what you have to learn but then, maybe some schools have better gray zones which allow you to be creative. That is the challenge of each school. What is that curriculum in the first year, second, third and fourth year, or graduate school? I think that experience in life helps a lot. I think maturity helps because what we do is not as simple as creating a nice landscape.

It's open-ended so it can be abstract too. Much more abstract than architecture and I would say more difficult to do good work. <u>It's much more abstract</u>, it's much more than just doing a road with trees and landscape and all that.

What do you think are the most common or important dilemmas that landscape architects are working to solve today?

Well I think sustainability is a big one but I think that sometime we shall be able to elevate it to where it is built within our way of doing. I find that with everything wanting to be sustainable, sustainable, sustainable, you devote a lot of the time to that instead of focusing on different issues that should be taken care of and building it and elevating the kind of experience that we would like. I think sustainability should be a natural thing that we work with. I think that engineering and other practices might be taking it over and quantifying it and then making it a LEED thing. Everything is LEED but sometimes I find that I want to hit my head against the wall because it does not really make sense. It's much more of a quantitative way of doing things than the qualitative and I think that we should be able to do the two together; quantitative, but also an elevated matter of doing things with quality. I think that we can do it better than engineers, better than architects, and better than any LEED consultants. It's definitely a challenge that we have to take under our

belts.

What do you think your role is as a designer not only to your clients but also to society overall and the design world? I do not know. It's just something I really enjoy doing and I think I DCR Passion want to make a better world whenever I can. I do not want to live in the Wal-Mart world or in a dead suburbia. I do not want to live on a road that looks like everywhere else. I am hoping to make a place with a bit of soul or be able to recognize who we are and really demonstrate my own culture within my own geography. I do not want to make the world flat, I **RLA** want to make the world more distinctive and I think that is becoming more and more difficult and I am trying to break that. I do not know why but that's my contribution, I am hoping that will be my contribution. I look at some of my younger team members in my office when they write their professional exam and I was looking at what they have to LCR Expectations study to be able to be certified and I just wanted to scream. It's how to create the world flat. I would say this is the rule you have to learn, "Once **DCR** Challenge the Norm you know it, challenge it". Why does a curb have to be 6 inches all the time and why does a parking lot always have to look like a parking lot? Once you know how it works, and you have to know, I would say your goal has to be to challenge the norm and challenge the standardization DCR of the world. Absolutely, and that is what design can do; otherwise, the Challenge the Norm engineer can do it and let engineers do it. Then after, you can work with an engineer to get it built and that is the challenge. That is why you have to have a clear process with your design intentions so you can deliver it. I think it's a bit of a battle but I think that is why I believe in design. That is **DCR** Passion for Design why I love design, to challenge others, challenge the norm. How do you define creativity? I would say everything but a straight line. Even if sometimes a straight line can be the answer. Creativity is allowing unexpected elements to become a feature and embracing it and working with it. I **DCR Embrace Fear** think creativity is taking risks. It's simply seeing failure and embracing courage. I think it also brings the notion of pleasure into place. It can be CR fun. Being creative can be fun. I think some people think it's very frightening but if you decide that it's not, and you take more a positive **LCR** Fear outlook on it, then you can be creative in everything you do. Creativity is a mind set.

Appendix T: Peter Walker What made you interested or what brought you to landscape architecture? I was in journalism and I found out that journalism was all about writing which I didn't want to do. I wanted to be a published because my background was in art. So I was looking through the catalogues at Berkeley and I found this major that was 1/4 art, 1/4 architecture, 1/4 **BPP** landscape architecture and 1/4 general career and I said, "Well I don't know what a landscape architect is but I will go down there and take one course." So I took one course and we made models and we made drawings, and so forth, and ever since then I've been a landscape architect. You mentioned your background in art, can you explain that more? Well I had always drawn as a kid. I've gone to several art schools. I've taken several summer courses at California College of Arts and Crafts, what it was called then. I've always been interested in art. **BPP** photography, things visual. It started when I was four or five and I was drawing ever since, still am. I know your firm does a great deal of different types of landscapes but can you explain to me what types of landscapes your firm designs, briefly, or even what your favorite types of landscapes are to design? Well I think almost any kind of landscape we are interested in. Right now, we are doing about 1/3 of work on brownfields, where we are taking old, industrial sites, and bringing them back for recreation and other kinds of uses. We've done very large parks, several of them in Australia, several of them here, when you are going into industrial lands **BPF** and bringing them back. That is very interesting. Maybe about another 20 to 25 percent of our work is in doing rooftops, where they are new rooftops, but they actually want us to do a garden on top. Some of those rooftops are actually at grade level because it's a parking lot below but we have done an awful lot of work on structure. And then, the other large portion of work we are working on has

BPF

to do with redoing campuses: college campuses, medical campuses,

places that have been degraded overtime because, they basically ended up with just buildings and parking lots and to go in and redo those, the parking and the structure, and bring it back to something that someone

200

BPF	can walk around and call it campus. They tend to be fairly urban but we have worked at the University of Texas, University of Texas at Dallas, Stanford University, Cleveland Clinic, just a whole series of these projects where we are essentially transforming these parking lots into other things.
RS Analysis of Place BPF	Would you say, in your work, that there are any key ideas and concepts that are constantly being reintroduced into your projects? Well, an awful lot of our projects, because each one is a peculiar situation to itself. We work all over the world, so clearly climate and the lifestyle of the people who are in that area; so if we are in Australia, China or wherever has a huge effect on what we do. Another element that I think we are always very interested in is sustainability and making sure that these things, making the best use of particularly water, shade with reducing heat, water circulation if you're up on top of a garage and it goes down into a tank and then you use the water again. Rainwater collections, trying to get water back into the ground, recharge aquifers.
BPF	Those are some constant conceptual basis for which we work. We don't have a style, the designs we do are site specific. We don't have a product or a style.
	Although you have no real distinct style, would you ever consider your work to be avant-garde or does the term avant-garde ever come into play in your work?
AG Defining Avant-Garde in Landscape Architecture BPF Avant-Garde Firm	Well I think every important designer, architect, landscape architect at some time in their career is avant-garde because they're doing things that others aren't doing. Then, everybody catches up and they all do the same things that you were leading in. We had a time in the 70s through the 90s, perhaps, when we were the most avant-garde and we were one of two or three offices that was working like that. Martha Schwartz used to be a partner in this office, George Hargreaves,
AG	there were a number of people who were doing what I would consider to be very, very aggressive and modernistic, I guess, designs. Then, other
RALA	things come along, somebody else does something else. It's like painting, you might start off with something really, like Frank Stelli, you might start off with something really earth shaking and people are angry with you and so forth and that's how you find out how good it is. And then, later on everybody learns that, people try to go ahead, if you've

BPP been practicing, <u>I have been practicing for over fifty years</u>, people are bound to catch up.

Can you describe either a work that's in progress or one that sticks out.

Can you describe either a work that's in progress or one that sticks out to you that you worked on, can you describe the process that you used for it from the beginning inspiration that brought on the project through design development into the final product?

These things vary quite a bit. Obviously, if you are working on brownfields, you have reclamation and that tends to shape a lot of what you're doing. If you're on top of a building you pay attention to drainage, weight, water movement, all that kind of stuff. If you're working in these old campuses, in a sense its reclamation, but it's not industrial reclamation, its modern life reclamation, getting rid of parking lots and stuff.

I mean those are things that drive those projects and some of them are constant, one to another, but some of them are quite different one to another. We're working on two really large parks right now, one in San Francisco, actually in Oakland at the end of the Newbay Bridge. We're working on a project in Sydney, Australia to re-do the last long, it's about, almost a mile long piece of waterfront land that used to be a container port and now it's going to be a park. We're doing a project on top of the new high speed train station in San Francisco, a park that's seven stories up in the air, it's again about a half a mile long. We're doing the memorial in New York, which is top if a seven story building even though the building comes out at bay level. Were doing a sculpture garden, a huge one, 200 acres in Potomac, which is a rolling Maryland landscape. Were doing a lot of different things.

When you're working on projects, say the one in Maryland, or really any project, do you start with client meetings and then you jump to the project or do you start with something else?

Okay, I see what you mean. The first thing is you always meet with a client and find out what their interested is, what the purpose is.

Then, you go to the site and, depending on what type of site that exists, like in Maryland, or if it's a site like the memorial, which doesn't exist, it's just a hole in the ground, but you still have to visit the sites. What I am always interested in, is the connection within the site and dealing with what's across the street and what's next to it. You want to know what

AYA Ideal Relationships

RSAS Site Analysis Factors

> AYD Goals / Purpose RSAS

AYA
Relationships
RSAS
Context of Site

AYA Relationships RSAS Context of Site		kind of landscape you are dealing with whether it's observant, rural or whatever. In Sydney, I think it's really important that we visit the site because one side its water, it's on the harbor and that's the second stage.
SYI Design Development AYA	<u></u>	Then, the next thing is you produce, a little more than diagrams, but you produce some sort of conceptual directions, maybe one or two, and you talk to the client about it and you gradually find the direction you're going. A lot of times that stage will affect the program, people will see opportunities that they didn't see when they came to you in the first
Program SYI		place. You contribute to their knowledge and their understanding of where they might go.
ILM EVS Media Review ILMD Solutions		And then, you do preliminaries and you make models, we make virtual models so we can walk around them, figure out if you can build that model of the site and of the concept that's selected. You refine that concept and produce a set of preliminaries. Then, you generally have
SYI EVI Construction Documents Bidding		some costing at that point and you do some cost control. Then, you do design development, which is a much more detailed design, sort of half way between construction drawings and the concept, and then you finish up construction drawings and then you bid it. There are always problems when you bid, if you get high bids and
EVI Construction Management		low bids and you have to rearrange things to some extent. Then, the building begins and you do supervision and that may go anything from six or eight months to, like in the memorial, we have been supervising for four years and it goes on and on.
		In the beginning of the projects, when you are developing your concepts and doing the diagrams, other than the computer models that you talked about, is there any other media you use to develop your ideas?
		Well we're a firm that builds models, most landscape architects do plans, maybe sections, but we build models. We build models at every stage. Some of those models are physical models, which you
ILM Models		would recognize where we have buildings in them and all of that, but increasingly we are using digital models inside the computer and the reasons were doing that is because you can get real scale. You can put
SYI Aesthetics		people, they can walk around, you can look at it, and you can see what you're actually seeing.
LCR Drawings		Increasingly, my view is that the plan is not as useful as it used to be. What you really want to know is three-dimensionally, what you're

LCR seeing. Any device, model, section, whatever, any device which gives Drawings you a better impression of what is actually being seen and what a person would feel like being there, because scale is the most important thing. DCR This modeling, in one form or another, is really important. Sometimes we Media Use make the models like a movie where you can drive through it or walk through it to get an idea of what you're impression would be as you see the various elements of the plan. Also, at the beginning of your project or throughout the entire process, do you have any particular places you go or things you do that help you work or help you generate ideas? Well, I travel a great deal and whenever I go somewhere, I go see other projects that other people have done. I am always interested in what people are doing and you're taking a critical look to those. If you INA don't like what they've done, you figure out why you don't like it, and if Precedent Visit Museums, etc you like what they've done, you try and figure out why you like it. It's continuing education. You're going around and looking at plant materials **RSAS** Site Analysis if you're in a different place, if you're in Saudi Arabia or Sydney, Australia or if you're in Chicago, it's a completely different set of plant materials. And so you go around the area your working and the area your site is in RSAS Site Analysis and try to figure out what does well there, what could you use, what are INA things that seem to thrive and you go to nurseries to see what's Precedent Visit Museums, etc available. I think the other thing I do a lot, in each of these places, I love museums and I love sculpture, and so I try and see a lot of the museum, INA not just modern things but also historic things because they partly **RSAS** represent the culture and they partly represent visual ideas. I get a great History deal from looking at museums and looking at different things that artists have done. How do you think looking at art and sculpture, how does that play into the designs you are working on? Well have you seen any of our work? Do you know our work at all? Have you seen any of the books because I've described this in great length. Minimalist Gardens describes it, Visible Gardens describes my view of other people, historical figures, sometimes more recent figures, INA all of that. I mean landscape's are cultural and you have to keep Drawing

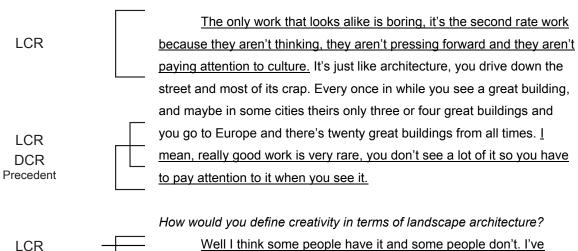
renewing your awareness and interest in culture, not only in new things

Inspiration

but old things. You need to keep educating yourself as to these things INA and I think that's important. I go to conferences, I like to see what other Drawing people have done, I serve on juries, you know, I see what the most Inspiration interesting work is of all people. I see ourselves as part of a culture, I also see ourselves as part of history. Were not independent, were not operating independently of those two things. When you were going to school for landscape architecture, did you find that you were taught more of a staged, conventional process or was it more of a free, creative process that you were able to develop on your own? Well, it goes back to what I just said. I don't think you do things on your own. In a way, there's nothing new under the sun. It may seem **DCR** new but it has reference to something and I think it's important that you ED know what those references are. If you're a painter and you don't know LCR anything about what happened in the past, you're just likely to repeat RALA what happened, you're not pushing forward. I think you have to be aware DCR of those references; you have to keep learning more about them. Awareness Once students do have the opportunity to learn the underlying structure of a design process, what value do you think it would have on landscape architecture if students were given the opportunity to do more of a creative process and experiment a little more with their own process? Well I think to some extent everybody has their own process but CDP also everybody has practices with certain projects. If you're in China now, your working in China, you're going to be doing work that is quite different from what's going on here. If you're here your doing work different than China. And people go back and forth, I mean we go to China and Chinese landscape architects work here but you still have your own route in your own environment and a lot of it goes back to how you were raised as kid so I think there's a cultural distinction between people in various places. But I also think that you have, there's a richness in culture, so your analysis of it, and each designers analyzes that differently. They may say, "This is good" or "This is bad" or "I don't

alike.

like that". Each one makes judgments about the culture that there in or the culture they're working in; therefore, that's why the work doesn't look



ED

taught school for twenty-three years and some of the students are creative and some of them aren't. It doesn't mean creativity is the only thing, I mean there are many things that they have that are very, very useful to them or to the world. Creativity is relatively rare.

Do you think there's anything specific, other than whether or not a person has the ability to be really creative or not, are there any other things that you have run into that are obstacles to creativity when you're designing?

Yea, I think the interest in building, knowing how things go together, knowing how to put things together, knowing how to plant, all the technology of planting, knowing about water. There are lots of things that are useful. In an office, you might only have one or two people that are being creative, doing the form giving part; but you have twenty-five other people doing all sorts of other things. The most important thing from my point of view is who supervises in the field. You know, who makes the last and most important decision? If you make a mistake on your drawings or if you make a mistake on the design direction, the only person who can fix it is the guy that is watching in the field and he's one of the most important people in the office. That's a characteristic that some people have and that's as rare as creativity.

What do you think are some of the most pertinent and common dilemmas that landscape architects are working to solve today?

Well I think the most interesting people today are people who are working in a variety of scales. I think of a landscape architect in China, where he is working with regional planning scales, and also working with

INA

DCR Aware Inspiration specific parks and areas of cities, just ranging from scale in those two. I think he is one of the more interesting people. I always thought [Dan] Kiley was terribly important because he's probably one of the great artists of our time, maybe the greatest landscape architect of our time. And I think you might look at one for one thing and you might look at another for another and clearly, if I see something that someone has done and it informs, it educates me, and it tries some stuff that I have thought of, and of course I think that's what creativity is.

What do you feel your role is as a landscape architect?

RLA Creating Meaningful Places My role, as I see, is making landscape. I know other people work on regional issues, like [lan] McHarg. Some people are interested in water, some people are interested primarily in plants, but I'm interested in making landscapes that are memorable and can last through time, they are important to the institutions that mission them. They make the place important. I think of Olmstead like that.

Appendix U: Ted Adler

What made you interested in doing art?

I think the real answer is that I was never good at anything else. From an early age, I was interested in it. I think my family and friends gave me positive feedback on those things. I would not say it was from any natural talent that I had, but just an interest and a way of engaging myself and playing, like rather than toys, I played with drawing or messing around with stuff. In high school, it was almost more of a lifestyle choice. I could hang out in the art department and get away from crowds that I did not want to hang out with or teachers. I think it provided a haven or a respite from things about life that I was not interested in. It helped reinforce my own formation of the things in my life that I was interested in. My grandmother was supportive of any creative endeavor. That positive reinforcement at an early age makes you start to feel like you can do those things.

What kind of art is it that you work with primarily?

I would call myself a potter, which some people would agree with and some would not. My work is mainly sculptural vessel but my projects take on a range of things. I explore installation a little, I have played around with painting and printmaking, but I would say, primarily I am a vessel maker.

Do you have any key ideas or concepts that drive the art that you do?

I do. I think sometimes I have ideas that come through well in the form of vessels although my work does stray away from things like that. The vessel also has ideas that are not inherent but are easy for us to project onto it. When you think of the vessel container and the relationship with the body and self but beyond that I would say ideas about transformation, metamorphosis, maybe in more of an ontological way, transformation and how things come to be. There are ideas of fragmentation, being incomplete and when we experience things we like to think of things as being vey unified and harmonious but really, I think our experience, because it's a physical thing and a mental thing, that we bring a lot gaps artificially or mentally to create our experiences. We fill in the blanks in an automatic way but really, those experiences are not so fluid and are quite fragmented, I think.

BPP

BPP

BPP

DCR Experience Thinking about either something you have done recently or a project that you really enjoyed doing, can you explain the process you went through beginning with the original inspiration for the project through the materials you used throughout the project to get the final piece?

Lately, I have big chunks of working time, which are Christmas break and summer time. During the school year I do produce but it's not with the same type of regularity or really immersive time that starts to get things going. I would say, in general, I have a fairly regular working process. I would not say that I work from project to project but I think that my making is a little more consistent, at least in my own mind.

Some of the things I do to get going, well sometimes you just have to run in and make yourself work, but when things are going really well, organizing the studio is an important thing and making sure all the tools and materials are there. It's just being prepared and having a clear sense of what your goals are, what you want to produce, and how far you want to get on certain piece.

With ceramics, you're usually working on more than one piece at a time. There are different stages where you can work with the material differently so I might start by revisiting works that are in progress or looking at the last things that came out of the kiln, get myself charged up, and get myself re-familiarized with what my thoughts were the last time I was in studio. Then, a little music always helps. Usually if I have a hard time getting started it's something like White Zombies or Fugazi that would help get me going, some Helmet maybe, something a little more hardcore and then once things really get going I will switch over to jazz, Philonius Monk, in particular. Something that keeps the thinking going. I would say, in general, that would be my process. Then, preparing the clay and really using the stages of the process and sort of meditative opportunities to really get my thoughts together.

When you are working with clay and you are doing a certain project, do you always start immediately with clay or do you use sketching or other materials to mock things up?

Sometimes I will mock things up and get a sense of scale
relationships or placement of things but by and large I really, well I will
blame the material or the way I work with the material, but since it
changes as you work with it, it's a very fluid plastic material that ideas
evolve from that process. I think that my work is content driven but I think

CP Regular Working Process

INA

PPF

INA

ILM

		it's process dependent in terms of how it develops. My secret shame is
ILM		that I really do not draw. My fiancé draws quite a bit as part of her
TEIVI		process, it's really important to her idea generation, but for me, if I start
		to draw, I am drawing but it doesn't come off of the page that way.
		As a professor and how you teach your students, or how you were taught
		in school, were you taught more of a technical process of how to work
		with ceramics and later on you developed your own process or were they
		really more interested in letting you learn for yourself?
		I would say that it goes both ways in terms of experience and the
		ways that I teach. I figure that I am not the last teacher these students
		will ever have and at WSU (Wichita State University), we really make
		sure that students have a diverse experience across all the disciplines \underline{so}
ED		hopefully they do pick up different ways of thinking through things or
ED		engaging in the creative process or solving problems.
		My way of learning, I was fortunate to have several important
		teachers in my life, all of whom were very different but I would say my
		first formal training was not rooted in the Bauhaus. My first teacher was a
		student of Marguerite Wildenhain who was a Bauhaus potter, very strict
ED		and form followed function, shooed any type of ornate decoration, so
ED		things were pretty rounded and brown but it was a very modernist
		approach to pottery in the role it plays in everyday life. His own pottery
		was very different, he was very flamboyant, but when he taught pottery,
		which is what we learned, we did not learn ceramic art or anything. He
ED		would come out and show you how to make a mug and the various
		steps, which is how he learned. He did not apply that to his own art but
		the way he taught was very much that regimented approach to
		production. Then, I do not think I ever settled into that.
VCD		I think it was always a place to get started and then go where
		your ideas take you or look for other models. Also, other students, my
ED	_	peers, people that I worked with seemed to want to do something radical,
		we thought we were radical but we were just doing crazy stuff in the art
		department and wanting to engage in those conversations and thinking
		about, "How can I bring that to a process that I enjoyed?" So making pots
		is not about, "I have this radical idea and I am going to make a mug
		about it." The fact that I was invested in making pottery but I was also
BPP		interested in those other ideas; I think that is a very important thing for
		me, staying rooted in those traditions but then finding ways to push the

DDD		envelope. It is not a huge envelope, just like painting, it can be a very
BPP		small envelope or a very big envelope in terms of how far from the center
		you get.
		Then, I studied with another woman who had more of an abstract,
		expressionist approach to things. It was a welding of eastern and
		western art philosophies. She handled material more freely and more
ED	_	directly. It was the spirit of freedom of making art and that was a big part
		of her work. I think I absorbed a lot of that. Then, later I did a lot of post-
		baccalaureate stints, or what you call special students at University of
BPP		lowa and the Oregon College of Art and Craft. I absorbed a lot of
		perspectives and picked and chose what seemed appropriate. I do not
		think I could trace it directly to anybody.
		I think synthesizing different perspectives and getting a sense of
DCR		what that means to me in terms of what is possible for my own problem
		solving is important. I tend to teach along the lines of "here's one way
	\top	that you can do it, but here are two or three more ways that you might
		think about solving this problem, but you have to engage it to really get
		your own ideas about it." Sometimes I am jealous; I know that in the
		past, such as up at the Kansas City Art Institute, Ken Ferguson who
ED		taught there for years and years, his generation always seemed to have
		their "isms". They are very quotable. When you get into this situation, this
		is the way to solve it and I am sort of jealous of that because I don't have
		that. I think I have my own "isms" but I do not think their quite as
		applicable in that direct of a way. So I think I teach a more personalized
		approach to solving ideas and problems in the work.
		What do you think are the advantages and disadvantages of those two
		types of teaching the creative process?
		I think that old style of training where "this is the way you get to
		the final product and any deviation from this will lead to ruin or lesser
VCD		product," I think there's a place for that, well I do not know if I can really
		answer that question. On one hand, I think there's a lot of value in
		craftsmanship and the value of the well-made object and the appealing
		object but I just do not think that is the "end-all, be-all". Art is a really
		broad term. Everyone has a very specific idea of what that means. If you
RALA	+	talk to a lay person who has more limited experience with art or making.
		you say the word art and it's a painting of a flower or something very
		recognizable, something well rendered. How that fits with the actual
	Ь	

RALA

RALA

ED

LCR Working for the Familiar practice and how that is relevant now or how art has an effect in the world now is a lot broader than that. I guess I would say there are many different kinds of art so I think there's room for all of it in terms of what appropriate in terms of academia and getting a degree in something.

I tell students a lot that you do not need a degree to make art. You can just make it. You do not need any training, all you need is the willingness to sit down and do something. It's like any other discipline, it has its relationships, it is a mode of inquiry, and it's about production of new knowledge. Wichita State is a Carnegie 1 research institution so how is the experience here in developing creative problem solving, how is it different than say Kalamazoo University or a small private liberal arts college when it comes to agenda. A research institution is really about pushing the envelope to find something new. That's what researchers do, they look for existing knowledge and apply it in new way. When someone comes into a class and says, "Hey I want to put a dragon on a mug," sometimes they are disappointed when I tell them that it may not be the most promising idea for developing a sense of one's own personal creative vision. You can call it trite; it's just not new information. It's a student trying to find a sense of success through the familiar and I just do not really think that art is about the familiar. That has not to say that the training is not important, for me it just has to go beyond that at some point.

That's really interesting, hearing the way you talk about how art is taught and in general what you focus on when you are doing art. There are a lot of parallels between what I am studying now in landscape architecture. It's interesting because a lot of times what I hear from people when I am talking about my thesis and how I am comparing landscape architects to artists is that they immediately jump on the fact that, "well landscape architects are working for a client and they have very specific things in mind and are trying to solve dilemmas, so you can't compare them to artists."

Do not let anyone in graphic design hear this but that is a familiar thing that I hear from graphics designers and I completely disagree.

Yes, and it is hard to explain that to people because hewn I am trying to research art and how artists thinking, you don't find something that is written or anything that can be compared to landscape architecture in a descent way. What you are saying about art is what I am trying to show people is valuable to landscape architecture where

you learn the very technical ways of designing but then the importance of being introduced to other design processes and the importance of developing your own unique process which sounds a lot like what people are doing in art. Learn the technical but then eventually evolve to be unique and that will lead to more unique and personal ideas.

I think one idea that gets lost is that there are different degrees of achievement so when we talk about art or landscape architecture or graphic design or practicing medicine, you have people that just do it and they do it well. They do it adequately, they are capable. For that, maybe you do not need a very highly developed sense of creative problem solving. There's problem solving and then there's creative problem solving. Politics, medicine, history, writing, engineering, mathematics, if you're not a creative problem solver, you're going to be occupying the very broad middle tier. You will do it and be able to pay your mortgage and student loans but what have you really done? Is there any higher sense of aspiration? Even if we do not achieve it, the desire to solve problems creatively, in a new way, that is something that propels culture and I think that is really arts main purpose.

To engage in art without trying to look at things different, I do not know that we can really call it art. It bears a resemblance of art but it's not that. Art is more of an adjective than a noun to me. It describes a way of doing something. I do, I tell students, a garbage man can do it. It all depends on how you approach it, how you find new ways to do it that makes it more significant. A graphic designer, or landscape architect does not need to be very creative, they can just follow the rules, if you will, but their always going to get the minor jobs. They are not going to make any significant contributions to the field, as a higher aspiration or goal; I think that is what needs to be taught.

Teach to the highest level and then everything will arrange itself from that rather than teaching from the middle and letting those that excel find their own way. It leads to that saying, "You can't help the bad ones and you can't stop the good ones." For me, I would rather engage people on a higher level because then they can find their own way and from there make their own choice; but, yes, the difference between problem solving and creative problem solving is important to understand. When you're talking about a discipline with a very rigid set of practices, you're not talking about creative problem solving but if you do not teach it then how do you know it?

LCR

RALA

VCD

RALA VCD

LCR ED RALA VCD

ED

VCD

Well and it's like you said, everything that they have done in the past and the more traditional or conventional ways of doing things aren't going to necessarily produce things that are relevant to the times that you are working in. It's like you said, they are going to do what they need to do but it's not necessarily going to be up to date or with what's happening right now.

VCD ILI Right. Anybody who does what they do and does not have the occasional gift of having those "ah-ha" moments, I mean that is synthesis. That is this thing over here that I know, and this thing over here that I know have suddenly come together with this other thing that I am working on and it clicks. I mean we talk about "it clicks" as metaphor but what do we mean? We mean parts clicking together with an audible sound, its perfect. Well and it's that feeling that the metaphor describes. It's a shame for anybody who goes through life without having that

VCD ILI

feeling.

When you think about avant-garde, not necessarily as a radical movement that begged for change, but rather than thinking that goes into producing something avant-garde that is new and has not been done before, do you ever think about that when you are designing or creating? Does thinking about your work being avant-garde ever play a role in what you are doing?

AG

Yes. I would not use those terms for the reasons that you state. I mean, do we have a different way to talk about that aspect of any practice, meaning the "leading edge" or the advanced, whatever that is and I do not think that idea has a lot for me in it in that sense but I do work with a conscious sense that I do not want to be derivative. I do not want to know what I am doing all that well because then that means I am using existing knowledge and not pushing my thinking. Being a little bit lost, like groping around in the dark, I get a little wary of myself when my own ideas come too quickly or come too easily. There are those "ah-ha" moments that are unexpected and instant but when I sit down and already know how things are going to turn out, then I start to try to talk myself into trying something a little but different or take a risk and lose the work.

DCR

In ceramics, the individual piece is not maybe as precious or valuable as something like casting bronze, which is a huge time

RALA

DCR Embrace Unknowns Expertise commitment into one piece, I can almost say that I work by the kiln load. That is not to say that each piece is not important and does not get that attention to detail to make sure it's the best that I can make it; although it does not always turn out that way. That piece is not so precious that I need to resolve it all at once. It's resolved more by the kiln load so there's a broader perspective there. When I unload a kiln, what I really want is to be just as surprised as anybody else and that involves thwarting my own knowledge of the medium and my own experience. At the same time, it is integral to know what choices to make to do and that really requires that knowledge.

Define Creativity.

I think sometimes that is bound up with the idea of originality. Well I am going to answer that as a teacher because I don't really think of myself as being creative when I am working. I think more about the idea of creativity when I consider teaching and when I consider helping students develop creativity. Creativity sounds a little but like arts and crafts camp but what is creative? It's an important idea so I do think about it. Students get really caught up with trying to be original so a lot of times they do not learn lessons from other people's work which I think is really important.

Imitation or immolation is an important part of developing a creative identity. So what is originality? Something that is original to the artists, the artist is the origin. With creativity, it's the idea that you created something. Is creativity the same as making? You create something, you make something, and that is just language being slippery. What is the idea that creativity is trying to convey? What I explain to students is that they have unique experiences and whatever they have done is unique no matter because you have different perspective and different way of seeing things. When you're engaged and when you do the work and solve those problems, your solution will be unique.

That goes back to the other question about training and following a prescribed kind of methodology. When you make something, even if you sit down to emulate another person's work, your choices of how you make it are going to be different because of who you are. In that sense, it's original if you engage that consciously. I think there's a certain sense of consciousness that needs to be there for something to be original. You

LCR

DCR
Anyone is Creative or Original
Experiences

DCR Awareness Experiences DCR Awareness Experiences

have to be aware of yourself making it and what influences that. What shapes that decision making process?

More with the graduate students, but something I say frequently is, "It's hard enough to know what decision to make" and I think that's more of an undergraduate level of learning and maybe that goes back to the training thing, learning how to make good decisions when the time comes to make those decisions. At the graduate level, it's hard enough to know what decisions to make but it's even harder to know you're making a decision. For instance, you wake up in the morning and you decide what shoes you're going to wear. The comfort level of your shoes, I really believe has an effect on what you're going to do. How you lay out your studio. There's a guy in Ohio, John Balistreri, actually one of his former students is here for graduate school, and he took out all of the shelves in his studio. You think, "We have shelves everywhere," and if you look into the ceramics studios, there are shelves everywhere. Well he cleared them out because if you have shelves that are 9 inches tall then you're going to make things that are 9 inches tall. Whereas, if there are no shelves, you might make something 9 inches or you might make something 9 feet. We are affected by the choices we make about our environment. Bring me back to the question.

LCR Environment

DCR Awareness It was to define creativity.

Being aware that you make a decision. In ceramics, we say clay but there are an infinite number of types of clay and clay bodies, which is a mixture of different kinds of clay, the natural dug material, that we combine like a recipe to get different qualities; whether it's a working quality or a color or a fire temperature. Just to decide what type of clay you're going to use is an important decision. So students come in and say, "I'm going to work in porcelain," and just the simply question of, "Well why porcelain? Why not stoneware and is that the best material for what you're doing," can lead to a deep creative investigation of what motivates the work.

It's just as simple as making decisions about the material but to make those decisions you have to have your own set of experiences and consciously use them. To sit down and think, "What do I know" as a departure point and then "How do I apply that to this other thing?" When you're doing it right, I think what you know and what you're working on has never really been connected in that way. I think that is what constitutes creativity. A conscious engagement with things that uses

RALA

VCP

RALA	what you know but pushes beyond that and the originality, that is your
	take on it, it may resemble something else but because of who you are,
VCP	you're using that in a way which brings something else to it. It's not
	simply that it's never been done before.

Appendix V: Diana Cooper

What made you interested in doing art?

I actually spent a lot of time resisting doing art because I grew up in a family that was very artistic from the moment I can remember I was exposed to contemporary art and the history of art because of my parents, particularly my father. I was much more drawn to dance and eventually to choreography. So until I was 18, if someone would have asked me what was more compelling to me the visual arts or performance dance, I would have answered dance or choreography. I was always drawing and painting and going to museums with my parents but I was much more engaged in dance. I started to have injuries to my knees and my back that got progressively worse when I was 16 or 17 so I had to stop in a very serious way.

I did not think then, "O I will replace this with visual art." It's not that I replaced dance with visual arts because then I went to college and chose not to go to an art school. I pursued dance a little and did some choreography and then slowly the visual arts started becoming more central to me and replacing that void that was left from having to stop dancing and choreography. What was interesting is I was studying history of literature but I did not replace that need either.

I think a lot of my interest in art, in a general sense, is the place that allows you to use your imagination and has the potential for an emotional depth. I feel sometimes that I am attracted to art in its largest application, like architecture or theater or sculpture or installation, and as long as they have those components, then they seem right on and very compelling to me.

Can you describe to me the kinds of art that you create?

O, my least favorite question. I feel that it's hard to describe what I do because I feel like it's constantly changing and that is part of the appeal for me, that it's not set. I would say much of what I do rose out of an interest in both psychological spaces, what are things in your mind that you can't articulate any other way? For instance, visual art and drawing which led me into the work and into a different mindset. It created a connection between how my mind works and wanders and drawing or mark or form making. I like very much the sense of allowing myself not to know because I think that the work that I do is a system which is nonsensical or open ended and engages the viewer to the decision making process. It's not presented to you as a closed,

BPP
Journey to Art
Education

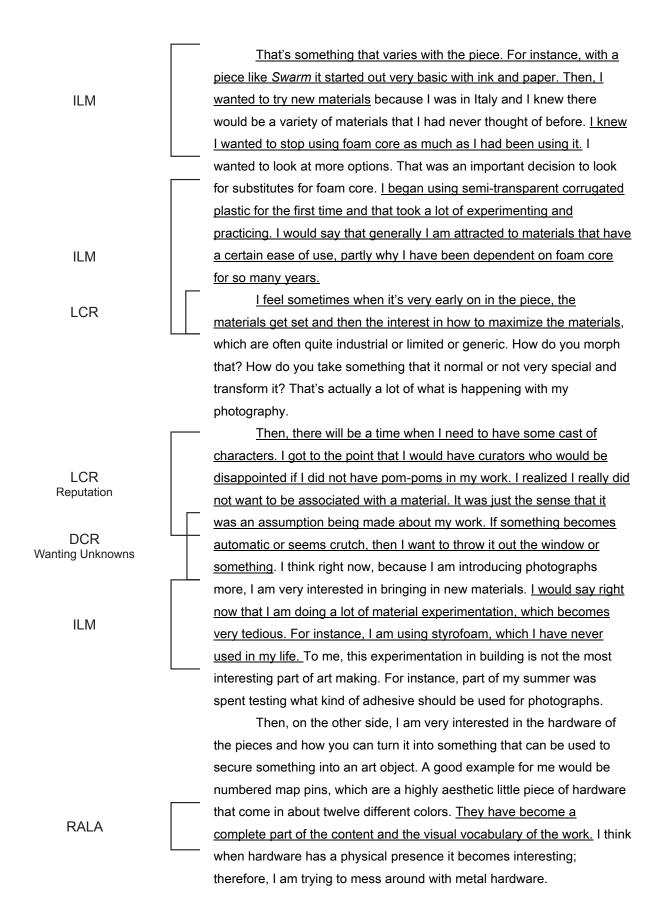
VCP

DCR

DCR		impenetrable object. In fact, the making and thinking and the contact are
ILM		a major part of the work. There is a certain transparency that I want to
		have and I feel that those things I just described are in the two
		dimensional drawings and the painting and the sculptural installations.
		They will all have aspects of that.
		Physical space and the psychological space and the conduit
		between that and image making and then the physical space as
		something that endangers you beyond the visual. You have to navigate it
		and become conscious of your own body. Another thing that comes out
DALA		of my work is fragility so often the work, like a doodle, has a touch of
RALA		fragility but not in a literal sense; but, that it is a meandering and private
		activity. My installations, which are very large, can also have fragility
		depending on how it is made and the way that it occupies the floor space
		and how it relates to its surroundings, which are the people.
		If you think about either a work that you recently finished or one that you
		are working on now, could you describe how you started working on the
		project, such as what started your creative thinking to the final product?
		"Swarm" is a piece started in 2003 and its last incarnation was in
		2007 which to me was the most successful. It started basically from
		another piece, which is often the case. There is something that happens
ILI		in another piece, which could just be a fine detail or was just a small
121		detail of another piece, and I decide it is something that I would like to
		bring forward. I had made a drawing, which was very different from my
		usual work, that was called "Music Saves my Life Everyday" and in the
		drawing there were these arrows, very graphic black and white arrows,
Γ		which for me indicated volume, which to me indicated sound. <u>I took those</u>
ILI PPF INA ILI INA		arrows not really knowing much more than that but I wanted to do
		something with them and they spoke something to me. They spoke
		about music and volume to me and music and volume are such an
		integral part to my creative process. Sometimes I think if there was no
		music in the world, I wouldn't be able to be an artist.
		In addition, the arrow is a directional and instructive sign and I'm
		very interested in the things in the landscape that are manmade signage.
		I was living at Rome at the time, I was at the American Academy in
	+	Rome, and whenever I would go out on a drive, I was struck by the
		signage. I think when you go to a foreign place you see a few things you
		don't see in a place with which you are familiar; therefore, I wasn't that

	attended to the circums in New York City for instance. From time Lyant
	attuned to the signage in New York City, for instance. Every time I went
	 outside, I would see these incredible graphic black and white super
ILMD	graphic signs with lines on the exit ramps on the highways. <u>I began to</u>
	think about it in a two-fold way and then it just started morphing. It
	became a flat sign and then it became an arrow that became white paper
ILM	with a foam core base and then it started to become more three-
	dimensional. Then, with that, they started to cast shadows and they
	started to suggest motion and movement and they had this visual
PPF	vibration in the way they looked depending on how I directed the light.
	Then, I started thinking about access and accumulation and it started to
	grow with other forms, not just arrows. I never make a piece that has a
	 single repeated element.
	So the piece was getting larger and larger and I was making it in
	a room that had nearly thirty-foot ceilings; it was extremely influenced by
DCR	the architecture of the room that suggested height or something soaring.
LCR Environment	There was this sense of space that was very intimidating and daunting at
Liviloiiiieiit	first and then became very inspiring. At one point, I was staring at this
	 thing and thinking about volume and our insatiable need for things to get
	faster and louder or bigger and that human characteristic that I feel is
	both a positive and a negative aspect of human nature. You can see it as
	curiosity but you can also see as a very destructive force as well. Then, I
	was looking at the piece one day and this word just came into my head.
ILI	It was as if I was naming a child that was unnamed for months and
	months and months and suddenly I got this name. Then all of a sudden, I
	knew where to take this piece. It was an interesting moment.
	That's not the same as a process for another piece but I feel like
	that's a piece that I have thought about a lot in terms of trying to explain
	it in language.
VFE CP	Then, of course, there is trial and error and I do things I don't like
	and I take them off. There is a constant back and forth with your every
	active. So usually a piece can take anywhere from six months to three
	 years to make that is large.
	When you are going through your process, do you have any specific
	places you go or habits that you do in order to take a break from what
	your doing and spiral creative thinking?
INA	I'd say I am influenced by my surroundings. I am very much a
	studio artist geared on making and learning through making as a hands-

on way of thinking. I find sometimes that seeing other art or traveling, for me, obviously that's not something that I can just take a break and travel. but sometimes taking a walk and getting out of the studio, just letting something go for awhile and putting it away if possible. I find that then when I come back to it, I have a fresher perspective and I am more INA willing to change things or let go of certain things. I would say a huge change for me is the fact that I have the internet in my studio and that there is even something like the internet. I **PPF** find that I might be working on something and I will look at images. For instance, I am working on a piece right now with images from both EKGs and seismographs and the confliction of those two measuring systems; I will sometimes just go on the internet and type in "seismograph" just to see the different fermentations of it. I am also becoming more involved and more interested in photography. I am working on another piece right now that uses photographs that are taken of garbage bags as an example of foreground and background in space. Sometimes if I am getting stuck or feel like I am repeating myself, I will go back to images and work on the INA computer, not to plan out the composition of the piece, but more printing out more possibilities, in this case garbage bags. If you saw the piece, you would have no idea that they were garbage bags. I know that because no one who has seen the piece in my studio has any idea what it is when they see it. For me, I know what they are so I can't make that distinction. On the other hand, the internet can become very distracting and have a negative impact on my concentration. I am just the queen of procrastination. I don't think I am the kind of artist that has the self-discipline or self-awareness that when I know I am beating my head against the wall or going nowhere, I can tell myself "you should leave the studio for a little bit" or "you should go to the museum." I think it's more that I do these other things and look at other art or go to films or the theater and look at INA those things that inspire me, a lot. It is not like a prescription for me to DCR think creatively. When speaking of one of the projects you have talked about, did you use a variety of different media when developing the project or did you jump straight into the media you knew you wanted to use and run with it?



I think that right now I am just in a metamorphic place and trying CP to explore new possibilities with materials. It's a time in which there is a lot more change happening within a piece. Suddenly, styrofoam is in a piece or suddenly I am working with metal hardware. When you were going to school for art, did you find that your professors taught you an artistic process or was it more of a free creative process with no set way of doing things? I should say since I majored in history and literature in my undergrad and started out as a masters student in painting, and then between those two schools I went to New York Studio School, I didn't have the most typical art education. I actually missed that part of our ED education. I missed the basic things of how to use power tools or how to use glazing in a painting. I found that even though I grew up in an artistic **BPP** household, I was very short on technical deals and so I often find myself learning through mistakes or figuring an alternative route out for myself because I never learned the proper way to do something. I think the older I get, I have never been that attracted to learning ED the proper way of doing things. Even my first attraction to dance, even though I was taking ballet at the age of five, it was a real war for me and part of the dance class that appealed to me was that at the end of class DCR you would get to do improve and you would be assigned a certain task to portray. For instance, one time they told us to act like a "melting ice cube" and that improvisation at the end of the class was like the dessert. It's the chicken and the egg at this point. Is it that I don't know these processes because I missed that part of my education? Or am I a person that shies away from that kind of training? I would say I probably shy away. At the New York Studio School there was a right way to draw and a method and a system, but I ED feel like I was allergic to it even if it's right and it's something that they **BPP** have to teach you. It's not that I am judging one system over the other, and maybe it's self-defeating, but I think I am allergic to group mentality and "if you want to get to their this is how you do it." In graduate school, and I can't speak for other graduate schools, but I feel like there is an assumption that you have already learned these things. It's not about ED showing you technical skills. It really is about coaxing out what interests you, what are your obsessions, what are your desires or goals? I felt very

much ready for that actually, even though I was late to go to graduate ED school. So many times, I suggest to students not to go straight from school to graduate school. I tell them to live a little bit and get out of that mind set where there is a teacher and a student. I had a great experience though. I was at Hunter, which is a huge school, so I felt like I **BPP** was learning just as much from the faculty as I was from the students around me. It was such a diverse group of people too. I do remember ED having a professor who warned me about the materials I was using and coming in and saying, "You are going to run into problems if you continue to work this way because it is going to fall apart." I remember being really **LCR** rattled by that and, to some extent, she was completely right in that comment but if I had listened to that, I wouldn't make the work that I make today. It has definitely presented tremendous challenges to work with the materials that I work in. The term avant-garde is an important part of my thesis work and I was curious if the term avant-garde played any part in the art that you do or if it is something you ever think about when doing your work? Well I have definitely studied it, the different avant-gardes, and the historical movements. When I think of avant-garde, I think of it almost in parenthesis because of its place historically. Then, of course, there is the whole question of whether or not there can be an avant-garde today, of how quickly the avant-garde, when it does exist, is put aside or AG becomes canonized or historic. It is almost an oxy-moron just to use the terms avant-garde and historic in the same sentence. I think of it not so much that I am in any movement that is avant-garde; I think of the avantgrade, whether its through the Dada or Situationists, as art movements which have influenced me. I was exposed to them at an early age. It's more of a vernacular sense in terms of pushing the envelope. I guess I am feeling tentative about using the term avant-grade in relation to what I do. I think if I was going to distill aspects of it, like looking at what the next thing is on the horizon and certain aspects of AG Dada, like freedom or playfulness or mischievousness, it's influential. I am less attracted to the self-destructive or annalistic aspects of it. I think that I am more interested in the unorthodox or serious play aspects of it. **RALA** One thing that I have been struck by is the difference between **LCR** being a student or an artist working on your own and putting art into an

ED

RALA LCR ED

RALA ED institution, whether it's a gallery or a museum. It's different because what you thought was perfectly acceptable, like being okay with people touching my work, becomes completely taboo. I am not saying that if I were a different kind of artist, like I know an artist that works with collapsed surfaces and if you touched it, it would be destroyed; I am not saying all art should be things that people should touch. I am just saying that I was surprised that I did not have the same attitude as the gallery owner or whoever and once you realize people have different opinions, it makes you realize that you do have an opinion but what does that mean?

I am not saying that's an avant-garde practice but it is the idea that if you can touch something means it's an outdoor sculpture made to be destroyed. It's not something that has lasting value. It's the idea that you would be okay with someone touching something that you have made, that is an art project and not something ephemeral. I realize that there are certain conventions that I feel that I play with in my work in terms of the tactile or engagement.

I think a big issue with me is ephemerally, where there is a comfort zone for the things that are ephemeral and things that are permanent. I think that the place in between is, and what I mean by in between is the idea that you would make something that wants to be permanent but is impermanent, is a living contradiction; that's a place that I have been very interested in and that I feel mirrors life. Right now, as human beings, we feel very self-sufficient and autonomous and permanent but, of course, we all have our expiration dates. I think that's something that factors into fragility. Is there a place for that?

This is what brings me to landscape. An interesting idea in nature that's one thing I think about sometimes is why cant an artwork be like a plant? By migrating a plant into a home, I can't ignore it or it will die. What would it be like to bring an artwork into the home that needed a certain amount of maintenance? Maintenance meaning if every now and then something was droopy you have to add a little bit of glue. I do not see myself going into organic forms but it is something I think about sometimes. There are certain aspects of landscape that are very attractive to me. I was in Madrid a year or two ago and I went to this building where they hired a landscape architect designer to collaborate and the most memorable part of it to me, well it was all very impressive, but the landscape architect covered an entire wall with masses of

just found it powerful. There is something about the juxtaposition of such a manmade environment with suddenly something like this. I don't know, I mean as you can tell, I am a little tentative about talking about the avant-garde because it is such a historical term but for me the history of attraction AG plays such a huge part in what I do and has a huge influence on me. It's just hard to say what the avant-garde is today. Everything today is very rapid. It's difficult to define in terms of a physical project. That's not to say that there is not a kind of hierarchical "winner takes all" mentality in the art world; but, there is a pluralism now that I think is seen in earlier generations that makes it more difficult to talk about the avant-garde. That being said, with the avant-garde, at any given time there has been a group of people who do not seem like they AG have very much in common with each other. We do have a tendency when we look back in history to see things as more monolithic or well defined than they really are and that is just the nature of history and how it is supported. I do feel that when I hear talks of other artists from an **LCR** earlier generation, like the late 60s and 70s in New York, you can forget about getting a show so they actually ended up going to Paris. I feel that kind of thing is not going to happen now so there is a variety of different **DCR** styles and genres; you can't say "only minimalist or non-objective art is being shown" now but maybe now you can say "only art that sells is being shown". How do you define creativity? Beauty is in the eye of the beholder. I would say first that I think creativity is not totally in the domain of art. I think that some people feel **RALA** like the arts, in the most general sense, own the word. Then at the same time, I do not think it should be completely zapped of its significance by CR being used all over the place. For instance, I am shopping for cameras and one of the cameras has three settings, and one of the settings is "creative automatic". I think of it as using invention and imagination. I think of the word conventional as being the opposite. I am trying to think of when I look at CR an artwork and I think there is something creative in it or it is creative. I

think that often it means that it is not predictable.

shallow landscapes, like grasses and vegetations and it was enormous. I

Appendix W: Del Harrow What made you interested in art? What made you become an artist?

I started working seriously with art in high school. I took a ceramics class at that time and it was really something for me about the activity of throwing on the wheel. That really physical activity and the idea that you could control and manipulate material directly with your hands but it makes a perfect and symmetrical form at that time and that age, well it was really engaging for me.

What kind of art do you design? What different types of works do you do?

My training is in ceramics and I make sculpture and installation work. I also work on some collaborative research projects with architects. Not so much making something for a specific space or building but I worked on a two-year research project with a colleague at Penn State University and we were working with production methodologies or moving from digital computer models to physical ceramic materials. It seems like I have different arts in my practice where part of it I am really engaged in speculative research and making traditional forms and learning about how things are made. Then, I also make sculptures and installations, which I think, are speculative in another way but are definitely real things too. They are really about creating an experience and physical space.

Do you think your work to create real things that you can experience in space and a focus on how things are made, are there any other keys ideas and concepts that you pull into the work that you do?

Yes, I think there are a lot of different ideas. The idea of how things are made and simple materials are really complicated ideas historically. There are pieces I have done where I try to make a piece about a particular historical moment regarding that idea. I made a piece that was reproductions of other artists work as a way of physically thinking through some historical ideas about form. Another way of looking at that same idea is a lot of work is about geometry and different mathematical systems. Another historical idea is about the way form is discussed.

Can you describe either your most recent work or something you're working on now or something that sticks in your mind and go through the

BPP

BPP

BPP

kind of process that you used throughout that work, such as how you started developing your ideas to what it was made out of and other details?

I just finished a large solo show that was over the summer at a gallery in Kansas City. The show consisted of a number of different sculptures. My work, in general, is working more towards this form that I think of as being in between making discrete sculpture and making installations. I am always thinking about sculpture that could stand on its own; but I am most interested in an object when a group of different pieces can be arranges in a space.

When I am working, I am always thinking about what threads different pieces together. For this body of work, in particularly, they were threads in terms of forms or materials again but many of the shapes for the show were developed using a 3-D computer modeling applications called Real Flow, which stimulates the movement of fluids and was developed for movie special effects. Then, I generated shapes using that program by entering a certain number of different parameters into the computer. For instance, gravity or wind. Then, these forms start emerging that are changing and playing out over time. Then, I go in and select little fragments in these shapes, these fluid topographies, and I use the computer often to unfold those surfaces to make a certain pattern or template. Then, I cut that flat pattern out of other materials and fold it up and either that will be the finished project or I will cast that in a ceramic material.

At that stage, I have different thoughts when I am selecting the material that I am going to make something out of. This is the place when different forms throughout an installation become really important. I think it's really important to have contrast within a space of the installations, such as forms that are soft and forms that are hard, and even though they have the same kind of geometry on the surface. For instance, often these digital models have triangulated mesh geometry and I think it's really interesting to see something cast in a hard black porcelain material mixed with something sown with a soft black cloth. You really start seeing different things about shape, which feels similar in the kind of hypothetical virtual space of the computer, but you see how significant its manifestation in physical materials can be too, such as what the object feels like in real space.

PPF

ILM

ILI ILMD

ILM

VFE

ILMD VFE

BPP

VFE

How do you think those things translated when you were doing your collaborative work with the architecture professor? How did those ideas of seeing how the computer renderings translated to real space, what was the effect out of that? What did you find to be the biggest benefit out of seeing it in real space?

When I was working with the architect, her background is in product design, we were really trying to address specific design problems. Things where there is a really cut and dry set of requirements for the object, like it has to be impervious to water and moisture but it also has to hang on some kind of building surface. I think that's the place where it's really interesting that we create these collaborations between artists, who have a craft based background, because we are working with materials in a really hands on way all the time. I think architects, especially as the computer becomes a more and more prevalent design tool, tend to work in a digital space more and more but, I think there are ideas about design that you lose when you are working primarily in the computer.

Material has a specific scale. If you think about the grain in a piece of wood or something similar, as a wall or floor becomes larger, the grain stays the same size so there is a visual and compositional relationship that's hard to perceive if you are purely working in digital space. Then, I think there are other things about where artifacts from the making process can yield really interesting and sometimes unexpected elements in a composition. There are certain elements that the computer just can't predict.

When you were talking about the installation that you did for the place in Kansas City, when you first started that project, how did you begin working? What was the original inspiration for the project that helped you begin working?

I am not entirely sure. Maybe I am in a certain phase of my process where I move between phases a bit where maybe a few years after I finished graduate school, I was doing projects where I really planned the whole piece in a very clear way, in a very lingual way. The project would be about a very specific concept like a specific historical moment or historical figure.

I feel like the work I have been doing for the past two or three years feels more like a process of curating in a way, where I am working

LCR

RALA

LCR

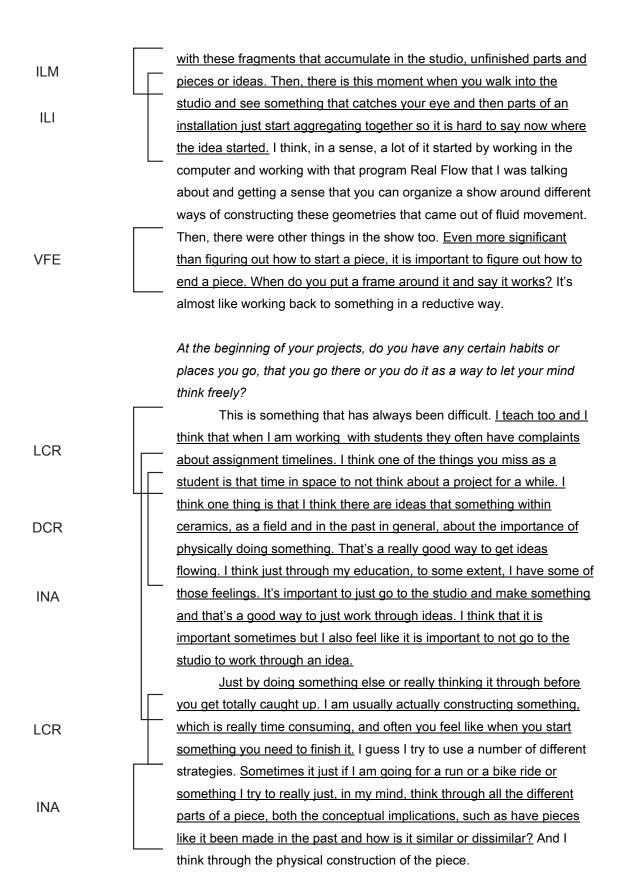
ILM

LCR

VCP

ED CP

ILM



I use a sketchbook a lot and I use it both to imagine what a piece ILM will feel like in physical space and to figure out problems with making it. I think I also try to both write and read a lot. I have been reading a lot of INA craft theory lately and I think it's important for me to think about theory in sense that some ideas for work are better than others. I think that has to do, to an extent, with things that have been made in the recent past. I think certain ideas can get played out a little bit. Maybe that's the question and is implicit in what you're asking. What is someone working towards? What am I working towards doing? You mentioned that you are a professor now and I was wondering when you were in school and in ceramics, in the beginning when you were learning ceramics, which might even go back to high school, did they teach you a process of steps to go through to come up with your final piece of art? Or has it always been a more personal process that has continued to develop into new things? One of the things I like about learning ceramics and teaching it's that there is the part that's about aesthetic evaluation or appreciation, the thing about looking at art, but then there is this other part that's about developing a skill, a manual skill. I think it's really interesting how those ED two things work in relation to each other. When you are learning ceramics, it seems like you can always focus on something and go deeper into the material. When I was first learning ceramics that was a lot of it for me, this very skill based mastery of a material. In those terms, it's really clear what you are striving towards. I think through high school it was about going into the studio everyday and sitting down on the wheel and trying to throw some thin ball clump some symmetrical volume and your teacher can show you how to do that and that pedagogical exchange is very clear. Then, I think in college, for me, there was a lot less focus on that kind of technical development. I do not think that's the case for every ED program but I think for the professors I had, they were more interested in

an idea about personal expression, and how you develop that. My
undergraduate professor had a whole strategy for bringing that out in
students that had to do with metaphoric, ancient mythology that created
this elaborate theater almost within the classroom. I think when I am
teaching and I am working with colleagues about developing a

ED

RALA
Difference between Art and
Landscape Architecture

ED

curriculum now in ceramics, it's really like we are trying to find a balance between those different things.

I think it is important in ceramics or in art in general, not to overlook the significance of technical virtuosity. I think it has been fashionable in a lot of contemporary art to move away from that for quite awhile but I think it's something that creates an experience and can contribute to an experience. I think when we look at a piece of art, I think that empathetic response for the making of the piece is important and I think we can feel the perceived virtuosity and imagine what it would be like to make something. I think that idea is at the core of how I think about teaching in terms of trying to articulate how to create good quality in art in a way. Whether or not that technique is virtuosic or something very expressive, whatever it is, I think that not thoroughly take on the making of the piece is an expressive potential.

Does the term avant-garde play any role in work either in thinking behind what you are trying to do or in the product itself?

Can I ask where did that question come from?

In my thesis work, I am using avant-garde as more of a mode of thinking and I am using it as the ultimate way of encouraging creative thinking. That idea in landscape architecture is a very wishy-washy topic in landscape architecture. I am seeing it as a positive way of design because I am seeing it as you absolutely cannot have something avant-garde without doing a great deal of creative thinking and creative process because it has to be something entirely new. It's trying to stray from the idea that the avant-garde is bizarre or tacky like it has been throughout of in landscape architecture and moving more towards avant-garde as being more of a body of thought.

I guess I think avant-garde, that idea of making a radical break with the past, is tied up with historical modernist thinking. I think a big component in the field of ceramics is looking at history and finding precedent in history. I do not think of my own work as being avant-garde. I think I am more interested in making something that looks like modern or contemporary in one way but also, in terms of ideas, is connected to a historical precedent but in a way that is unexpected.

And that's one of the big things that is the difference between how artists, like you, see avant-garde as opposed to how landscape architects that I have also interviewed see avant-garde. I was interested

AG

in hearing what your response would be and hearing from two different types of people.

In what way? How do landscape architects respond to the avantgarde?

Well from what I have heard so far it is this immediate "O, no, absolutely not, we don't try to be avant-garde," because they do see it as more of a wacky, almost tacky way of thinking about landscapes. It seems from artists it is more related to how I am thinking about avant-garde in my project.

I think the avant-garde is really interesting to think about historically. The avant-garde is probably defined strictly as this moving target that is constantly changing but to look back and see what was defined as avant-garde during historical periods, I think there are things which I think are often very interesting. There are things which were out on the fringe. I am really interested in those things but in a slightly ironic way, not ironic but they are tricky. It's all that modernist problem of striving for something utopia or beginning this radical break that begins from utopist and new ideas. It's really problematic in some ways but in the same way as optimism, it's important. To me, I am not very interested in irony in art, which is hard to figure out how you take on the historical avant-garde in a non-ironic way.

I think also that at least with landscape architecture is that people do not understand how the avant-garde can have a place in landscape architecture.

Well do you think anything where if you are thinking about green building or how do you think about making the world better through landscape architecture and is that connected to the historical modernist project?

I am not sure. That's part of what I am trying to get out of this thesis. I am trying to figure out where the value is in the more modern ideas in landscape architecture as opposed to the more traditional ideas. What is the value in not thinking in traditional and conventional ways? When I am talking about these modern ideas, I am trying to support the fact that the people who are develop the more modern places, it is all based on creative thinking and the ways they incorporate creativity into their process. How much of their process is more of the psychological creative process as opposed to the more traditional conventional design process?

AG

AG

AG

garde finever of about the in a way base left working making.

Define what working necess problems are to same the same to same the same to same the same to same

Yes, and I think there is something about dismissing the avant-garde that can be a little cynical. For instance, when you say you are never going to do anything new, there is something kind of cynicism about the potential of design. I think making things is inherently sincere in a way. Really talking about making stuff, I think there is some kind of base level sincerity in that.

I agree and that's another piece of this that I am encouraging in this is more kinesthetic and physical connection with the design you are working with rather than just using the computer and the value actually making something.

Define creativity in your own words or if someone told you to be creative what would you think?

I think it has to do with really good problem-solving without necessarily having a problem. I think there are a lot of strategies for problem solving where you try to define a set of parameters but at the same time, you are flexible to the idea that world is infinitely complex. You set parameters but then, you have to be flexible to change and take in additional information but there is also a kind of rigor about organizing the information not in a consistent way, which does not necessarily mean you always organize it in the same way. You can always take in information and you are creating a model of the world where it's not about trying to simplify the world. I think scientists are so creative. That's, for me, a really good model. It is really trying to see what is really in front of you, not just trying to make everything fit into the box or model that you have already constructed.

RALA DCR VCP

DCR

VCP

Appendix X: Lisa Rundstrom

How did you get into art and what made you interested in doing art?

I think it's an intuitive thing and I think, for me, that it's something I have always done since my youngest memories of making things, creating things. I think all children play and there is that element of play that's involved. in art and that's a learning tool. We play in one sense, like role-playing about life, and teaching us about life. From earliest childhood memories, you're acting out and playing with things that you do not understand. I think that is something that is a kin to art making. The decision to continue to take it further, it's a little bit different.

I think that's a process to in and of itself. It's coming to terms with its usefulness and functionality and your relationship to that. I think you have to have a belief that you have a message or that there is something that's important about what you're doing in order to invest more time and resources into that stuff. I think that happens throughout your life. You find things that are working and chose to invest more into those things since the payoff is greater. That's just my experience with it. It was not like one day I just had a revelation of "I'm going to be an artist". It was a narrowing of paths, there are all of these possibilities, and then this one becomes more and more dominant until it's what I am doing.

Can you describe the types of art that you do from materials to anything else involved?

I use a wide range of materials. I started out drawing and painting in school. I was working with whatever medium was available. As I continued into college and studying work, I was really interested in sculpture. It was a discipline that intrigued me. It was something where I saw bronze sculptures and statues, more abstract work. Being from the Midwest and from a very blue-collared kind of family, I was not exposed to that. I remember seeing a Richard Serra piece one time when I was in early junior high school and it had a huge impact on me. I remember seeing it and not understanding it but being really interested in it and wanting to know more. That's my earliest experience with that.

I started out as an engineer. I did one semester, I am good at math and science, and it's difficult. It was not something that I could see myself doing for the rest of my life. I knew it was needed and I think it's very creative. I have had people quoting me as saying, "It's not creative," but I think it's very creative. It just lacks a visual component that I am very engaged with personally. I quit school and I worked outside of that

BPP

VCP

BPP

BPP BPP DCR **BPP**

for a while and then I came back and decided to study art. I did not know what discipline I was going to go into but I went back into sculpture again. It took some time. I started fabricating metal, which is funny because that Richard Serra piece was large core-tinned steel. I do not why other than I am structuralist. I love to see structure and deconstruction and that play between those things.

So is your idea of construction and deconstruction a major concept in your art? Or are their other concepts that you focus on a lot?

That's a key component to my art making and there are many ways which I address that. It's a very fundamental, key component. A lot of times I am looking at it through the guides of different systems of logic or different perspectives. Sometimes it may be through a philosophical perspective. I have some philosophers that are obviously very interested in structure and deconstruction in our culture, or it could be a growth system of decay or rebirth. It could be through a spiritual component or through electricity but it's present in all the work. It's interesting to me because it's something that is rampant it's everywhere. I can't take any stake in it, its all around me. It's just something that I see everywhere.

If you think about something you are working on now or something that you have one in the past, can you explain to me the process you went through, like what the original inspiration was through the materials you used through the final piece?

Life experience is a key thing. Even though the work is not biographical, it's not about me. It's very much about what I see and my experience. I think as an artist, or as artists meaning my colleagues and myself or people I know, I was married to an artist who was a musician, I have always been very fascinated with process, very similar to what you're addressing here. I think part of it comes from this idea of play and childhood with experimentation and then at this level of professionalism, I think it becomes about follow through. It's about really continuing to pursue that beyond a lighthearted thought or passing thought. It really becomes an investment in research and really wanting to understand something and communicate those ideas. To me, it's about encountering a problem and solving it.

It has always been a problem-solution process. It always starts with not understanding something or starts with concern or not having a

PPF

DCR

PPF	sense o	f something being addressed in a way. Then there is this visual
ILM	compon	ent. So problem then research then execution as this process
PPF	continue	es. Then it unfolds. Once I have the problem and it starts
	unfoldin	g, that's when the creative act is because I do not know what the
	end pro	duct is going to be. Sometimes I get glimpses of that in dreams
ILI	or, I do	not want to say visions, but in glimpses of ideas that really come
	from the	problems. They spawn off all these new problems and new
	ideas. T	hey all start multiplying. I already have a lifetime full of work
	ahead o	f me and I have not even encountered more to come.
	l keep h	earing artist address the idea of problem solving in art. Can you
	explain	to me what problem solving is in art? I understand problem
	solving i	in landscape architecture so I am curious what problem solving is
	in art.	
		That is a great question. I think people relate problem solving to a
	direct ar	nswer, like here is a problem and there is a direct answer. In art, I
	perceive	e problem solving as more of risk-taking. What I am doing when I
	have thi	s problem is I am looking at it from a different perspective than
	how I ha	ave seen it before. That's really what I am trying to do. It's more
RALA	like a so	ientist who does not really have an answer, I am not trying to fit
	the form	ula into the equation, I am trying to figure out a new equation all
DCR	together	r. It's that kind of thinking because what I do not want to do is
	come up	o with something that I already know. I want to find something
	that I do	not know.
	<u>'</u> <u>'</u>	Much of what we see in art making has been done before so it's
LCR	really ha	ard to come up with new things, well not new but reconfiguring
	things o	r looking at things in new ways. It's the same ideas. I am as
	much co	oncerned with the same things that have been going on since
BPP	<u>human l</u>	peings have been alive but we have new ideas, new
LOD	technolo	ogies, and new quantities of information that's available. I am
LCR	confider	nt that there are new things that I can do. The creative act in and
	of itself	is stressful. There is always the ability to make something that
DCR	does no	t work or that you're not satisfied with; to allow yourself to fail is a
	big part	of that to me. I can't just expect perfection. I have to go into it
	with no	expectation and that's hard. As a person that's outgoing and
	cares at	pout the planet, to set those things down and just sit down and
	say you	re going to create something with no expectation is hard.

It's different from having a right answer but I see other people do it as well. I think that's so much about teaching. It's important for me to teach because I think some students think that there is a right way and ED formula to this and I am going to teach them how to do that. I think it's a little disconcerting for people to find out that's not true. You can formulaically make design and principles of design and there are right **RALA** and a wrong ways to do those things, but to create something is beyond that formula, it's beyond that. When you were in school for art, when people were teaching you about art, were you taught amore technical process or were you taught a technical process in the beginning then they let you make it your own process or was it a free process from the beginning? I was taught a very technical process. I was taught design principles, which are also the formal elements of design and the elements of form in painting or sculpture. I believe that gives us language more than anything else. It gives me a way to talk about what I am looking at more than anything else. Then I was also taught, I pursed metal fabrication, so I learned craft in that. I learned how to weld every kind of metal that I know about that is weld-able. I learned how to take care of the shop, how to cast metal, how to build with wood. I learned **RALA** building processes and then with no real, well this is the strange thing to me about the earlier times in my study, I could make anything I wanted. It started out where they give you a problem and you solve it, so **BPP** "we are going to activate space" and then at some point, it's "now you make what you want to make" and you think, "Well what do I want to make? I forgot about me," but our mark is prevalent from the very beginning in what we make. I can tell the difference between something I make versus something you make versus something someone else makes, if I look close enough I can tell exactly who made it. I think that's one of the things that make a great artist. I can tell you if Picasso painted RALA a painting by looking at that painting fairly certainly. I think being able to **LCR** find your own mark is something that takes time. I have had professors teach me about that, I do not just come up with it. I had a professor Lester Van Winkle at VCU. He said, "If you make three things that are very disconnected, it doesn't mean they are

disconnected, there just aren't enough of them because if I make five hundred things and those three things are a part of it I can see the

connection." You just have to make enough to see what is connected between them. I think if you look at my work, you would see the connection, like that is a video and that is interactive but I can see that they are all connected, at least in my opinion.

When you begin working on a project and you are trying to develop the project, do you have any places you go or things you to help you with your creativity or idea generation?

Yes. I like to be alone. I have two kids and its hard for me if I am starting something, I can't be interrupted because I get really irritable if I am bothered. I have to have focus, I have to have clarity. I do my best work when I wake up. Sometimes I wake up at four or five in the morning and I can't sleep because my mind will wake up before I wake up because it wants to make work. I have talked a little bit about apprehension or failure and I think that's a really common thing. That used to really bother me in my work. It does not so much now because I just see what it is and know it is trying to slow me down.

I do a lot of mediation and I have to get out of the way of my own self because the ideas are there and they are very creative. I feel like I am a vehicle and I am supposed to put all the right stuff in my mind and pay attention to the things that are right in front of me and feed myself with them, then get myself out of the way because ego and things will stop you in your work. I believe that one hundred percent. The idea is to not stop myself. If there is fear, get rid of it. It's the enemy beyond anything else. I need to get my mind clear of anything else, if it's teaching, if it's grading papers, if it's children, it has to go because it's a distraction. I want to be focused on that but I can only solve one problem and it's the thing that's in front of me. If I am trying to many things then I am breaking things and I am not being free to think. I am really inhibited by those other things.

When you are going through a project, do you usually start the project with a certain media like drawings or mocking things up before you go straight to the final material?

I always try to draw first. It does not matter to me to draw meticulously thinking, "It's going to look exactly like this," it's more like mapping it out. I just want to have a map of where I am going.

Sometimes I have very specific details or parts of things that I need to

INA

LCR DCR Embrace the Unknowns

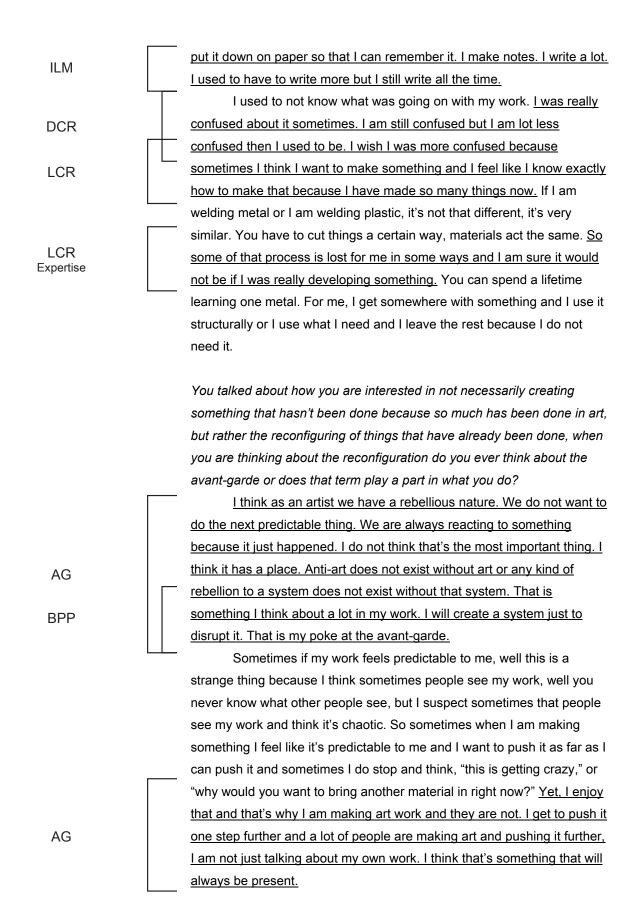
INA

DCR

INA

LCR

ILM



I will disrupt what I am making and poke fun at my own work. I think as serious as it is; there is a component that's not serious. One thing that I have written in my statement is that I am interested in this **BPP** anti-heroic nature because one of the things I communicate with my students, my friends, or through my art is that I am not that big of a deal. I am going to be gone, I am going to die, I know this, and I think we all get that. So, our job here is to get as much out of this experience as we can and I want to do that. For me, that avant-garde movement has a lot to do with living in the moment and being very much a part of the next AG thing. They just want to keep moving forward and art making has that component to it. How do you define creativity? I define it generally with my students as risk taking. A big part of CR DCR the creative act is doing what you do not know. Creativity is a major part of making art. It really is the key component to me to making good work. I am not saying that other parts are not important. I have been asked about this question a lot and I really do think it's about this risk taking **DCR** Embrace the Unknowns component that's exciting. It keeps visual art visual. You want to see the risk; you want to see it in front of you playing out. Many times, people question my research asking why I am comparing landscape architects to artists because they are very different. What is your take on that opinion and the misconception that artists do not solve problems or artists only work for themselves? This is a huge misconception and it's something that has always upset me. My whole life, one of the reasons I did not want to go into art was because I thought what I was doing was selfish and I am not a selfish person. I am no more selfish than a doctor who saves people's lives. I find that artists are not about self-serving. It's about searching. Artists, in general, that I see, are not searching for their own profit or their **RALA** own well-being, they are really more concerned, and I am making a board statement, but artists are sensitive people who are very in tuned with what is going on around them. I am politically motivated, I am

socially motivated, and I am spiritually motivated, I am paying attention to what is going on. So to think that I am not affected by those things, my whole world is engaged in that and I suspect that all human beings are

affected by that. My job is to bring that to them. It's really to bring that to them.

When I see architects and I see engineers and I see graphic design, well design is a part of my existence. It is a part of this beautiful terrain that has been created by human beings. Architecture is just prevalent but I do not see how we are not connected, art is not something different. The only difference I see is that there are certain standards that have to be met. With architecture, I can't just wing it. It has to have those considerations or else it will not work; however, they are so related.

Some artists may not be as aware as others but I do not see it as people living in their little niche only concerned with their work. I really see it the opposite way around. I see that many other jobs descriptions and positions have to be specialized in what they are doing and artists are free thinkers. We are really drawing from all of those things a lot more.

That is something that I have to prove to people is that artists and landscape architects are not that different. The thing I struggle with most is that almost no profession can work without people. You can have the most functional place in the world but if people do not have that experience, they aren't going to care about it and it is going to fail. I feel that is the same with art. It is as much about the viewers experience as it is about the artist's personal experience.

It sok me until graduate school for someone to tell me that it's visual art and, "I don't care what process you just did," because it was really all about the process. To really be told, "I don't care if you stood on your head for a week to make this," I care about my experience when I walk into the room and how it makes me feel. I have also been told that if I am not excited about making it, how is my viewer going to be excited about seeing it or experiencing it?

RALA

RALA

RALA

DCR Passion

Appendix Y: Example of Single Subject Matrix with Comparison **Notes**

Landscape Architect Interview Findings **Thomas Balsley**

Balsley is one of three brothers who are all landscape architects:

- Older brother stumbled into landscape architecture the conventional way
- Told Balsley about it while Balsley was studying another major
- Balsley became interested in landscape architecture

.4

He studied landscape architecture at Syracuse

Balsley's favorite types of projects are urban parks and urban waterfronts:

• They give him the greatest satisfaction and represent the greatest

- He feels they have the potential to touch millions of lives
- · He feels they enhance urban living and urban lifestyles
- He feels they are an alternative to suburban sprawl

Balsley sets up a friction in design and creates a dialogue between (',(/ opposing ideas





Subject Profile Personal Philosophy

• Education

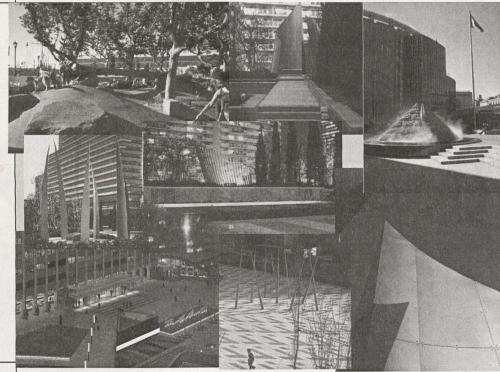
Favorite Projects

- · Firm Philosophy
- Project Scope
- Primary Concepts

Firm designs:

- Small intimate landscapes like small public spaces, small courtyards, or roof terraces
- Large scale urban plans and the open space and streetscape systems that go hand and hand with new developments
- Balsley's firms has a total focus on landscape urbanism

The work of Balsley's firm covers a range of scales from large to small to public to private



Project Examples

RSAS: Focus on the environmental implications, history and heritage of a city and celebrate it as a reminder of the history meaning of that place; Broader look at the urban context

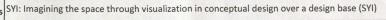
AYA: Proposed program and requirements; outreach to users

AYD: Define goals and problems which need solving

Conventional Design Process

- Stages Used (See Diagrams)
- Thoughts on Conventional **Design Process**

Personal evolved Process

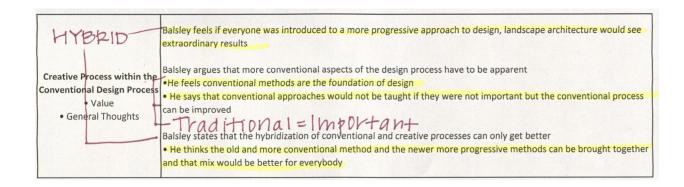




Incorporates Creative Process Creative Process ILMD: Considers all resolutions and solutions to problems Stages Used (See Diagram) • Thoughts on Creative PPF, ILM: Works with a design base with all design considerations apparent throughout the design process **Process Activity to Provoke Creative** Thinking in Design Habits Breaks Relaxation Techniques Layers of trace over a design base: grawing Balsley uses an under-laid design base sheet which Balsley layers trace over for design to make a meaningful process Kineathetic This design base influences his visualization He uses a compilation of all the factors which should influence the design For him, the base is always present and can be reproduced constantly Balsley's firm also uses computer Modeling Media Used in Design Development Balsley feels his role is to address the urban situation: He feels architects are object oriented people, engineers are just what they are, and planners are too broad and can't really take on all the work Role of Landscape Architects · Balsley recognizes landscape architects as the only designers who can truly take on this task Balsley believes his role is to stop suburban sprawl, to save the environment and the urban environment through his work as an alternative to suburban living Sustainability (Social Sustainability) - GUGTainability Dilemmas faced by Balsley sees social sustainability as the challenge of making cities rich, vibrant, healthy and livable **Landscape Architects** Balsley is not discouraged by challenges and unknowing: He feels that challenging projects are the most exciting Balsley does not let challenges and difficult design situations prevent him from moving forward Challenging projects give Balsley the greatest satisfaction "I'm not a path of least resistance kind of person, so I think my personality comes out where I enjoy a good fight" Balsley is more interested in provocative landscapes beyond going to a park, sitting there and staring up at the leaves; Balsley drops down to be inspired and stimulated by dialogues setup to frame unique spatial experiences Balsley's team gains the trust of clients by setting up a dialogue with the people or users · Firm earns their trust from the beginning · Balsley has found that when they gain the client's trust in the beginning of a project, they give his team the trust and **Drivers for Creativity in** artistic license needed to create an excellent design space Balsley's team gains the client's trust and they give them the ability to work with contemporary forms Design Balsley's firms has developed a positive reputation: (() · His designs have been very powerfully embraced by the public • They are not just a little "flash-in-the-pan" ideas from artists They really have a deeper meaning and touch the core of the public they are intended to serve One of the keys for success has been Balsley's ability to be creative, tactful, and diplomatic: · Figuring out a way to lead people to the watering hole and ask them to write checks to pay for the project Landscape architects must have energy, patience and knowledge: • They must be as smart as the planner, as smart as the engineer and as smart as the architect awarenegg/ · Landscape architects cannot simply say, "I'm a landscape architect, I don't know how to do those things"

Landscape architects must know about a variety of different subjects

Balsley feels designing without thinking about original concepts limits creativity in design: • He says many times designers work with a piece of paper over a blank slate awareneas These designers have gone through the whole process but it is in a file or in a pile of drawings in the other room The designers do not make it part of their every moment of their thinking about that design Balsley believes in the need for hand graphics because the computer can limit creativity: He says that while the computer can help, it does not move as quickly as a hand over paper computer Balsley recognizes that a landscape architect's reputations can limit creativity: He says landscape architects need to be provocative but not all designers get to design like that limits Balsley recognizes that the general public limits creativity: 00 MK • He says landscape architects have a lot of masters that are all talking to them as they design and all have different interests and ideas • These groups talk so much that designers get to the point that they feel their creativity and artistic muscle is lost Limitations on Creativity in He says that designers get to the point that they feel no one cares about their voice and creativity because of all the Design demands making it difficult to express themselves Balsley supports the idea that the creativity of landscape architects is limited by uncertainty: Balsley thinks that too much focus on sustainability limits creativity in design · He says too many designers focus on environmental sustainability at the expense of other He says that as a whole the profession of landscape architects has subconsciously ignored or run away from the hallenges of making our cities rich and vibrant and healthy and livable He says designers have gone off to do wetlands and storm water management and green roofs and anything that would allow us to stay in our little corners and play by ourselves Balsley supports the lack of expertise in design as a limitation on creative thinking: He says that designers cannot just say, "I'm a landscape architect, I don't know how to do those things" He feels the real challenge is for landscape architects to make themselves knowledgeable about a variety of subjects education/ awareness Education should expose students to a number of different processes that people have used and found successful: personal _ process developmen Students can then find which process works for them Teaching multiple processes is a way of accelerating student's ability to plug into something suited for them W Students should learn how to draw: Drawing skills gives students solid ground to start from • Students need something to "sink their hooks into" for motivation Drawing is a method that students do not need a lick of artistic talent to be able to do Through drawing, students would be able to communicate their ideas quickly **Design Education** • While the computer is designed to help students, it typically cannot move as quickly as a hand on paper Teach design process helps students learn what they are interested in doing Not many schools are interested in creative or artistic design process Emphasis on creative design is becoming less and less apparent Students need to be taught how to convince clients to support a project or how to be tacticians: · Many students graduate and think as long as they design something, someone will always pay for it to get built Students need to get a better idea that it's not going to be that easy and learn ways to help get their ideas built Creativity in landscape architecture is different than creativity in the fine arts Relationships between Art and Landscape Architecture In the fine arts, artists are free to think, "How do I feel today" and "Let's just see if I can express it" but landscape Similarities architecture has never been about that type of thinking art based on personal Differences Balsley argues that not everyone is supposed to be avant-garde in their designs • He says the need for avant-garde solutions is determined depending on the project Thoughts on the Avant-• For instance, if cities only have one urban park space downtown to be designed and the future and quality of Garde downtown depends on that park, avant-garde is not the solution Avant-Garde Practice He says in other situations, avant-garde or innovative designs are imperative to push the profession and push the • Value edges - originality Define Avant-Garde Not all landscape architects get a chance to be avant-garde



Appendix Z: Color Coded Findings Matrix

			Landscape Architects				Artists			
Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Conventional	l and Initial	The creative processes of artists and design process of avant-garde landscape architects are different but both show signs of the psychological phases of creative thinking								
Design Process		The design process used by avant-garde landscape architects is a personal process that has evolved since their formal education in conventional processes								
	Assumptions and Initial Themes	The processes used by avant-garde landscape architects are non-linear, creative processes								
		The creative process consists of many episodes of work, relaxation, and minidiscontinuous insights until final illumination occurs and the design falls into place								
Creative Process	Emerging	The creative process is driven by human nature, not organization and planning								
	Themes	The idea is to go back and forth between phases until illumination occurs and the final design is developed.								
		Creative process is how it revolves solely around the process, not the product								
		Design is not a singular process and changes with each project								

Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Activity to Provoke Creative Thinking		Kinesthetic activity in design development Any activities that allow the mind to think creatively and freely are integral parts of creative process								
	Assumptions and Initial Themes	Avant-garde landscape architects use a variety of different media throughout their design processes in order to evoke more creative thinking								
Media Used in Design Development		Designers feel freer when drawing Kinesthetic thinking is important for designers wishing to embrace a								
	Emerging Themes	when designers physically work through problems within a project, rather than immediately entering the information into the computer, their minds stay open								
Role of LA		Place making / Making Landscapes Stop Sprawl / Urban Design								
Dilemmas		Sustainability								
		Passion and Personal Confidence in Design Client Trust								
	Drivers for Creativity	Education and training along are not enough in developing an avant- garde landscape architect; Must be Challenged once Learned								
Creativity in Design		Level of Expertise Working Alone Traditional or								
		Criticism of Clients and								
	Limitations on Creativity	Dependence on a set design process making it difficult for them to work through all major obstacles								
		The computer negatively affects creativity								

Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Creativity in Design	Limitations on Creativity	Emphasis on Sustainability Some People are Creative and Some People are not								
Creativity in Design	Factors Affecting Creativity	Environment Reputation or specialization in a specific field Fear of the Unknown and Failure/ Risky Situations Awareness of the Culture, the Profession, and other Subjects								
	Limitations on Creativity in Education	Studio Format Accreditation Expectations Students given environmental information are more inclined to develop conventional methods of idea-generation While the computer is a great asset in several aspects of design, it limits the creativity that needs to be present throughout design development								
Creativity in Design Education	Changes to Encourage Creativity in Education	Creativity, flexibility, originality and elaboration should be Direct changes to the accreditation standards expected of accredited landscape architecture programs Teaching students about the principles of art and other Disciplines Introduce students to many process perspectives Aid students in learning how to verify themselves and their ideas as designers Adopt Creative Problem Solving								

Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
Creativity in Design	Changes to Encourage Creativity in Education	Shift focus on computer use back to the sensory realm of design so students can begin to rediscover themselves as designers; Bringing back and encouraging the use of kinesthetic								
Education		Encouragement of original ideas; Encouraging students to pursue new ideas regardless of feasibility; Encourage students to be spontaneous when working through ideas								
		The design process is a personal process that evolves even after formal education								
Creativity in Design Education	Emerging Themes on Education	Traditional and Technical Aspects of Education are Important								
		Design education needs to better prepare students for working with real clients in selling their designs								
		Artists and landscape architects are both problem solvers								
Relationship of Art and Landscape Architecture	Similarities between Art and Landscape Architecture	The primary role of both artists and landscape architects is developing or finding something that has never been done before								
		Focusing on traditional aspects of design is imperative to both groups								
		Both incorporate personal expression in design								

Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
		Both are influenced by the audience surrounding the designers that constantly pushes and pulls seeking satisfaction								
Relationship of Art and Landscape Architecture	Differences between Art and Landscape Architecture	Landscape architects have clients with expectations and time and financial constraints; artists can concentrate on what they feel is most interesting								
		Landscape architects must work in the real world, making things realistic and functional and artists do not								
		Avant-garde refers to the concept of invention, originality and application of new approaches and techniques								
		Creativity is vital because the moment a design is implemented, it can no longer be avant-garde								
Avant-Garde	Emerging Themes	Copying past designs and traditions or using others' design solutions is not an option for the avantgarde								
		Avant-garde strives for complete creativity over design that is driven by society and past traditions								
		Avant-Garde as a form of Rebellion								
Value of Artistic and Creative Thinking	Value of Creative Thinking and Process	A Hybrid Creative and Conventional Design Process would be Valuable to Landscape Architecture								

Themes from Literature Review	Initial or Emergent Themes	Sub-Themes from Interviews	Thomas Balsley	Peter Walker	Claude Cormier	Mikyoung Kim	Del Harrow	Diana Cooper	Ted Adler	Lisa Rundstrom
	istic and as Art	Personal expression and experiences embraced to understand real life experiences								
Value of Artistic and Creative Thinking		Overall thinking that design is limitless; Artists do not allow basic dilemmas to keep them from thinking creatively								
	Value of Creative Thinking and Process	Creative thinking would help spawn new design solutions								

Matrix Overview:

These are showing overlaps in topics which we brought up by the artists and landscape architects. So although the subjects were not asked about any

Themes from Majority of Respondents in both Groups
Therites from Majority of Respondents in South Groups
Themes from Majority of Respondents Weighted towards Landscape Architects
Themes from Majority of Respondents Weighted towards Artists
Themes from Majority of Landscape Architecture Respondents Only
Themes from Majority of Artist Respondents Only
Themes from Exactly Half of Both Groups of Respondents
Themes from Less then Three Respondents Total

Appendix AA: Informed Consent Form

Reinventing Creative Thinking within the Conventional Design Process:

An Identification of the Factors Contributing to the Creative Thinking of Landscape Architects and Artists

Approval Date of Project: November 4, 2010 Expiration Date of Project: November 4, 2011

Principal Investigator: Katie Kingery-Page

Co-Investigator: Emily King

Contact Name and Phone for any Problems/Questions:

Name: Katie Kingery-Page, Assistant Professor of

Landscape Architecture

Campus Location: 102a Seaton Hall Campus Phone Number: 785-341-5650

Campus E-Mail: kkp@ksu.edu

IRB Chair Contact/Phone Information:

(This information is for the subject in case he/she has questions, or needs or wants to discuss any aspect of the research with an official of the university or the IRB)

- Rick Scheidt, Chair, Committee on Research Involving Human Subjects, 203 Fairchild Hall, Kansas State University, Manhattan, KS 66506, (785) 532-3224.
- Jerry Jaax, Associate Vice Provost for Research Compliance and University Veterinarian, 203 Fairchild Hall, Kansas State University, Manhattan, KS 66506, (785) 532-3224.

Purpose of the Research:

Information obtained from interviews is being used as a primary source of research about creative process for my thesis. My thesis focuses on the role of the creative process in landscape architecture. I will use the information obtained in order to study the creative process of artists and landscape architects. The information will be coded once all interviews have been conducted in order to compare the overlaps between the artists' and landscape architects' processes. While all landscape architects are creative and use some form of a design process, I want to prove the value of a specific creative process which only a handful of landscape architects use on a daily basis. When learning about the creative processes, I will be focusing on the mental phases and psychology of creativity, as well as the media used throughout the creative process. Another objective of my interviews,

specific to landscape architects, is to learn what they feel are their personal obstacles to creativity, value of creative process in landscape architecture, and dilemmas faced by landscape architects today.

Procedures or Methods to be used:

The interviews will be conducted face-to-face, through e-mail or over the phone, depending on the preference of the subject being interviewed. The interviews will be recorded electronically for phone and face-to-face interviews. For e-mail interviews, the information will simple be recorded textually. Finally, for information gathered at student critiques, the information will be recorded through note taking by hand.

The only expectation of the subjects being interviewed is to give honest answers based on the questions asked. It is important that the subjects are honest about details in order to produce an accurate conclusion about creative process.

Once all of my information is collected, I will go through the information through the use of coding. The coding procedure for both artist and landscape architect interviews will be based on the terminology used to describe the phases of creative process and the stages of conventional design process. Coding will also be carried out to find information specific to landscape architects about what they feel are their personal obstacles to creativity, the value of creative process in landscape architecture, and the dilemmas faced by landscape architects today.

Length of the Study:

I would estimate that the interviews will take no more than one hour to complete. Due to the questions being asked, the time length will be dependent on the subject and how much detail they are willing to/ able to provide about their process. The time length will also be dependent upon how the interview is being conducted.

Benefits Anticipated: No benefits anticipated.

Extent of Confidentiality:

Below, subjects have the option of keeping all information with which they provide unidentified within my thesis. If subjects chose to remain unidentified, all names and informational materials which would allow readers to directly identify who I am referring too will be taken out.

If subjects do not wish to remain unidentified, the information recorded from the interviews will be unaltered and published in the appendix of the thesis, as well as on the K-Rex database, a database controlled

by Kansas State University which any person can view and use as a research material (http://krex.k-state.edu). In addition, all names and other identifiable materials will be published as necessary.
I,, wish to remain unidentified. I understand that my name and all identifiable information will be left out of the written thesis, as well as the appendix. I also understand that although I am to remain unidentified, the information gathered from this interview will still be published without all names and identifiable materials to the best of the investigator's knowledge.
Terms of Participation:
I understand this project is research, and that my participation is completely voluntary. I also understand that if I decide to participate in this study, I may withdraw my consent at any time, and stop participating at any time without explanation, penalty, or loss of benefits, or academic standing to which I may otherwise be entitled.
I verify that my signature below indicates that I have read and understand this consent form, and willingly agree to participate in this study under the terms described, and that my signature acknowledges that I have received a signed and dated copy of this consent form.
Participant Name:
Participant Signature:
Date:
Witness to Signature (project staff):



