

THE PHENOMENOLOGY OF A MODERN ARCHITECT AND HIS SENSE OF PLACE: HENRY KLUMB'S RESIDENTIAL ARCHITECTURE IN PUERTO RICO, 1944-1975

BY

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DISSERTATION

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ABSTRACT

At the center of this dissertation is an architect's sense of place – how did it develop or grow within him, what did it consist of, and how did he apply it in his work? The architect, Heinrich "Henry" Klumb (1905-1984), was a German immigrant, a one-time associate of Frank Lloyd Wright, and from 1944 to 1984 a prolific and celebrated modern architect in the Caribbean island of Puerto Rico. Within this study a sense of place is defined as the beliefs people adopt, the actions they undertake, and the feelings they develop towards those locations that through time, experience, group norms and practices, personal investment, or immediate appreciation have become important or meaningful to them.

Klumb's sense of place was a defining and demonstrable quality of his life in architecture. It was characterized by a heartfelt affection for various places where he lived and worked, and for the local populations at those places. These places and peoples included Frank Lloyd Wright's Taliesin, the American desert Southwest and its Native American populations, Puerto Rico's mountainous countryside and its rural working poor populations, and parts of the San Juan metropolitan area. This sense of place was evident in Klumb's reactions to and recollections of these locations and peoples. It was likewise evident in his views on what he thought to be the rightful interrelation between people and their surroundings. All of these aspects were chronicled in his collection of letters, public speeches, essays, and other private papers spanning a period of over fifty-five years.

The focus of this dissertation is twofold. First is an examination of the key events, people, experiences, and locations that impressed a sense of place on Klumb. Second is an analysis of the houses that he designed and built in Puerto Rico from 1944 to 1975. These two subjects coalesce in this dissertation based on the underlying assertions that Klumb's houses in Puerto Rico were a

direct result of those experiences that instilled in him an ability to bring together the daily lives of people in a harmonious relationship with their built and natural environments. Further, with such an idea in mind Klumb in turn attempted to create houses that were meant to foster the same harmonious relationship for others. Nowhere was Klumb's fondness for a location and its peoples more evident and directly relatable than in the houses that he designed and built in Puerto Rico. That is because when we look at the many circumstances in Klumb's life that led him to value specific locations through his demonstrated beliefs, actions, and feelings, we see that these same circumstances found direct expression in his residential practice on the island.

The principal research question of this study is: how did Henry Klumb's life experiences shape his sense of place, and consequently his houses? An important contribution of this dissertation to the scholarly research on Klumb is in applying insights derived from architectural phenomenology and other related fields to reexamine some of the key turning points over the long arc of Klumb's life and career. In doing so the aim is to uncover the very genetic makeup of Klumb's affinity for specific locations and their peoples. A crucial assumption is that a person's most deeply felt connections with various places have their genesis not in a personal philosophy or a conceptual framework. Such connections arise initially and principally out of an accumulation of experiences that are inexorably tied to where those experiences occurred. Those experiences and places then have an impact upon a person's thinking, actions, and feelings.

Through this dissertation I trace the pivotal elements that shaped Klumb's sense of place from when he emigrated from Cologne, Germany in 1927, through his seventeen year sojourn in the United States, on to his career in Puerto Rico. I also track the evolution of Klumb's houses over five decades, determine various trajectories in his residential practice in Puerto Rico, and identify four common physical and conceptual threads in his houses. These four common threads

are, first, that a principal way that Klumb fused select houses with their topographies was through the innovative use of planning grid systems. Second, Klumb's houses in Puerto Rico owed a great deal to the vernacular *Jibaro* hut of Puerto Rico's rural and working poor. Third, the principal spaces in a Klumb house were his open air rooms. These were spaces that were conceived in response to the prevailing breezes at their building sites. Fourth, Klumb's affinity with nature was so strong that even in densely-packed, urban, residential communities Klumb tried to strike a balance between natural and built elements.

This dissertation focuses on Klumb and his residential architecture for a number of reasons. First, Klumb's legacy is an important part of Puerto Rico's cultural heritage. Second, while a small number of Klumb's houses have been venerated in Puerto Rico by local architects and scholars, a full understanding of the history of his residential architecture practice is lacking. Third, given today's global imperative to safeguard the environment, Klumb's houses offer valuable lessons in sustainable design. Finally, Klumb's life and works have great potential to augment our understanding of notions of place. Specifically, this dissertation offers an opportunity to readdress issues related to organic architecture, modernism, regionalism, vernacular architecture, and environmentally and socially conscious design. It also shines a light on an important chapter in mid-twentieth century Latin American modernism.

In the end, this dissertation presents a history of a regional architect who only in recent years has begun to be recognized outside of Puerto Rico for his prodigious and nuanced merging of modern architecture and a special place. As a consequence of the history presented herein, an understanding of Klumb's sense of place serves as an example of how to study other architects with strong ties to specific places. It also serves as a guide for present and future architects so that they can reflect on and strengthen their positions on the notions of place.

To Kris, Orson, and Lucy

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CHAPTER 1: INTRODUCTION TO A PRINCIPLED

ARCHITECT AND HIS SENSE OF PLACE

"History is not just a storehouse of facts but is only important, to me at least, as a process and a pattern of living and changing attitudes and interrelations."

- Henry Klumb¹

The historical and theoretical research that has revolved around and followed much of the Modern Architecture movement of the twentieth century has emphasized what the geographer Ed Relph has described as a "largely placeless approach to design," which was characterized by an architecture "that could fit almost anywhere." Similarly, in less than appreciative terms the architect Kate Nesbitt observed, "One can argue that place and the body were not recognized by the Modern Movement because of its focus on accommodating the collective over the individual, expressed in a language of universality, both technological and abstract." These are of course broad characterizations that do not apply to every architect of the era. An architecture that adheres to the unique and evocative qualities that emerge from local conditions could not have and did not pass away with the rise of the Modern Architecture movement. Indeed, writers such as Christian Norberg-Schulz and others after him have searched for contrary cases from the annals of architectural history and have tried to highlight exemplary place-centric architects and their approaches.⁴

One architect whose career was defined by his association with a particular location as well as by his abilities to synthesize local environmental conditions with more universal, modern approaches was Heinrich "Henry" Klumb (1905-1984), who is pictured in Figure 1.1. Klumb was a German immigrant, a one-time associate of Frank Lloyd Wright, and for forty years a

³ Nesbitt, *Theorizing a New Agenda for Architecture*, 40.

¹ Klumb "Henry Klumb, Prepared for the Opening of 'Skyscraper Architecture'," 3.

² Relph, "A Pragmatic Sense of Place," 29.

⁴ The apex of this research on the part of Norberg-Schulz was his book *The Principles of Modern Architecture*.



Figure 1.1. Henry and Else Klumb, and their two children, Richard (left) and Peter (right), c. 1947. Image courtesy of the AACUPR.

prolific and celebrated modern architect on the Caribbean island of Puerto Rico. Recent scholar-ship on Klumb has made him and his works more accessible than ever before. This recent scholarship, Klumb's few published writings, and other original source documents point to a singular role for architects in modern times. As Klumb saw it, at its core the role of the architect in society was to solve the "basic" and "pressing problems" of a people in a principled manner by engaging, improving, and bringing together both the built and natural environments. This guiding vision, which I will explore in detail later in this chapter, was the driving force behind hundreds of buildings and design projects that he undertook. Inherent in this vision was a social conscience aimed at the betterment of people's lives.

In this dissertation I argue that Klumb's conception of an architect's roles and

⁵ On the subject of basic and pressing problems, see Klumb, "Excerpts from an interview given to Julio Marrero," 1; Klumb, "Statements made to UPR Arch. Students to Guide Design Approach," 1; and Klumb, "Writings," 313, 321.

responsibilities was inexorably linked to his sense of place, which I define as the beliefs that people adopt, the actions that they undertake, and the feelings that they develop towards those locations that through time, experience, group norms and practices, personal investment, or immediate appreciation (that is, upon first impression) have become important or meaningful to them. Generally those locations can include a person's home or neighborhood, a favorite travel destination, or their native city, region, or country. Some of the locations that Klumb treasured over his lifetime included Frank Lloyd Wright's home and architecture studio in rural Wisconsin, the American desert Southwest, Puerto Rico's mountainous countryside, parts of Puerto Rico's San Juan metropolitan area, his own home in the San Juan suburb of Rio Piedras, and St. John's Caneel Bay in the U.S. Virgin Islands. The ways that Klumb felt about these and other locations are evident in his recollections of and his reactions to both these locations, and to his experiences there. Furthermore, all of these sentiments are chronicled in Klumb's voluminous collection of archived letters, public speeches, essays, and other private papers spanning over fifty-five years. Today, this vast documentary evidence resides in the Henry Klumb Collection within the Architecture and Construction Archives at the University of Puerto Rico (AACUPR).

From the wealth of documentary evidence related to Klumb I further contend the following regarding his sense of place:

- that it was a defining and demonstrable quality in his life and work
- that it was characterized by heartfelt affections for various locations where he lived and worked, and for the local populations there
- that it was the result of a lifetime of experiences nurtured and facilitated at key moments in his life by mentors, patrons and employers, and several fortuitous design and construction projects
- that it found its fullest expression in the course of Klumb's highly productive and influential architectural practice in Puerto Rico from 1944 to 1984

With this background in mind, the foci of this dissertation are twofold. They are, first, an examination of the key events, people, experiences, and locations that instilled in Klumb a fondness for various locations and their peoples, and second, an analysis of the houses that he designed and built in Puerto Rico from 1944 to 1975. These two subjects have come together in this dissertation because of two underlying assertions. First, Klumb's houses in Puerto Rico were a direct result of those experiences that impressed upon him how to bring together in a harmonious relationship the daily lives of people with their built and natural environments, and second, with such an idea in mind Klumb in turn attempted to create houses that were meant to foster the same harmonious relationship in others. In other words, nowhere was Klumb's fondness for a location and its peoples more evident and directly relatable than in the houses that he designed and built in Puerto Rico. That is because when we look at the many circumstances in Klumb's life that led him to value specific locations, we see that these same circumstances later found direct expression in his residential practice on the island.

The principal research question of this study is: "How did Henry Klumb's life experiences shape his sense of place, and consequently his houses?" In answering this question, the objective is not to simply report new, previously unknown, factual information about Klumb and his houses. It is rather to convey a fuller understanding of the substance or essence of the man, his houses, and his perspective on both those locations and experiences that over time became particularly meaningful to him.

To be sure, to posit a deep seated, heartfelt, and long-lasting bond between Klumb and Puerto Rico is already a part of the literature on Klumb. The link essentially springs forth from his biography. Some researchers have explicitly drawn from the idea, while still others consider it *a priori*, a tacit acknowledgement, to understanding Klumb and his work. My contribution to

this discourse will be to apply insights derived from phenomenological philosophy, architectural phenomenology, and other related fields to reexamine in detail the key turning points over the long arc of Klumb's life and career. In doing so my aim is to uncover the very genetic makeup of Klumb's affinity for specific locations and their peoples. A key assumption behind this is that a person's most deeply felt connections with various locations have their genesis not in a personal philosophy or a conceptual framework. Such connections arise first out of a set of experiences that are inexorably tied to where those experiences occurred and that have consequently had an effect on a person's thinking, actions, and feelings.

In the remainder of this introduction I will present the following components of my research: the literature review, the significance of this study, and a brief statement on the structure of the dissertation. First, however, I begin with a biographical sketch on Klumb. This initial biography will unfold as a brief historical account in broad brushstrokes, the fine details of which I will present and examine more carefully in the body of the dissertation. Nevertheless, this biographical sketch is essential here for several reasons. One reason is the fact that Henry Klumb is a relatively obscure figure, if not largely unknown, outside of Frank Lloyd Wright scholars and architects from Puerto Rico. Another reason is to present Klumb's life in a traditional overarching manner before proceeding with the dissertation, which unfolds thematically and episodically rather than strictly chronologically. Next, the biographical sketch will help readers to understand Klumb in relation to the various historical forces that intersected his life, particularly those that relate to the architectural movements and trends of his era. Finally, after an overview of his life, I will be able to lay out more easily and in greater detail Klumb's three core architectural principles – higher values, an architecture of social concern, and the maxim that man is the measure of all things.

Henry Klumb, a Life in Architecture, 1905-1984

The times, influences, and people that were a part of Klumb's life were remarkable. Born in Germany at the dawn of the twentieth century, he lived in a time and place that was deeply affected by the turmoil of the First World War. After immigrating to the United States he endured a period of scant work opportunities for an architect living through the Great Depression and the American home front of World War Two. Finally, in Puerto Rico he flourished in the island's postwar economy, building booms, political and economic reforms, pronounced urbanization, and the concomitant rise of suburbia. More broadly, he also felt a great affinity with the burgeoning worldwide environmental movements of the 1960s and 70s.

The number of notable people in the architecture profession who crisscrossed Klumb's life was also extraordinary. These included Frank Lloyd Wright, Philip Johnson, Louis Khan, Richard Neutra, Sybil Moholy-Nagy, and Ada Louise Huxtable. Just as remarkable were the diverse architectural movements and trends that unfolded before him over his nearly sixty years in professional practice. These included the *Deutcher Werkbund*, the Bauhaus, Philip Johnson's and Henry-Russell Hitchcock's International Style, Frank Lloyd Wright's Organic Architecture and Taliesin Fellowship, the architecture of post-World War Two corporate culture, late Modernism, and the postmodern era's appreciation for vernacular architecture and environmentally conscious design. To understand the many aspects that factored in his life, it will be useful to view Klumb's life in three phases: the German period, 1905-1927; the American period, 1927-1943; and the Puerto Rican period, 1944-1984.

The German Period, 1905-1927: Klumb in a Crosswind of European and American Architectural Forces

Klumb's story begins in Cologne, Germany, the city where he was born in 1905, raised, educated

from primary school through college, and worked briefly until immigrating to the United States in the summer of 1927.⁶ We know very little directly from Klumb of his early years in Germany. From the documentary evidence in the Henry Klumb Collection, even where he received his architecture education in Cologne is ambiguous. The most likely institution, as Enrique Vivoni has concluded, is the *Staatliche Baugewerkschule Köln*, a technical college for building engineers and architects.⁷ This school had its roots in a late nineteenth century national system of vocational schools for the construction trades such as masons and carpenters. Although these schools were becoming prevalent in Germany in the early twentieth century, Mies van der Rohe (who was one of Germany's most notable architects of a generation just prior to Klumb) obtained his architecture education through apprenticeships in esteemed architecture offices rather than similar, established vocational schools in his hometown of Aachen.

Klumb's technical education was influenced in these early years of the twentieth century by a host of emerging local and international influences. Chief among them were the ideas of Frank Lloyd Wright. Wright's *Wasmuth Portfolio*, which showcased his work from 1893 to 1909 and was published in Germany in 1910, made a lasting impression on Klumb. In 1979 he recalled his impressions of it, saying that its strength lay in that it "challenged outworn architectural dogma." Its message was "that true architecture is timeless, that it evolves [and] follows organic principles of growth." Klumb's high regard for the *Wasmuth Portfolio* was such that he thought it had the potential to wrest architecture from a neoclassical past and propel it into a new modern era.

Originating in Klumb's own homeland just prior to and following the First World War

⁶ For the events in Klumb's timeline during his early years in Germany, see Kassler, *The Taliesin Membership*; Klumb, "Work History: 1925-1943," 1; and "The Office of Henry Klumb, FAIA, A Management Audit."

⁷ Vivoni, "Henry Klumb and Poetic Exuberance in Architecture." 5.

⁸ Klumb, "Writings," 320.

⁹ Ibid.

were two other powerful influences, the *Deutscher Werkbund* and the Bauhaus. At about the same time that Klumb left Germany in 1927, the avant-garde, modernist Bauhaus architecture school in Dessau, Germany was at its peak. At this point the school had been in operation for eight years, and its famous, factory aesthetic, concrete, glass, and steel buildings had been on the ground for just one year. At the same time, Mies van der Rohe (who would subsequently serve as the third and last director of the Bauhaus) had just completed the *Weißenhofsiedlung* in Stuttgart, which was his greatest works to date as well as a *tour de force* in housing master planning, project management, building design, and full scale architectural exhibit. Even closer to home, Klumb's native city of Cologne had hosted in 1914 a major exhibit by the *Deutcher Werkbund*, a coalition of Germany's leading modern architects and artists, and also an antecedent to the Bauhaus. The Cologne exhibit was significant not for studio exhibits of architectural drawings and models but rather for a number of fully built works by several leading European architects at the time.

The city of Cologne itself was likewise a significant factor in Klumb's life. By his own admission, Klumb grew up an urbanite in Cologne. Speaking to a reporter in 1962 on his gradual acceptance of natural elements and environments over his life, Klumb said,

"The longer you live, the more you want to enjoy the natural phenomena that surround you. Before I arrived at Frank Lloyd Wright's, I was a little soft myself, too. I had been brought up in a city, and a raindrop would alarm me." ¹⁰

Cologne has been one of Germany's largest cities and an important seat of government and religious institutions since antiquity. The city grid that emanates from a bend in the Rhine River dates to its founding as a Roman military outpost and settlement during the reign of the Emperor Augustus. Even one of the city's most prominent bridges during Klumb's years there,

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¹⁰ "Klumb of Puerto Rico," 88.

the Deutz Suspension Bridge (today the rebuilt, post-World War Two Deutzer Bridge), sat close to the original site of a Roman bridge from the first century A.D. As a religious center it has evolved from housing the temples and altars of its original polytheistic Germanic inhabitants to becoming a Catholic archdiocese. The archdiocese is represented by the city's most recognizable architectural work, the Cologne Cathedral, which was completed in 1880 after centuries of work on the building. When Klumb lived in Cologne, the city's ancient and medieval past was increasingly mixing with modern structures and features. The *Deutcher Werkbund* exhibit of 1914 is one example, but a more striking contrast was made by the dual presence of the Cologne Cathedral and its adjacent neighbor, the city's multiline rail station and its lines that emanate to Western Europe and throughout Germany.

By the time he graduated from college in 1926, the allure of leaving Germany and joining with Wright's architecture practice in the United States was strong. ¹¹ This desire was first fueled by Wright's *Wasmuth Portfolio*. Unfortunately, Wright's ideas had been set aside by European architectural audiences during and after the First World War. Of that time period, Klumb wrote, "By 1926 [...] the spiritual and poetic exuberance inherent in Wright's work, missing in the new, were debated again and the intellectually contrived dogma and the contention that it would remake the world again began to be questioned." But, he added,

"In 1927 facing a full life ahead I could not identify with the prevalent architectural concept of the day. To give my existence meaning I had to search for higher values and through fortunate circumstances found myself in early 1929 [...] in Taliesin."¹³

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¹¹ On Klumb's college graduation date, see "The Office of Henry Klumb, FAIA, A Management Audit;" and Klumb, "Personal Data: Henry Klumb, Architect."

¹² Klumb, "Writings," 320.

¹³ Ibid., 321.

The American Period, 1927-1943: Klumb in the Pursuit and Practice of Organic Architecture in America

Upon arriving in the United States in the summer of 1927, Klumb visited various American cities – among them New York, Detroit, and Chicago – before settling down and working for a brief time in St. Louis. Then in the summer of 1928 he managed to reach Wright through a letter. They corresponded over the next few months, and by January 1929 Klumb was with Wright at his rural studio in Spring Green, Wisconsin, soon to be followed by a journey to the Sonoran Desert in Arizona.¹⁴

Klumb spent an eventful five years with Wright. It began with a five month stay in a desert camp, Camp Ocotillo, erected by Wright and his staff of young architects. Here Klumb was witness to Wright taking command of a seemingly barren desert landscape, seeing the potential in its natural splendor, and then transforming it together with this staff into a viable yet temporary architecture studio, campground, and fabrication laboratory.

After departing Camp Ocotillo with Wright in May 1929, Wright's home and architecture studio in rural Wisconsin held a strong sway over Klumb. Klumb saw this place, named Taliesin, as decidedly of its surroundings, that is, he saw it as an intermingling of buildings and natural elements so strong that any dividing line between the built and natural environments had been completely blurred. Klumb wrote of Taliesin at the time,

"Taliesin stands today on the crown of the hill, completely fused with it, living and breathing proudly. It is a part of the characteristically southwestern Wisconsin landscape, a part of the tranquil rocky outcropping with its dark cedars and white birch trees. A living architecture!" ¹⁵

¹⁴ For Klumb's movements between 1927 and 1929, see Klumb, *Henry Klumb 1: Architecture in Search of Higher Values: 1929-1933*; Klumb, "Skyscraper Architecture," 9-10; and Klumb, "Work History: 1925-1943," 1. ¹⁵ Klumb. "Taliesin." 1.

Klumb added, "The construction of the buildings is highly natural." To some architectural historians and critics today this intermingling of the built and the natural was a major hallmark in Wright's widely diverse and prolific career. To others it was the defining characteristic of his architecture. To Klumb it was a lesson in Wright's Organic Architecture that he learned through prolonged, first-person experiences and concerted efforts.

While at Taliesin, Klumb suggested to Wright that he would like to organize and lead an exhibit of Wright's work in Europe. Wright accepted the proposal, dispatching Klumb to Europe from May through September of 1931. The exhibit was a critical and popular success, with showings in Amsterdam, Stuttgart, Berlin, and Brussels. During this time, the noted architecture critic Philip Johnson visited the exhibit in Berlin and expressed to Klumb an interest in showing Wright's work at New York's Museum of Modern Art. Klumb encouraged Johnson to contact Wright directly. Yet to Klumb's surprise, five months later Johnson presided over the International Style exhibit at MoMA. The exhibit included only a small sample of Wright's works. There would be no exhibit dedicated exclusively to him until Fallingwater was featured in 1938 and then a full exhibit on his works was held in 1940.

Klumb's time at Taliesin and hence his tenure with Wright ended in September 1933.

Life around Wright's home and studio had begun to change in 1932 with the advent of Wright's Taliesin Fellowship. Batches of new Fellowship apprentices began to fill the ranks of Wright's staff, and the original Taliesin Men (as Klumb and his peers who had already been with Wright for years called themselves) began to increasingly lose out on meaningful work in the design

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¹⁶ Ibid.. 3.

¹⁷ Klumb stated that the 1931 Wright European exhibit was due to his initiative and Wright's consent. See Klumb, "Professional Duties and Responsibilities: 1929-1943," 1.

¹⁸ On Klumb's 1931 encounter with Johnson, see Klumb to Tafel, letter dated 17 June 1981; and Klumb to Huxtable, letter dated 6 August 1981.

¹⁹ Hitchcock, *In the Nature of Materials*, 85.

²⁰ Ibid., xxvii, xxix, 106.

studio. While visiting a friend and former Taliesin apprentice living in Minnesota, Klumb unexpectedly and without notice decided not return to Taliesin.²¹

During Klumb's next eleven years in the United States, from September 1933 to February 1944, work was scarce and many commissions remained unbuilt. It was, after all, the Great Depression in the United States and an era of further turmoil around the world. In Germany, five months before Klumb left Wright's service and his cherished Taliesin, the Bauhaus was forced to close under pressure from Germany's National Socialist Party. The school's closing and the increasingly difficult work opportunities in Nazi Germany precipitated an exodus of architectural talent from Germany. Walter Gropius, the Bauhaus' founder and first director, fled first to England in 1934 and then to the United States in 1937. Gropius' protégé Marcel Breuer followed him on both moves. Mies van der Rohe fled to the United States in 1937. The architect and urban planner Ludwig Hilberseimer joined him in Chicago the following year. At first, these renowned architects found sparing success in the United States as educators, civil servants, and through a few private commissions. Their greater American successes would have to wait until after the Great Depression and the Second World War.

After leaving Wright in 1933, Klumb pursued job opportunities in Minnesota and Chicago before settling in Washington, D.C. in the summer of 1934. For the next four years, work opportunities were sporadic. Many of them consisted of feasibility studies on prefabricated, affordable housing, and of cooperative housing master plans. Regrettably, although there was great interest and exploratory funding for these projects, due to the economic conditions at the time few of them proceeded beyond the drawing board, proposal, or feasibility study phase. ²²

It was during this time that Klumb briefly partnered with a local Philadelphia architect,

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²¹ Kastner to Klumb, undated letter (c. fall 1933); and Klumb to Kastner, undated later (c. fall 1933).

²² Klumb, "Professional Duties and Responsibilities: 1929-1943," 2-3, 7; and "Work History: 1925-1943," 2-4.

Louis Kahn. Their "Worker's Cooperative Housing Project for Greenbelt, Maryland" remained unbuilt due to a lack of funds necessary to acquire the land. Again, Kahn, like Klumb and so many others, would have to wait until after the Great Depression and the passing of the Second World War to see his greatest works come to fruition.

In February 1938, a fortuitous project came Klumb's way. He was hired by the Golden Gate International Exposition Commission to design displays for a Native American exhibit planned for the spring and summer of 1939 in San Francisco. The project led to an ongoing partnership with the U.S. Department of the Interior's Indian Arts and Crafts Board. Together they collaborated on six projects over three-and-a-half years including museum exhibits, furniture designs and showrooms, and a community center. The projects also led Klumb to a host of diverse places – Tulsa, Oklahoma; Santa Fe and Albuquerque, New Mexico; southern Arizona; San Francisco; and New York's Museum of Modern Art. But more importantly, these projects introduced Klumb to the history, culture, geography, and artistic and building traditions of many various but loosely related groups of people that were heretofore quite foreign to him. These aspects of those projects would turn out to be profound ones for him, and he would build upon them later in Puerto Rico.

By 1941 Klumb had set up an office in Los Angeles. Late in 1943, however, a friend and former Taliesin colleague working in Puerto Rico contacted Klumb and told him of the promising work opportunities there.²³ At the time, the island was a United States territory operating principally under the federal government's control but also in collaboration with local authorities, including a popularly elected Senate and House of Representatives. There, both federal and local authorities sought to transform the island through increased manufacturing. With this goal there was a great impetus to build.

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²³ "Henry Klumb Finds an Architecture for Puerto Rico," 123.

The Puerto Rican Period, 1944-1984: Klumb's Arrival and Forty Year Sojourn in the Caribbean

Klumb's experiences in Puerto Rico and his impact locally on the daily lives of so many people were expansive. He did, after all, live there longer than anywhere else. And his professional output in terms of building design and construction during this time was remarkable. Over the arc of his career in Puerto Rico, Klumb designed over three hundred buildings, touching upon nearly every aspect – for example, institutional, educational, commercial, industrial, residential, and religious – of daily life. But in the spirit of this biographical sketch, I will only touch upon the highlights of his long and distinguished career while on the island. Before doing so, however, an initial geographic orientation is necessary.

The island nation state of Puerto Rico, shown in Figure 1.2, is the smallest of the three Caribbean islands that comprise the Greater Antilles. Puerto Rico itself consists of a mainland, three major outlying islands (Vieques, Culebra, and Mona), and numerous smaller islands. The mainland measures thirty-five miles in width and 100 miles in length. By comparison, it falls in size (3,515 sq. mi.) between Delaware and Connecticut (2,489 and 5,543 sq. mi., respectively).

The country's largest cities, shown in Figure 1.3, are the capital city of San Juan, and the other coastal cities of Arecibo, Mayaguez, and Ponce. Of these, San Juan has been the largest in both size and population since the Spanish colonial era. Although San Juan only occupied a rocky outcropping overlooking the entrance to San Juan Bay when it was first settled by the Spanish, over time the capital city expanded to encompass the San Juan metropolitan area, a small region that includes the municipalities of Cataño, Bayamon, Guaynabo, San Juan, and Carolina, as indicated in Figure 1.4.

Over the course of his career Klumb engaged in design and construction projects throughout the island, but the bulk of his works were located in the ever evolving, key urban,



Figure 1.2. The Greater Antilles: Cuba, Haiti/The Dominican Republic, and Puerto Rico. Map by the author, courtesy of stepmap.com.



Figure 1.3. Puerto Rico. Map by the author, courtesy of stepmap.com.

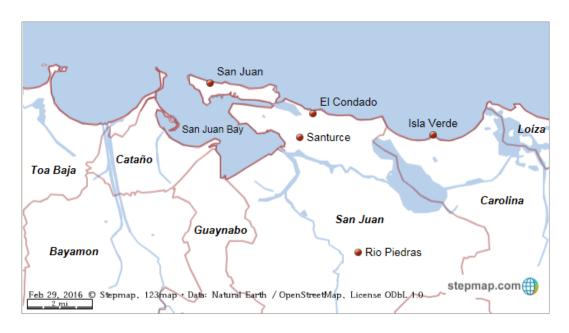


Figure 1.4. The San Juan metropolitan area. Municipalities are indicated in *bold italics*. Map by the author, courtesy of stepmap.com.

suburban, and semi-rural region of the San Juan metropolitan area. Two maps of this part of Puerto Rico give an indication of the changing context during Klumb's career. The first map, Figure 1.5, depicts the municipalities around San Juan in 1947, three years after Klumb arrived in Puerto Rico. The most densely populated and built up areas are the small island of San Juan and the city of Santurce to the east of San Juan. South of these two places there is a small amount of development, especially around Rio Piedras, but not nearly as much as the centuries old communities of San Juan and Santurce. The second map, Figure 1.6, depicts the same areas in 1969, twenty five after Klumb arrived on the island. By this time, a great swath of suburbia had arisen south of San Juan and Santurce. This great swath was the setting for the majority of Klumb's works.

Finally as part of this brief orientation to the island, there is Puerto Rico's most prominent inland physical feature, the *Cordillera Central*, or central mountain range. This range runs along an east-west axis located just south of the island's geographic center. The mountain range subsides to the east only enough to conveniently facilitate overland travel from the north to the



Figure 1.5. The San Juan metropolitan area, c. 1947. Map courtesy of the Historical Topographic Map Collection, the U.S. Geological Survey (HTMC /USGS).



Figure 1.6. The San Juan metropolitan area, c. 1969. Map courtesy of the HTMC /USGS.

south, but the mountainous terrain reasserts itself towards the northeast of the island with the presence of the *El Yunque* tropical rainforest. Puerto Rico's mountains are worth noting for the purposes of this dissertation because of the great influence that they exert on the island's overall topography. While the central mountains may seem like a distant and largely inconsequential backdrop to the populations that inhabit the coastal cities and towns, their effect on the island's total landscape is ever present, and hence they influenced even Klumb's building sites that were far from the central mountain range. Beyond the *Cordillera Central*, as one approaches the island's beaches, the terrain does not recede to a uniform band of flat ground along the coastline. The terrain instead mutates into a highly variable combination of mountains, hills, small plains, jagged rivers and streams, and occasional rocky outcroppings, often all in close proximity to one another. San Juan's mid and late twentieth century urbanization and the great swath of suburbia that accompanied it did much to mask the preexisting natural landscape, but they did not eliminate it. So, modern architects, whether local or imported, had to constantly contend with such varied conditions, just as Spanish *conquistadors* and generations of native inhabitants had done for centuries.

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In the mid-1940s there was a strong push by local politicians and reformers to catch up with other industrialized nations. To this end, Klumb's immediate concern upon arriving in Puerto Rico was the aggressive building program of his first employer there, the local government's Committee on Design of Public Works (CDPW). Even though Klumb's initial employment with the CDPW was brief (from February to November 1944,), this time was both very productive and highly instructive. The CDPW's program was meant to meet the needs of the modern middle class and the impoverished by reaping the benefits of increased industrialization. While with the

CDPW Klumb made great strides towards learning about the socio-economic conditions on the island, the needs of its people, local environmental factors, and native building traditions.

By February of 1945 Klumb had his own private practice on the island. And although the office continued to operate until his death in 1984, it was the office's first twenty years that marked Klumb as Puerto Rico's premier modern architect. From 1945 to 1965 Klumb continued to prosper on the island through some of the same kinds of projects that were simultaneously demanding the attention of elite European and American architects practicing in the United States. He designed a number of corporate buildings and facilities, thus establishing a company's identity and presence through a signature building. Among the most notable were the New York Department Store (1946) and the IBM Building (1957), both in Santurce; and the Parke Davis Pharmaceutical Industrial Complex (1957) in Carolina. Klumb also shaped the University of Puerto Rico-Rio Piedras (UPR-Rio Piedras) campus for years to come through an ongoing campus master planning process, and the design and construction of many of the university buildings. He likewise contributed to select communities through the design and construction of several highly regarded local churches and other religious institutions, most notably the San Martin de Porres (1949) and Del Carmen (1953) churches in Cataño, and the San Ignacio de Loyola School and Church in Rio Piedras (1953-1969). Lastly, he was also in continuous demand during this time to design modern houses fit for the tropics.

At the end of this first twenty year period on the island he was awarded one of the highest honors in architecture in the United States. On June 18, 1964 he was recognized as a Fellow of the American Institute of Architects, in the same awards ceremony in St. Louis as Ludwig Hilberseimer and Ieoh Ming (I.M.) Pei.²⁴ And in keeping with the seemingly international flavor

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²⁴ The granting of Klumb's FAIA award has consistently been reported to have occurred in October 1979. The evidence indicates, however, that he received the award on the aforementioned date in 1964. The documentary

of these awardees, the Italian architect Paolo Nervi was likewise recognized with the AIA Gold Medal. Klumb's FAIA citation is worth quoting as a concise way to understand his work in Puerto Rico and some of its key contributions to tropical architecture. It read as follows:

"Mr. Klumb, who resides in San Juan, Puerto Rico, was recognized for his achievement in design. Among the projects he was singled out for is the series of structures he did for the University of Puerto Rico. These buildings, according to the A.I.A.'s New York Chapter, are consistently stamped with excellence. Their very direct planning solutions, variety of methods of sun control and air movement, and economy in construction result in an almost indigenous expression. As consultant to the Commonwealth of Puerto Rico on housing, public works, and planning, Mr. Klumb made notable contribution in the area of public service. A graduate of the School of Architecture in Cologne, Germany, he also has studied at Washington University, St. Louis, Mo."²⁵

One of Klumb's most significant and ambitious if not altogether successful accomplishments in the ten years after being made an AIA Fellow was the creation of the Klumb Foundation in 1968. The foundation was guided by the bywords "Architecture, Art, Ambiance." Through the work of the nonprofit foundation, Klumb and a small group of foundation officers hoped to ally themselves with likeminded architects, community leaders, government agencies, and socially and environmentally oriented organizations. Their aims were to identify, study, and propose solutions to issues of ecology and social advancement that were of import to the Puerto Rican people and the Caribbean region. Years after establishing the foundation, he summed up the general rationale behind these and other similar efforts when he wrote to a friend, saying,

"The urgent need for social betterment can be obtained through sustained small,

evidence includes references to the award in letters between Klumb and his friends, and his signature stamp

reading "Henry Klumb, FAIA" in many construction drawings after 1964. The most definitive proof, though, is a press release by the AIA's New York Chapter (dated 10 May 1964), an announcement in the June 1964 issue of Architectural Record, and the official program for the awards dinner on 18 June 1964.

²⁵ Jack Bernstein Associates Inc., "Press Release."

regionally directed efforts to generate a deeper sense of belonging in those concerned. Instinctively I tried in varied ways to adhere to the architect's obligations to give priority to improve man's progressively deteriorating physical environment he is in immediate contact with."²⁶

Among the foundation's stated priorities was the promotion of the following:

- "the natural harmony which can be attained in an integrated living environment"
- "essential research in tropical architectural design exploring new relationships between architecture and the arts"
- "an integration of human values in technological, social and economic solutions"²⁷

Although these issues were very much in line with the environmental movements emerging and popular around the world in Klumb's later years, Klumb had confidently espoused an environmental agenda since his early days with the CDPW in the mid-1940s. He promoted an awareness of environmental issues in public speeches and interviews throughout his career. And he made great concessions to environmental factors in his works on the island, particularly in his university, public works, residential, and religious buildings. As a friend remarked to Klumb through a letter in 1980, "Now with the surge of ecological awareness in the sixties, of energy awareness in the seventies, your approach should be more than ever influential in Puerto Rico, and elsewhere." In many ways, then, the foundation was an important and overt symbolic culmination of Klumb's work to date in Puerto Rico.

Unfortunately, the foundation never attained the level of influence or activity that Klumb and its founding officers originally intended. In 1970, just two years after establishing the foundation, Klumb wrote to a friend and fellow founding officer, "We charged ahead too fast. At the other hand it seemed the thing to do at the particular time we started. It might have worked

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²⁶ Klumb to Kohr, letter dated 14 April 1982.

²⁷ "the natural harmony..." and "essential research...": see Klumb, "Certificate of Incorporation of Klumb Foundation." "an integration of human values...": see Klumb, "Klumb Foundation brochure."

²⁸ Kassler to Klumb, letter dated 16 September 1980.

out. We have not lost – money yes. I am sure it was worth the efforts."²⁹ Ten years later he similarly observed, "The K Foundation is neither dead nor alive. Still filling out yearly tax forms. I still don't see any possibility to activate it until I win in the lottery. Keep your fingers crossed. A million dollar drawing is just around the corner."³⁰

The last ten years of Klumb's life and professional practice, from the ages of 69 to 79 and the years 1974 to 1984, were times of significantly less design and construction output than the previous thirty years in Puerto Rico. For one thing, Klumb's long and fruitful association with UPR-Rio Piedras had ended in 1965. Also, the architecture profession had grown significantly in Puerto Rico over the decades following World War Two, and thus there were more architects (both Puerto Ricans and Americans) practicing on the island. But specific to this time frame, Puerto Rico had entered into a period of economic decline. Historians have described this period on the island as a "phase of economic slowdown in which established structures and institutions are subjected to increased stress." More broadly, the U.S. economy was suffering from a recession precipitated by the Energy Crisis and the post-Viet Nam War malaise of the 1970s. And as Puerto Rico's economy suffered to a greater extent than the one in the North American mainland, the island was at a particularly low point. 32

Despite the low level of work, this time was important for Klumb because it engendered a great deal of reminiscing and self-reflection, or at least reminiscing and self-reflection that was recorded in key pieces of documentary evidence. Other than the reduced work, this period of looking back was very likely precipitated by two key factors. First, architecture critics and authors in the 1970s and 1980s had come to question the legacy of the Modern Architecture

²⁹ Klumb to Gutheim, letter dated 25 September 1970.

³⁰ Klumb to Tafel, letter dated 12 December 1980.

³¹ Ayala and Bernabe, *Puerto Rico in the American Century*, 2.

³² Ibid., 245-246.

movement during its ascendancy and influential reign from the 1920s through the 1960s. Two works that struck a particular cord with Klumb, both from 1981, were Ada Louise Huxtable's essay "Is Modern Architecture Dead" and Tom Wolfe's book excerpt in *Harper's Magazine*, "From Bauhaus to Our House." Both were topics of correspondence among Klumb and his friends in the United Sates.

During this same time several of Wright's former apprentices and associates also participated in this reevaluation of modern architecture and their roles in it. In 1974 the urban theorist and architecture critic Frederic Gutheim gathered a collection of Wright's essays in the book *In the Cause of Architecture*, to which Klumb contributed an essay on Wright. In 1979 Edgar Tafel wrote his book *Apprentice to Genius: Years with Frank Lloyd Wright*. In 1981 another former Taliesin apprentice, the landscape architect Elizabeth Kassler, published a comprehensive list and a collection of biographical entries of the many artists and architects who had been in residence at Taliesin and Taliesin West at any time from the 1930s through the early 1980s. Klumb had met each of them – Gutheim, Tafel, and Kassler – at Taliesin in the early 1930s. Although Klumb had lost contact with them after leaving Taliesin, over the years they each rekindled their friendship with him and they exchanged many letters.

The second factor that influenced Klumb's reminiscence and self-reflection in the late 1970s and early 1980s was that his legacy in Puerto Rico began to be officially recognized on the island through a series of awards and honors. At each of these events, Klumb had an opportunity to explain through public remarks his core architectural principles. On those occasions he declared that his architectural principles stretched all the way back to his last years in Germany, that they were significantly affected by Wright, and that they were influenced by his experiences in Puerto Rico. The reevaluation of the Modern Architecture movement and their participation in

it by Gutheim, Tafel, Kassler and Klumb continued both in public and private, in their personal correspondences, and through statements and speeches that Klumb made in public appearances.

With this same retrospective attitude in mind, beginning in 1979 Klumb undertook an ambitious project to chronicle his life in the practice of architecture from 1929 to 1974. This took shape through a series of autobiographical "public pamphlets" (a project which I detail in Appendix A of this dissertation). These pamphlets serve today as invaluable windows not only on the life and work of Klumb but also to the works of Wright in the late 1920s and early 1930s, Puerto Rico's post-World War Two public works programs, and tropical modern architecture on the island, among other things. In retrospect, then, the evidentiary document trail from this time period so late in Klumb's life has become as important to scholars as the many documents that had been amassed in the forty-seven years previous to that from 1927 to 1974.

Klumb's Core Architectural Principles

As mentioned at the beginning of this chapter and later in reference to the Klumb Foundation, Klumb held firm notions regarding an architect's responsibility to others, to his or her community, and to our shared natural environments. To reiterate, Klumb's guiding vision over hundreds of design and construction projects was that the role of the architect in society was to solve the basic and pressing problems of a people in a principled manner by engaging, improving, and bringing together both the built and natural environment. This vision stemmed from three principles that Klumb espoused throughout his life and career:

- an adherence to higher values
- the practice of an architecture of social concern
- the maxim that man is the measure of all things

First was the idea of higher values. As we saw in the German period of the biographical

sketch above, Klumb directly invoked higher values as the reason he left Germany to work with Wright in the United States. Writing to the architectural critic Ada Louise Huxtable in 1981, he likewise said, "I had come to F.LL. Wright two years before [in 1929], leaving Germany in search of higher values." Accordingly, Klumb characterized Wright's career as exemplifying higher values in saying, "Material success achieved at the expense of higher values, eclecticism and emulation as a substitute for creativity he despised." Klumb also titled one of his most consequential autobiographical pamphlets (the pamphlet that covered his years with Wright) Henry Klumb 1: Architect in Search of Higher Values. Also, over the forty years he lived in Puerto Rico, he spoke many times of higher values equally in terms of human values, lasting values, or just simply in stressing the importance of values in general.

But what exactly did Klumb mean by higher values? Higher values implied, first, that architects should not concern themselves with the inconsequential pursuit of artistic expression or release of a creative impulse. He despised such notions, saying of them,

- "Architecture, the art of building Buildings is no silly carnival decoration."
- "Throughout the ages and to some extent today architecture has been a means of translating into concrete form the image of selfish ambitions using resources of will and employing man as slaves to achieve personal satisfaction and glorification."
- "The architect can no longer continue to indulge in imposing his personally evolved creation."
- "The architect is no longer free to impose his personal artistic idiosyncrasies, often mistaken for genius." ³⁵

As Klumb saw it, an architect was a problem solver. Put another way, architects are charged with meeting the needs of a people in a principled manner by improving and engaging

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³³ Klumb to Huxtable, letter dated 6 August 1981.

³⁴ Klumb, "Wright, the Man," 12.

³⁵ "Architecture, the art of building Buildings...often mistaken for genius," see Klumb, "Writings," 304-305.

both the built and natural environments. First was the matter of solving problems. "The basic thing is the logical solution of a given problem," Klumb said, and he saw many problems within the architect's purview. ³⁶ Thinking back in 1979 on when he first left Wright's service in 1933 in order to independently establish himself in the architecture profession, Klumb wrote, "Pressing problems needed attention. Problems are clear if what matters is clear. What seemed to matter most was the quality of shelter, the quality of environment and the simple fact that people live and work in buildings." As a public servant in Puerto Rico in 1944, he expounded on the sort of problems that would occupy him throughout his time on the island. At the time, along with the basic and timeless problems of shelter and dwelling, Klumb wrote at length on the island's "social, economic and environmental needs."

In his core principles, Klumb was especially concerned with problems that led to a schism between people and the natural world, that is, problems that disrupted what he specifically believed to be the inherent harmony that should exist between the two. Klumb's concerns and efforts towards bridging the relationship between people and their natural surroundings spanned five decades. Accordingly, his views on this subject were extensive. These views sprang forth first and foremost from his time with Wright and later took a firm hold of him through his experiences in Puerto Rico, particularly his longtime association with his own house. He credited Wright for imparting upon him "an awareness that man belongs to and is inseparable from nature." Later on in Puerto Rico, in comments about what he saw as the largely regrettable evolution of cities and skyscrapers under the Modern Architecture movement, he asked his lecture audience, "How long can man survive as man in defiance of the renewing

³⁶ "Excerpts from an interview given to Julio Marerro," 1.

³⁷ Klumb, "Writings," 321.

³⁸ Ibid., 306. On Puerto Rico's general problems in 1944, see Ibid., 305-308; and Klumb, CDPW internal memorandum dated 16 August 1944.

³⁹ Klumb, "Wright, the Man," 12.

power of nature?"⁴⁰ Then, as environmental issues had come to the forefront of minds around the world in the 1960s and 70s, in an article on preservation he sounded a somber note by saying, "Man's work on earth, done by man for man and in harmony with nature is all but lost. This is the basic problem facing us, the man-made dilemma."⁴¹ Finally, in sharing even more dour concerns over mankind's insatiable demands for more of everything, he said to a longtime friend through a letter, "All Human Misery can be attributed to a 'Trespassing of the Law of Nature,' and when not obeyed, will force us into self-destruction."⁴²

The second core principle was an architecture of social concern. This principle was closely related to higher values, and given that Klumb included the phrase "An Architecture of Social Concern" in the titles of the majority of his autobiographical pamphlets (namely the pamphlet that covered his intervening American years, 1933-1944, and four pamphlets covering his projects from 1944 to 1974 in Puerto Rico), in a great many ways this principle is thought by Klumb scholars to have defined his work on the island. ⁴³ An architecture of social concern as he practiced it in Puerto Rico promoted the idea that an architectural project can and should simultaneously meet multiple social, economic, and ecological needs.

One of the clearest examples of Klumb's architecture of social concern was his stated objective for the design section of the CDPW. Klumb declared in 1944 that the most important benefit of Puerto Rico's public building programs was not in providing shelter, schools, or government services. It was instead in alleviating widespread unemployment and in turn raising the standard of living across the island.⁴⁴

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⁴⁰ Klumb, "Skyscraper Architecture," 3.

⁴¹ Klumb, "Writings," 313.

⁴² Klumb to Kohr, letter dated 14 April 1982.

⁴³ See the five autobiographical pamphlets *The Office of Henry Klumb 2: An Architecture of Social Concern, 1933-1944* through *The Office of Henry Klumb 6: An Architecture of Social Concern, 1961-1974*.

⁴⁴ Klumb, "Writings," 305-307; and Klumb, CDPW internal memorandum dated 16 August 1944.

Other key examples of an architecture of social concern are found in the Klumb pamphlet *Henry Klumb: Eight Architectural Concerns*. In the pamphlet, Klumb summarized many of the elements he sought to combine in his buildings and master plans. Among these elements were leveraging environmental factors, ensuring personal privacy and security, providing basic modern amenities for the poor, considering topography in master planning, and socioeconomically integrated housing. In the end, what Klumb tried to accomplish through an architecture of social concern was in each case to find a holistic solution to "the complex problems of building."

The third of Klumb's overarching principles is his interpretation of the aphorism, attributed to the Ancient Greek philosopher Protagoras, that man is the measure of all things. Klumb's interpretation is unusual because in philosophy the saying is generally understood to refer to the relative or subjective nature of truth. To Klumb the saying meant that everything that an architect does should be for the betterment of mankind. Inversely, anything that is to the detriment of mankind should be seen as such (as detrimental) and thus either avoided or rectified by the architect. "Architecture," he said, "is the art of building and must concern itself with social matters and with the physical environment shaping man for better or worse." 46

As with many other things, Klumb attributed the genesis of this personal belief to Wright. Klumb wrote, "He used new technology and urged the use of it to further the advancement of architecture. That 'Man is the Measure' he never forgot. The new technology, to be beneficial to men, had to be in the service of man."⁴⁷ As alluded to in this quote, Klumb thought that the adverse unintended consequences of progress – whether technical, scientific, or economic progress – were particularly at odds with the idea that man is the measure. He explained, "Under

⁴⁵ Klumb, "Writings," 305.

⁴⁶ Ibid 221

⁴⁷ Klumb, "Wright, the Man," 13.

the slogan of modern trends [...] we forget or ignore our immediate problems in many matters very conveniently. Man is the measure." In response to this very concern Klumb added, "To maintain what we have – improve and add – within our framework of existence and ability – all along the line – this should be the trend. It is not a modern one – it is an ageless one." He leveraged the idea that man is the measure, sometimes under the banner of human values or the "humanization of architecture," in critiquing unbridled industrialization, urbanization, capitalism, and consumption of nature. Klumb's continued reference to his interpretation of Protagoras' saying was such that late in his career he confided to his friend, the economist Leopold Kohr, saying, "An inner urge led me to realize that 'Man is the Measure,' which became, before we even met, the criteria of my architectural solutions."

Higher values, an architecture of social concern, and mankind as the measure of all things will resonate throughout his life as it unfolds over the five historical episodes that will follow in chapters four through seven. They also resonate as a viable architectural philosophy today.

Literature Review: Klumb at Taliesin, and Klumb in Puerto Rico

Existing scholarly work and research on Klumb revolves around two principal research areas. The first area encompasses those historical accounts in which Klumb plays a supporting role in the production of Frank Lloyd Wright's architecture. The reasons for this are because of Klumb's time working with Wright from 1929 to 1933, the cordial relationship that the two maintained for the rest of Wright's life, and the great influence that Wright's thinking exerted on Klumb throughout his career. The second area where Klumb appears in scholarly work and

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 $^{^{48}}$ Klumb, "Modern Trends in School Plant Planning," 2. The underlined emphasis was by Klumb. 49 Ibid., 5.

⁵⁰ Klumb, "Skyscraper Architecture," 6, 8, 12; Klumb, "Statements made to UPR Arch. Students to Guide Design Approach," 2; Klumb, "Wright, the Man," 12; and Klumb, "Writings," 311, 312, 321. ⁵¹ Klumb to Kohr. letter dated 14 April 1982.

research is a recent and growing interest in his works in Puerto Rico. A common feature of that recent interest is that it has either originated or has depended to a large extent on the Henry Klumb Collection and individuals associated with it at UPR-Rio Piedras. I will begin with the work that deals with Klumb and his association with Frank Lloyd Wright.

Between 1975 and 2006, Klumb appeared in a number of retrospectives and compendiums on Wright. In some of these Klumb was a direct contributor via, for example, an original, first-person account or the publication of correspondence by Klumb that explains his association with Wright. In others he appears in historical accounts regarding Wright. In either case, these works not only establish a key relationship and influence in Klumb's life and work, they also provide a glimpse into who Klumb was and what his legacy is. In the first category is In the Cause of Architecture, which was Frederic Gutheim's collection of Wright's writings published in Architectural Record between 1908 and 1952. Here Klumb is one of several contributors who wrote brief retrospectives on Wright. Klumb's brief essay, four pages long and written late in Klumb's career in 1974, is divided into three parts. Klumb writes first of the relevance of Wright's principles today, second of the lessons learned during his first working experiences with Wright at Camp Ocotillo, and third of the void in architectural leadership left after Wright's passing.⁵² The brief biography appended to Klumb's essay is noteworthy in that it points out his FAIA honor, his considerable number and wide range of built works, and his immigration to Puerto Rico in 1944. Also, in the preface to In the Cause of Architecture, Gutheim credits Klumb and another Wright employee with conceiving and carrying out for Wright a series of perspective drawings – drawings in "a boldly shadowed yet simplified rendering" style – made famous by Wright's Princeton Lectures in 1930 and reprinted in many

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 $^{^{52}}$ Klumb "Wright, the Man," 12-15.

publications since then.⁵³ For anyone in the field of architecture who has never heard of Henry Klumb before, these drawings are likely the only works of his that they have ever seen.

Next, in a 1952 letter by Klumb published in *Frank Lloyd Wright: Letters to Apprentices*, Klumb provided a summation of his life from the time he left Germany in 1927 to his early career in Puerto Rico. In the letter he focused on the personal and professional appreciation he felt for the time he worked with Wright. The letter is one of several written by former Wright employees and apprentices, and they are in response to a request by Wright for written support and testimonials. In the letter Klumb states that he immigrated to the United States specifically to pursue a professional association with Wright, whose reputation, according to Klumb, was held in high esteem throughout Europe. Working for Wright, Klumb goes on to say, provided an invaluable means "to continue and broaden my architectural education." Lastly, Klumb credits his experiences with Wright in guiding him through his career up to that point, namely in city planning and building design throughout the United States and Puerto Rico, the latter, as he described it, "an island rapidly developing."

The association between Klumb and Wright also surfaces in two works by Edgar Tafel, Apprentice to Genius (Tafel's memoir of his time as a member of Wright's Taliesin Fellowship) and About Wright (a compilation of various perspectives on Wright). In the former, Tafel introduces us to Klumb, who was already a member of Wright's professional inner circle when a new crop of eager, young apprentices arrived at Taliesin, Tafel being among them. As such Klumb and others who had already worked with Wright for some time served as mentors or guides to the new arrivals at Taliesin. ⁵⁶ Officially, Klumb was never an apprentice of the

⁵³ Gutheim, "Preface," In the Cause of Architecture, 2.

⁵⁴ Wright and Pfeiffer (ed.), Letters to Apprentices, 194.

⁵⁵ Ibid., 195.

⁵⁶ Tafel, *Apprentice to Genius*, 37-38; and Tafel, *About Wright*, 148, 156.

fellowship. He was a draftsman and later a senior draftsman, although by today's standards we would consider him an intern architect or a junior associate.

Tafel's two books were precursors of something we see more regularly today, which is Klumb's presence, often just in passing, in a number of Wright biographies. These brief appearances shed a further light on aspects of Klumb's life. One example among several is Friedland and Zellman's *The Fellowship*. In it the authors tell us of less than idyllic times with Wright, even for Klumb. Klumb's aforementioned departure from Taliesin, for example, was precipitated by personal disagreements between the two men. In one such disagreement detailed by Friedland and Zellman, "Wright berated him [Klumb] for marrying without his permission." Then, even though Klumb's years at Taliesin afforded him some seniority it also led to some resentment, as new, coveted work was increasingly going to the ever growing population of apprentices instead of to Klumb and his more established group of peers. Shortly thereafter Klumb left Taliesin. Rifts such as these did not last, however, as a fondness between the two men remained throughout their lives. 58

Through these accounts we see Klumb playing a part in one of the many crucial time periods in Wright's career – as Wright starts a practice in Arizona, prepares and delivers the influential Princeton Lectures, and forms the Taliesin Fellowship. The accounts also contain valuable biographical information on Klumb himself. An important element in these accounts, certainly when we hear about Wright in Klumb's own voice, are recurring traces between Klumb's own core architectural principles and Wright's work. Perhaps the most substantive of these is Klumb's contribution to Frederick Gutheim's edited volume *In the Cause of Architecture*. As we saw earlier, in the essay Klumb disparaged "material success" when

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⁵⁷ Friedland and Zellman, *The Fellowship*, 160.

⁵⁸ Ibid., 224-225, 259.

achieved at the cost of "higher values." ⁵⁹ He also wrote of "the humanization of architecture," of the essential relationship between people and the natural world, of meeting the "emotional needs of human beings," and in defense of the "social concern" of Wright's architecture. ⁶⁰

Apart from works where Klumb plays a supporting role in Wright's architecture, there is also a recent and growing scholarship that has focused on Klumb's life and work. Most of this research has been conducted in the last twelve years. More specifically, since 2004 there have been a retrospective museum exhibit, four books, and three doctoral dissertations on Klumb. At the center of much of this work has been the Henry Klumb Collection at the AACUPR and its director, Professor Enrique Vivoni. From October 2004 to January 2005, Vivoni curated the exhibit on Klumb at the Museum of Art of Puerto Rico. He also wrote the text for the museum exhibit program, edited a subsequent volume on Klumb, and wrote a journal article on the importance of Klumb's architecture in Puerto Rico's modernization. These texts by Vivoni and the edited volume serve as the most comprehensive collection of biographical information to date on Klumb. The edited volume, Klumb: An Architecture of Social Concern, includes contributions from Gwendolyn Wright, David Leatherbarrow, Sandy Isenstadt, Vivoni himself, and others. The book includes an introductory essay and six essays covering (1) Klumb's biography, (2) the Klumb House, (3) Klumb's designs at the UPR-Rio Piedras campus, (4) Klumb as an agent of modernism in Puerto Rico, (5) Klumb's role in Puerto Rico's public housing programs in the mid to late 1940s, and (6) Klumb's building details (specifically those details that facilitate indoor-outdoor relationships and mediate environmental factors).

Rosa Otero's doctoral dissertation, *Permeable Walls and Place Recognition in Henry Klumb's Architecture of Social Concern*, which was completed in 2005 at the University of

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⁵⁹ Klumb "Wright, the Man," 12.

⁶⁰ Ibid., 12-15.

Pennsylvania, focuses on Klumb's use of *brise-soleils* and how these building elements are befitting Puerto Rico's climate and culture. Aside from her treatment of Klumb's *brise-soleils*, two valuable elements in her dissertation are an appendix with a sampling of Klumb's writings, and another appendix that devotes an individual page to each one of Klumb's projects undertaken in Puerto Rico. The first of these appendices, which totals twenty-four pages, is the largest collection of Klumb's writings published to date, and as such is a contribution of paramount importance to the scholarly research on Klumb. The second appendix, totaling 314 pages, is a ready-made reference of critical data for each project that Klumb's office worked on, whether built or unbuilt, between 1944 and 1984.

In 2007, Josean Figueroa and Edric Vivoni's book, *Henry Klumb: Principios Para Una Arquitectura de Integracion*, was published ("Henry Klumb: Principles for an Architecture of Integration"). Like Otero's dissertation, Figueroa and Vivoni are primarily concerned with how Klumb's designs respond to environmental factors. Their objects of analysis are six houses by Klumb, and their principal analytical methods are diagrammatic plans, conceptual diagrams, and block diagrams in plan and section.

The second dissertation on Klumb is Luz Marie Rodriguez's ¡Vuelo al Porvenir! Henry Klumb y Toro-Ferrer: Proyecto Moderno y Arquitectura Como Vitrina de la Democracia (Puerto Rico, 1944-1958) ("Flight Towards the Future! Henry Klumb and Toro-Ferrer – the Modern Project and Architecture as a Showcase for Democracy in Puerto Rico, 1944-1958"). Completed in 2006 at the Polytechnic University of Catalonia, Spain, it is a history of the two leading offices specializing in modern architecture in Puerto Rico during the island's early modernization period. The third dissertation is Glorilis Ortiz Rodriguez's La Relación Entre el Arquitecto y el Cliente: Henry Klumb y William Levitt, dos Modelos de Relación en la Arqui-

tectura Doméstica de Puerto Rico ("The Architect-Client Relationship: Henry Klumb and William Levitt, Two Models for Domestic Architecture in Puerto Rico"), completed in 2012 at the University of Leon (Spain). It is a comparative study between Klumb's collaborative client-architect relationship and the less personal and less accommodating approach of the Levittown residential developments. In her dissertation, Ortiz highlights Klumb's Dreyfuss, Marrero, and Aponte residences.

These recent articles, books, and dissertations have promoted a number of key elements in Klumb's life and works. The most prominent is Klumb's architecture of social concern, which I described above in Klumb's core architectural principles. To Klumb scholars it has become the catch-all lens by which to view his life's work. At the same time it has been interpreted to mean many different things, but primarily an architecture that is politically and economically progressive, environmentally conscious, and post-colonial (that is, not beholden to the Spanish colonial building traditions).

Closely associated with his architecture of social concern is Klumb's role in Puerto Rico's modernization. Scholars credit Klumb with reshaping the island's built environment by introducing to the island key concepts of modern architecture, specifically ideas from Wright, Le Corbusier, Kahn, and the International Style in general. Klumb's influence is manifest by both its scale and timeliness. Over the arc of his career, scholars have pointed out, Klumb designed over three hundred buildings, touching upon nearly every aspect (institutional, educational, commercial, industrial, residential, and religious) of daily life in Puerto Rico. Of particular interest to researchers has been Klumb's time in the CDPW in 1944 and from 1946 to 1948, and his tenure as university architect at UPR-Rio Piedras from 1945 to 1965. Even though his role with the university was an unofficial distinction, it represented a tacit agreement between Klumb and

Jaime Benitez – the university chancellor of that era – and it was the source of numerous building commissions.⁶¹ In this role as university architect he put a new face on a grand scale to an institution that would play a crucial part in bolstering the higher education needs and consequently the economic future of the Puerto Rican people. That face was a decidedly modern one that stood in opposition to the campus' precious Spanish revival aesthetics.

Another prevalent aspect of the body of research related to Klumb is how his buildings relate to environmental factors. Otero, Leatherbarrow, and Figueroa and Vivoni have all made this a central feature of their analyses. Otero's approach is technical, as she categorizes Klumb's *brise-soleils* based on their "permeability" to light, air, and people. Leatherbarrow's approach is phenomenological in that he focuses on how Klumb's walls mediate indoor/outdoor relationships, and manage daylight and air. Figueroa and Vivoni's approach is predominantly diagrammatic, as they dissect house plans and various diagrams in search of general design principles.

Finally, it is important to note what level of attention has been afforded both generally to Klumb's many architectural works and specifically to his houses. Klumb's university buildings as well as the overarching master plan project at the UPR-Rio Piedras campus have been the subject of many scholars and researchers. They are featured more than any other group of buildings in Otero's doctoral dissertation, and in Vivoni's journal article and throughout his edited volume. This is not surprising since the campus contains the largest concentration of buildings by Klumb, specifically large, multistory buildings. At its height the university contained nineteen buildings designed by Klumb, among them dormitories, faculty housing, a museum, a library, a bookstore, and various department buildings, making them an impressive,

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⁶¹ On Klumb's service to UPR-Rio Piedras, see Arango, "Henry Klumb and the University of Puerto Rico, Rio Piedras Campus," 85-132.

influential, and very accessible collection of buildings. ⁶² The university buildings are also very popular among researchers as case studies for Klumb's many varied *brise-soleils*. Apart from his university buildings, there are a wide range of works covered. That is because most research on Klumb takes a broad perspective on his architecture, so studies of his works feature an even mix of his work for the CDPW (including public housing and government office buildings) as well as his churches, commercial buildings, and his residences. ⁶³ In general, studies on Klumb's works cast a wide net rather than having intently focused on any one building type or a specific building, so much so that in the end there has been little typological specialization. This leaves an ample supply of built works available for further research on Klumb.

Numerous Klumb researchers have acknowledged, usually in passing, the great importance of his residential architecture. Even just in passing, they provide some small yet significant insights on his houses. ⁶⁴ Still, theirs are not full treatments on this aspect of his design practice. Three works that have focused on Klumb's houses are Figueroa and Vivoni's analyses of six Klumb houses, Glorilis Ortiz's dissertation, and Fuster and Crichfield's "The Klumb House: The Recycling and Modernization of the Type" in Vivoni's 2006 edited volume. Figueroa and Vivoni's book is the most comprehensive treatment of Klumb's houses to date, as the six houses in their analyses are divided into three pairs of houses in three contexts – urban, suburban, and rural. In Fuster and Crichfield's work the authors argue that Klumb's own house – a converted, colonial era, light-wood frame farmhouse – stands as a hybrid of past (historic or colonial era) and modern spaces. It also stands alongside some of the other houses from the great architects of the twentieth century – works by Mies van der Rohe, Le Corbusier, Aalto, Barragan, and

⁶² Ibid., 87.

⁶³ This broad perspective and even mix approach of buildings represented is characteristic of the studies by Vivoni, Leatherbarrow, Isenstadt, and Otero. Arango, as already noted, focuses on Klumb's university buildings.

⁶⁴ Arango, 89; Otero, *Permeable Walls and Place Recognition*, 53-57, 191-192, 228-229; and Vivoni, "Modern Puerto Rico and Henry Klumb," 36.

Niemeyer. I have already detailed Ortiz's dissertation in the section above. In the end, though, even with a book, a dissertation, and an essay devoted to them, the attention afforded to Klumb's university, commercial, and religious works far outweighs the attention his houses have received. This results in a significant gap. There still remains much that we can learn from his houses and they deserve an even more complete treatment than exists today.

This present dissertation will contribute to the existing body of work related to Klumb's houses in several ways. First, it will diachronically trace the evolution of Klumb's houses over four decades, and by necessity it will greatly increase the number of Klumb's houses previously studied and analyzed. This will unearth important insights into Klumb and his houses that may not be evident in a synchronic study or studies of a small subset of his houses. Second, it will focus on the surrounding built and natural contexts of each house, paying particular attention to their topographies, to better understand them as a part of a larger place, community, or physical environment. This perspective on a work of architecture is difficult to apprehend when a building is studied as a stand-alone object or a diagrammatic plan rather than viewing and approaching a building as an inhabited place in its surrounding environment. Finally, it will explore the fine grains of Klumb's biography in order to make key connections between his life experiences and his built residential works. In the end, I seek to provide an intimate, personal account of Klumb's influences and motivations as they evolved throughout the course of his life and then as they surfaced in one of architecture's fundamental typologies – the house.

The Dissertation's Significance

I have chosen to focus on Klumb's residential architecture among his many varied works for a number of reasons. First, Klumb's legacy is an important part of Puerto Rico's cultural heritage. His buildings have been venerated by generations of architects, the university community, and

the local press. Annually since 1981 a top architect in Puerto Rico has been honored with the Henry Klumb Award. Also, today there is a well-publicized effort to restore Klumb's own house, which was declared an invaluable cultural heritage site in 2014 by the World Heritage Foundation. As a renowned architect, Klumb's works have the potential to inform architects beyond the borders of the Caribbean region.

Second, while a small number of Klumb's houses have been venerated in Puerto Rico by local architects and scholars, a full understanding of the history of his residential architecture practice is lacking. There are no monographs of his works and drawings, which in itself would be a formidable and valuable project. In fact, the published material on Klumb is small when compared to that regarding many other well-known modern architects in the region, such as Brazil's Oscar Niemeyer, or Mexico's Luis Barragan and Ricardo Legorreta. Thus, Klumb's residential architecture remains open for further research.

Third, given today's global imperative to safeguard the environment, Klumb's houses offer valuable lessons in sustainable design. That is because his buildings reflect a deep-rooted belief that we are not masters over the environment but rather stewards of it.

Finally, Klumb's life and works have great potential to illuminate our understanding of notions of place. This is possible because to study Klumb's works in Puerto Rico is to be transported to a time and location that is so starkly different and unfamiliar to what we may be accustomed. Consequently we are forced to confront the practice of architecture under entirely new conditions – social, cultural, historical, political, and environmental. In doing so readers must situate themselves and adopt a new perspective centered on a specific place and its people, not unlike Klumb did upon arriving in Puerto Rico. Additionally we are able to readdress issues related to organic architecture, modernism, regionalism and critical regionalism, vernacular

architecture, and environmentally and socially conscious design, which are themes that have dominated twentieth century architectural discourse.

An Overview of the Remainder of the Dissertation

Following this introductory chapter, in the theoretical framework I draw upon David Seamon's concept of phenomenological ecology to clarify aspects related to notions of place and a sense of place, and to understand how scholars in the fields of geography, philosophy, architectural theory, and landscape studies have leveraged history to study the ways that people believe, act, and feel towards those locations that have become meaningful to them. In Chapter Three I detail my research methods and approach to this dissertation as a hermeneutic and phenomenological history of Klumb and some of his chief works. The subsequent four chapters unfold thematically and episodically. In these chapters I explore Klumb's works and biography in a series of alternating and interrelated analytical sections and historical episodes. Through the analytical sections I explore those themes that, I argue, are at the heart of Klumb's houses in Puerto Rico. The historical episodes associated with each of these analytical sections correspond with those parts of Klumb's life and professional practice that most directly relate to the arguments made in the analytical sections. But the historical episodes do not merely support the assertions of the analytical sections. The historical episodes also stand as discrete units each organized around a key period of Klumb's life, periods that in themselves help us to better understand his connections with various locations and the transformative experiences those locations helped to engender. Finally, in the concluding chapter of this dissertation I consolidate the major findings of this research, the contributions of this dissertation to the scholarly research on Klumb and to the field of architectural history and theory, the areas of limitations of the study, and areas for further investigation.

CHAPTER 2: PARSING THE PLACE META-CONCEPT

- THE THEORETICAL FRAMEWORK

"Some people are not much interested in the world around them, and place for them is mostly a lived background. But others always attend closely to the character of the places they encounter."

– Ed Relph¹

At the heart of this dissertation are an architect's major beliefs, actions, and feelings towards those locations that through personal experience, group norms and practices, or other means became important to him. This corresponds with what I defined at the beginning of the previous chapter as a person's sense of place. In this chapter I explore select theories regarding this wide-ranging personal and social phenomenon with an emphasis on a modern and contemporary architectural context. Through this I explain the theoretical frame that I employ in successive chapters. In the focus of this dissertation, the case of the German-Puerto Rican architect Henry Klumb, I am specifically concerned with the following set of questions: How did this personal characteristic developed or grew within him, of what did it specifically consist, and how did he apply it in his work?

The literature on what has traditionally fallen under the domain of a sense of place is vast. As the geographer Edward Relph notes, the subject was first the purview of his peers in geography in the early 1970s.² Since then it has also been a fertile research area in many other fields, among them cultural anthropology, archeology, environmental and developmental psychology, architectural phenomenology, landscape architecture, education, and even recreation, sports, and leisure. I have organized my exploration of the subject along three lines.

¹ Relph, "A Sense of Place," 208.

² Relph, "Modernity and the Reclamation of Place," 32. The impetus to the increased interest on place and sense of place in the 1970s has been attributed to the influences of Bachelard, Heidegger, Norberg-Schulz, Tuan, and Relph, among others. See Low and Altman, "Place Attachment: A Conceptual Inquiry," 1; Cresswell, *Place: A Short Introduction*, 19-21, 24; Relph, "A Sense of Place," 217; and Seamon, "Dwelling, Seeing, and Designing: An Introduction," 3, 17.

First, to draw from the most appropriate field's literature, I will use David Seamon's phenomenological ecology as an initial orienting principle. Second are the temporal aspects of a sense of place. By temporal aspects I mean, first, how notions of place have evolved and been treated in historical research, and second, to what extent have researchers examined the processes by which people diachronically develop a bond with various locations or have exhibited that connection synchronically. The third part of this chapter is a synthesis and final refinement of the ideas from the previous two sections on phenomenological ecology and temporal aspects. This third point requires further introductory remarks here.

In researching subjects of this theoretical framework it became apparent that the word "place" is frequently used by thinkers and writers to describe a great many diverse phenomena. As the geographer Tim Cresswell and the philosopher Edward Casey have pointed out, place is such a common part of our everyday speech that it routinely avoids precise definition and consequently rigorous thinking.³ When this word assumes a multiplicity of meanings, it carries with it an overabundance of ambiguities. When it is used in this manner, place is not a precise identifier of any one thing or concept. Instead it acts in such a broad way that it is more appropriate to think of it not as referring to a specific location but rather as referring to what I will call the place meta-concept. Throughout this chapter I will add some helpful specificity and clarifications to what others have put under the umbrella term of place. In the third section of this chapter I will cull from the relevant meanings and interpretations that revolve around the place meta-concept, and give shape to the lens that I will use to examine Klumb's biography and his residential practice in Puerto Rico. To borrow an analogy from the area of mathematical functions, the place meta-concept is the range from which I will formulate a domain of concepts, precise definitions, and relationships that will constitute my theoretical frame.

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³ Casey, *The Fate of Place*, x, xiv; and Cresswell, *Place: A Short Introduction*, 1, 15-16.

To aid in this effort I propose two definitions, the second of which I have alluded to already but bears repeating in full.

- place a collection of all objects and materials brought together by people and natural processes at a specific, habitable location. A place is not just any one thing but rather an entire composition, everything that comes together at that location.
- a sense of place the beliefs that people adopt, the actions that they undertake, and the feeling that they develop towards those locations that through time, experience, group norms and practices, personal investment, or immediate appreciation have become important or meaningful to them.

A place, as indicated above, requires three conditions: geographic location, the physical and material compositions at those locations, and the fact that those compositions are the results of human and natural processes or interactions. The defining qualities of a place, then, are concrete and relational in nature. A sense of place points to an ingrained worldview or perspective that leads a person to think, act, and feel in ways that show care, concern, or the need for safeguarding of a treasured location.

To get from a location (which is both a material container and a locus of natural processes and human efforts) to people having imbued those locations with special meanings, there are subtleties to be made evident about what bridges these two points. This I will begin in the subsequent sections, and endeavor to scrutinize over the course of the chapters that follow.

Phenomenological Ecology

Seamon coined the term "phenomenological ecology" in 1993 to categorize the contributions to two edited volumes by a number of notable geographers, philosophers, architects, landscape architects, and environment-behavior researchers.⁴ Their specific efforts as part of those two

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⁴ Seamon and Mugerauer (eds.), *Dwelling, Place and Environment*; and Seamon (ed.), *Dwelling, Seeing, and Designing*.

edited volumes were directed at the intersection of theory, design, and the built environment. In the second of those two edited volumes, Seamon extolled phenomenological ecology as a new, multidisciplinary field of study that was grounded in the following:

- (1) phenomenological thinking and methods
- (2) the relationships between environments and people⁵

Phenomenological thinking and methods aim to transcend what Seamon sees as the overly specialized and limited scopes of traditional scientific and quantitative approaches. Phenomenology, Seamon argues, allows for "a deeper, more holistic way" of seeing and understanding any part of the lived-world (that realm that encompasses peoples' everyday lives and experiences). Phenomenological "ways of knowing," Seamon writes, "are wider-ranging and incorporate qualitative description, intuitive insight, and thoughtful interpretation." He continues, "Human beings, including scholars, 'know' in many different ways – intellectually, emotionally, intuitively, viscerally, bodily, and so forth. A full understanding of any phenomenon requires that all these modes of knowing belong and have a place."⁷

Seamon uses the term environments to refer to the built environment, landscapes, communities, or in general any "world outside ourselves." In phenomenological ecology, however, Seamon tells us that there is no rift between person and world, between subject and object, as there is in "conventional Western philosophy." Phenomenological ecology aims to bridge those divides and apprehend people, objects, and their environments clearly and as they are, that is, interrelated to one another rather than "isolated" or "fractured" from each other. 10

Finally, Seamon directly asserts that all of the concerns inherent in phenomenological

⁵ Seamon, "Dwelling, Seeing, and Designing: An Introduction," 1-2, 16.

⁶ "a deeper, more holistic way": see Ibid., 8. On the lived-world, see Ibid., 17.

⁷ Ibid., 15.

⁸ Ibid.. 16.

⁹ Ibid., 14.

ecology coalesce around places in a way consistent with our definition for a place established above. As Seamon explained, "Phenomenological ecology is an interdisciplinary field that explores and describes the ways that things, living forms, people, events, situations and worlds come together environmentally. A key focus is how all these entities *belong* together in place."¹¹

In combining in his statements above several related but distinct ideas revolving around "place," Seamon invokes different aspects of the place meta-concept, among them physical locations and material compositions shaped by man and nature, locations as the backdrop of human activities, and a sense of belonging. These three aspects fall under the auspices of our previously defined place and sense of place. Indeed, among the contributors to Seamon's two edited volumes were some of today's leading geographers and philosophers who support architectural theories and practices that revolve around the place meta-concept. Phenomenological ecology is thus poised to enlighten us in a multidisciplinary way on the wide range of ideas within the place meta-concept and as it relates to architecture and landscape architecture.

Scales of Places

We can refine scholars' ideas about places by considering the issue of scale, of which the geographer Yi-Fu Tuan has said, "Place exists at different scales. At one extreme a favorite armchair is a place, at the other extreme the whole earth." Again, like Seamon, by using the word "place" instead of "a place" or "places" in this statement, Tuan invokes the place metaconcept. In his statement Tuan is of course alluding to places as specific, habitable locations (which a chair and the world both are) and to their varying material makeup depending upon the

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¹³ Tuan, *Space and Place*, 149.

¹¹ Ibid., 16 (the emphasis in italics is by Seamon).

¹² Frequent contributors to the publications associated with phenomenological ecology have included Edward Relph, and the philosophers Karsten Harries, Jeff Malpas, and Robert Mugerauer. Other contributors have included the architect Christopher Alexander, the anthropologist Timothy Ingold, and the geographer Yi-Fu Tuan.

size of those locations. There is also in Tuan's statement a tacit reference to how a person might feel about such locations (not just an armchair but a favorite armchair). But to get closer to what Tuan is referring to, consider how Relph has codified these different scales and some examples of these scales. Relph's scales are as follows:

For the sake of illustration of Relph's taxonomy, some of the key locations that will surface in the course of this dissertation include the following:

- Nation: the island state of Puerto Rico, containing all its cities, towns, buildings, valleys, mountains, and beaches, etc.
- Region: the San Juan metropolitan area, El Yunque tropical rainforest, Puerto Rico's Cordillera Central.
- Landscape: a hilltop, a ridgeline, a sloping or mountainous building site, a garden.
- City: Puerto Rico's historic capital city of San Juan; its dense residential and commercial neighbor of Santurce; the tourist, entertainment, residential, and beachside area of El Condado; Dorado, a beach, golf, and weekend getaway community. Closely related subsets include the University Gardens and San Patricio residential developments.
- Street: El Condado's Ashford and Magdalena avenues, and the Santa Maria
 Development's Orquidea Street.
- Home: Any of the houses Klumb designed (e.g., the Haeussler and Ewing residences), and Klumb's own house.

The architect and architectural historian Christian Norberg-Schulz had a similar conception to Relph's, which he termed environmental levels. These levels included the following:

The last of these, sub-places, allows for the component parts of a building – for example, a room,

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¹⁴ Relph, *Place and Placelessness*, 18-22.

¹⁵ Norberg-Schulz, *Genius Loci*, 16. Norberg-Schulz later asserted that three principal modes whereby life "takes place" – private or personal life, public life, and collective life – are supported by three principal places – the house, institution, and city. See Norberg-Schulz, *Principles of Modern Architecture*, 115.

a patio, a veranda, or Tuan's favorite armchair – to also fall under the concept of a place.

When we view these scales in descending order of size, each level within the scale physically subsumes all the levels below them. Also, each stop or habitat in this sliding scale supports a greater capacity for material composition of built and natural elements than those places that exist at smaller scales below them. Similarly, larger places support greater varieties of human activities. A large international city, for example, will offer a greater number of possible activities than Tuan's proverbial armchair in a living room or den. Lastly, each point in these scales of places engenders differing perspectives, attitudes, or commitments from individuals or communities. To once again play off the city-armchair example, a community of preservationists would be more inclined to save a historic building than the individual pieces of furniture in it (the furniture being sub-places of smaller size or consequence).

Places as Sources of Meaning that Lead to a Sense of Place

Like the basic issue of scale, under the place meta-concept the answers to the seemingly basic question "What is a place?" not surprisingly transcend and subsume numerous issues. For scholars, a fuller answer necessarily includes what I will refer to as the person-location reciprocity. The philosopher Jeff Malpas refers to this phenomenon as "mutuality," the idea whereby "while we may affect the places in which we live and so may take responsibility for them, those places also affect us in profound and inescapable ways." Cresswell adds, "As well as being located and having a material form, places must have some relationship to humans and the human capacity to produce and consume meaning." A similar sentiment is evident in Relph's observation: "Some people are not much interested in the world around them, and place for them is mostly a lived background. But others always attend closely to the character of the

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¹⁶ Malpas "Place and Human Being," 22.

¹⁷ Cresswell, 7.

places they encounter."¹⁸ In these statements, Malpas, Cresswell, and Relph acknowledge that there are processes through which people derive meaning from their interactions with locations. But what meanings, and through what processes do we derive such meanings?

Among the most commonly studied sources of meaning, significance, and value that people derive from their person-location reciprocity are place attachment, a sense of belonging, and personal and collective identity. Others include feelings of nostalgia, drives towards conservation and preservation, and even a profound sense of loss when faced with abrupt cases of displacement. Another significant association that can develop between people and places is place dependence, whereby a particular place is more suitable "for satisfying an individual's goals and needs when compared with some other potential area." This is particularly helpful towards understanding regional architects not unlike Klumb, Wright, and others whose lives, professional careers, and successes have benefited greatly from specific regions or homelands. Examples include H.H. Richardson, Greene and Greene, Alvar Aalto, Luis Barragan, Alvaro Siza, Peter Zumthor, and Rick Joy. What is important about these elements inherent in the person-location reciprocity (issues such as place attachment, place dependence, nostalgia, or a the adverse mental and emotional effects of displacement) is that people are conscious of them, that people can relate to them, and that they can see them as important and potentially influential aspects in their lives.

Elements such as a person's conscious ability to relate to and acknowledge a relationship to locations to which they have formed a bond or attraction correspond in a general way with what phenomenological ecologists consider to be a sense of place but it does not fully delineate this sense yet. Relph has written extensively on the subject of a sense of place over four decades,

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¹⁸ Relph, "A Sense of Place," 208.

¹⁹ Nanzer, "Measuring a Sense of Place," 365.

refining his interpretation, responding to critics, and reconsidering the concept in light of a globalized, interconnected, and technological world. Some of his more salient conclusions on a sense of place include the following:

- 1. It is "an innate faculty, possessed in some degree by everyone."
- 2. It is "a strong and usually positive faculty that links us to the world," although it can also be negative and harmful, even destructive (as a result, for example, of territorialism, parochialism, or nationalism).
- 3. It can mature self-consciously and unselfconsciously.
- 4. Similar to any skill or ability, it is transferrable, that is, it can be taught, learned, refined, or strengthened, both individually and collectively.
- 5. Like a critical theory, it can be leveraged to assess any issue of consequence between people and the built environment, for example, urbanization, globalization, gentrification, immigration, commercialism, and urban sprawl. The point is not pure condemnation against examples of placelessness, but rather an appraisal of "how the intrinsic and the placeless fit together, and in what sort of balance."

The many notions on place we have encountered so far are a part of the place meta-concept, but now there are clearer distinctions between places, their associated meanings, and a person's ingrained stance towards them. These distinctions are illustrated in Table 2.1. Further clarifying distinctions will be explored in the third section of this chapter. In the next section I explore the intersection of time and a person's sense of place.

Temporal Aspects of a Sense of Place

Temporal aspects have been well represented in the research regarding notions of place. In terms of historical research, Norberg-Schulz traced historic attitudes related to places back to the Greek's concretizing sacred spaces through the building of temples, and the Romans' beliefs in a

²⁰ For points (1) and (2) above see Relph, "A Sense of Place," 208, 209; (3) Relph, *Place and Placelessness*, 64-67, and "A Pragmatic Sense of Place," 25; (4) Relph, "A Sense of Place," 208-209, 221-222, 225, and "A Pragmatic Sense of Place," 25-26; and (5) Relph, "A Sense of Place," 211, and "A Pragmatic Sense of Place," 24-31.

Table 2.1. Issues related to place and a sense of place

<u>Place</u>	Place Meaning	Sense of Place
Location Material content Built elements Natural elements Scale	Attachment Belonging Identity Dependence Nostalgia Inclusion Exclusion Dislocation	An innate faculty Positive, destructive Self-conscious, unselfconscious A transferrable skill A critical stance

genius loci or spirit of place. He then illustrated the *genius loci* and the structures of natural and built places across eras and throughout the world in locations as varied as Khartoum, Prague, and Chicago. He even turned his phenomenological and place-centric lens onto the modern architectural era, reinterpreting the movement in light of its unique types of spaces and places, among them the free plan and the natural house.²¹

Relph relates what he calls a geographic sense of place as it has evolved from antiquity, through the pre-modern world, modernism, and postmodernism. He illustrates the shift between these eras through the cross-generational example of his grandfather and himself, both born in rural south Wales but possessing decidedly different attitudes toward places (one from the pre-modern world and the other of modernism/postmodernism). ²² Casey has examined the idea of place as a theme in Western philosophy throughout various periods of its ascension and decline. He traced the philosophical subject of place from the oldest creation stories, through antiquity, and on through the most revered names in the modern philosophical tradition, to include

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²¹ Norberg-Schulz, *Genius Loci*. On ancient religions and notions of place, see also Tuan, 152-154.

²² Relph, "A Sense of Place," 214-215, 219-220; and Relph, "A Pragmatic Sense of Place," 29.

Descartes, Kant, Leibniz, Heidegger, Merleau-Ponty, Foucault, Derrida, and Irigaray. 23

Returning our attention to Seamon's lived-world (to reiterate, that realm that encompasses peoples' everyday lives and experiences), both Tuan and J.B. Jackson argue that how we come to act and feel towards meaningful locations is by necessity a temporal phenomenon. In Jackson's seminal work, A Sense of Place, a Sense of Time, an overarching theme is how the passage of time changes our perception of those locations we are most familiar with or just interact with regularly. Jackson draws from a myriad of historical and first-person anthropological examples to illustrate how over the seasons, years, decades, and centuries the physical makeup of a place changes in both great and small ways. These changes are the result more so than anything else of the hands of the very people who inhabit those locations but also due to social, economic, political, and cultural forces. Thus people's relationships with places and the meanings they derive from them will likewise change.

Tuan, in trying to ascertain "attachment to a place as a function of time," asks "how long does it take to know a place?"²⁴ Tuan tells us that over the course of a person's life, there are many factors to consider. A person is likely to feel a unique affection for their place of origin, where they were born and raised, and in a different way for a place they may encounter later as an adult. Childhood memories of a place, although inchoate, can have profound, long lasting effects. Also, although an adult has greater powers of environmental awareness and self-reflection, their responses to different locations can vary from indifference to an intense desire to experience and learn about new destinations. Furthermore, in encountering a new location, an intense first impression, especially of some evocative foreign environment, can leave a long lasting impression. On the other hand, "Attachment, whether to a person or a locality, is seldom

²³ Casey, 151-179, 202-330. ²⁴ Tuan, 179, 183.

acquired in passing."25

Another way to think of how people and places are able to come together is through Seamon's "relationship cycle." Seamon's model involves a seven step process of (1) dissatisfaction, (2) asking, (3) searching, (4) trying to accept, (5) accepting, (6) understanding, and (7) caring. This process, Seamon tells us, depends to a certain degree on the differences between connection and commitment. Seamon defines connection as "an arbitrary linkage between two worlds that is susceptible to breakage when stressed or changed in any way" and that "is imposed from without." On the other hand, Seamon explains, commitment transcends the simple level of understanding that comes from awareness. Commitment entails genuine, profound caring. 27

Although Seamon's relationship cycle is built around the idea of two people coming together (the two worlds refer to two vastly different lives), he allows that two worlds can stand for more than two distinct people. In doing so he opens the possibility for the interrelationship between people and places. He hints at this possibility when he writes,

"In the past [...] human relationships came about largely through physical and familiar nearness – that is, living as an integral member of a place-based community that included blood relatives. [...] Modern transportation and communications have weakened the significance of physical nearness as people with means live practically anywhere; they are no longer necessarily bound to particular people and places. [...] How does modernity attempt to repair the loss of human identity due to the erosion of nearness? Modern solutions are founded on connection."²⁸

Through the seven stages of his relationship cycle, and the notions of connection, commitment, awareness, caring, and nearness, Seamon thus provides us with many possible ways to study the

²⁵ Tuan, 184. On his overall views on place attachment discussed above, see Tuan, 183-186.

²⁶ Seamon, "Different Worlds Coming Together," 220, 224.

²⁷ Ibid., 232.

²⁸ Ibid., 236, 237.

coming together of people and places.

The views of Seamon, Relph, Norberg-Schulz and the many other writers and thinkers on the temporal aspects of a sense of place are summarized in Table 2.2 below. Remaining open to all manifestations of the temporal aspects and to all evidence that may point to such phenomena, only those issues from Table 2.2 that pertain to a recent historical figure such as Klumb will be of use in evidentiary search, analysis, and synthesis. These and similar issues from phenomenological ecology are the subject of the next section.

Table 2.2. Issues related to the temporal aspects of a sense of place

Manifestations of a Temporal Sense of Place	Available Evidence
Cosmologies	Creation stories, folklore
Antiquity and sacred places	Religious practices and rituals
Medieval landscapes (groves, gardens)	Cultural objects, art, literature
Pre-modern world attitudes	Local (vernacular) building practices
Modernism	Symbolic place names
Postmodernism	Individual expression (manifestos, essays)
Biography, personal experience (diachro-	Community values, practices
nic, synchronous senses of place)	

Place Thinking, Place Making, and Impressing a Sense of Place

At this point, having presented Seamon's phenomenological ecology, place scales and meanings, and Relph's points regarding a sense of place and its temporal aspects, it is important to hone in on those aspects of the place meta-concept that will produce the needed leverage to understand Klumb's sense of place and his houses. I begin with Table 2.3 below, which distinguishes between the two definitions for place and sense of place proposed at the beginning of this

Table 2.3. Basic Division of the Place Meta-Concept

Place Sense of Place

Location Beliefs adopted

Objects and materials Acts undertaken

Shaped by natural processes Feelings developed

and human activity

chapter. Once the notion of a place is isolated from the many different meanings and interpretations that have been heaped under the auspices of the place meta-concept, the idea of a place becomes simpler and more easily understood. To reiterate, places break down to geographic locations at varying scales, the physical and material compositions at those locations, and the fact that those compositions are the results of human and natural processes or interactions. What now becomes important are the components of a sense of place, and the links that bridge the two subjects of place and a sense of place.

The beliefs adopted and acts undertaken under a sense of place are central to this dissertation. Two new definitions that will help to clarify these concepts are as follows:

- place thinking the personal adoption, generation, or articulation of positions,
 standpoints, or ideas that are amenable to a particular location or places in general.
- place making the ways that a person will alter the physical environment to better suit their needs or desires, or to fit one's worldview or ideology.

Place thinking, which is akin to adopting beliefs in regards to a sense of place, is supported by several aspects from phenomenological ecology and the temporal aspects of a sense of place. In Table 2.2 in the previous section I identified many example manifestations of a sense of place throughout time and different sources of evidence that point to those manifestations. The

most relevant for a recent historical figure under Klumb's circumstances are examples, if they exist in his life, of pre-modern, modern, and postmodern place thinking. The principal instances that will point to Klumb's place thinking are his personal expressions in the form of manifestos, essays, and correspondence. Another example includes expressions of community values related to places. While these may seem like few sources from which to pick, an abundance of such instances at the Henry Klumb Collection (which spans a period of over fifty-five years and significant experiences at multiple locations) will be essential in demonstrating the architect's place thinking.

In the realm of place thinking there are also items from phenomenological ecology to be considered. Among those that I will draw from in studying Klumb and his houses is Seamon's characterization of phenomenology as "a deeper, more holistic way" of seeing and understanding the world around us. A relevant concept in architectural phenomenology is Norberg-Schulz's conception of the inhabited landscape. The inhabited landscape embodies the idea that architecture, when properly carried out, seeks to create an organic whole between a building and its surrounding environment or context. Norberg-Schulz called this "a complex totality of interrelated things." In this vein, a building and its environment enliven each other. Natural elements and surroundings complement the built environment, and vice versa. Each brings out the best qualities of the other. Klumb's words in support of holistic architectural and landscape design would demonstrate such place thinking.

Place making acts are also supported by elements of phenomenological ecology and the temporal aspects of a sense of place. A key aspect explored in this theoretical framework and crucial to this dissertation's critical lens is the ability to see the multifaceted qualities inherent in

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²⁹ Norberg-Schulz, *The Concept of Dwelling*, 19.

³⁰ Norberg-Schulz, "Heidegger's Thinking on Architecture," 62-64.

places. These qualities include a person's ability to apprehend places at different scales. To reiterate, places at different scales support differing capacities for material composition of built and natural elements, they support many varieties of human activities, and they engender a range of perspectives, attitudes, or commitments from individuals or communities. To personally realize these aspects related to place scales and to take action upon that realization demonstrates an acute understanding of the highly variable power of places, and is an important personal quality necessary in conscious place making. Also, holistic architectural and landscape designs along the lines of Norberg-Schulz's inhabited landscape would not only surface as examples of place making in Klumb's personal and professional documentary evidence but also as fully realized projects in his architectural drawings and completed houses.

Strong indicators of place making acts from the temporal aspects of a sense of place that would apply to Klumb would include works that conform to local (vernacular) building practices and community values. Also relevant would be art or cultural objects retained or produced as part of experiences associated with meaningful places.

Although instances of place thinking and place making are paramount to this dissertation, feelings developed by Klumb towards specific places may be found in Klumb's words and thus may also play a part. From phenomenological ecology, the many types of place meanings would apply here as well, as in feelings of nostalgia, attachment, dependence, belonging, inclusion, and exclusion, among others.

A new combination of definitions for place and sense of place, elements from phenomenological ecology, and the temporal aspects of a sense of place that are relevant to this dissertation are summarized in Table 2.4.

Table 2.4. Detailed Components of the Place Meta-Concept in relation to a study of Henry Klumb's sense of place and houses

Place Sense of Place Location Beliefs/Place thinking Acts/Place making Feelings/Meanings Objects/materials pre-modern designing to place attachment Hybrids of natural modern scales belonging process and postmodern creating holistically dependence human activity possessing community designed projects nostalgia Scales values about place using local building included espousing holistic practices excluded design ideas incorporating community dislocated/ values in built works detached art or cultural objects associated with specific places

One additional key element that is missing in this discussion is the process or mechanism that transforms a place into a meaningful place or places into a place conscious worldview or perspective. Another proposed definition will help to fill that void. That definition is as follows:

 impressing – the accumulation of personal experiences that shapes or imparts upon a person their outlook towards a place, multiple places, or places in general.

This definition serves several useful purposes in this dissertation. Impressing supports the definition of a sense of place adhered to in this chapter, which suggests a transformative process that depends on time, experience, group norms and practices, personal investment, or immediate appreciation. Impressing keys in on the experiential and temporal aspects of this process, which can be seen as overarching and inherent in the other components of the definition. In other words, time and experience are inherent in attaining a sense of place through group norms and practices, personal investment, or immediate appreciation. The emphasis on these experiential

and temporal aspects also build upon an underlying assumption of this dissertation, established in the previous chapter, that a person's sense of place is not just a personal philosophy or a conceptual framework, but rather is first the result of a set of experiences that are inexorably tied to where those experiences occurred. Impressing also speaks to Relph's self-consciously and unselfconsciously maturing sense of place, and to its transferable quality.

The concept of impressing completes the refining of the place meta-concept necessary for this theoretical framework. The value of the place meta-concept is that it acts as a reservoir for the vast amount of research, writing, and thinking related to notions of place. But for that reservoir to be useful in specific circumstances, unique attributes have to be plucked from under the all-encompassing term of place. The refining in this chapter began with separating place as location from sense of place as beliefs, actions, and feelings associated with places. The refining continued as I drew from the research and writings associated with notions of place to make evident essential aspects of a sense of place, and furthermore essential aspects as they will relate to Klumb and his houses. The refining then concluded with the experiential and temporal bridge that transforms experiences grounded in places into an ingrained worldview or perspective that revolves around a treasured location or locations. The resulting understandings of place, sense of place, place thinking, place making, and impressing will be guiding hands in the remainder of this dissertation.

CHAPTER 3: HISTORY, PHENOMENOLOGY,

AND HERMENEUTICS – A RESEARCH APPROACH

"There will always, one hopes, be historians [...] with special gifts in the re-creation of the past. But it is quite wrong to suppose that historians in general should be content with this. For most of them it is the essential preliminary to *explaining* the past. Their purpose is to identify trends, to analyze cause and consequences – in short to interpret history as a process."

- John Tosh¹

The conduct of this dissertation was governed by a tripartite application of hermeneutics, phenomenology, and history. In this chapter I discuss the ways that these three fields constituted the boundary conditions of this dissertation and thus have guided the following:

- the overall aims of this research
- the evidentiary search, analysis, and synthesis
- the dissertation's narrative writing

Interrelated with this general foundation for the research, throughout this chapter I also discuss the specific techniques that I subsequently applied in the course of my fieldwork, in weighing the evidence I uncovered, and in bringing the vast amount of historical subject matter together in the final dissertation product.

Lessons from Past Events and Outcomes

The first set of ideas that have influenced this study revolved around notions of history and historical research. To this end I have worked under the assumption that the purpose of historical research and presentation is to provide an honest accounting of subjects that reside in the past, particularly the following:

- examining how and why past events and outcomes unfolded as they did
- what lessons we are able to derive in the present from such an understanding

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¹ Tosh, The Pursuit of History, 46-47.

Taking each matter in turn, first, through an honest accounting of subjects that reside in the past I assert that in the course of their work historians have a responsibility to identify, acknowledge, and remain open to all of the major factors and influences that had an impact upon their subject. These factors may be, for example, political, economic, cultural, ideological, international, regional, local, familial, or exclusively and idiosyncratically personal to a historical figure. Only by facing all major factors can the historian then proceed and conduct a more narrowly bounded historical study. Put another way, a historian should strive to understand their subject as broadly, thoroughly, and in as unbiased a manner as possible even as they are engaged in their focused research. The point of this endeavor is that once a historian embarks on a study that is guided by a particular perspective, worldview, ideology, or new research question, the resulting study must still be able to withstand the scrutiny it will face from the historical facts. Those historical facts include both the previously known and newly discovered body of evidence that surrounds the subject, as well as the past research on the subject. In terms of the latter case, historical research may be in either agreement or disagreement with past research on the subject.

In terms of the scholarly work on Henry Klumb, much of the research has emphasized the political and socioeconomic context under which he operated immediately following the Second World War. According to scholars, in this context he helped to shape a modern Puerto Rican identity through a post-colonial, socially progressive, and environmentally conscious architectural practice whose major works were in the civic, religious, and educational spheres. In my research on Klumb I not only acknowledge those aspects of his life and career, I also seek to better understand them through my examination of the archival evidence. In doing so I am responsible to critically reassess their relevance to the overall Klumb historical narrative and to my focused study of him, his houses, and his sense of place. This reassessment is paramount to

my work as I cite new evidence in an attempt to take both a long and finely detailed look at those personal and professional experiences that later shaped Klumb's residential practice in Puerto Rico. Chief among these new pieces of evidence are public statements and speeches, personal correspondence, and architectural drawings, many of which had not previously been cited, published, or perhaps studied at all.

Next, the past events and outcomes refer to the purview of historians, that is, the past.²
But the past itself demands clarification. While every moment that a person experiences instantaneously becomes a part of the past, and hence history, as per David Wang there nevertheless should exist a necessary temporal separation between a historian and their subject. As he explains, the significance of the past cannot ordinarily or fully be ascertained by the people living through those times.³ Historians hold a privileged position, sufficiently removed from the subject of their study by the passage of time, whereby they can observe individual events or time periods unfold from their origins on to their fateful conclusions, and thus view the past in a broader context.⁴ Although one can argue for the validity of contemporary or recent history, in the conduct of this dissertation I accepted the positions of Wang and to a lesser degree John Zeisel that the historical past "is not empirically accessible" [that is, directly observable] by the researcher, and that two defining characteristics of studying "historical problems or past events" are that the researcher "can neither interview participants nor observe behavior."⁵

Wang's position puts first person accounts of historical events or time periods in the realm of autobiography or eyewitness testimony. Those works in turn become the source material for the historian rather than becoming definitive historical accounts. Zeisel's position is

² Tosh, 194; and Wang, "Historical Research," 175.

³ Wang, 180.

⁴ Ibid.

⁵ Wang, 175; and Zeisel, *Inquiry be Design*, 311.

somewhat problematic in that it discounts the use of living eyewitnesses. But Zeisel's concern is the study of the past through archived documents, information, and data. As Zeisel points out, although of utmost importance to the historical researcher today, archived evidence often arises not for the purpose of historical posterity but rather out of an institution's or business' functional need for record keeping.⁶ I support these views of both Wang and Zeisel in that my research methods depend greatly on the documented past as it exists in Klumb's archived architectural drawings, photographs, letters, speeches, and published and unpublished texts.

The thousands of documents in the Henry Klumb Collection in the AACUPR span his career from when he immigrated to the United States in 1927 until his death in 1984. Klumb fastidiously organized both his professional and private papers over his lifetime. Of particular interest to researchers in the past ten years have been Klumb's public statements and speeches, his architectural drawings, and his autobiographical pamphlets. Beyond these archived sources, in my research I also relied extensively on Klumb's correspondence.

Throughout his life, Klumb kept a copy of every letter he sent and received. Almost every one of these letters was typed and in English. And depending on the circumstance and recipient of the letter, through many of these letters I was privy to Klumb's personal opinions, recollections, and corroborating information relevant to every aspect of my study. In many cases, information in letters written decades after the facts under scrutiny could be pieced together to better understand a single moment in time in Klumb's life and career. In other instances I was able to follow personal conversations between Klumb and his friends as the conversations unfolded over the course of several days or weeks. These letters were invaluable to my research, and as such they demonstrated the value of the Henry Klumb Collection as a singular comprehensive repository of evidence on the architect.

⁶ Zeisel. 312.

Third in my stated purpose of historical research, what lessons we are able to derive speaks to the end goal of our efforts. While through the conduct of their research historians may accomplish many things (as I also have attempted in reconstructing the past through a cohesive narrative of historical events, bringing to the forefront previously unknown information or data from the past, or satisfying a reading audience's curiosity) a general epistemological impetus that drove this dissertation is the idea that no subject or field of study may be fully grasped without an understanding of that subject's evolution over time. Delving into a subject's or field's history reveals previous practices and norms, shifting ideological positions, successes and failures, influential figures, pivotal moments, and most importantly what specifically led to the present state of that subject or field. As such, history is as viable an entry point to learning about any subject or field as is the study its current body of knowledge.

The subject that I wish to gain an entry point into, to which I wish to apply a historical lens, is the temporal aspects of a sense of place as evinced through the historical figure of Henry Klumb. More to the point, previous scholarly research on Klumb has emphasized his role during a time that was pivotal in shaping the modern Puerto Rican identity, a legacy that is very much apparent today. That time period – the 1940s, 50s, and 60s – was indeed significant for the island and its people. The period saw more political autonomy for Puerto Rico, new industries and economic opportunities, increases in public services, advances in education, and greater building construction spread across many fronts. Klumb's work during this time was not only a product of this transformative era but also pioneering in the ways that he helped to propel tropical architecture from an amalgamation of imported styles (Spanish colonial, Art Deco, and Federal/Neoclassical influences) to a modern architecture appropriate to the island. On the other hand, I have chosen to reappraise Klumb and to add to the existing body of work on him by

studying him as an architect who embodied a reciprocal relationship between an architect and a place as much as any in history. As such, our understanding of Klumb will serve as an example of how to study other architects with similar ties to meaningful locations. It will also serve as a guide for present and future architects who may wish to reflect on and strengthen their perspectives on the importance of places. Thus, as all of these are matters in the realm of architectural phenomenology, I will rely on that field's modes of thinking in the conduct of my research. Given the great amount of time and space devoted to matters of architectural phenomenology in the theoretical framework, in the next section it is not necessary to lay out an overarching phenomenological schema as I have done above with the subject of history. I will only address those issues that have influenced my methodological approaches.

Searching for Evidence of Phenomenological Thinking

As established in the theoretical framework in the previous chapter, in addition to imparting an overall place oriented focus to this study, architectural phenomenology also played a central role in matters of information gathering and analysis, and narrative writing. Through my information gathering and analysis I focused on discovering evidence of phenomenological thinking on Klumb's part. To be sure, I do not assert that Klumb was a phenomenologist. Put another way, I do not assert that Klumb had specifically read and directly absorbed the tenets of phenomenological philosophy as established in the early-to-mid twentieth century by the German philosophers Edmund Husserl and Martin Heidegger, or the later works and English translations of such influential figures as the French philosophers Maurice-Merleau Ponty and Gaston Bachelard, or the architect, educator, theorist, and writer Christian Norberg-Schulz. Nevertheless, as per David Seamon, "a phenomenological perspective" can be demonstrated "either explicitly or implicitly" through research and the professional design practices (architecture,

landscape architecture, or environmental design).⁷ In assembling contributing authors for his edited volume *Dwelling, Seeing, and Designing*, Seamon wrote, "Though many of the authors in the present volume would not call themselves phenomenologist or their work phenomenological, I feel their studies are significant phenomenologically."

Yet the questions remain, what constitutes evidence of phenomenological thinking, and how am I able to attribute it to Klumb? In the previous chapter I identified several indicators of place thinking, place making, and impressing a sense of place, and their possible evidentiary sources. Some of the principal indicators include the following:

- a holistic worldview, consistent with Norberg-Schulz's inhabited landscape, whereby people, buildings, and their surrounding environments constitute an organic, interrelated whole.
- an awareness and appreciation of the multifaceted qualities inherent in places,
 especially their different potentials at different scales.
- the presence of those processes that typify an evolving valuation for specific locations, namely the processes of impressing, place thinking, and place making.

The primary possible evidentiary sources are individual expressions (through manifestoes, essays, personal and professional correspondence) and holistic architectural and landscape design. A second set of possible evidence entails references to or the adoption of community values and practices, vernacular building practices, and cultural objects and art. To locate this evidence I turn again to the Henry Klumb Collection at the AACUPR.

The thousands of documents in the Klumb Collection necessitated two critical selection criteria. First were those documents associated with Klumb's houses built in Puerto Rico. Second were any documents that showed careful consideration of the importance of places, site, context, nature, landscape, the environment, materiality, architecture and personal experience (subjective,

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 $^{^{\}rm 7}$ Seamon, "Dwelling, Seeing, and Designing: An Introduction," 1.

⁸ Ibid., 17.

sensorial, and bodily experience), the house, and Klumb's life in Puerto Rico.

These topics were sought after in texts as search terms, a process otherwise known as theming. One example of many was in looking for evidence in a heretofore unpublished document written by Klumb titled "Taliesin" (of which an English translation and some background information can be found in Appendix B of this dissertation). Numerous examples of phrases and key terms in the essay support the second search criterion described above. Klumb clearly states Taliesin's context in terms of place scales – a valley, near the city of Madison, in the state of Wisconsin. Its natural surroundings and the many natural materials used in its buildings are inherent throughout the essay. Klumb wrote, for example, "Taliesin stands today on the crown of the hill, completely fused with it, living and breathing proudly. It is a part of the characteristically southwestern Wisconsin landscape." Of its natural materials Klumb observed, "Out of a neighboring quarry comes the yellow-brown limestone out of which the walls and the great masses of chimneys have been erected in layers of rock," adding later, "The plastered surfaces of the light, wooden structures that make up the walls and on which the shadows of the deep overhanging roofs fall, resemble the color and the surfaces of the sandy banks of the wide, outstretched river plain." And of his own personal experiences Klumb writes of "the great, open fireplaces [...] where during the long winter months and after a strenuous day's work a person will find the company to engage in small talk or to play music around the warming wood fire."12 In these few samples we glimpse a document that both in its overall tenor and its fine details supports the search for evidence related to the importance of places, nature, materiality, and many other relevant topics. The initial importance of the essay "Taliesin" was discovered by

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⁹ Mayan, Essentials of Qualitative Inquiry, 94-98.

¹⁰ Klumb. "Taliesin." 1.

¹¹ Ibid., 1-2.

¹² Ibid., 2.

noting the preponderance of key terms such as valley, hill, landscape, rocky outcropping, dark cedars, and white birch trees, among many other examples.

Although similar elements in drawings and photographs were less directly apparent than in words in a text, they were still discernable. Constructed perspective drawings, period photographs, site plans, and design sketches were especially useful at capturing visible, recognizable, and relevant contexts. Such contextual information included foreground, background, and adjacent built forms and details. It also included landscape and topographical features such as level of vegetation, grades, and ground slopes. Photographs were likewise key sources of information and objects of analysis in themselves, especially in a photograph's ability to convey the relationship between buildings and their contexts.

Of particular historical and phenomenological relevance, a crucial step in the process of searching and locating evidence was to identify the inclusion and exclusion over time of key building elements that related to place in general or to specific contexts. Once I was able to identify specific occurrences of these building elements, I studied how combinations of these elements came together in houses that joined with and enlivened the places around them along the lines of Norberg-Schulz's inhabited landscape.

At the most basic level of information gathering and analysis, all written documents and images were subject to latent content analyses in search of five key elements of historical significance: dates, events, individuals mentioned, locations, and ideas. ¹³ These elements correspond to Groat and Wang's evidentiary, contextual, inferential, and recollective evidence, which comprise the fundamental building blocks necessary for any historical narrative. ¹⁴

Studying a Complex Historical Subject by way of the Hermeneutic Circle

Whereas a phenomenological approach such as the one I used has a place oriented focus, a hermeneutic approach is analytical and interpretive. Originating in the practice of interpreting religious texts during the Middle Ages, hermeneutics has evolved to include "the understanding of all human behavior and products." Of particular interest for our purposes here is the process of the hermeneutic circle. William Schroeder explains,

"The hermeneutic circle [...] implies that one's grasp of a text's parts will depend on one's grasp of the whole and vice versa. It allows interpretations to be refined and sharpened by allowing parts and whole to clarify each other. Thus, understanding proceeds in a continuous circular process of comprehending relationships among parts and wholes."

Two salient points regarding hermeneutic circles are (1) understanding how an interpreter enters into this interpretive cycle, and (2) determining how broad and inclusive is to be one's hermeneutic circle. In terms of the latter point, hermeneutics has been tailored to suit entire interpretive fields, specific genres, individual authors, or single works.

My principal interpretive approach consisted of a series of investigative cycles that filtered through many disparate pieces of evidence and allowed me to match events with their plausible causes. The pieces of evidence were disparate because any point in Klumb's life might not be fully comprehended without information that may reside, in a document produced sometimes decades after the fact. Nonetheless, I began my process with broad, open-ended inquiries into Klumb's houses. I began to investigate these inquiries through his architectural drawings. My first objective in these inquiries was to identify recurring themes, if any were present, in Klumb's houses. By themes I mean any common physical and conceptual threads, or

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¹⁵ Inwood, "Hermeneutics," 353.

¹⁶ Schroeder, *Continental Philosophy*, 150.

trajectories in his residential practice in Puerto Rico. Concurrently I looked at these drawings and their associated written documents (for example, letters between Klumb and his clients) for evidence of phenomenological thinking. These actions represented my entry into a hermeneutic circle. Following the investigation of an initial set of Klumb's drawings and their related written documents, I undertook a new investigative cycle of the architect's writings – his personal and professional correspondence, speeches and other public statements, publications, and unpublished transcripts and notes. The purposes of this cycle were, as before, to locate evidence of phenomenological thinking, and also to collect detailed biographical and design project information.

Over subsequent rounds of these investigative cycles, significant parts of the whole of the subject took shape. As a result, more concise and detailed investigative cycles facilitated connections in information resulting from earlier cycles – associations between buildings and conceptual frameworks (such as architectural theories or movements), between multiple buildings that share common features, and most significantly between Klumb's houses and earlier, formative personal and professional experiences.

The more that the investigative cycles moved from evidentiary discovery to the synthesis of results across distinct cycles, the research process required that the historical, phenomenological, and hermeneutic components came together in the dissertation narrative. In composing the narrative I relied on a process of (1) establishing the historical context, (2) describing the relevant details found in the documentary or physical evidence and (3) interpreting the significance of the combined historical context and evidence. The first and third of these steps allowed me to bring the full weight of my accumulated documentary evidence into this study.

The second step in the narrative writing, the descriptive process, was essential to

understanding every project, place, and experience phenomenologically as espoused in an important way by David Seamon and his fellow contributors in phenomenological ecology. Seamon has called phenomenology both "a way of thinking rigorously and of describing accurately the complex relation between person and world," and "a qualitative, descriptive approach to environment and environmental experience." In bringing together researchers whose works he finds to be "significant phenomenologically," he includes among their methods "careful observation and interpretation," and "qualitative description, intuitive insight, and thoughtful interpretation." Seamon's assertion is that deep description is a prelude to valuable insight, which he explains through a historical example,

"Johann Wolfgang von Goethe [...] believed that thoughtful, dedicated looking at a particular phenomenon would eventually lead to a vivid moment of seeing in which the phenomenon and it various aspects are understood in a deeper, more holistic way." ¹⁹

The greatest value of description as I have leveraged it in this dissertation is in firmly situating the reader both in the numerous historical contexts I have encountered and in specific places. The latter includes individual buildings, sites, landscapes, or cities.

What follows in the next four chapters are the results of an interwoven tripartite process of historical inquiry, phenomenological thinking, and hermeneutic research cycles. Like the research processes itself, the narrative within each chapter alternates between analyses of Klumb's houses and the formative events in the process of impressing a sense of place on the architect.

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 $^{^{17}}$ Seamon, "Dwelling, place, and environment: An introduction," 1, 2.

¹⁸ Seamon, "Dwelling, Seeing, and Designing: An Introduction," 15.

¹⁹ Ibid., 8.

CHAPTER 4: THE GRID AND THE LANDSCAPE

"Pattern was everything to Wright. [...] Pattern, for Wright, was not a formulaic approach to design or a utilitarian device for space planning. When Wright began to draw a plan of a house, as he invariably did with the simple pattern of a grid, he believed that he was invoking the essence of life – his plan was a divine encoding. And when Wright extended that pattern from plan into a continuous building envelope and then out into the landscape as he did at the Jacobs House, he claimed a unity whereby everyday family life intertwined with the revelatory potential of nature."

- Michael Cadwell¹

The orientations, building forms, and floor plans of Klumb's houses in Puerto Rico were significantly influenced by natural and built landmarks both far and near. Klumb sited and oriented both the Bosch House (1944) and the Ewing Residence (1965), for example, in relation to landmarks and views far from the houses themselves. As illustrated in figures 4.1 and 4.2, as the long axis of the Bosch House on the isthmus of Cataño extends across San Juan Bay, it passes directly in front of *El Morro*, which is the massive, Spanish colonial-era, stone fortification on the other side (to the east) of San Juan Bay. The effect was that while the front façade of the Bosch House faced northwest and directly out to sea, the rear façade faced into San Juan Bay, and the living room and terrace on the northeast end of the house pointed directly across the bay's strait and on to a point in front of *El Morro*. The backyard behind and away from the house offered unimpeded picturesque views of San Juan Bay and the old city.

The Ewing Residence is an aberration on its street, as is evident in figures 4.3 and 4.4. Whereas the neighboring houses are oriented parallel to the street (along the street's west-southwest-to-east-northeast axis), Klumb rotated one wing of the Ewing Residence so that the terrace at the back of the house would directly face both the prevailing breezes to the site (a recurrent and well documented technique of Klumb's) and the mountains in *El Yunque's* tropical rainforest and natural preserve seventeen miles away. The other wing is rotated so that it is in

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¹ Cadwell, *Strange Details*, 76-77.





Figures 4.1. Satellite image of the Bosch House. The rectangular pool was a later addition, not part of the original house plans. Image © UPR, courtesy of the Environmental Systems Research Institute (ESRI), modified by the author.

Figure 4.2. Satellite image of the long axis of the Bosch House as it extends from Cataño in the west, across the strait into San Juan Bay and towards the protruding point of *El Morro* to the east. Image © UPR, courtesy of ESRI, modified by the author.



Figure 4.3. Satellite image of the Ewing Residence. Image $\ \$ UPR, courtesy of ESRI, modified by the author.



Figure 4.4. Satellite image of Calle Himalaya. Image © UPR, courtesy of ESRI, modified by the author.

line with the contour intervals of the steep slope behind the house.

These concessions to natural and built landmarks on the parts of the Bosch and Ewing residences are subtle to the point of being barely perceptible to the casual observer. In the case of the Bosch House, the building's orientation in relation to *El Morro* would be evident on a site plan large enough to encompass the eastern edge of Cataño, the water strait leading into San Juan Bay, and the western point of San Juan containing *El Morro*. Although later in his career Klumb did produce expansive site plans that encompassed the much broader context and location of his houses, no such drawing of the Bosch House remains in Klumb's archived papers. Today, this complex interrelationship between the Bosch House and its surroundings is evident upon a site visit to the house, and as presented above in satellite imagery of the house and the surrounding area. As for the Ewing Residence, the house's orientation to *El Yunque* is annotated on only two drawings, the house's floor and site plans. Standing on the Ewing Residence's terrace today, a viewer would have to find just the right opening through the dense growth of trees behind the house to catch a glimpse of *El Yunque*'s distant mountains.

The Bosch and Ewing residences are only two out of several similar examples of deliberate place making in this fashion. Klumb carefully positioned the Benitez Mountain Cottage (1961) in Cayey, the Tugwell Cottage (1964) in *El Yunque*, the Russell House (1972) south of Luquillo, and the Foreman Mountain Retreat (1974) in Adjuntas to afford each of them views to the picturesque coastlines that were visible through their surrounding mountains and forests. Their locations on the island are shown in Figure 4.5. These six examples (including the Bosch and Ewing residences) are a testament both to the rich opportunities for architects to connect their designs with Puerto Rico's evocative natural surroundings, and to Klumb's awareness, desire, ability, and propensity to make such connections at different place scales.

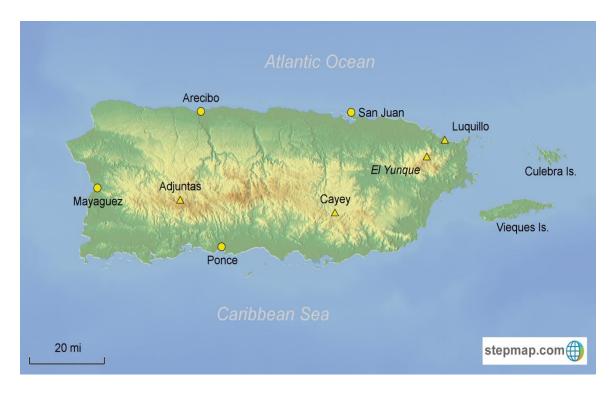


Figure 4.5. Klumb's houses in the remote locations of Adjuntas, Cayey, *El Yunque*, and the hills south of Luquillo. Map by the author, courtesy of stepmap.com.

A recurring and telling technique used by Klumb to relate his houses to the more immediate and unique characteristics of their sites was to use a house's planning grid to integrate the building with its topography and other nearby natural and built elements. In this chapter I will explore a special ability in place making on the part of Klumb, that is, how he organized and gave shape to his houses through planning grids that were borne not out of preconceived, modern notions of abstract spatial order or structure but rather out of specific site conditions. Following this examination of Klumb's houses I will discuss the closest historical precedents for this practice by him. Those precedents revolve around his time working with Frank Lloyd Wright from 1929 to 1933. During this period Klumb was witness and gave testament to Wright's deeprooted abilities at both place making and place thinking. These abilities in turn contributed immensely to the process of impressing a sense of place on Klumb.

In referring to this relationship as one existing between the grid and the landscape, I am

invoking two specific definitions of the term landscape. One definition is of a landscape as a scene or visual image of the outside world, for example, a view of a valley or distant mountaintops. Another is of a landscape as the ground, terrain, and topography that a person or building is able to inhabit. Both definitions are evident in Klumb's houses.

Architectural Analysis: Klumb's Orthogonal and Triangular Grids in Puerto Rico's Terrain

Klumb utilized a very clear and deliberate planning grid in every one of his house designs. The grids often stood out in his drawings – whether in his sketches, working floor plans, or construction drawings – by their distinctive red pencil lines. But it was in houses such as the ones discussed above, with their evocative site conditions, that the grids seemed to rise up from the ground. In some of Klumb's working drawings, alignment markings on various sheets of trace paper indicated a drawing order and holistic design process that was respectful of the project's site conditions. On a first sheet of trace paper there was the site's topographic map. On top of that sheet went another sheet with a planning grid template. Finally there was a third sheet of trace paper with a floor plan or a spatial block diagram. On other occasions Klumb or a draftsman drew a mirror image of the site's topographic map on the back side of a sheet of trace paper so that the contour lines would be visible on the front of the paper. Then they would lay down the planning grid in red pencil on the front of the sheet of paper. On top of that they drew the floor plan. In yet other examples, Klumb or a draftsman would simply draw each of these layers – the contour lines, the grid, and the floor plan – directly on top of one another on the same sheet of paper. Regardless of the technique, in each case the strong link between building, organizing grid, and underlying and foundational ground conditions was evident. The examination of six houses – the Haeussler, Evans, Ewing, Fullana, Tugwell, and Foreman residences –

shows both the continuity of the grid-building-site relationship and its development over Klumb's career in Puerto Rico.

The Haeussler Residence

The Haeussler Residence (1945) in Guaynabo's prestigious San Patricio residential community serves as a basic and preliminary example of Klumb's approach to the grid and the landscape. Its site and floor plans are shown in figures 4.6 and 4.7. In designing the Haeussler Residence, Klumb used a 4' square planning grid for a number of common practical purposes – for structural and space planning; to set the scoring pattern for the concrete floor surfaces in the entryway, the garage, and the rear service yard; and to easily determine area calculations, especially when a grid rotation or shift led to an unorthodox room shape. Initially the grid was conventionally oriented parallel to the street to the south (Street No. 4 on the site plan) so that the spaces closest to that street – the garage, the maid's room, the laundry room, and the entry porch - are arrayed perpendicular to the site's southern edge. Likewise the walled-in patio facing the street corner takes its orientation from the angle between Street nos. 1 and 4 (today Calle Muñoz Rivera Ferrer and Calle Nogal, respectively). But as the house continues northwards into the living room and bedroom wing the planning grid rotates approximately 76° in a counterclockwise direction. This sudden, unexpected, and new orientation is not parallel with the site's northern boundary. Instead, the new orientation is in place to accommodate three trees – a large Banyan tree and another, smaller tree close to the northeast site boundary; and another large Banyan tree at the rear of the house facing the service yard and adjacent to a small terrace. These trees and their proximities to the house are shown in the photographs in figures 4.8, 4.9, 4.10, and 4.11.

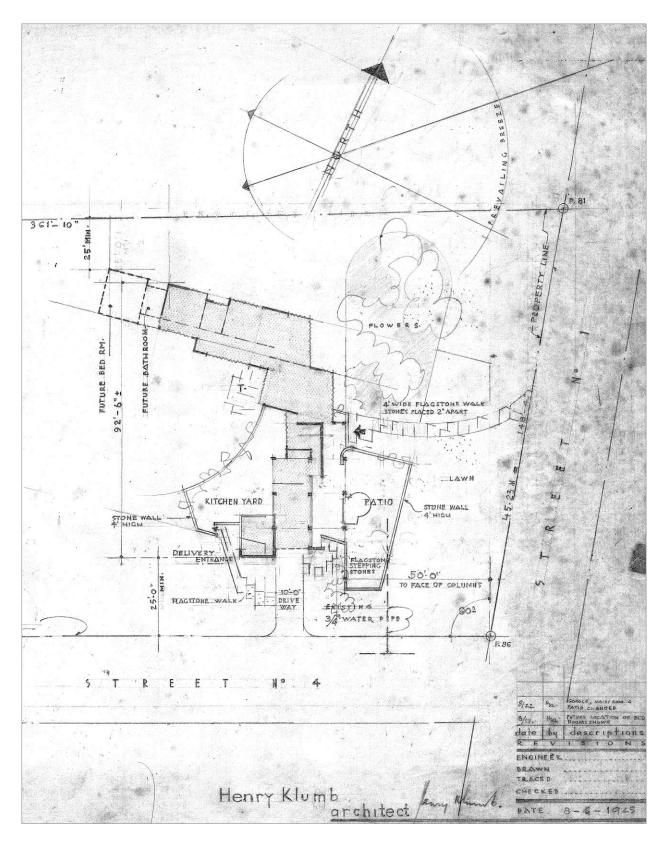
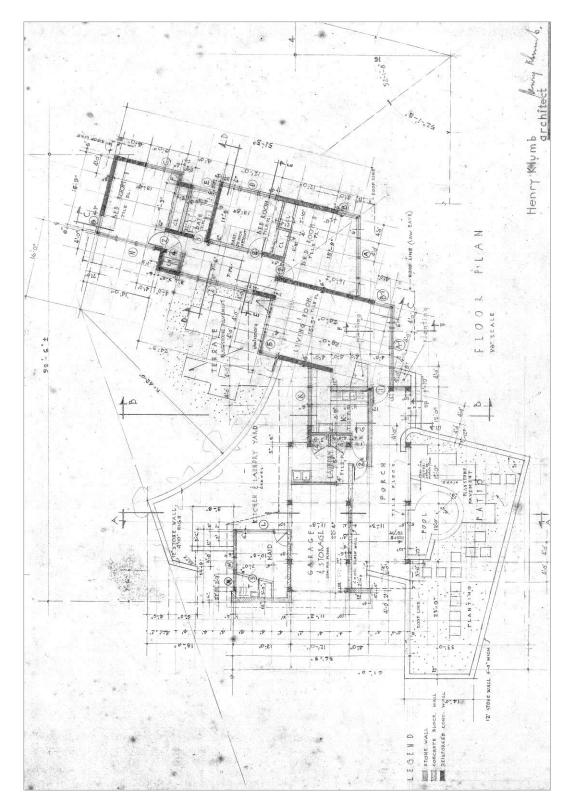


Figure 4.6. Site plan, the Haeussler Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.



Figures 4.7. Floor plan, the Hauessler Residence. The genesis of the house's planning grid can be seen in the parallel grid lines spaced 4' apart at the bottom of the drawing. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.



Figure 4.8. The Haeussler Residence, view from Calle Muñoz Rivera Ferrer. The two key trees in the front are at center-right and to the right. Photograph by the author.



Figure 4.9. The Haeussler Residence's rear terrace and Banyan tree. Photograph by the author.

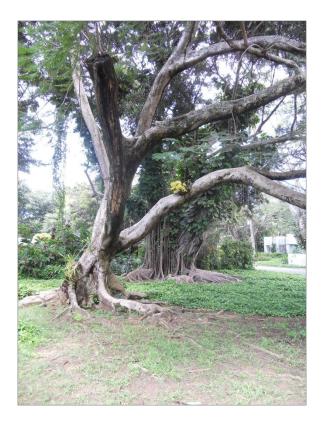




Figure 4.10. The two front trees. Photograph by the author.

Figure 4.11. The rear Banyan tree. Photograph by the author.

The locations of the large Banyan tree behind the house and the smaller tree at the front were first indicated on presentation drawings – a site plan and a floor plan – that were made for the clients and that preceded the production of the construction documents. On the site plan of the construction documents, the two trees in the front are indicated by the tree canopies over the circular cluster of plantings marked "FLOWERS." The rear Banyan tree is not shown on the site plan, but its location is alluded to on both the site plan and the floor plan by the irregular pattern of flagstone pavers that comprises the rear terrace. On the floor plan, among the flagstone pavers there is a U-shaped notch above the word "TERRACE." This notch surrounds part of the Banyan tree at the back of the house. So, although at first glance this irregular pattern in these two drawings appears to be an abstract depiction of a terrace, it is in fact an accurate representation of the exact paving pattern on the ground, a paving pattern that is in place in direct relationship to

this Banyan tree. Other trees and tall plants dot the landscape around the house, and indeed the house appears to be sandwiched in between a total of five trees – the first three already mentioned, another Banyan tree near the intersections of Street nos. 1 and 4, and a fifth tree (another Banyan tree) to the west of the driveway and delivery entrance. But it is the first three trees that had the most profound influence upon the shape of the building, as they led Klumb to employ the two interlocking grid systems, that is, the one oriented north-south perpendicular to Street No. 4 and the second one rotated 76°.

The principal, striking effect of deferring to these trees rather than to the property lines or to other nearby buildings for ideas on how to establish the house's footprint and orientation (and of shifting the planning grid accordingly) was that the immediate views from the living room and its adjacent bedroom (labeled "BED ROOM 3" on the floor plan) were not of the street or of the neighboring houses but instead of these majestic, twisted, veined structures of nature. Also, because the living room and its adjacent bedroom were precisely at the point where the planning grid rotated 76°, their corners closest to the Banyan trees opened beyond a standard 90° corner to 104°. Klumb capitalized on this unusual condition and further augmented the views from these rooms by wrapping the wood-louvered windows around these wider than normal corners.

At the back of the house, Klumb similarly directed a viewer's gaze towards the prominent Banyan tree there by orienting several key building elements towards the tree. These elements include the terrace, the wood-louvered windows along the hallway in the living room/bedroom wing, the window and folding door at the back of the living room, and the expansive service yard. Of these, the service yard relates most overtly to the Banyan tree through its curved wall that partially encircles the tree itself.

By focusing on these majestic trees scattered around the house, Klumb derived order

from the landscape, made substantial concession to the natural elements on the site, and then carefully and thoughtfully applied a dynamic planning grid that acceded to those elements.

Klumb repeated this basic approach —an orthogonal planning grid with a shift, rotation, or a new direction or extension that suited a site's peculiar conditions — in other examples. The Evans Residence is one such case, one which benefitted from an even more pronounced and unorthodox approach to the grid and the landscape.

The Evans Residence

The Evans Residence (1961) was built as a Chicago family's winter vacation home at the beach, golf, resort, and weekend getaway town of Dorado, which is on Puerto Rico's north coast and approximately a twenty-two mile drive west of San Juan. The house was a two-story building on a site with a hilltop to the south and a gentle downward slope towards the ocean to the north, The site and floor plans are shown in figures 4.12, 4.13, and 4.14. The top floor contained the entrance, living room, dining room, bedrooms, and several terraces. As the site sloped down, Klumb put in a lower level with larger terraces, outdoor patios, a sunroom, and paths that led to the expansive and well-planted, ocean-facing side of the property. Each of the two floors, their rooms, terraces, and patios were subject to the unusual planning grid that Klumb chose for the project, an 8' equilateral triangular grid system.

The end result of this triangular grid system at the Evans Residence was a group of non-equilateral hexagonal rooms that conformed to the site's topography in several ways, starting with the entrance at the back of the house and just north of the site's dominant hilltop. Two hexagonal areas flanked the entrance so that stone walls on either side of it funneled residents and visitors around the hilltop and into the house. These two hexagonal areas – a kitchen terrace to the east and a lower level patio to the west – extended south beyond the entryway way so as to

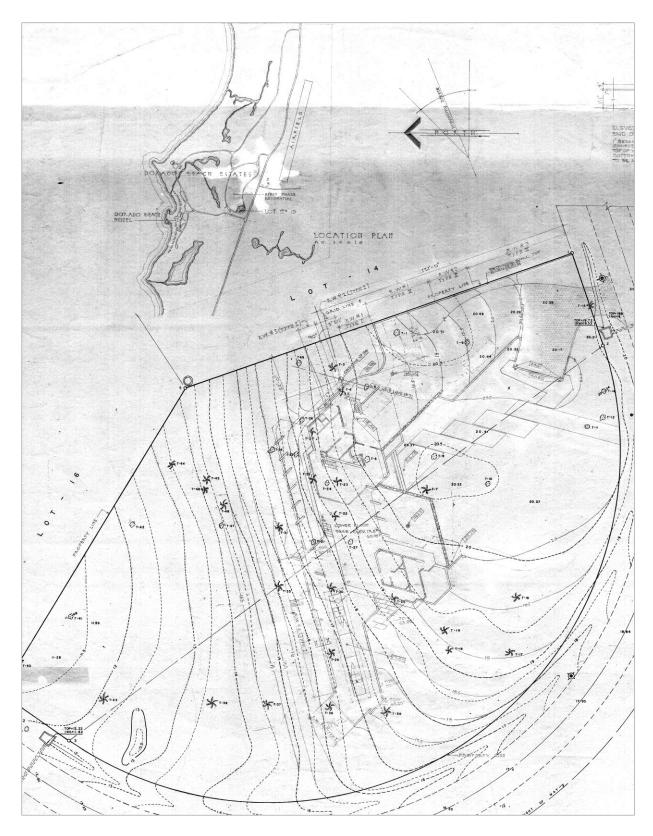


Figure 4.12. Site plan, the Evans Residence. The coastline is to the north (to the left). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

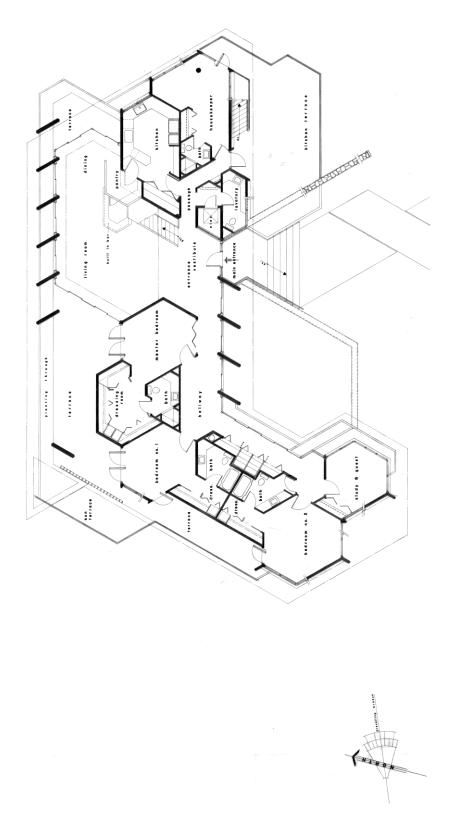


Figure 4.13. Entry/upper level floor plan, the Evans Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

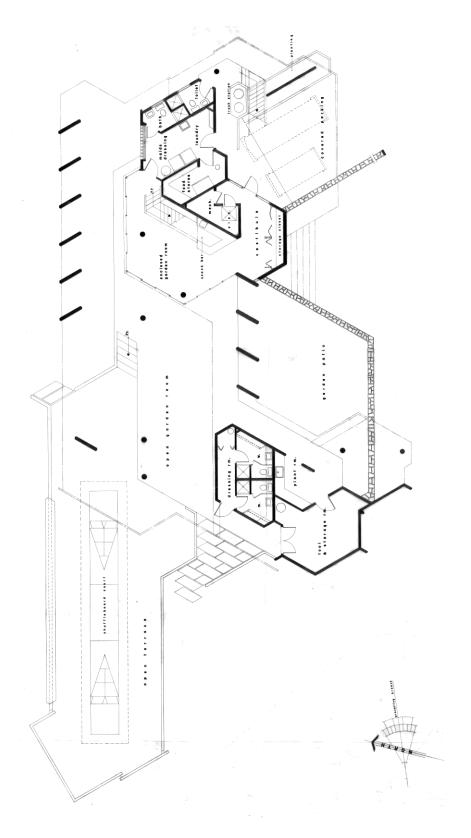


Figure 4.14. Ground/lower level floor plan, the Evans Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

encircle the hilltop's northern slope. Upon entering the house, from the entry vestibule a person could immediately take in the ocean views straight ahead beyond the living room. To the west of this central point in the house, Klumb arrayed the bedrooms and their attendant bathrooms. To the east he placed the dining room, kitchen, and housekeeper's work area. These two clusters of rooms related to their surroundings through a series of protruding, angular, and long terraces that surrounded the house along its southwest, north, and southeast edges. Such immediate access to the outdoors all around the house offered panoramic views along the coastline. At the lower level, save for two small enclosed areas, the space was almost completely open to the outdoors. From this level a person could have enjoyed unimpeded coastal breezes, have accessed a nearby shuffleboard court, or taken multiple paths down into the property and towards the beach.

The house's close relationship with its site was a direct consequence of the grid system. Far more flexible than a standard orthogonal grid, this 8' equilateral triangular grid system allowed Klumb to fashion the angles necessary to more readily merge the house with the sloping hilltop terrain. To be sure, the disadvantages of this planning grid, or rather its challenges, were the unusual room configurations and the construction details needed to build them. Also, the hexagonal and zigzagged outlines of the rooms and of the two floor levels were a harsh, angular complement to the smooth curvilinear form of the topography's contour intervals. Nevertheless, through this planning grid Klumb was able to gently approach and surround the site's hilltop. Through the protruding and angular terraces he mimicked and mirrored the hills and ridgelines of Puerto Rico's mountainous terrain, a terrain that in Dorado, as in many other places, extends from deep within the island's central mountain range all the way to the coast. Klumb also oriented the northern leading edge of the house – the long line segment that bordered the large terraces on both the upper and lower floors – parallel to both the contour intervals of the site's

gentle downward slope and the coastline. In the Evans Residence, then, the planning grid was instrumental in bringing the natural surroundings and the built – the house, the hilltop, the site's gentle slope, the coastline and the beach, and the ocean beyond – closer to one another.

The Ewing, Fullana, Tugwell, and Foreman Homes

Klumb used orthogonal and triangular grids similar to those of the Haeussler and Evans residences in other projects where site conditions favored grid shifts, extensions or rotations, or where an unusual grid system could more closely emulate local landforms. In terms of an orthogonal grid system adapted to site conditions, immediately we can refer to the Ewing Residence (1965) at the beginning of this chapter. In the design of this house Klumb first turned its main wing (containing the bedrooms, a studio, and a small library) away from the street at an angle of 30° clockwise to align it with the house's own steep backyard slope. Then he employed for the living room and terrace wing a second orientation rotated 45° back towards the street in order to place this part of the house transverse to *El Yunque*. As with the Haeussler Residence, in the Ewing Residence Klumb did not strictly adhere to standard orienting conventions such as the street, the property lines, and the orientations of the neighboring houses.

As seen in the site plan in Figure 4.15, the Fullana Residence (1954), like Haeussler and Ewing, relied on a 4' grid (sometimes subdivided into a smaller 2' grid pattern) to conform to its site's pronounced topography. The house sits astride a small peak that rises forty feet from the site's boundary. While Klumb oriented the planning grid for one long wing of the house (containing two bedrooms, a study, and the combined living-dining room) along a north-northwest-to-south-southeast line so that this wing faced the site's prevailing breezes, he then projected a second, wedge shaped wing of the house around the site's peak by extending a part of the planning grid toward the southwest, as shown in figures 4.16 and 4.17. Through this orienta-

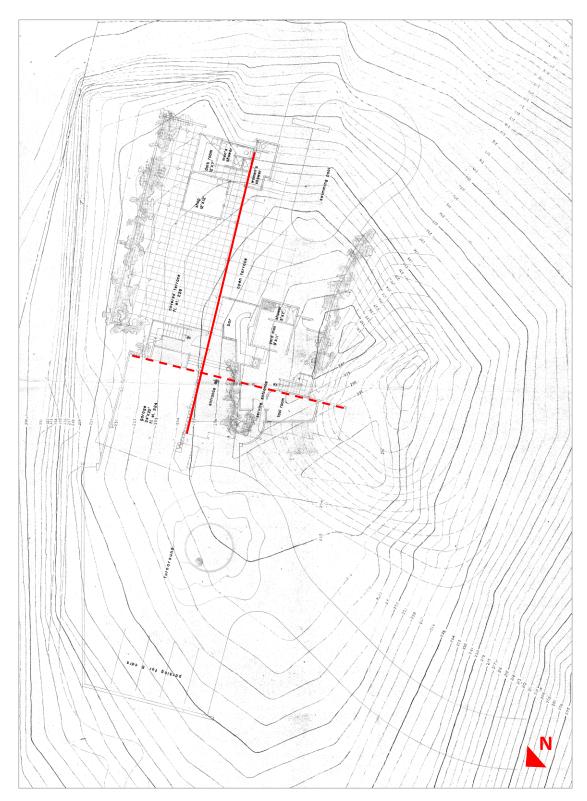


Figure 4.15. The Fullana Residence's ground floor plan inside the project's composite site plan and topographic survey. The principal axis of the house's planning grid is indicated by the solid line, the secondary axis of the wedge shaped extension by the dashed line. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

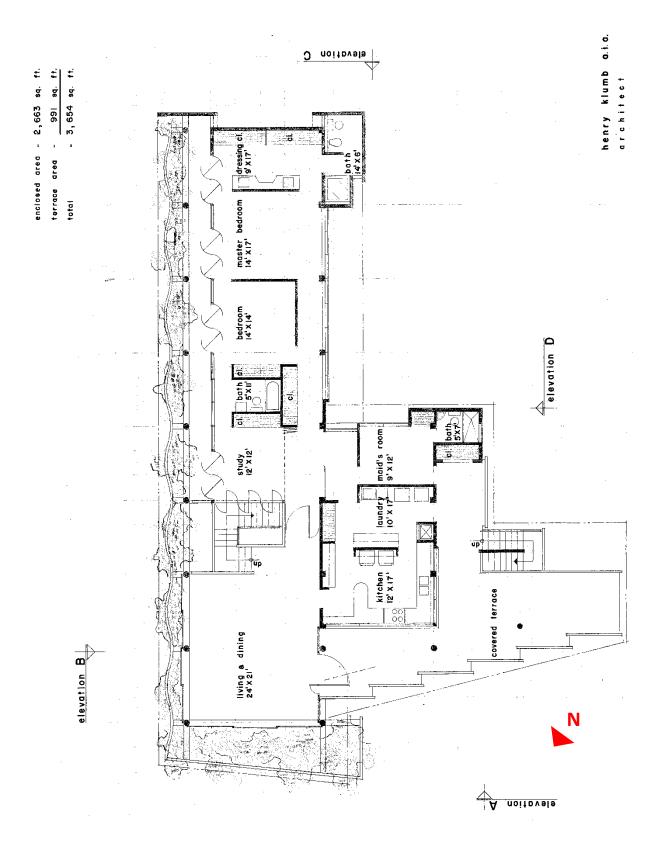


Figure 4.16. Upper floor plan, the Fullana Residence (this plan is rotated 13° counterclockwise from the one in Figure 4.15). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

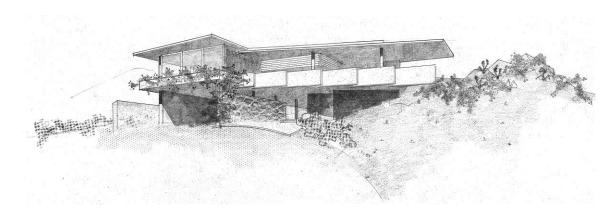


Figure 4.17. The Fullana Residence's front façade, showing how the house's wedge shaped extension is tucked into a small mound to the southwest. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

tion and because the Fullana Residence's hilltops site is one of the highest points in the hilly Park Gardens neighborhood in Rio Piedras, from the houses commanding heights a person not only benefits from cooling breezes, they can also see the Isla Verde beaches and the Atlantic Ocean four miles to the northeast.

Klumb employed triangular planning grids in two notable projects, the Tugwell Cottage (1964) and the Foreman Mountain Retreat (1974), which exhibited even more pronounced natural surroundings than the Evans Residence. Both of these houses were secluded, mountain getaways, not beach homes. Still, in both houses we see the unusually angular, non-equilateral hexagonal rooms and floors that

- readily conformed to the contour intervals of each house's dramatically sloping sites
- emulated the mountaintops and ridgelines in their remote, mountainous, and wooded terrains
- offered ocean views even at significant distances from their coastlines

The Tugwell Cottage's two large terraces and master bedroom (the latter under a Buck-minster Fuller decahedron dome) were arrayed linearly, as shown in figures 4.18 and 4.19, on an east-west axis. This axis sat transverse to a long spur line that sloped down to the north. So tucked in among *El Yunque's* verdant and lofty peaks at an altitude of 1,020 feet, the house

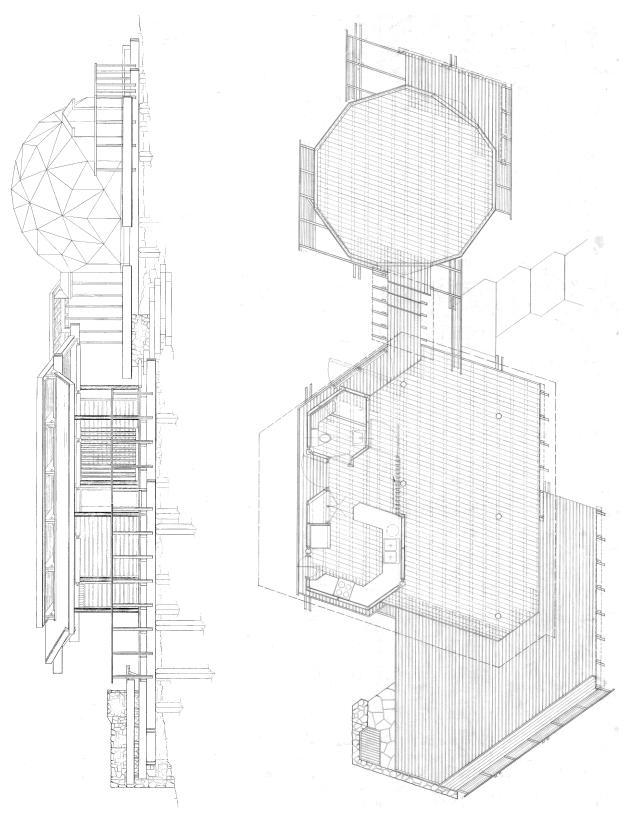


Figure 4.18. The Tugwell Cottage's south elevation. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

Figure 4.19. The Tugwell Cottage's floor plan. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

overlooked the beaches of Luquillo 4.6 miles to the northeast. At the same time, the verandas surrounding the house and the protruding, hexagonal terrace platforms invited panoramic views down the east and west sides of the house's ridge line and farther inland into *El Yunque*.

At the Foreman Mountain Retreat, shown in Figure 4.20, a triangular planning grid enabled two wings to be built at sharp angles to one another. These two wings were adapted to the curving and bulging terrain originating from a mountaintop just over three hundred yards (615 feet) to the north of the house. From the house's inland perch at an altitude



Figure 4.20. Aerial perspective, the Foreman Mountain Retreat. The site slopes down to the south. The two principal wings of the house are at the upper left (the long axis in the description above) and upper right in the drawing. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

of 3,030 feet in Puerto Rico's central mountain range, both Ponce and the island coastline 11.5 miles to the southeast are visible. The long axis of one of the wings is perpendicular to those two sights – the city and the ocean.

The Grid and the Landscape within a System of Dualities

Through Klumb's skillful implementation and manipulation of planning grids he integrated his buildings within their sites and surrounding environments and he challenged powerful norms associated with grid systems. These norms include the universality, geometrical nature, and the imposing and rigid tendencies of grid systems. Both these norms and how Klumb's grid systems related to them can be understood in terms of a series of dualities. Through Klumb's designs some of these dualities remained standing in opposition to one another, while others were resolved through dialectical syntheses. The relevant dualities are as follows:

- 1. universal-local
- 2. geometrical-topographical
- 3. imposing-conforming
- 4. rigidity-flexibility
- 5. macro-micro

The universal-local duality typifies the great power and influence of a modern planning grid system. A grid's universality lies in its ability to parcel land uniformly, en masse, and irrespective of any preexisting physical features or obstacles over which the grid will be applied. Modern architects and planners have taken this approach at all scales – from the individual building (the spatial-structural grid), to the city grid, at the national level (the Jeffersonian grid), and even internationally in the Universal Map Grid System. In doing so, local conditions on the ground are essentially buried over, they are ignored. The process by which the universal-local duality dominates is typified by the geometrical-topographical duality.

Through the geometrical-topographical duality, the geometrical patterns, subunits, and elements of a grid system take precedence or govern over the specific characteristics of the land. Whereas past territorial boundaries, for example, were determined by terrain features – a river, a valley, a ridge or mountain range, or a land strait – in a strictly geometric grid system an imaginary line or grid intersection, for example, defines a new type of border. In modernist architectural design, a building's surrounding context recedes in favor of only those parts that contain the design's governing grid system. In other words, a building's relevant context is self-contained with the building's footprint or its figure-ground outline.

As an example of the dominance of the geometrical over the topographical, consider representations of Mies van der Rohe's Barcelona Pavilion. Monographs of Mies's works often do not include much if any information about the pavilion's surrounding environment. They instead give primary consideration to the building in plan drawings that extend only to the edges of the plinth on which the building rested. Contained within the extents of the plinth is the building's underlying grid, which drove the building's spatial-structural scheme. Simon Unwin's analysis of the pavilion is unique, however, in that he relates the building's well known design elements to the broader context of the grounds, pedestrian circulation, and nearby buildings that comprised Barcelona's 1929 International Exposition.²

Next, imposing-conforming refers to the kind of order that a building, master plan, or design either brings to or demonstrates in relation to its site. Similar to the universal-local duality, an imposed order is exemplified by modern architecture's *tabula rasa* approach to master planning and site development. Through this approach, architects, planners, designers, and builders sought to either minimize or altogether eliminate physical variability at a given

² Unwin, *Twenty Buildings*, 23-42. More generally, Norberg-Schulz and Cadwell are among those writers who credit Mies van der Rohe with greater sensitivity to place than many of Mies's chroniclers. See Norberg-Schulz, *Principles of Modern Architecture*, 28-29, 40-41, 55-56, 68; and Cadwell, 93-132.

location (e.g., variability due to topography, habitation patterns, or preexisting systems of paths and roads) in favor of a new, ideal, homogeneous surface (preferably a flat surface) upon which to build. To reiterate from the universal-local duality, through a rigorously imposed physical order local conditions on the ground are ignored, they are essentially buried over. A conforming order, on the other hand, accedes to a site's existing conditions. It respects, reflects, and works within some of the restrictions inherent in those preexisting conditions.

Rigidity-flexibility contends with an architect's or planner's response to a particular planning grid. This duality is best illustrated in the context of a preexisting grid such as an orthogonal city grid or a suburban residential development consisting of neatly apportioned rectangular building lots on both sides of a straight-line street. A common practice when designing a building under these conditions is to align a building with an orthogonal footprint so that its sides conform to the edges of the rectangular building site. Examples of this rigidity in response to a preexisting grid are innumerable around the world. It is the rare architect that, when faced with a rectangular plot of land inside a larger city or suburban grid of surrounding properties and streets, turns their design at an oblique angle to the orthogonal order. This flexible approach can be done for a number of reasons. These include increasing the building footprint by designing along the diagonal of the rectangular site, or to orient a building so as to take full advantage of environmental factors such as specific day lighting conditions, prevailing breezes, desirable vistas, or a site's topography.

Lastly, macro-micro relates to the environments subsumed under the universality of grid systems. A planning grid that covers a region or a country exerts its influence from large swaths of land all the way down to small plots of land, the buildings that occupy them, and the rooms inside those buildings. Grid systems such as these have strong and widespread tendencies

towards the universal, geometric, imposing, and rigid over the local, topographical, conforming, and flexible. But like the rigidity-flexibility duality above, even in the face of a grid that exerts as strong an influence across the place scales from nation to region, city, street, and building, there are always occasions for improvisation within the preexisting grid system. Throughout the United States, city and town planners under the influence of the Jeffersonian grid have allowed themselves slight alterations to the grid due to, for example, a rail line, a river, an original community's path or road, a prominent local hill, or a mountain range. Whenever one of these cases arises, even a slight alteration to the predominant grid structure is a noteworthy concession to local context.

In terms of these five dualities, Klumb's houses stood squarely on the side of the local, the flexible, and conforming, and stood opposed to the universal, the rigid, and the imposing. Meanwhile, his houses transcended and resolved the geometrical-topographical and the macromicro dualities. In terms of the universal-local, Klumb's grid systems were not beholden to a larger, governing pattern or grid system. Except for the Universal Map Grid System used by American cartographers in surveying and mapping the island, in Puerto Rico there is no overriding national or territorial grid system, there is no equivalent to the United States' Jeffersonian grid. The largest grid systems evident on the ground in Puerto Rico are city grids bounded by topographical constraints. The city grid in Old San Juan, for example, was established by its Spanish conquerors and is constrained by the tight limits of the narrow west end of San Juan island, which controls access into the once strategically important (today commercially important) San Juan Bay. The city grid of Mayaguez on Puerto Rico's west coast adheres loosely to the long, curved coastline and to the roads that radiate inland and transverse to the coast. The same can be seen in parts of other coastal cities such as Ponce, Arecibo, Fajardo,

and Dorado. Farther inland in many small towns, a well ordered, orthogonal grid is allotted for the town center, plaza, and church while the rest of the settlement conforms more organically to the surrounding hills that rise above the town.

Even in light of Puerto Rico's historical and highly localized grid systems, Klumb extended the practice of establishing localized grids farther still than the island's norms. Except for his houses in dense urban areas, Klumb even eschewed the limits and conventions ordinarily imposed by or acceded to in deference to neighborhood streets or site boundaries. Klumb's patterning or grid systems were inherently localized to the most intimate details of each house's site, particularly their topographies. What we start to see in the examples in this chapter, then, is that his houses in Puerto Rico were quintessential examples of places as the collection of all things that have been brought together by people and natural elements at a specific habitable location. Put another way, Klumb's houses in Puerto Rico demonstrated his acute awareness of each project's surroundings both far and near. With that awareness in mind, he disdained the modern practice of using a grid system to impart order upon a site or landscape. He instead practiced a unique form of place making. He derived order from the landscape, its vistas, and a site's environmental factors (especially the prevailing winds). Then he imparted that order back onto his house designs through an appropriate square, triangular, or rhomboidal (a diamond shape derived from two combined triangles) grid system. As such, the duality of universal-local remains unequivocally unresolved. Klumb's houses emanated from local conditions. The geometrical-geographical duality, however, is resolved in specific contexts. The duality is resolved where a planning grid and a site's topographical features make allowances for one another, and coexist in the harmonious unity of the built work and its surroundings. Finally, with Klumb's strong tendencies towards remaining flexible and conforming a structure to its surroundings, the dualities of imposing-conforming and rigidity-flexibility remain unresolved in his residential works.

Klumb researchers Silvia Arango and Josean Figueroa have proposed possible explanations for Klumb's idiosyncratic grid systems. Both point to Wright's influence on Klumb. Figueroa has proposed that the ways that both Wright and Klumb integrated their buildings with their surroundings are the results of design methodologies that follow patterns of fractal geometry. Arango's position is that Klumb's planning grids were inheritors of Wright's habit of mathematically abstracting natural forms and structures, reproducing those abstractions in repeated geometric patterns, and then translating those patterns into floor plans. Arango further explains that this process of abstraction, reproducing, and translating is most evident in Wright's pinwheel floor plans. This method described by Arango is in the spirit of the one that the architect Michael Cadwell describes in the opening quote at the top of this chapter. Cadwell wrote,

"Pattern was everything to Wright. [...] Pattern, for Wright, was not a formulaic approach to design or a utilitarian device for space planning. When Wright began to draw a plan of a house, as he invariably did with the simple pattern of a grid, he believed that he was invoking the essence of life – his plan was a divine encoding. And when Wright extended that pattern from plan into a continuous building envelope and then out into the landscape as he did at the Jacobs House, he claimed a unity whereby everyday family life intertwined with the revelatory potential of nature."

I concur to a large degree with Arango's and Cadwell's characterizations of Klumb's and Wright's thinking, respectively, but I further contend that in the case of Klumb there were specific experiential aspects from his five years with Wright that led to his later merging of the

³ Arango, "Henry Klumb and the University of Puerto Rico, Rio Piedras Campus," 133-138.

⁴ Cadwell, 76-77.

grid and the landscape. Elizabeth Kassler, Klumb's friend, alluded to those experiences when she wrote to him,

"Because you looked to the principles, not to the forms, your interpretation of Wright's philosophy comes out individual but selfless, strong but humble. [...] You were wise in your choice of Puerto Rico as a workplace. The unspoken, yet insistent demands of that tropical island seem to have stimulated you in much the same way the Arizona desert stimulated Mr. Wright: new and appropriate forms came 'from the ground up'."⁵

Those experiences with Wright are the subject of the first historical episode that follows, an episode that perhaps rises above all others in impressing a sense of place on Klumb.

Historical Episode Number One: 1929-1933
Fitting Buildings into the Landscape at Taliesin and Camp Ocotillo

The forty years that Klumb spent in Puerto Rico afforded him opportunities and propelled him to professional heights that he never could have imagined. His years on the Caribbean island cemented a legacy that, although it remains almost entirely localized to Puerto Rico today, has received a modest amount of recognition outside of the island. Quite likely none of his achievements in Puerto Rico would have occurred had he not allied himself with Frank Lloyd Wright. Indeed, the nearly five years that Klumb spent with Wright would turn out to be the most formative and consequential period of his professional life. Following his five years with Wright Klumb repeatedly and adamantly espoused and adapted Wright's Organic Architecture. From this time also flowed a long list of lifelong friends, colleagues, confidants, and a key business partner. Klumb's continued interactions with these friends engendered many recollections on his

⁵ Kassler to Klumb, letter dated 16 September 1980.

time with Wright. These recollections proved to be instrumental to Klumb's thinking about the built environment, natural elements and environments, and the architecture profession's ability to enhance people's lives. Lastly, experiences gained while with Wright led to other similar and even more fruitful projects. To be sure, other significant experiences and influential places would affect Klumb between the time he left Wright in 1933 and when he moved to Puerto Rico in 1944, but none would have the wide ranging impact as did his time with Wright, its associated people, and its evocative locations.

To begin to understand this important period, it will be helpful to refer to Klumb's autobiographical pamphlet, *Henry Klumb 1: Architecture in Search of Higher Values, 1929-1933.* Over the course of fifty pages in this unpublished manuscript, Klumb's depiction of his nearly five years with Wright resembles a pictorial travel essay. Klumb's collection of images during this period illustrates a journey that begins with his travel by train from St. Louis to Spring Green, Wisconsin in January 1929. Klumb arrived at Taliesin in the middle of a Midwestern winter. One of Klumb's earliest recollections (and photographs) of Taliesin was standing in deep snow in one of the courtyards for a group portrait with the other "Taliesin Men," as Wright's small architectural staff at the time referred to themselves. With just enough time for Klumb to make first impressions of Taliesin and meet his new coworkers, Wright and his band of young architects made a cross-country car trip to Chandler, Arizona. Among the cacti, sparse patches of grass and brush, rugged mountain crags, Native American rock carvings, and a solitary dirt road inscribed in the landscape, they carved out a desert campsite, Camp Ocotillo, and began working on the designs for the San Marcos in the Desert Hotel and the San

⁶ For a more complete description of Klumb's pamphlets, see Appendix A of this dissertation.

⁷ As a way to distinguish themselves from the later groups of architects that would form Wright's Taliesin Fellowship, which was founded in 1932, Klumb referred to himself and his colleagues from this time (between 1929 and 1932) as the "Taliesin Men." See Klumb to Gutheim, letter dated 5 February 1980; and Klumb to Kassler, letter dated 8 April 1980.

Marcos Water Garden. All three projects – the desert camp and its buildings, the hotel, and the garden pools – bore Wright's occasional penchant for oblique angles and triangular grid patterns, which led to such oddities as rhomboidal floor grids, hexagonal-shaped rooms, and multifaceted, polygonal shaped roofs. Before long, the group returned to Taliesin. Days at Taliesin were filled with drafting work in the studio, building architectural models, tending to the grounds, new building construction, and the occasional picnics and nature walks. In early and mid-1930, Klumb and the staff worked making new architectural drawings, models, graphic art, and presentation boards for Wright's famed Organic Architecture lectures at Princeton University. The following year Wright agreed to let Klumb supervise through Europe a traveling exhibit of Wright's works. At the conclusion of the exhibit, Klumb was accompanied on his second trans-Atlantic voyage from Germany to the United States by his new bride, Else. Back with Wright in Wisconsin, Klumb helped in the foundation of the Taliesin Fellowship in 1932. Then, in the closing pages of *Henry Klumb 1*, Klumb discusses his decisions to leave Taliesin and to establish his own architecture practice.

Of Klumb's years with Wright, two factors stand out as most directly related to Klumb's evolving sense of place. The first is Klumb's brief sojourn in Camp Ocotillo. The second is the more extended time spent at Taliesin.

Camp Ocotillo

In a 1974 essay titled "Wright, the Man," Klumb related his earliest experiences with Wright. Among them, their time together in Arizona was formative for the younger architect.⁸ According to Klumb, upon arriving in Arizona Wright quickly decided to establish a temporary home and

⁸ Klumb, "Wright, the Man," 13-14. The essay was written in 1974, "fifteen years after Frank Lloyd Wright's death" (p. 15), but published the next year in Gutheim's edited volume In the Cause of Architecture.

architecture studio on a low hill overlooking the project site. As a consequence of this decision they would have to build the living and working accommodations that they needed. In the essay, Klumb described the physical results and some of the lessons that he took from the experience,

"Working from sunrise to sunset, Camp Ocotillo, as it was named, came into existence. There it was, rising overnight, sitting dignified, human in scale, on a rocky rise of the desert floor, interwoven into the Arizona landscape, belonging to it, in form interwoven with the geometric triangular-shaped mountains and rock formations, sparkling in the sun with its white canvas roof surfaces, rose-painted lumber walls and the coral-painted flaps providing ventilation, arousing a joyful thankfulness in being alive to everyone who came upon it. [...] Here we experienced in a couple of weeks Frank Lloyd Wright's principle applied. A lesson to be taught without teaching, taking architecture from its pedestal and putting it to a simple task in solving a minor, immediate and pressing need to provide a temporary shelter for work and living, all accomplished within limited economic means, with low cost materials and, of course, with willing hands." ¹⁰

Wright and his staff resided at Camp Ocotillo from February until May of 1929. By May, with the design for the San Marcos in the Desert Hotel significantly advanced and with an eye to the construction start the following year, Wright and his entourage returned to Wisconsin. Still, the result of their brief sojourn was indeed an impressive accomplishment, especially in terms of a unified building-landscape composition. The camp and its buildings embodied Wright's two maxims:

- "A building should appear to grow easily from its site and be shaped to harmonize with its surroundings if Nature is manifest there."
- "No house should ever be *on* a hill or *on* anything. It should be *of* the hill.

 Belonging to it."

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⁹ Ibid., 13.

¹⁰ Ibid., 14.

¹¹ Wright, *In the Cause of Architecture*, 55.

¹² Wright, *An Autobiography*, 168. The italicized emphasis is from Wright.

How did Wright and his staff so deftly and quickly give shape to a camp that turned out in Klumb's estimation to be inherently of its desert site? As shown in the site plan in Figure 4.21, Wright designed the camp so as to surround a hilltop with two protruding ridgelines, one extending toward the south and the other to the northwest. He left the hilltop itself exposed except for a communal campfire area, complete with bench seating, and an open work area where Wright and his architects erected a full-scale section mockup of the proposed modular structural system for the San Marcos in the Desert Hotel. ¹³ This site plan and the photographs

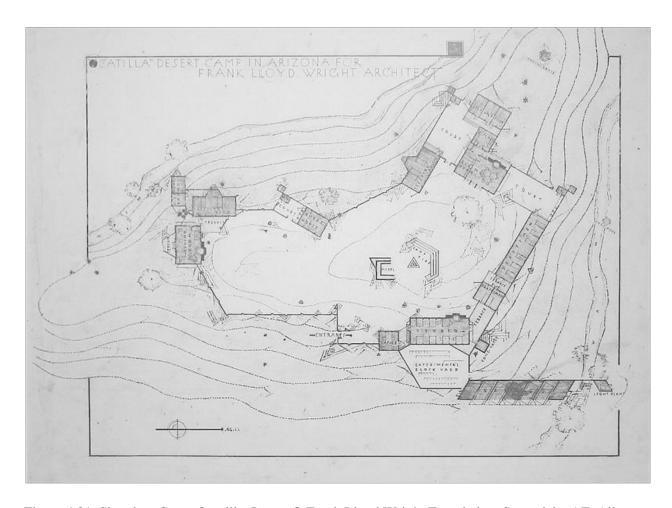


Figure 4.21. Site plan, Camp Ocotilla. Image © Frank Lloyd Wright Foundation, Scottsdale, AZ. All rights reserved. The Frank Lloyd Wright Foundation Archives (The Museum of Modern Art | Avery Architectural & Fine Arts Library, Columbia University).

¹³ Levine, *The Architecture of Frank Lloyd Wright*, 203.

in figures 4.22 and 4.23 indicate that the camp perimeter consisted of a low wooden wall that hillside, with the resulting effect that the face of the wooden wall gradually rose and receded with the undulations and the two protruding ridges. The perimeter wall was carved into the hillside, with the resulting effect that the face of the wooden wall gradually rose and receded with the undulations of the landscape. More specifically, the wall stepped incrementally lower as it wound to the south, and higher the closer that the wall approached the hilltop's northwest,



Figure 4.22. Camp Ocotillo cabins and parts of the perimeter wall, from an original photograph in *Henry Klumb 1: Architect in Search of Higher Values*, 1929-1933. Image courtesy of the AACUPR.



Figure 4.23. Camp Ocotillo on its hilltop site, from an original photograph in Klumb's pamphlet *Henry Klumb 1*. Image courtesy of the AACUPR.

north, and northeast edges. Wright and his staff built the camp's wooden cabins in-line with the camp's perimeter wall, thus the buildings and the perimeter wall formed a seamless boundary, albeit jagged and stepped, around the hill. Also, the cabins and wall segments along the northwest, north, and northeast limits of the compound were just far enough downhill that the crest of the hill remained visible when viewed from outside the camp. Thus we see Klumb's characterization of the camp as "sitting dignified [...] on a rocky rise of the desert floor, interwoven into the Arizona landscape." But there was more that Klumb only hinted at in his comments on the camp.

In his 1974 published recollection on Wright, quoted above, Klumb subtly pointed out the relationship between the camp's forms and the surrounding natural forms. He also alluded to the rose colored wood stains, the coral colored cloth roof coverings, and to the sunlight and breezes at the camp. The architecture critic Neil Levine explains in greater detail these aspects of the camp and its buildings, and how they relate to notions of place. ¹⁵ In establishing the camp, Wright began with one of the most basic and fundamental aspects of place making – assigning the camp a name that was itself evocative of the site. Wright named the camp after a cactus flower prominent in the area. Next, the triangular cabin roofs (which were made of wood frames and canvas covers) harkened to the jagged ridgeline of the nearby mountains. The roofs' transverse elevations were also in the proportions of a draftsman's 30-60-90 triangle, further signifying the place as an "architect's high desert compound." ¹⁶ The rose and cream colors of the light coat of paint on the wood and of the canvas roof covers, respectively, were suggestive of the pink hues of the desert landscape in the evening light and of the clouds in the expansive desert sky. On more practical terms, the white canvas covers softened the often harsh desert

¹⁴ Klumb, "Wright, the Man," 13.

¹⁵ Levine, 204.

¹⁶ Wright, "Arizona," 2.

sunlight. Also, the triangular sides at the ends of each roof could be opened to allow cooling breezes to flow through the rooms as needed or closed to trap some of the daytime heat for a measure of nighttime comfort.

Once Wright and his staff returned to Taliesin in May, Klumb would not be back in the American Southwest for another nine years, long after he had left Wright's service. Nevertheless, Camp Ocotillo remained with Klumb as a transformative place and experience because of how the time spent there was associated with notions of place making, place thinking, and impressing a sense of place. In terms of place making, by his own accounting of the experience in his 1974 essay, in Arizona Klumb participated in a range of activities to alter the environment to meet, in this case, the needs and desires of Wright and his staff, and to fit Wright's philosophy and precepts of Organic Architecture. These activities included the conception of the camp while standing on its barren hilltop, the sawing and hammering necessary for its erection, and then living and working in the majesty of the desert. In terms of place thinking, the experience may have been more substantial.

A large lesson in place thinking that Wright imparted to Klumb during this time was in encouraging Klumb to embrace this brave new world of the desert, a world that was inhospitable to many yet full of possibilities to those who were willing to indulge in it. Wright did this by helping Klumb to clearly and intently see the desert in both all its grandeur and in the smallest perceptible detail. While it may seem like a simple thing, to be able to do this as Wright did was no easy task, not to mention that it was also a necessary precondition to the building-nature integration that resulted in Camp Ocotillo. Wright helped Klumb to understand this not only though teaching by example in their desert camp but also shortly thereafter at Taliesin. Around the time that he either was departing Camp Ocotillo or had arrived back in Wisconsin, Wright

wrote two essays inspired by his experiences in Camp Ocotillo. One was called "To Arizona," the other simply "Arizona." Klumb made handwritten copies of these two essays, and over fifty years later a photocopy of his handwritten copy of "To Arizona" found its way into the pages of the pamphlet *Henry Klumb 1*.

Between the two essays, "Arizona" is much longer than "To Arizona" (the former is eleven pages long, the latter two). "Arizona" is also more unstructured, at times resembling more a collection of field notes or a haphazard series of thoughts, at other times its passages resemble rough cuts or rewrites of earlier passages in the essay. The two essays taken together would turn out to be rough drafts for a later, much more polished, and highly condensed version that Wright was able to publish in May 1940.¹⁷ Parts of the two original essays also found their way into Wright's autobiography.¹⁸ But in their early incarnations, these versions of "Arizona" and "To Arizona" ranged far afield in their subject matter. In the two essays, Wright described the desert with the perceptive eyes of a geographer, botanist, biologist, anthropologist, social critic, poet, and philosopher. Among the many subjects Wright covered were the colors, topography, vegetation, animal wildlife, Native American habitations, light and air, permanence and etherealness, and life and death cycles of the desert. Each of these things, Wright wrote, were studied, considered, and in various ways represented in his desert camp. A key aspect of what Wright observed while in Arizona, then, was the architecture both inherent and possible in the desert.

In "Arizona" and "To Arizona" Wright saw the desert, full of life, as nature's act of architectural creation. It had been shaped by primordial fire, water, wind, and sunlight. Wright called this "the architecture of the ages." The result he called "a grand garden" and, in alluding to natural processes, the product of "a very high civilization." Wright further observed, "Nature

¹⁷ Wright and Pfeiffer (ed.), *Collected Writings*, 1939-1949, 33.

¹⁸ Wright, *An Autobiography*, 306-316.

shows remarkable scientific-economy in her desert construction and could teach any architect who might apply." Out of the "rocks and reptiles no less than cacti" he surmised architectonic and stereotomic structures, a rich array of both surface textures and internal organizational patterns, architectural ornamentation, building skins, and nature's creative and destructive construction processes. So Wright extrapolated functional, beautiful, evolved, resilient, and living building elements from the desert and applied them to an architecture fit for humans in this environment. The environment was tough, to be sure, but nature had already demonstrated that life was not only possible in the desert, but it was able to thrive there. And as people were a part of nature, they belonged there, too. ¹⁹

In Wright's conception of desert architecture as outlined in "Arizona" and "To Arizona," a building is subject to what he called "sun acceptance." The desert, Wright thought, is teeming with variety – variety of forms, colors, textures, patterns, species, etc. The sun's intense light is both the source of much of that variety and a great equalizer between varieties. In other words, the sun imparts upon all – the ground, rocks, mountains, plants and trees, and animals and people – a tough outer cover, a muted palette of colors, gritty surfaces, at times a quiet and otherworldly presence, not all equally, of course, but rather each according to nature's grand design. Likewise the sun also washes away just enough of the surfaces and edges of everything so that all things blend together in the desert. Everything retains a measure of physical and visual distinctiveness in the desert while at the same time everything is somewhat normalized by the harsh desert light. A desert building should be no different. Accordingly, Wright wrote, "A desert building should be nobly simple in outline," adding that an architect should "harmonize his building masses with

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¹⁹ "It had been shaped by primordial fire, water, wind, and sunlight," see Wright, "Arizona," p. 5; "the architecture of the ages," see Wright, "Arizona," p. 6; "a grand garden" and "a very high civilization," see Wright, "To Arizona," p. 1; "Nature shows remarkable scientific-economy...," see Wright, "Arizona," p. 3; and "rocks and reptiles no less than cacti," see Wright, "To Arizona," p. 1.

topography and his building walls with the nature creation they consort with." Wright described this process as "playing with the light and softening the building into its proper place." Ironically, and with more than a dose of condescension, Wright thought that Native American desert dwellers had done little to typify the sort of architecture he felt was appropriate and was espousing, Hopi Indians much less so than Pueblo cliff dwellers. Wright thought that Egyptian and Mayan architecture provided better examples.²⁰

To directly invoke one's natural surroundings through forms, materials, colors, and the careful balancing of natural light and ventilation as Wright did was a far cry from the cold sterility that Klumb had felt characterized the International Style, which was making great headway on the European continent. How unusual and unexpected it was that such valuable lessons were taking place at a location more akin to a frontier outpost or military fort than a reputable old firm in Chicago, an atelier in Paris, or the Bauhaus school in Dessau, Germany. Camp Ocotillo was in such a remote location that it was not even in Chandler proper but rather in its outskirts, which was itself in the outskirts of Phoenix.²¹

Levine points out that what allowed Wright to plan and build Camp Ocotillo in such a facile manner and so evocative of the desert landscape and environment were his previous projects in Death Valley and Lake Tahoe. ²² Klumb at Camp Ocotillo, then, was a direct inheritor of Wright's past experiences in the desert. In other words, the Arizona experience enabled Wright to transfer select, place-specific, past experiences and beliefs to Klumb. These experiences and beliefs were then augmented by their joint efforts at conceiving, building, and living at the camp, and by Wright's twin expositions of "Arizona" and "To Arizona." The

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²⁰ "Sun-acceptance," see Wright, "To Arizona," p.2; "A desert building should be nobly simple in outline," see Wright, "To Arizona," p.1; "harmonize his building masses…," see Wright, "To Arizona," p.2.

²¹ Levine, 201.

²² Ibid., 205-206.

combined effects of these place making and place thinking efforts were all key processes of impressing a sense of place on Klumb.

A lasting outcome of this impressing was a burgeoning affection for the American Southwest. Wright wrote of the desert experience, "Like art or religion the experience comes quickly, to some. To others only after repeated association." It is difficult to say whether it took to Klumb instantly or over a longer period of time. Regardless, at some point Klumb did develop a deep affection for the region, and that lure would remain with him for nearly twenty years hence, perhaps longer. The ramifications of this affection for the region would manifest themselves in projects that brought Klumb back to the region years later.

Taliesin

Upon leaving Arizona and returning with Wright to Taliesin, Klumb remained there for an extended period of time. From June 1929 to September 1933. Klumb's longest continuous separation from Taliesin was the five months from May to September of 1931 when he guided an exhibit of Wright's works through Europe. It is remarkable that in regard to this first return trip back to Europe Klumb left no record of any emotion over his home city and country. In the archived evidence of Klumb's personal letters or recollections in his speeches and essays, there was no nostalgia evident, no triumphant return home, or any wistful attachments to the places of his German past. This was despite the fact that in between exhibit showings in Amsterdam, Berlin, Stuttgart, and Brussels in the summer of 1931 Klumb continually used Cologne as a home base. What mattered to Klumb the most during this brief time in Europe was returning to the United States with his new bride Elsa, and acting as an advocate for Wright on the continent. Back in America the one place that did capture Klumb's imagination the most was Taliesin.

²³ Wright, "Arizona," 1.

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For our purposes, what is most important about Taliesin is not its long history or association with Wright (for example, its source of refuge and security for Wright, a series of personal tragedies that befell Wright there, or Taliesin's role in shaping the generations of architects that made up the Taliesin Fellowship) but rather the impressions that the place made specifically upon Klumb. Those impressions are most well represented in an evocative essay titled "Taliesin," which was written by Klumb sometime between returning from Camp Ocotillo in June 1929 and departing to Europe in May 1931 (see Appendix B for more information on Klumb's "Taliesin"). The purpose of this essay by Klumb is not entirely clear, whether he wrote it to simply record his thoughts, to send it to someone in a letter, or for publication. Whatever the case, the essay shows a great deal of Wright's influence. It is in many ways reminiscent of Wright's "Arizona" and "To Arizona." Several passages also bear a close resemblance to Wright's later writings about Taliesin.²⁴ Most importantly, Klumb's essay demonstrates a great sensitivity to a place.

In his essay, Klumb shows that he saw Taliesin as decidedly of its surroundings in ways both large and small. Its numerous buildings were part of a larger composition of natural and built elements that were in perpetual and vivid juxtaposition with one another. Klumb noted how the buildings were sited along a line of hills that overlooked the Wisconsin River valley below it, as can be seen in Figure 4.24. Yet instead of dominating or eradicating those hills, Klumb could see how Wright arrayed a series of interconnected buildings to surround the open hilltops in such a way that they formed courtyards, gardens, and outdoor walkways in between some of the buildings. Besides the buildings, courtyards, gardens, hills, valley, and river, Klumb noted that the overall composition also included a working farm and a small power-generating dam. Banks of windows and terraces accentuated the views to each of these places, thus fomenting a connec-

²⁴ Wright. *An Autobiography*, 167-175, 272, 368.

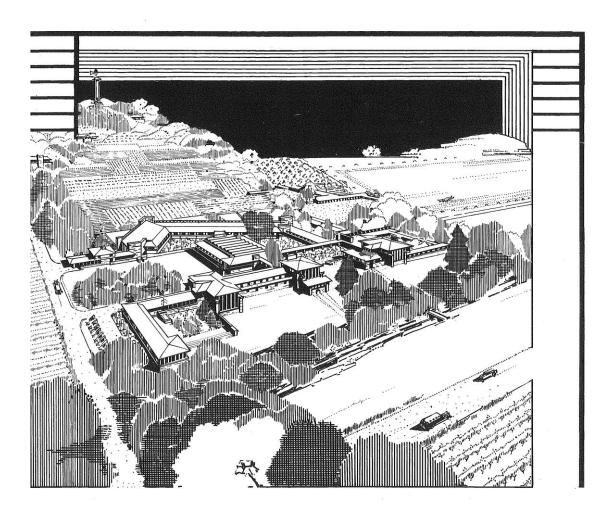


Figure 4.24. Aerial perspective, Taliesin, c. 1933. Image © Frank Lloyd Wright Foundation, Scotts-dale, AZ. All rights reserved. The Frank Lloyd Wright Foundation Archives (The Museum of Modern Art | Avery Architectural & Fine Arts Library, Columbia University).

tion between Taliesin's inhabitants and their surroundings.

In its finer details, too, Taliesin strove to be of its chosen place. It was apparent to Klumb that Taliesin drew its material palette from its site. The limestone of its many fireplaces and its thick walls (in the buildings, courtyards, and gardens) came from a local quarry. Wood was everywhere within and without – inside in the lightly-stained partition walls, cabinets, flooring, and moldings, outside in the roof shingles as well as the surrounding cedars and birch trees. "Every material speaks its own language," Klumb wrote, adding that in their "totality is a great

harmony in colors, masses, proportions."²⁵ Its colors were the subdued tones found in nature, primarily shades of brown and grey in the limestone, interior wooden walls and exterior roof shingles, and the unadorned plaster. They reflected, for example, "the color and the surfaces of the sandy banks of the wide, outstretched river plain," the flower stems and boughs as they shone bright in the sunlight, and the rocky outcroppings all around the various hilltops.²⁶ In their forms, Wright's well-known, low profile, overhanging eaves of his Prairie Style, Klumb observed, echoed the gentle slopes of the hills.

The seasons brought new dimensions to this place. The spring and summer months were marked by blooming flower gardens, by the cooling breezes through Taliesin's many windows, and by an active, productive farm. With winter, Klumb noted,

"When the snow has accumulated in the courtyards, having come down from the hilltops and roofs where they lie, icicles a meter long hang from the gutter-less, towering ledges of the gently sloping roofs. They are suspended in midair between the landscape and one's line of sight. During this time, Taliesin looks like an ice palace."²⁷

During this time, fireplaces came to life beckoning Klumb and his associates "to engage in small talk or to play music around the warming wood fire."²⁸

Klumb's "Taliesin" is not long, a mere three and a half pages compared to the combined thirteen pages of "Arizona" and "To Arizona." But while brief, it is still apparent from Klumb's descriptions of Taliesin that he developed a strong affection for the place and its diverse subplaces (its buildings, its rooms, the many residual outdoor spaces, the surrounding landscape, even the region). But why? Klumb's affection was due in large part because Taliesin was the

²⁷ Ibid., 3.

²⁵ Klumb, "Taliesin," 2.

²⁶ Ibid.

²⁸ Ibid., 2.

embodiment of higher values, that is, of Wright's nobler purpose in architecture. Klumb alluded to this when he wrote in his essay, "Twice Taliesin was destroyed by fire, but each time it rose out of the ashes to achieve new heights of beauty, to become an even greater and better realization of an idea." That idea, Wright's purpose, was directed to the fullest possible integration between architecture and nature in a modern context. It is remarkable how Klumb was able to grasp so fully this element of Wright's architectural philosophy and express it so clearly at such a young age, so early during his tutelage under Wright, and decades ahead of a phalanx of Wright scholars. Indeed, Klumb's awareness of this idea and purpose is evident throughout "Taliesin." By the time he declared in the essay, "In color and in form, ever changing nature is a living, delightful gift," Klumb had drawn so many parallels between the architecture and its natural surroundings that any dividing line between the built and the natural world had been completely blurred.

Wright's passion for the interrelationship between architecture and nature took a hold of Klumb and remained with him for the rest of his life. To this end, Klumb's comment in 1962 to an *Architectural Forum* reporter, previously cited in the "Chapter One – Introduction," bears repeating. Klumb said,

"Before I arrived at Frank Lloyd Wright's, I was a little soft myself, too. I had been brought up in a city, and a raindrop would alarm me. But a gradual acceptance of nature becomes in the end a *need* for nature."³¹

This quote is significant because it directly credits Wright with a change in attitude in Klumb from an urbanite or a nature neophyte to an architectural naturalist. It also causes us to reconsider the argument put forward by a number of scholars that Klumb's reverence for nature was due to

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²⁹ Ibid.. 1.

³⁰ Ibid., 3.

³¹ "Klumb of Puerto Rico," 88 (original emphasis in italics).

the German Wandervogel movement, which was a traditional nature walk youth program popular in Germany in the early twentieth century and still practiced today. Indeed, I have found no mention of the Wandervogel movement in Klumb's vast collection of personal and professional papers, while time and time again Klumb referred to Wright's love of nature and its importance to both Wright's and his own architecture. Almost forty-five years after penning "Taliesin," Klumb made the following statements,

- "Every word written, every building built by Frank Lloyd Wright, expresses [...] an awareness that man belongs to and is an inseparable part of nature." 32
- "Observation of the organic processes of nature, a deep understanding of the interdependence of all living things with each other and nature, and a realization that all that grows comes 'out of the ground into the light' – this understanding he felt to be essential to any architect worth his calling.",33

Then, in a speech at a 1982 symposium in honor of his friend, the Austrian economist Leopold Kohr, Klumb tied these sentiments back to his own work, saying, "Influenced by Leopold Kohr's philosophy of size and the principles of Frank Lloyd Wright's philosophy of an 'organic architecture,' both are deeply grounded in the laws of nature, my work adheres to both these concepts."³⁴ But these are just a few examples. Similar sentiments are scattered throughout Klumb's writings. 35 What is important about these and other such passages is how deeply entrenched these notions of nature were in Klumb's thinking, how he refined these ideas as he applied them to various design projects, and how these conceptions regarding natural spaces were tied to specific places – first Camp Ocotillo, then Taliesin, and later New Mexico and the American desert Southwest, and finally various parts of Puerto Rico.

³² Klumb, "Wright, the Man," 12.

³³ Ibid., 13.

³⁴ Klumb, "Writings," 325.

³⁵ Ibid., 313-319, 322, 324-325. See also Klumb, "Modern Trends in School Plant Planning," 5-7; and Klumb, "Skyscraper Architecture," 12-13.

Returning to Klumb's "Taliesin," one last point to be made about the essay is how much it demonstrated his power of observation towards a place. In the essay Klumb demonstrated a similarly keen eye as was evident in Wright's "Arizona" and "To Arizona." Klumb noted in great detail elements of the place, such as its topography, vegetation, environmental factors and effects, materials, colors, surfaces, tectonic and stereotomic structures, and natural and habitation patterns (e.g., seasonal variations, the logic of Taliesin's plan, and rituals at Taliesin). Most importantly, he noted the interrelationship between all of these factors. There were also, however, some key distinctions between Klumb's earlier experiences in Camp Ocotillo and those at Taliesin. Wright's desert camp in Arizona was a sudden, short-lived, inspired act of place making. In contrast, Wright had been variously designing, building, living, and working in this Wisconsin valley since the turn of the century. Talisein was, after all, family property on his mother's side. (Its first buildings were featured as the "Hillside Home School Building / Built for the Lloyd Jones sisters in 1906" in Wright's 1910 Wasmuth Portfolio, a publication with which, as we saw in the introductory chapter's biographical sketch, Klumb was very familiar.) So at Taliesin, Klumb was witness to Wright's years long handiwork of merging the built with the natural. He was also a direct participant in its routine maintenance and care as well as in its ongoing expansion following Wright's decision to establish his Taliesin Fellowship in 1932. For a significant amount of time – roughly two years – Klumb was a part of the "living architecture" at Taliesin.

Klumb's residence at Taliesin and hence his tenure with Wright ended in September 1933. Life around Wright's home and studio began to change in 1932 with the advent of the Taliesin Fellowship. Batches of new apprentices began to fill the ranks of Wright's staff, and the original Taliesin Men increasingly lost out on meaningful work in the studio. By the spring of

1933 Klumb had started to discuss with Wright his professional aspirations, a future that was likely to involve a life outside of Taliesin. Wright did not seem receptive to the idea. That September Klumb and his wife visited a former apprentice at Taliesin, Steven Arneson, who was living in Brainerd, Minnesota. As Klumb explained it in a letter to another former Taliesin Man, George Kastner, "I came up here to rest and some unexpected possibilities turned up." So, unexpectedly and without notice, Klumb did not return to Taliesin.

Klumb and Arneson tried to establish a practice in Brainerd, then in Washington, D.C., where Arneson had some business contacts. Arneson did not stay in Washington for long. He did not stay anywhere too long. Arneson was truly an architectural vagabond, working all over the world throughout his career, often for various government agencies. Klumb, on the other hand, led a somewhat more stable life during this time. He and his wife remained in Washington for another six years. Nevertheless, Klumb and Arneson remained very good friends over the years, corresponding regularly. They eventually worked together again eleven years later in Puerto Rico. Arneson's many travels and globetrotting job assignments had led him to work for Puerto Rico's provincial government (appointed and supervised by the American federal government) in the mid-1940s.

* * *

Writing on matters of ecology in 1970, Klumb said,

"Man can be guided, he can be trained and finally educated to become aware of the fact that he is part of a larger whole. [...] All men can be guided, trained and educated to see, to feel, to wonder, and thus become aware, through awareness attempt to correct our neglect and errors."

At Camp Ocotillo and Taliesin Wright acted as Klumb's guide. A guide may be defined as that

³⁶ Klumb to Kastner, undated letter (sometime in the fall of 1933).

³⁷ Klumb, "Writings," 315.

individual, established community, or group of assorted people that impress a sense of place upon another person or group by sharing place-specific practices, traditions, or value systems. One of Wright's principal lessons to his junior architect, taught by doing together in Arizona and through the completed work of Taliesin, was to look to the local and topographical for a natural order that could be translated into habitats conceived and made by people. Accordingly, the mathematical and abstract rigor of a building and site plan were altered to flexibly respond and conform to the concrete and evocative conditions of the natural world present at a site. So, both macro and micro environments, encompassing both the natural and built environments, were meant to converge in a harmonious unity at a building site.

The long term effects of these lessons were not just evident in both Wright's and Klumb's words, they were demonstrated once again, years later, in how Klumb's houses grew out of their sites. That growth was made possible by square, triangular, and rhomboidal spatial-structural planning grids that Klumb rotated, shifted, and projected in concert with his houses' surroundings.

CHAPTER 5: VERNACULAR INFLUENCES

"In all lies the pattern of architecture. [...] The true basis is in those indigenous structures, in the humble buildings, which are to architecture what folklore is to literature or folk song to music. [...] These traits of a structure are national – of the soil, their virtue intimately related with the environment and with the habits of life of the people."

- Henry Klumb¹

Although steeped in Frank Lloyd Wright's Organic Architecture and well versed in the early and mid-twentieth century's major modern architecture movements (including the *Deutscher Werkbund*, the Bauhaus, and the International Style,) Klumb was an unusual architect in his time because of his great interest in and experience with vernacular building practices. His initial investigations into this realm of architecture began with a series of Native American projects, which Klumb undertook on behalf of the U.S. Department of Interior in the latter years of the Great Depression. Later, in the mid and late 1940s, Klumb's interest in native structures resurfaced through his early work experiences with the government of Puerto Rico. Both of these periods in Klumb's life comprised significant elements in the process of impressing a sense of place on him. That is because for Klumb learning about, transforming, and adapting highly localized, culturally specific building practices was not a casual affair. It was a full immersion into new worlds, which he then incorporated into his design repertoire.

In this chapter I investigate how Klumb's immersion into two distinct vernacular architecture traditions influenced his residential practice in Puerto Rico. Klumb's appreciation for and reliance upon local building practices and traditions depended upon the contexts in which they were to be employed. More specifically, as with the grid and the landscape, Klumb found these ways of place making to be most useful and appropriate in projects located on gently sloping or hilly terrains with evocative natural views.

¹ Klumb, "On Tropical Architecture," 2.

To understand Klumb's extensive background with indigenous structures, this chapter is comprised of two historical episodes and an analytical section. Both historical episodes promote the further understanding of the impressing of a sense of place on Klumb. The initial historical episode details Klumb's work in 1944 and from 1946 to 1948 with the Puerto Rican government's Committee on Design of Public Works (CDPW). A recurring theme throughout this historical episode is the native *Jibaro* hut, which for Klumb was a key influence specific to Puerto Rico. Next, I examine and analyze how details of the *Jibaro* hut and its response to life in Puerto Rico's mountainous interior countryside are evident in Klumb's houses. Finally, in a second historical episode I delve into an earlier period of Klumb's biography to investigate his initial experiences in earnest with local building practices and traditions, that is, I explore his Native American projects between 1938 and 1941.

Historical Episode Number Two: 1944, 1946-1948 Learning from and Reimagining the *Jibaro* Hut

Klumb chose to go to Puerto Rico thanks to the efforts of two very important people in his life.

One was Rexford Tugwell, who from 1941 to 1946 was the federally appointed governor of Puerto Rico and a political ally of then-President Franklin D. Roosevelt. Tugwell and Klumb had met previously while collaborating on planned cooperative communities – the Greenbelt Towns, also known as Tugwell Towns – in Maryland in the mid-1930s.² Since Klumb was going to Puerto Rico to work as a government architect and master planner, he needed Governor Tugwell's approval to make this transition possible. This included gaining permission by both Klumb's local draft board in California and the Department of Interior to relocate to Puerto Rico,

² Klumb did not care for the term "Tugwell Towns" because he thought that it was used derisively by Tugwell's critics and therefore demeaned the important work related to planned cooperative housing being done in the 1930s. See Klumb, "Writings," 321.

to travel by military air transport to the island, and to deliver the Klumbs' household goods to the island.³ Subsequent to Klumb's move to Puerto Rico, over the next thirty-five years Klumb remained friends with Tugwell and his family. Their relationship was such that in 1963 and 1964 he designed a vacation house for them within *El Yunque*, Puerto Rico's rainforest natural preserve. This was the Tugwell Cottage that we saw in the previous chapter.

Klumb's opportunities in Puerto Rico would never have materialized had it not been for the efforts of his longtime friend, occasional business partner, and a former Taliesin Fellowship apprentice, Steve Arneson. We first met Arneson at the conclusion to Historical Episode Number One, after Klumb left the Taliesin Fellowship in 1933. At that time Klumb and Arneson had formed a brief business partnership first in Brainerd, Minnesota and then in Washington, D.C. Among his travels since parting ways with Klumb in Washington, D.C. in 1934, Arneson had landed in Puerto Rico, gotten married, and had a daughter. By 1943 Arneson was working as a project designer with the CDPW. The CDPW was a legislatively mandated organization charged with postwar reconstruction and economic stimulus. Its scope of work included "the construction of hospitals, schools, health centers, insane asylums, public libraries, office buildings, etc." Although Klumb's invitation to work in Puerto Rico is usually attributed to having come directly from Tugwell, as Klumb later recalled it was actually Arneson who reached out to him, extolling the many opportunities available to experienced architects such as themselves thanks to the aggressive public works programs expected of the CDPW.⁵ Arneson then acted as an intermediary between Klumb, the CDPW, and Governor Tugwell to bring Klumb to Puerto Rico. Arneson even personally arranged for the Klumbs' air transportation and move of their

³ Klumb to Draft Board No. 182 (Glendale, California), letter dated 5 January 1944; Hampton (Acting Director, the Division of Territories and Island Possessions, the Office of the Secretary of the Department of Interior) to Klumb, letter dated 4 February 1944; and Tugwell to Klumb, letter dated 13 February 1944.

⁴ Guillermety, Jr. (Executive Director and Secretary, the CDPW) to Draft Board No. 182, letter dated 14 July 1944.

⁵ "Henry Klumb Finds an Architecture for Puerto Rico," 123.

household goods.6

Together once again in the CDPW, from February to October 1944 Klumb and Arneson worked on several public works projects sensitive to the needs of the Puerto Rican people. They were also mindful of Puerto Rico's natural resources and environmental factors. In private practice they jointly designed Klumb's first house in Puerto Rico, the Bosch House in Cataño. (Cataño is to the west of San Juan Bay. After San Juan and Santurce, it is also one of the oldest Spanish colonial-era communities on the island). They established a moderately successful furniture design business that showcased local materials, craftsmanship, and aesthetics. Their time together in Puerto Rico was brief, however, as Arneson abruptly fled the island in April 1945 to avoid the consequences of an unpleasant separation, divorce, and child custody battle.

Klumb's arrival in Puerto Rico coincided with a time of great political and economic transformation on the island. In Puerto Rico's popularly elected Senate and House of Representatives, politicians and political activists were promoting economic and social changes of great consequence. These activists were trying to shift the local economic base from agriculture to manufacturing. Their intent was to propel Puerto Rico into the twentieth century, alleviate many of its social and economic ills, and in doing so engender greater political and economic autonomy from the United States. As part of these aspirations, Puerto Ricans also longed for their first popularly elected governor. In the Spanish colonial era, the island had been governed by military governors. After the Spanish American War of 1898, a succession of American

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⁶ Arneson to Klumb, letter dated 14 January 1944.

⁷ Arneson left the CDPW in early October while Klumb remained with the office until the following month. See Arneson and Klumb to Guillermety, Jr., letter dated 30 September 1944; Klumb to Galib, letter dated 5 October 1944; and Klumb to Guillermety, Jr., letter dated 13 November 1944.

⁸ Arneson to Klumb, letter dated 10 September 1945. Klumb and Steven Arneson remained very close friends until Arneson's untimely death in 1956. They frequently exchanged letters, sometimes even weekly, eventually amassing the largest number of letters between Klumb and any other person. These letters were warm, humorous, and unguarded, and they provide a great deal of insight into Klumb's first twelve years in Puerto Rico.

military governors and federally-appointed civilian governors like Tugwell supplanted their Spanish predecessors. This arrangement ended with the first gubernatorial election in 1948.⁹

With Klumb now situated in Puerto Rico, in the remainder of this historical episode I will examine the simple wooden huts of Puerto Rico's working poor as a key, overarching influence on his design sensibilities. Throughout this chapter I will refer to dwellings such as those shown in figures 5.1 and 5.2 as *Jibaro* huts. The term *jibaro* refers to the rural working poor – the farmers and fieldworkers – of Puerto Rico's rugged mountain interior. On the island, *jibaro* culture is viewed with reverence and nostalgia, and the image of the *jibaro* and his family has been venerated through songs, musicals, traditional costumes, works of literature, and art. I link this term to this particular building type in large part because of the noted documentary photographers Edwin and Louisa Rosskam. In a series of photographs taken in the late 1930s and mid-1940s, they referred to these structures in their field notes as "Jibaro shacks." ¹⁰

Carol Jopling has determined that the mid-twentieth century Jibaro hut was the inheritor of four historical influences. Spanning over five centuries, those influences included Puerto Rico's pre-Columbian *Taino* Indian inhabitants; Spanish colonists; African slave labor; and twentieth century America. 11 Of these four, Spanish and American influences were outwardly clear but altogether small. Early Spanish colonists imposed rectilinear forms onto the Taino Indians' native bohio huts. 12 Americans introduced low cost corrugated metal sheets that became ubiquitous as roofing material for the huts. 13

Tainos and Africans imparted a great mix of complementary features to what would

⁹ Puerto Rican gubernatorial elections coincide with the American presidential elections.

¹⁰ Rosskam, annotation to the Puerto Rico Office of Information photograph X 427, dated October 1945.

¹¹ Jopling, Puerto Rican Houses in Sociohistorical Perspective, 5.

¹² Ibid., 7.

¹³ Ibid., 50.



Figure 5.1. A typical *Jibaro* hut in Ponce, 1937. Photograph by Edwin Rosskam, courtesy of the Library of Congress.



Figure 5.2. A typical *Jibaro* hut in Cidra, 1938. Photograph by Rosskam, courtesy of the Library of Congress.

eventually become the *Jibaro* hut that Klumb became familiar with. The hut's basic light-wood structural frame (which included a wood platform that was elevated off the ground on wood posts) originated in the *Taino's bohio* hut. ¹⁴ Under Spanish rule, skilled African carpenters replaced the *bohio* hut's fragile exterior walls, made of sugar cane and palm tree bark, with stronger and more uniform wooden cladding. ¹⁵ Next, both *Taino* and African cultures conceived their homes as connected with exterior elements and to other homes. In Puerto Rico, these exterior elements ranged from gardens and yards to detached kitchens, and small, communal, plaza-like areas around which multiple houses could be grouped. ¹⁶

The multiethnic heritage of *Jibaro* huts speaks to architecture's abilities to travel vast distances, and to permeate and join with other cultures, even in pre-modern and pre-industrial civilizations. John Vlach asserts that these abilities are especially germane to African influences due to the trans-Atlantic and inter-American slave trade, and the migration of former slaves. This

¹⁴ Ibid., 5, 65.

¹⁵ Ibid., 21, 23.

¹⁶ Ibid., 7, 22-23.

helps to explain common traits between certain domiciles across the American South and Latin America. According to Vlach, a few of the recurring features of houses built by slave and former slave families included a consistent room module that transcended locales, building materials, and time periods; small front porches that took advantage of cooling breezes; and the basic, rural, one-room family home even on occasions where a family was free to build larger, more complex houses. ¹⁷ Vlach's alluding to the theory of proxemics as it relates to African-American living spaces and habits also helps to explain why a place as restricted as a front door threshold can turn into a suitable gathering space for a small family. ¹⁸ All of these traits of African communities in the American South and the Caribbean will be seen in the *Jibaro* huts in the following pages.

Over the course of his career in Puerto Rico, the *Jibaro* hut turned into an early and lasting influence for Klumb, to the extent that a number of his houses on the island were an extension of this multiethnic, traditional building type. Klumb first encountered the *Jibaro* hut tradition while working with the CDPW.

The Jibaro Hut in Klumb's Pamphlets

To look back at Klumb's time with the CDPW is to look back at the nascence of Klumb's architectural practice in Puerto Rico and hence at Puerto Rico's earliest influences upon him.

This time period and these influences Klumb examined in two of his autobiographical pamphlets – Committee on Design of Public Works: 1944, 1946-1948 and The Office of Henry Klumb 3:

Architecture of Social Concern, 1944-1947. Klumb compiled these two unpublished manuscripts more than thirty-five years after his arrival on the island. In doing so, he filled them with sketch plans and isometric drawings, construction drawing, photographs, and internal memoranda related to his CDPW projects. Notably, Klumb also augmented these pamphlets with five photo-

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¹⁷ Vlach, The Afro-American Tradition in the Decorative Arts, 124-125, 128, 135-138.

¹⁸ Ibid., 122-123, 125, 133.

graphs depicting various indigenous dwellings and their inhabitants, and a one page collage of five images that Klumb saw as emblematic of Puerto Rico.

Two of these photographs in the pamphlets come from a March 8, 1943 *LIFE Magazine* article on Puerto Rico, an article that predated Klumb's arrival on the island by almost a year. In one photograph, shown in Figure 5.3, a group of children are running and playing before a row of wooden huts sited along a muddy street. The second photograph, Figure 5.4, shows a family sitting in the entrance to their house.

The 1943 *LIFE Magazine* article was both a photo essay on the country and a damning critique of the wholesale neglect by the U.S. government of Puerto Rico's socioeconomic ills. The article listed a host of local problems, including the following:

- abject poverty
- unsanitary living conditions
- slum overcrowding
- an economically unsustainable birthrate
- a grave infant mortality rate
- high unemployment and inflation
- an ever worsening trade deficit
- gross income inequality
- low federal funding
- local and federal bureaucratic squabbles
- an unwieldy and ineffective system of government.

Writing in the middle of America's involvement in the Second World War, the article asked, "If Americans cannot straighten out the relatively small mess of this small island, how can they expect to bring order out of the chaos in the rest of the big world?"²⁰

¹⁹ "Puerto Rico: Senate Investigating Committee Finds it an Unsolvable Problem," 23-31.

²⁰ Ibid., 23.

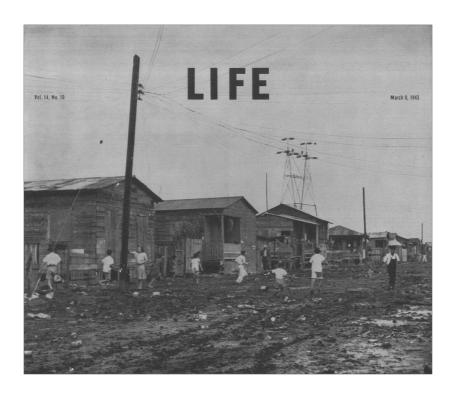


Figure 5.3. A row of *Jibaro* huts in San Juan. Photograph by Thomas D. McAvoy, from *LIFE Magazine*, 8 March 1943.



Figure 5.4. The rural working poor in Puerto Rico. Photograph by Thomas D. McAvoy, from *LIFE Magazine*, 8 March 1943.

In another photograph in the pamphlets, shown in Figure 5.5, a wooden cabin is perched precariously on a mountainside deep within Puerto Rico's countryside. In the distance one can also see several other cabins as well as the farming fields draped over the steep mountain slopes.



Figure 5.5. The Rosskams' photograph of a "*Jibaro* shack." Photography by Edwin Rosskam, courtesy of the AACUPR.

The photograph, which was dated October 1945, came from Puerto Rico's Office of Information. It was part of a group of photographs from the noted documentary photographers Edwin and Louise Rosskam, who in 1945 traversed Puerto Rico documenting daily life on the island. The Rosskams captured images of rural towns and urban shantytowns, men laboring in the fields, women tending to their families and supplementing the family's income by working as domestic seamstresses, informal gatherings around the local convenience store or a rickety refreshment stand, as well as Puerto Rico's political reformers interacting with the local population.

Inside Klumb's pamphlets, one other noteworthy image representative of indigenous life

in Puerto Rico was the one-page collage, shown in Figure 5.6. The collage situates Puerto Rico geographically in relation to the United States, the other major islands in the Caribbean, and the South American continent. The image of the three wooden figures acknowledges religious beliefs, cultural traditions, and native craftsmanship. The images of the sugar cane field and the fieldworker recognize a way of life practiced throughout Puerto Rico's expansive, mountainous countryside. Also, the title "Puerto Rico" heralds a new era as a reader navigates Klumb's life and work through his pamphlets. Klumb used this collage as an introductory image to his entire Puerto Rican sojourn.

If Klumb's pamphlets were meant to depict Klumb's singular life in the practice of architecture, then why did he place these indigenous images alongside those representing the most significant early projects of his vast oeuvre? There are several possible answers. One is that



Figure 5.6. Klumb's collage "Puerto Rico," from the Klumb pamphlet *The Office of Henry Klumb 3: Architecture of Social Concern: 1944-1947*, courtesy of the AACUPR.

the photographs and the collage depicted the contexts that Klumb encountered when he first arrived in Puerto Rico. Although Puerto Rico in the mid-1940s was on the verge of increased industrialization, the images of rural life and urban slums captured by these documentary photographers were ever present throughout the island, the norm rather than the exception. Edwin and Louise Rosskam, *LIFE Magazine* photographer Thomas McAvoy, and other contemporary documentary photographers traveled the length and breadth of the island. To document their subjects, they visited the major cities along the coast, small towns alongside winding country roads, and distant dwellings and farm fields throughout the mountainous rural interior.

What all of these various photographers saw Klumb also saw during his travels visiting job sites and construction projects in the course of his work for the CDPW. An early CDPW project, a hospital and the residences for the head doctor and nurse, took him to Ponce on the south side of the island, at least one time by air from San Juan. There were also one hundred twenty seven rural school master plans scattered throughout the remote countryside, for which he acted as a CDPW consultant architect and chief designer, and seven housing project locations with approximately 796 housing units likewise scattered throughout the island. An important educational project, the Industrial Vocational Schools, took him to three of Puerto Rico's largest coastal cities: Arecibo on the northwest coast, Mayaguez on the far west coast, and again to Ponce. Travelling by car with other CDPW employees, Klumb had an intimate, close to the ground view of life far afield from the San Juan metropolitan area. And when he occasionally traveled by air, he had a panoramic view of the island's coastline and countryside as well.

There is another possible explanation for Klumb's collection of photographs and images of life in Puerto Rico. Through these photographs and images Klumb can be seen to embrace the

²³ Klumb, "Committee on Design of Public Works, Work Performed as Architect-Consultant, June 46 to June 48."

²⁵ Klumb, *Committee on Design of Public Works: 1944, 1946-1948*.

Jibaro hut as a complex symbol that was embroiled with the three tenets inherent in his core architectural principles: higher values, an architecture of social concern, and man is the measure of all things. As a symbol, these shacks represented the problems of substandard living conditions, a lack of economic opportunities, and the dearth of government services to the rural population, among other problems. That was the view of the sympathetic Depression era and wartime documentary photographers who made their way to Puerto Rico. Thus these huts stood for a host of problems that could be solved by an architect who espoused higher values and an architecture of social concern. On the other hand, through the indigenous images of Puerto Rico, Klumb may have also taken a highly romanticized view of the Jibaro hut as emblematic of the rural people's simple way of life, a life which he saw as intimately integrated with nature. In this sense these structures were a testament to the local population's abilities in place making under adverse circumstances. Here people (the local population) were the measure in the way they were able to shape the environment to organically improve their condition. A family could provide for themselves by farming even the most inhospitable terrain. With only a few building materials, they could also have a home, and with enough likeminded people, they could have a community. Puerto Rico's environment was such that so much could be done with so little. "Just four walls and a roof – and in this climate – just a roof" was all that was needed, Klumb remarked.²⁶

The local population's humble dwellings, then, were not only symbolic of the problems afflicting the people of Puerto Rico, they were also the inspiration to the solutions to some of these same problems, and something Klumb developed a great fondness for architecturally. In thinking about the most elementary aspects of building, what he called "the pattern of architecture," Klumb once noted,

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²⁶ Klumb, "Writings," 310.

"The true basis is in those indigenous structures, in the humble buildings, which are to architecture what folklore is to literature or folk songs to music. [...] These traits of a structure are national – of the soil, their virtue intimately related with environment and with the habits of life of the people."²⁷

In considering Klumb's relationship to the *Jibaro* hut, it is a testament to his admiration of this island place and its people that he so intently looked to their vernacular architecture for inspiration, a vernacular architecture tradition that originated far from where he was born. Like Klumb's buildings, those images of indigenous life in Puerto Rico that he included in his pamphlets were the products of outsiders looking at the island's local life and culture. Hence Klumb gave the images of vernacular architecture equal prominence with his earliest and provincially most well-known projects. But this episode is both past and prologue. That is because with these indigenous images in mind Klumb proceeded to transform the *Jibaro* hut into modern, reproducible versions in a number of CDPW projects and in select residential designs in Puerto Rico.

The Jibaro Hut Reimagined through the Teacher's Farms

Upon arriving in Puerto Rico on February 25, 1944, Klumb became the head of the General Designs Section of the CDPW.²⁸ Klumb's tenure as design section chief was brief. He stayed in this position just under nine months, from late February to mid-November, before moving on to private practice on the island. Even though it was a short time span, the office was very productive during Klumb's tenure there. From late February until early August, Klumb's staff completed three major projects: a proposal for a series of low-income housing units, the design

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²⁷ Klumb, "On Tropical Architecture," 2.

²⁸ On Klumb's arrival date of February 25, 2944, see Hampton (Acting Director, the Division of Territories and Island Possessions, the Office of the Secretary of the Department of the Interior) to Klumb, letter dated 4 February 1944.

of an open-air performance space, and the design of a two-story office building for the CDPW.²⁹ Meanwhile, the demand for work was only increasing. Indeed, by mid-August the staff was almost finished with six additional projects.

On August 16, 1944, Klumb's design section published a series of design packages for six public works projects. These projects consisted of the following:

- "A Plan for Rural Schools"
- "A Plan for Teacher's Farms"
- "A Plan for School Lunch Units"
- "A Plan for Social Community Halls"
- "A Plan for a Lending Library and Store"
- "A Plan for Rural Public Health Subunits"

On the same day that his office published these packages, Klumb also produced a two-page, memorandum to accompany the projects and explain the general rationale behind the designs. The memo is noteworthy for two fundamental reasons. One is that it points to the importance of the vernacular in Klumb's mind. Klumb saw value in the simple buildings of Puerto Rico's rural population. Where others might have rejected the *Jibaro* hut as a substandard dwelling and structure, Klumb thought that a number of these buildings' features were worthy of being emulated and reproduced using modern building materials, construction techniques, and design sensibilities. The other reason the memo is noteworthy is that in the concluding paragraph on the memorandum's second page Klumb singled out two of the six projects as most indicative of his overall aims. They were the Rural Schools and the Teacher's Farms.³⁰

In this August 16, 1944 memorandum Klumb stated that all of the six proposed building

²⁹ The first of these three projects, the Zero-Plus Housing was a key precedent for the subsequent six projects of August 16, 1944. The open-air performance space was a band shell for a traditional Puerto Rican guitar quartet. See Klumb to Guillermety, Jr., CDPW internal memorandum dated 10 August 1944.

³⁰ Klumb, CDPW internal memorandum dated 16 August 1944.

types aimed to address a set of somewhat different yet interrelated conditions. On the one hand there was the immediate need for basic infrastructure (buildings) in order to provide essential services to rural communities. On the other hand there was another problem altogether, as Klumb stated it, "what to do with the oversupply of manual labor" throughout the island. Between providing improved buildings and much needed services, and putting willing hands to work, as far as Klumb was concerned, the latter was in fact the more pressing problem. Fortunately, Klumb thought, the solution to one problem could be leveraged to also address the other. The way to do this was to strike a balance between "local methods and materials," and modern industrial means. But striking just such a balance would not be easy. Even though the many advantages of applying industrial means towards real-world problems were alluring (including architectural problems in general, and housing and public works in particular) such means were not always appropriate in light of local conditions. Among the most pressing of local conditions was where and when (1) industrial means were not firmly established, (2) modern materials were not abundantly available, and (3) such projects were cost prohibitive. Such was the case generally in Puerto Rico, which was still in the early stages of industrialization, but especially in the island's rural areas. Thus, Klumb thought, the full weight of industrialization would someday have a great effect throughout all of Puerto Rico, but not just yet.

In the meantime, these six design packages would make allowances for both approaches (using either modern materials and methods or local ones) by providing two distinct options in terms of construction methods. As Klumb detailed in the memo, one option relied upon "complete reinforced concrete structures of economical spacing and dimensions." A second option advocated for a mix of more durable and/or modern materials (specifically stone, concrete

³¹ Ibid.

block, or reinforced concrete) and local materials "which can be had at the cost of labor only."³² Having very briefly established these simple parameters, Klumb then pointed to the Rural Schools and Teacher's Farms as models for all of the six proposed designs. Between these two projects, however, it is the Teacher's Farms project that stands out as an important precedent in the course of Klumb's residential practice.

The rationale behind the Teacher's Farms was that providing the physical structures (the schools) was not enough to fill the void of educational resources in rural areas. It was just as crucial to supply qualified teachers.³³ Thus the farms would serve to alleviate the burden of a teacher who would presumably have to relocate from one of Puerto Rico's larger cities or even from the United States to raise educational standards throughout the island's rural areas. The farms would also serve as an incentive for a local resident to gain the required education and qualifications in order to return to their community and teach at the local school.

The end results of the Teacher's Farms followed, as previously stated, two distinct approaches. In the first approach, demonstrated in figures 5.7 and 5.8, Klumb and his staff designed a set of very basic domiciles – functional, economic, unadorned, but sensibly laid out homes – that were dependent on the modern industrial materials and construction methods available in Puerto Rico at the time.

These buildings were one and two-bedroom houses with concrete block walls, louvered windows, a concrete slab-on-grade foundation, and a low-angle gable roof made out of thin

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The Teacher's Farms projects were part of a broader outreach effort by the Puerto Rican government. The farms had their origins in a 1941 law establishing a "commission to study the problems of children without schools." In its report two years later to the governor and the legislature, the commission recommended and subsequently gained authorization to provide alongside each rural school "a dwelling house for the teacher and a parcel of land to be cultivated by him." It fell upon the Land Authority of Puerto Rico to establish, manage, and maintain these farms, which included providing the teachers with farming equipment, tools, and supplies. See "Act No. 14, Approved April 14, 1943" in the General Design Section of the CDPW, "A Plan for Teachers' Farms."

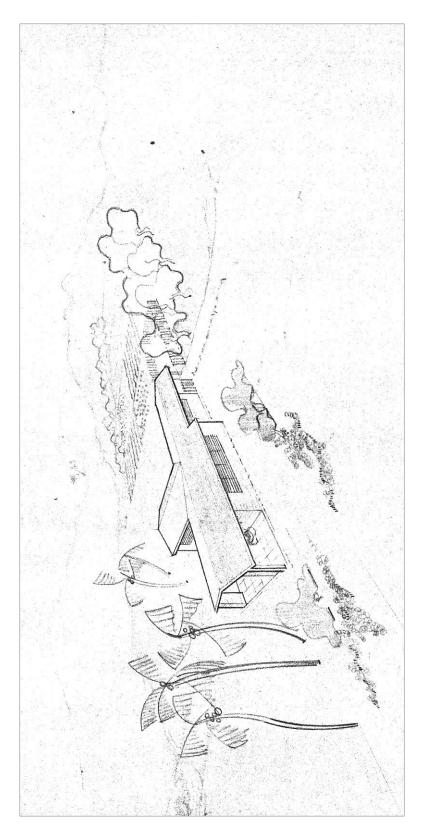


Figure 5.7. Aerial perspective, the Teacher's Farms in concrete. Drawing by Henry Klumb/the General Design Section of the CDPW, courtesy of the AACUPR.

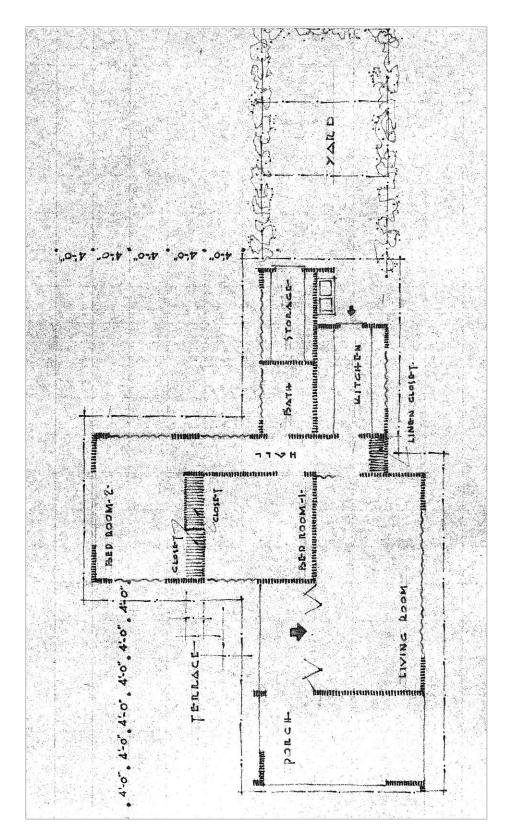


Figure 5.8. Floor plan, the Teacher's Farms in concrete. Drawing by Henry Klumb/the General Design Section of the CDPW, courtesy of the AACUPR.

precast concrete panels. Each house had a covered porch, an adjoining animal pen, and a small terrace. So, in the first house that he designed for Puerto Rico, Klumb replaced the *Jibaro* hut by making notable transformations to it. The roof retained its basic shape, although concrete panels were to replace the traditional thatch or corrugated metal sheets. The slab-on-grade foundation and the concrete block walls supplanted the rudimentary wood structure and building envelope. By doing this Klumb was able to go beyond the simple four corner configuration and the basic one or two room layout. It also brought the house's foundation in direct contact with the ground, enabling Klumb to make immediate and integral connections between the inside and the outside. In the two-bedroom configuration in particular, each of the three short wings of the house was directly linked to one of the three key outdoor spaces – the covered porch to the living room, the bedrooms to the terrace, and the kitchen to the animal pen. Consequently, this two-bedroom house was as much oriented to its outdoor elements as it was to a simple tripartite division of public, private, and service spaces.

The second approach to the Teacher's Farms was an amalgamation of the first approach detailed above, the *Jibaro* hut, and a number of innovative new features that relied heavily upon what Klumb termed "native materials" This approach, illustrated in Figure 5.9, borrowed sparingly from the first one, specifically in its use of concrete block walls solely for a kitchen and bathroom service core, a concrete slab-on-grade foundation, and very thin (2½" thick) precast concrete panels for the roof (in this case the panels are internally reinforced with a wire mesh). Next, it was in its superstructure that the building increasingly resembled a *Jibaro* hut. This is because the building frame consisted of field stripped sugar cane for columns, and beams and supporting members for a trussed roof; and of thin sugar cane branches to support the precast concrete roof panels. Then, in the building envelope, Klumb subtly altered the *Jibaro* hut model.

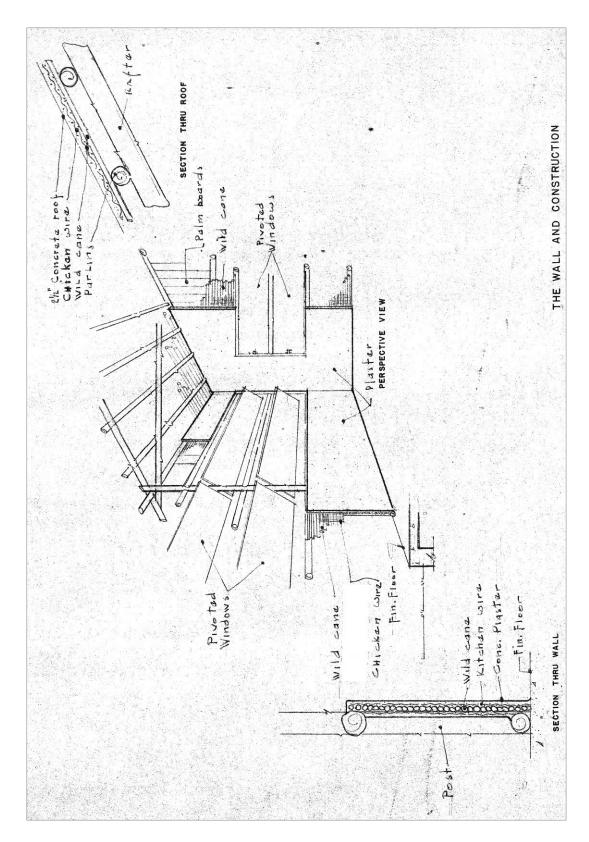


Figure 5.9. Details, the Teacher's Farms in native materials. Drawing by Henry Klumb/the General Design Section of the CDPW, courtesy of the AACUPR.

Under normal circumstances, a *Jibaro* hut was simply clad with wooden planks. Since that was the extent of the building envelope, the same wooden planks formed the interior wall surfaces as well. Consequently, as the boards were rough-hewn and affixed by the local population rather than a professional construction force, it was not uncommon to see the cracks in between the boards. In Klumb's version of this vernacular dwelling, wooden boards still covered significant parts of the exterior, although in this case they were more precisely machined and aligned both horizontally and vertically. Opposite these boards on the interior of the house Klumb added a more robust, impermeable, and smoother surface composed internally of small sugar cane branches and a wire mesh, and then covered with a thin topcoat of plaster. Along other large sections of the building envelope Klumb devised a series of oversized wooden louvers, or what he called "pivoted windows." When they were closed they ensured total privacy, when open they allowed expansive views and cooling breezes. Overall, then, this second scheme was a Herculean effort on the part of the architect to utilize materials that were readily available, easily manipulated, and very familiar to the local population.

Taken together, both the Teacher's Farm in concrete block and its more rustic counterpart set the stage for Klumb's subsequent houses in Puerto Rico. To begin with, these farms were his first stand-alone house designs intended for the island.³⁴ Next, as the August 16th memo makes clear, both versions of the farms were respectful of and were borne out of the local conditions in Puerto Rico's rural interior. Consequently, as experimental platforms indebted to a preexisting

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³⁴ Before the Teacher's Farms there was one other domestic project designed by Klumb while with the CDPW, but its aims were fundamentally different than those of the Teacher's Farms. That project, the Zero Plus Housing, intended to fill the short and mid-term mass housing needs of Puerto Rico's interior through a series of temporary occupancy, one and two-story duplexes that were to be deployed in clusters of six akin to a small suburban subdivision. The Teacher's Farms, on the other hand, were single occupancy dwellings. The farms also constituted a more long-term commitment to a place, to include a more meaningful relationship with the land, namely cultivating the adjoining farmland and tending to the farm animals there. Finally, while the Teacher's Farms offered clear options between modern and local materials and construction techniques, the units of the Zero Plus Housing project were hybrids of the two. See the General Design Section of the CDPW, "Zero Plus Housing."

local type, both versions of the farms served to reimagine the Puerto Rican house in a modern context. The farm in concrete block did so much more starkly, while the farm composed mainly of native materials and poles offered an even greater contrast to its vernacular progenitor by employing new design elements alongside the *Jibaro* hut's more traditional features. Both versions also established valuable precedents in terms of the importance, form, and material makeup of Klumb's later outdoor spaces. Time and time again in his subsequent houses, Klumb would put his personal stamp on traditional elements such as covered porches and fenced-in yards. Also, although he did not often implement his pivoted windows design in that exact manner in his residential practice, it was an early attempt in a long line of perforated wall designs, and it also presaged his great fondness for open air rooms.

Conceptually, the one major drawback of the Teacher's Farms project was its relationship to the local terrain. As is especially evident in the perspective drawing for the Teacher's Farm in concrete block, these houses were designed to rest on flat ground. Conditions on the ground throughout Puerto Rico would have made this very difficult to achieve on a large scale. That is because, as alluded to in the previous chapter and the dissertation's introduction, the rugged terrain of Puerto Rico's *Cordillera Central* and by consequence the undulating landscape that extends all the way to the coasts is pervasive. These effects make it exceedingly difficult to design a building on the island without making significant allowances for a site's sloping topography. To be sure, there are numerous examples where street segments, small suburban areas, or a central town plaza have been built on local spots of flat ground scattered throughout Puerto Rico. The towns of Caguas and Cayey are two such examples. Both are former Spanish settlements whose city centers have been tucked into bowls inside the island's mountainous interior. But such conditions are the exception rather than the rule. As we have seen, Klumb

would have been aware of these facts, having traveled throughout the island while with the CDPW, including at times by plane over the *Cordillera Central*, flying from San Juan on the northeast coast to Ponce on the south central coast. Even Rio Piedras, where Klumb lived and worked throughout his entire time in Puerto Rico, and the capital city of San Juan are characterized by a sharply rising and dropping micro relief. Regardless, in terms of the expected topography of the Teacher's Farms, Klumb did design the buildings in the abstract. He would readdress this condition in the years to come and design more appropriately to the local terrain in other public works projects as well as in his own houses.

A Return to the More Traditional *Jibaro* Hut through the Low Cost Rural Houses

By mid-November of 1944 Klumb had left the CDPW and soon thereafter, in February of 1945, established his private practice on the island. The built commissions quickly followed. Among the earliest of them were his first house designed solely by himself in Puerto Rico (the Haeussler Residence); a faculty housing block at the University of Puerto Rico in Rio Piedras (the first of several university buildings by Klumb); and the New York Department Store (a long and imposing six-story commercial building). Soon he would also augment his office's growing list of projects by returning to the CDPW as an architect-consultant. In this new role with the CDPW, Klumb and his staff supported an impressive number of government projects. According to an inventory composed by Klumb's office, Klumb and his staff handled 155 projects for the CDPW in a two-year timespan. Most of these, 127 of them, were site plans for rural schools.³⁵

In relation to his private residential practice, one standout project during this time was the Low Cost Rural Houses, which he worked on from August to October of 1946. The intent of this

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³⁵ Other projects that Klumb's office handled on behalf of the CDPW included a number of office furniture designs, worker's housing, a school for girls, and the aforementioned houses for the head doctor and nurse in a hospital in Ponce. See Klumb, "CDPW, Work Performed as Architect-Consultant June 46 to June 48."

project was to provide standardized house plans free of charge through the Office of Permits for the rural working poor.³⁶ The production of these plans by Klumb's office and their release by the Office of Permits coincided with the advent of the government's *parcelas* program, which was a lottery of land lots for the rural population to inhabit and cultivate their own farms.

The success of the Low Cost Rural Houses depended on the principles that Klumb had voiced in the course of the Teacher's Farms and the five other CDPW projects from August 16, 1944. Namely, the Government of Puerto Rico could provide baseline domestic units *en masse* to the island's rural population, and it could do so for the most part just for the cost of labor. As conceived two years prior, the key was to rely on locally available materials and common building practices. Not surprisingly, Klumb approached these houses by designing once again with the *Jibaro* hut in mind, advancing some of the ideas from the Teacher's Farms while discarding others.

The drawings generated during this project indicate that the Low Cost Rural Houses proceeded in three phases. At the conclusion of the project's first phase, Klumb's office produced a single floor plan for a two-bedroom house, shown in Figure 5.10. Immediately there were notable differences from the Teacher's Farms that preceded it. These included a more expansive stone-paved terrace that merged with the path leading away from the house. There were also two water containers – a tank and a barrel – as part of a rainwater collection system (a common practice in Puerto Rico's countryside at the time). The house was now sheathed in corrugated metal instead of wood planks (a temporary experiment he would subsequently abandon). Next, the house had begun to rise off of the ground. The two bedrooms no longer rested on a slab-on-grade foundation. They instead rose slightly off the ground on wooden stilts.

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 $^{^{36}}$ Klumb to Echeverria (*The Architectural Forum*), letter dated 24 March 1949.

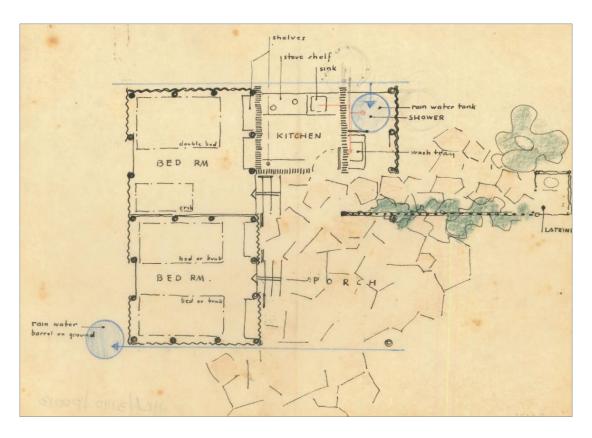


Figure 5.10. Floor plan, the Low Cost Rural Houses (initial phase). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

For now, the kitchen and its concrete block walls would still rest firmly on a concrete foundation. Also for the time being, due to the omission of the pivoted windows the house did not contain an open-air room.

Using the plan from the first phase as a point of departure, in the second phase Klumb designed four different schemes: a one-bedroom, a three-bedroom, and two two-bedroom units. Two schemes are illustrated in figures 5.11 and 5.12. Relying on posts as part of a balloon-frame structure, the houses were now fully off the ground. This eliminated the kitchen's concrete block walls. A more notable change was the addition of a breezeway between the kitchen and the bedrooms, thus reinstating a significant open air room into the houses. Another change was that Klumb more explicitly invoked a 3' x 3' structural-spatial planning grid. In the previous phase, a planning grid was inherent even though it was not explicitly shown.

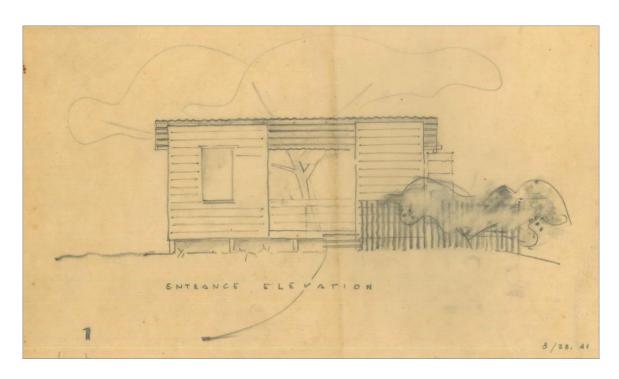


Figure 5.11. Elevation, the Low Cost Rural Houses (phase two). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

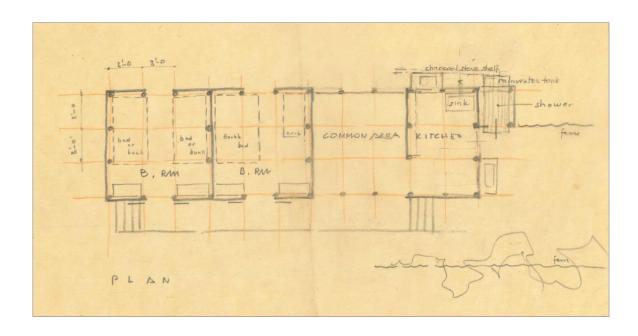


Figure 5.12. Floor plan, the Low Cost Rural Houses (phase two). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

Finally, in the third phase Klumb settled upon seven different schemes ranging once again from one to two and three-bedroom configurations. This last phase took shape first through a series of sketch isometric drawings and plans, and then through a final project document that depicted each of the seven schemes through an isometric drawing, a plan, and four elevation drawings for each house. The perspective and floor plan for scheme number 2 are shown in figures 5.13 and 5.14. Thanks to the work done in the previous two stages, at this point there were very few major changes made to the houses. Two worth noting, however, are changes in the breezeways, and the use of standardized modules for the bedrooms, kitchens, and latrines. In the case of the breezeways, Klumb removed the wood platform between the bedrooms and the kitchen, thus lowering the floor of the breezeways to ground level. This increased the total size of the breezeways and it eliminated the floor as an impediment to the free flow of air. Also, by giving the breezeways a new stone paved floor, it enabled the floor of this space to easily merge

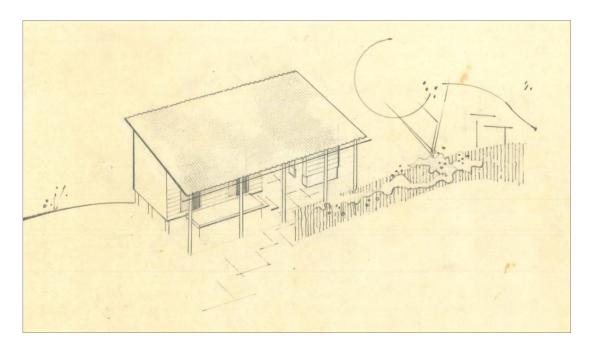


Figure 5.13. Perspective, scheme no. 2, the Low Cost Rural Houses (final phase). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

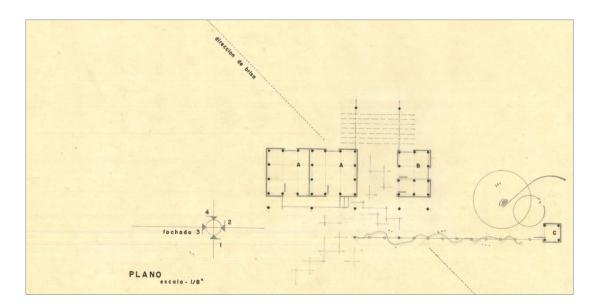


Figure 5.14. Floor plan, scheme no. 2, the Low Cost Rural Houses (final phase). Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

with the path leading up to the house, the nearby terrace/yard, and in selected schemes a covered patio adjacent to the house.

What was significant about the three phases of the Low Cost Rural Houses is that incrementally Klumb's simple country house, which was first glimpsed in the Teacher's Farms, began to revert back to the more traditional *Jibaro* hut. At the same time, as the Low Cost Rural Houses evolved over the three phases, Klumb added more advanced design features and modern sensibilities. Chief among these were Klumb's use of a 3' planning grid and his reliance on standardized modules. Neither of these is particularly novel or modern. Their import relies on how Klumb used them to transform a preexisting local type into a flexible building system. He accomplished this by replacing a static, single spatial unit (the small, one or two room, rectangular structure that comprised the entire house) with an even smaller and simpler unit (the planning grid). The grid then engendered a set of building blocks (the bedroom, kitchen, and latrine modules) and by extension an increasingly varied combination of spaces. Klumb then infused this building system with a greater unity between the building and its immediate

surroundings. This was achieved through his increasing emphasis on outdoor spaces. First, the terrace, the fenced-in yard, and even the latrine were made part of an integrated whole. Each of these elements was in fact integrated into the spatial-structural planning grid, even if these elements stood at a distance from the physical structure of the house itself. More importantly, though, these exterior elements generally responded to the house just as much as the house responded to them. Additionally, the inclusion, configuration, and proposed orientation of the breezeways (at an oblique angle to the direction of the prevailing breeze) spoke to Klumb's continued interest in responding to the external environmental factors in Puerto Rico as well as the design of open air rooms.

Another point to be made in favor of this project was that, whereas the Teacher's Farms took on a decidedly neutral approach towards Puerto Rico's landscape, in their second phase the Low Cost Rural Houses responded more realistically to conditions on the ground. Although the elevation drawing for the one-bedroom unit still shows the house's site to be generally flat, as the ground line recedes in the drawing there is now a hint of the terrain sloping down away from the house. It was a small concession, albeit an important one.

In the final analysis, the Low Cost Rural Houses project was a significant experience for Klumb. Having completed his first two houses in Puerto Rico in the previous two years (the Arneson-Klumb joint project of the Bosch House in 1944, and the Haeussler Residence in 1945) and with many more residential commissions to come, the project served as a brief interregnum whereby Klumb was further inculcated into the ways of life and especially the building practices of Puerto Rico's working poor. Klumb was afforded new opportunities to experiment with the *Jibaro* hut model, adding it to past influences such as his own design experiences in the United States and his understanding of Wright's Organic Architecture. Additionally, the work provided

a counterpoint to the many building styles already prevalent on the island (e.g., Spanish Revival, Art Deco, the increasingly influential International Style, the emerging Levittown suburbia, and even the Prairie Style). Through the Low Cost Rural Houses project Klumb established a personal precedent in which he made major concessions to this particular island place and its people. Klumb would leverage the concessions from this personal precedent in making a statement over the course of his career as to how he believed life should be lived in Puerto Rico, and how the built environment should respond in kind.

Architectural Analysis: The *Jibaro* Hut in relation to Klumb's Modern Stilt Houses in his Private Residential Practice

In investigating the overall impact of Klumb's sense of place on his houses, several of those houses presented a mystery, namely those houses that sat on difficult, hilly, or steep sloping terrain. (This is the same terrain that we saw in Klumb's mutual engagement of the grid and the landscape in the previous chapter.) Klumb designed many of these houses to rise up on *pilotis* (slender, cylindrical concrete columns), and to project upward and outward over their sites. The mystery lay in that this approach would seem to contradict a common practice of architects with a strong affinity with a site, landscape, or region. A common thread in the works of such architects is that their buildings do not touch the ground lightly, but rather typically sit with heavy footprints and thus demonstrate a firm connection with the ground. Often such a close, intimate relationship is symbolized through the building's materiality, particularly the stereotomic material composition of the building's foundation or base, which often relies on brick, stone, concrete block, or cast-in-place concrete. Also, many times buildings such as these have a low horizontal profile over their sites, even when in fact they are tall multistory structures. In many cases the architects who designed these buildings incorporated natural elements (e.g.,

rocky outcroppings, and grass and other vegetation) with the buildings in such a way that the line between the natural and the built is blurred. In many ways, then, these buildings have a firm hold not only of the grounds beneath them but also by extension with their immediate surroundings.

Examples of these kinds of buildings include many of Frank Lloyd Wright's works, particularly his Prairie Style houses and buildings, but others as well. Even a house such as Wright's Fallingwater (1937), which projects dramatically over a small stream and waterfall, is itself securely anchored to a prominent boulder on the site. In fact, the house's cantilevered concrete terraces were designed so as to almost fade back and merge into that boulder and the surrounding forested, rocky outcropping.³⁷ Other modern and contemporary architects and their representative works with tendencies for heavy footprints similar to Wright's works have included Alvar Aalto's Säynätso Town Hall (1952) and the Mount Angel Abbey Library (1970), Mario Botta's Chapel of St. Mary of the Angels (1996), Alvaro Siza's Leça da Palmeira Pools (1966), and Peter Zumthor's Saint Benedict Chapel (1988) and his Thermal Baths (1996).

If Klumb did indeed possess a well cultivated sense of place, then why did many of his houses seem to physically distance themselves from their sites instead of embracing them as other architects were wont to do? The Ewing Residence is a good example of this apparent dichotomy. We know from the previous chapter that it was influenced by topography both far and near, yet in its building profile, shown in Figure 5.15, the house seems to be floating over its site rather than firmly holding on to it through the use of a heavy base. The answer to this mystery can be found in evidence that points to a close relationship between Klumb's houses and the *Jibaro* hut. In this section I explore the principal way that, in houses like the Ewing Residence, Klumb borrowed from Puerto Rico's local building practices and traditions. That way was to emulate the *Jibaro* hut's relationship to the land and simplicity of form.

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³⁷ Levine, *The Architecture of Frank Lloyd Wright*, 229-230.

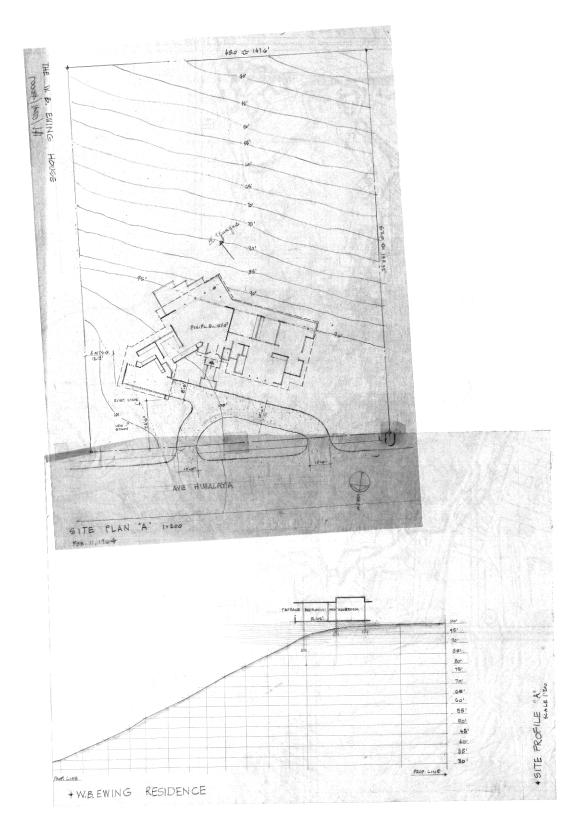


Figure 5.15. Site plan, site profile, and building section; the Ewing Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

Further transformations of the Jibaro hut in Klumb's residential practice

Already we have seen several examples of buildings, structures, and houses that in various ways emulated the *Jibaro* hut type. In this chapter there were the Teacher's Farms and the Low Cost Rural Houses. The Fullana (1954), Evans (1961), and Ewing (1965) residences, and the Tugwell Cottage (1964) from the previous chapter did so as well. One of the best examples of the influence of the *Jibaro* hut form on Klumb's residential architecture can be found in the Benitez Mountain Cottage (1961).

Klumb designed the Benitez Mountain Cottage as a rural retreat outside of the town of Cayey on the southeastern end of the Cordillera Central. The clients were Jaime and Lulu Benitez. Jaime Benitez was the longtime chancellor of UPR-Rio Piedras. The most significant aspect of the Benitez Mountain Cottage was its close resemblance to numerous period photographs depicting Jibaro huts in Puerto Rico's mountains, but particularly to the hut in Edwin Rosskam's 1945 photograph (Figure 5.5 on page 129) that Klumb included in two of his pamphlets, Committee on Design of Public Works: 1944, 1946-1948 and The Office of Henry Klumb 3: Architecture of Social Concern, 1944-1947. These period photographs of the working population's simple dwellings indicate that, in its twentieth century incarnation, the basic structure of these huts was simple for a fieldworker to build, even in the midst of arduous terrain. The building was essentially a square or rectangular, wood-framed, gable-roofed box that sat on top of a wooden platform. The fieldworker sheathed the box with wooden boards and the roof with corrugated metal sheets. Openings were simple and few, often one entrance and one window. The door and shutters were made of the same wooden boards that sheathed the house. Sometimes the windows were left open altogether. Occasionally the entryway was larger than an ordinary door, a wide floor-to-ceiling opening enabling cool breezes to pass through the house.

Siting the house among Puerto Rico's rugged mountains was only slightly more compli-

cated. The fieldworker began the construction process by building a wooden platform with one edge resting either directly on the mountainside or on short posts or blocks. This side was tied into the ground itself – either to a footpath or a road – thus enabling easy access and entry into the house. The other side rested on long wooden posts that at best sat on wood blocks resting directly on the bare ground. The steeper the ground was, the longer the posts.

The *Jibaro* hut's presence throughout Puerto Rico, even in the most remote and seemingly inhospitable topography, was a consequence of its simplicity in design, materiality, and structure. The hut required little to no alteration to the earth. The houses were not terraced into the ground, obviating burdensome earthmoving efforts or a large-scale mobilization of labor. The craftsmanship required to build a hut equated to moderate carpentry skills. The necessary materials were limited to wooden posts and planks, corrugated metal sheets, and basic carpentry materials. There were few if any interior partitions. The exterior walls comprised only of the wooden planks that covered the house. Thus the walls called for no insulation or intricate construction details.

However simple in form, materiality, and required construction techniques it may have appeared, the *Jibaro* hut's ubiquitous presence amidst Puerto Rico's high, steep, and rugged countryside was nonetheless striking. In reference to one of his photographs of a seamstress working at home in the countryside, Rosskam remarked, "The hillside on which her house is built falls so steeply that the house appears to be hanging in midair," adding that behind the house is "an equally steep hill on which tobacco is growing." 38

The Benitez Mountain Cottage was a derivative of the *Jibaro* hut in that it emulated the hut's relationship with Puerto Rico's mountainous topography. From a preliminary site plan of the Benitez Cottage, shown in Figure 5.16, one can see that the cottage emulates the way the

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³⁸ Edwin Rosskam, quoted in Katzman and Brannan, *Re-viewing Documentary*, 112.

Jibaro has a firm footing on the ground on one side of the hut and a commanding view of the surrounding mountains, valleys, and distant low-lying areas on the other side of a hut's supporting platform. These views were not merely aesthetic amenities for a fieldworker and his family. They were directed primarily at his immediate surroundings, at the very farming fields he tilled and were draped precariously over the nearby steep mountainsides. As evidenced by the *Jibaro* hut captured in 1945 by Edwin Rosskam's camera, the relationship between Jibaro huts and their surroundings was a relationship that was oriented towards the multifaceted and specific attributes of its distinct locations, that is, inward to the terrain that is most easily accessible and outward to both immediate and distant vistas. In the case of the Benitez Cottage, the house is in firm contact with the ground on one side, or rather on one corner. Just as with its vernacular progenitor, that point is the easiest entry point to the house. The elevations and floor plans figures 5.17 and 5.18 show that the other three corners of the cottage complete a platform that hovers over the sloping mountainside on stilt-like supports. Thus on the side opposite to the entry the cottage projects out towards a panoramic view of the mountains and valleys southeast of Cayey, and even as far as the ocean. The parallels with the *Jibaro* hut extend to the Benitez Cottage as a simple dwelling that is low in profile, almost square in plan, and contains few rooms.

Klumb diverged from the *Jibaro* hut in the Benitez Cottage in the ways he amended and augmented the type. A major alteration was in adding a multiplicity of materials and construction techniques while still retaining parallels to the original vernacular dwellings. A concrete slab, *pilotis*, and engineered concrete footings supplanted the original wooden platform and supporting posts. At the superstructure, the *Jibaro* hut's basic palette of wooden planks and structural frame, and corrugated metal ceded to full-height glass windows, sliding paneled doors, wood louvers and railings, concrete beams and roof panels, ceramic floor tiles, and a myriad of different wall

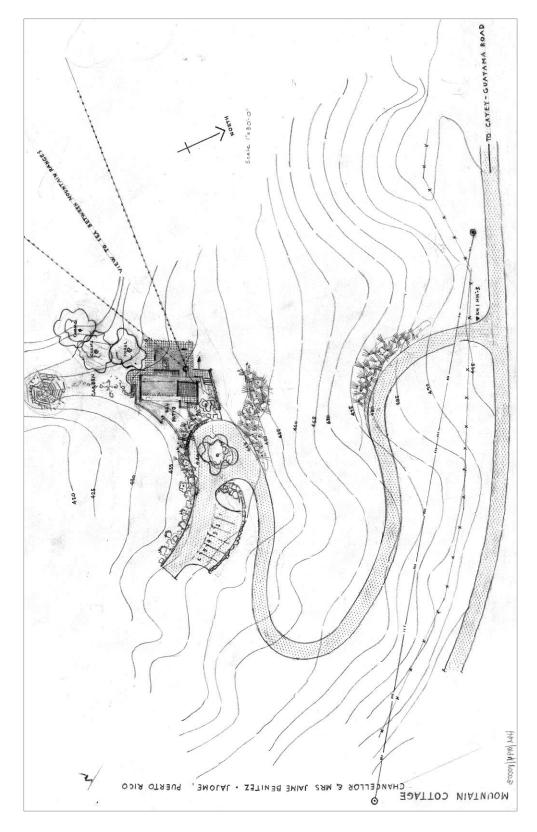


Figure 5.16. Preliminary site plan, the Benitez Mountain Cottage. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

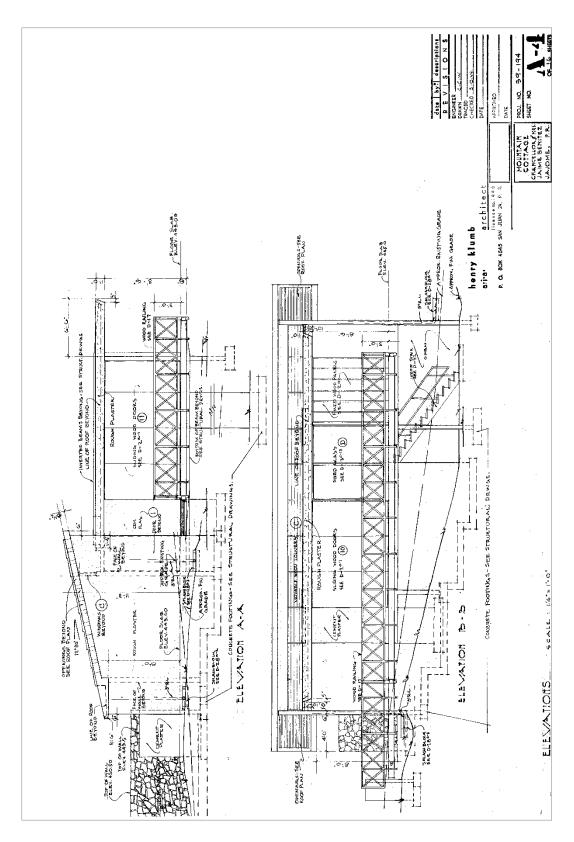


Figure 5.17. Elevations, the Benitez Mountain Cottage. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

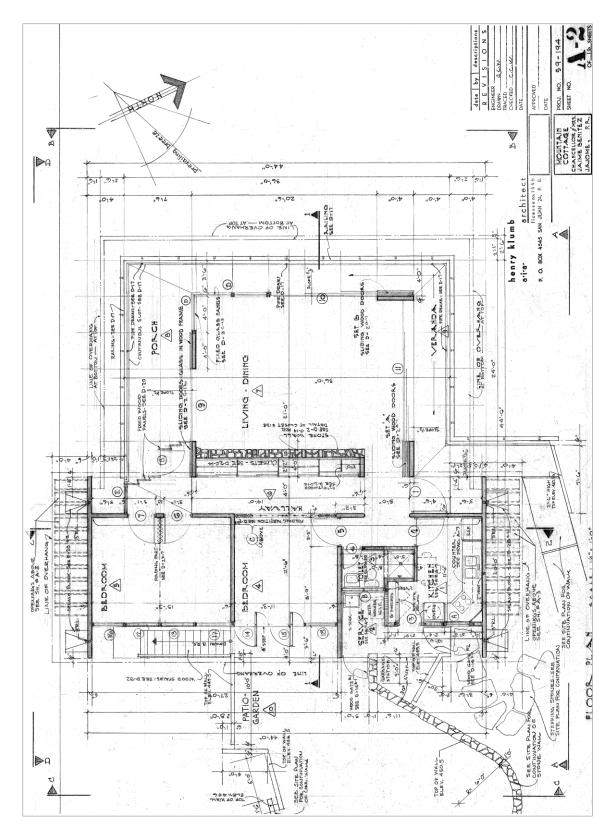


Figure 5.18. Floor plan, the Benitez Mountain Cottage. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

structures and surfaces (concrete, stone, and plaster). But despite the increased complexity of structure and variety of materials, in two principal parts of the Benitez Cottage the design retained a functional simplicity that was true to the spirit of the *Jibaro* hut type. The two principal parts were the cottage's living room and its surrounding veranda.

The living room was akin to a main hall. It occupied a substantial part of the house that projected out towards the landscape, that is, it occupied two of the three points supported by the cottage's projecting platform. Also, through its system of sliding paneled doors and tall glass windows, the living room enjoyed almost wholly unimpeded views of the surrounding country-side in three directions. Due to this transparency and physical openness, the living room was conjoined on three sides with the veranda that surrounded it. Together these two spaces formed a substantial open air room in concert with its surroundings. In their orientation to mountains and valleys beyond the cottage, they satisfied one part of the *Jibaro* hut's bilateral relationship with the outdoors.

No matter how much Klumb amended or augmented the *Jibaro* hut type through houses like the Benitez Mountain Cottage, it is important to reiterate how all of these departures had been foreshadowed by his earlier CDPW projects. In the Teacher's Farms we saw the introduction of concrete panels, concrete block walls, and cast-in-place concrete in lieu of wood posts, platforms, and sheathing. There were also spaces specifically oriented to the guiding hand of the outdoors (that is, to the immediate topography and to the site's vistas) and the expansion of the floor plan beyond the one room building. A greater openness and transparency in relation to the outdoors was only briefly explored in the Teacher's Farms' oversized wooden louvers/pivoted windows. In the Low Cost Rural Houses that Klumb designed two years after the Teacher's Farms, Klumb's principal contribution to a new, reimagined *Jibaro* hut was the

addition or refinement of outdoor spaces that were either absent or haphazardly applied to the huts in the photographs of these dwellings that Klumb inserted into his pamphlets. The most notable additions or refinements were the Low Cost Rural Houses' covered porches and breezeways, and stone-paved, fenced-in patios. Also noteworthy was the way that the stone-paved outdoor spaces merged path, patio, and entryway before each house. These exterior elements were precursors to the many terraces, verandas, stone-walled patios, and cross-ventilated spaces and rooms that Klumb wove into every one of his houses in Puerto Rico.

Whether these many design elements were attributable to the original indigenous rural dwellings or were later adaptations by Klumb, he looked to the local building practices of the Puerto Rican people for ways to inhabit the terrain shaped by the island's rugged mountain interior. In doing so he fashioned a modern stilt house, modern in materiality, structure, the complexity of their floor plans, and physical openness to the outdoors. Beyond the Benitez Mountain Cottage, Klumb's notions of a modern stilt house were also manifest in houses such as at Ewing, Fullana, and Evans, and the Tugwell Cottage, among others. But while these examples under the grid and the landscape in the previous chapter served to exhibit the great variability of Klumb's planning grids, the links between the *Jibaro* hut type and Klumb's modern stilt houses are straightforward and consistent. Whenever Klumb found himself designing a home in the deep countryside, along a ridgeline, or next to a dramatically sloping terrain, he invariably produced a *Jibaro* hut with modern design features and sensibilities.

The import of Klumb's efforts to reimagine the *Jibaro* hut as a modern structure and habitat lies in how highly unusual this was for an architect of that time. In 1964 and 1969 the architects Bernard Rudofsky and Amos Rapoport, respectively, criticized the fields of modern architectural history and theory, and the professional practice of architecture for disregarding the

lessons of indigenous architecture, particularly in the realm of home design and construction. "There is much to learn from architecture before it became an expert's art," Rudofsky wrote, adding that

"Untutored builders [...] demonstrate an admirable talent for fitting their buildings into the natural surroundings. Instead of trying to "conquer" nature, as we do, they welcome the vagaries of climate and the challenge of topography. Whereas we find flat, featureless country most to our liking (any flaws in the terrain are easily erased by the application of a bulldozer), more sophisticated people are attracted by rugged country. In fact, they do not hesitate to seek out the most complicated configurations in the landscape."³⁹

Rapoport's critique revolved around architects having "ignored" and "neglected" the many virtues of what he called "preindustrial vernacular architecture." Some of these virtues he codified under "the characteristics of vernacular buildings." Three of these characteristics were:

- "working with the site and the micro-climate"
- "respect for other people and *their* houses and hence for the total environment, manmade as well as natural"
- "working within an idiom with variations within a given order",42

As a consequence of ignoring and neglecting preindustrial vernacular architecture, Rapoport also lamented the "loss of the common shared value system and image of the world, [...] and generally a loss of goals shared by designers and the public."

Rudofsky's and Rapoport's comments are remarkable in light of Klumb's accomplishments in Puerto Rico. Klumb defied the obviating of nature that both Rudofsky and Rapoport decried. He expressed his defiance through his core architectural principles and the establishment

³⁹ Rudofsky, *Architecture Without Architects*, 4.

⁴⁰ Rapoport, *House Form and Culture*, 1, 2, 8.

⁴¹ Ihid 5

⁴² "working with the site...variations within a given order": Ibid. Emphasis in italics by Rapoport.

⁴³ Ibid., 6.

of the Klumb Foundation. He demonstrated it through his merging of the grid and the landscape. He further practiced it in the modest yet holistic designs of the Teacher's Farms and Low Cost Rural Houses, and then in transplanting the *Jibaro* hut's building-to-ground relationship to houses such as Evans, Ewing, Fullana, Tugwell, Foreman, and the Benitez Mountain Cottage. Alongside this joining with the natural world, in emulating the *Jibaro* hut Klumb also adhered to Rapoport's three precepts cited above.

Klumb's affinity for the vernacular first surfaced twenty-six years prior to Rudofsky's Museum of Modern Art exhibit and accompanying book *Architecture Without Architects*. Six years before encountering the CDPW, *Jibaro* huts, the *Cordillera Central*, and the needs of the Puerto Rican people, Klumb was in the American West and Southwest learning about construction practices predicated on local materials and customs, and then adapting those practices to modern design sensibilities, construction methods, and materials. That is the subject of the next historical episode.

In this historical episode there are highly detailed explanations of, among other things, modular furniture designs, museum exhibits, display room arrangements, and distinguished museum guests. Those details are important for several reasons. First, they demonstrate the genesis of Klumb's interest in vernacular architecture preceding his arrival in Puerto Rico. As the evidence points to this time in Klumb's life as a key turning point exposing him to vernacular architecture, this episode is central to Klumb's as of yet inchoate place thinking. Second, the fine details of this historical episode show that Klumb's initial investigation of indigenous buildings and cultures was no dalliance. It was an immersive three year process. And as a process with lasting personal and professional effects, it is crucial for a complete understanding the process of impressing a sense of place upon Klumb. Third, this lengthy and complex experience allowed

Klumb to apply some of the lessons in place making learned while with Wright at Camp Ocotillo and Taliesin. The most crucial of these lessons was to draw inspiration from the colors, textures, materials, forms, and aesthetics of his surroundings (in this case Native American arts, commercial products, buildings, and landscapes) and then translate those elements into culturally sensitive, modern designs at the various scales of furniture pieces, rooms, museum exhibits, and a building. Fourth, the results of Klumb's efforts during this time were at a grand scale: multiple design projects culminating in two major museum exhibits, one in San Francisco and another in New York City.

Historical Episode Number Three: 1938-1941 Respecting Tradition, Nature, and Context in Native American Architecture

While living and working in Washington, D.C. in the late 1930s, a very important and fruitful opportunity presented itself to Klumb. In February 1938 Klumb obtained a commission with the Golden Gate International Exposition Commission to design displays for a Native American exhibit that was planned for the spring and summer of 1939 in San Francisco. This was the primary project for which Klumb was hired by the commission. No doubt Klumb's prior experiences with the 1930 Princeton exhibits and lectures by Wright, and the 1931 European travelling exhibit on behalf of Wright worked to his advantage in obtaining this commission. A secondary project was to design the furniture for a room (hereafter Model Room no. 1) showcasing Native American arts and crafts in a modern residential setting. The room was to be displayed first in the fall of 1938 at a Native American exhibit in Tulsa, Oklahoma, and then at the San Francisco Exposition. Although these two projects were originally intended as a short-term, temporary job assignment, it became a succession of design projects that lasted from

February 1938 to June 1941. This turned out to be a very busy time for Klumb. This time also gave Klumb the opportunity to work with many local artisans, craftsmen and women, and construction trades at various locations and job sites, resulting in experiences that would greatly augment his sensitivity to different places, and the ways that people and places are linked.

In July 1938 the Indian Arts and Crafts Board of the U.S. Department of Interior absorbed Klumb's initial appointment by the Golden Gate Exposition Commission. With this seemingly inauspicious change, Klumb's supervisor and partner, and the guiding force for the numerous projects to follow, became the Indian Arts and Crafts Board's general manager, René d'Harnoncourt. Through their joint efforts d'Harnoncourt and Klumb obtained other exhibit commissions, re-exhibited large parts of the two initially planned projects, and designed and built an adobe community center in southern Arizona. Their eventual project list during this twenty-nine month period (including the project scope or title, venue, city, and dates) consisted of the following:

- Model Room no. 2, the Intertribal Indian Ceremonial, Gallup, New Mexico, August 1938.
- Model Room no. 1, American Indian Week, Tulsa, Oklahoma, October 1938.
- Displays, signage, and the re-exhibition of the two model rooms, the Golden Gate
 International Exposition, San Francisco, February October 1939.
- Design and construction management, the Papago Tribal Community House, Sells, Arizona,
 April–June 1940.
- Displays, signage, and modern Native American furniture, the Museum of Modern Art, New York City, January—April 1941.
- Displays, signage, and modern Native American furniture, the Pueblo Indian Market,
 Albuquerque and Santa Fe, New Mexico, May–June 1941.

In lending his talents to these projects, Klumb became part of a transformative movement in American culture and government policy. As Susan Mey points out in her history of the Indian

Arts and Crafts Board, the efforts of the Board resulted from a reversal of long-standing policy towards Native Americans. Until late in President Herbert Hoover's adminis-tration (and subsequently through the strength and momentum of President Franklin Roosevelt's reformoriented administration), federal policy in regards to Native American cultures and populations had been one of suppression, marginalization, and hoped-for eradication through assimilation processes that had been in effect for generations.⁴⁴ Mey details several factors that led to a change in the federal government's general policy and gave rise to the Indian Arts and Crafts Board. First was a series of grass-roots efforts in the early twentieth century on behalf of Native Americans living primarily in the Southwest but also in the West. 45 Next, throughout the 1920s there was increased advocacy and a heightened awareness of Native American issues advanced by concerned individuals, progressive institutions, and the print media. 46 Finally, a sea change came about with President Roosevelt's progressive New Deal of 1933. The president's wideranging set of economic and social reforms and programs included a New Deal for Indians. Such an initiative was bolstered by sympathetic and visionary new leadership at the Department of the Interior and the Bureau of Indian Affairs, and it led to the Indian Reorganization Act of 1934. 47 The Act was a landmark piece of legislation, as it marked a turning point from the overt, statesanctioned hostility against Native Americans to a new government position of greater openness, genuine concern, and preserving Native American ways of life.

In Aug 1935 the Bureau of Indian Affairs gained congressional approval to establish the Indian Arts and Crafts Board. ⁴⁸ Two years later René d'Harnoncourt became the board's general

⁴⁴ Mey, More Than Curiosities, 53, 55.

⁴⁵ Ibid., 1, 4-8, 13.

⁴⁶ Ibid., 9-12, 15-22, 29-47.

⁴⁷ Ibid., 8, 54, 70-72.

⁴⁸ Young, "The Revival and Development of Indian Arts and Crafts," 28.

manager.⁴⁹ Klumb's relationship with the Board from 1938 to 1941 presaged and in its essence paralleled his later work with Puerto Rico's CDPW. What was likely spurred by the simple utilitarian motives of seeking gainful employment in public service during hard times led to a fateful opportunity to learn about new places, building traditions, and people and their needs.

The Tulsa, Gallup, and San Francisco Exhibits

Upon being hired by d'Harnoncourt, Klumb's immediate attention turned to Model Room no. 1. The purpose of this modest exhibit was to make Native American products appealing to modern consumers. The hope was that if consumers were attracted to these products, it could be a boon to Native American craftsmen, artists, and communities. This was central to the mission of the Indian Arts and Crafts Board, which was to promote Native American goods for the economic advancement and increased self-sufficiency of its peoples.⁵⁰ D'Harnoncourt and Klumb's vision was to make the furniture and objects in the model room appear to fit seamlessly in a modern home. As such, the products would be modern-Native American hybrids. The products would follow Native American aesthetics through the use of traditional materials, particularly handwoven fabrics, locally produced leather, and common structural wood and decorative wood finishes. Color patterns would also follow the subdued tones found in Native American pottery and rugs. Finally, the furniture was to be made by the young men and women of the Seneca Indian School in Wyandotte, in far northeastern Oklahoma. This last aspect was essential because it would demonstrate the abilities of the local craftsmen and women to be able to produce everyday home furnishings. Also, the furniture had to be designed to the capabilities of the students and of their arts and crafts studios and woodshops.

Klumb took these many diverse elements – the aesthetics, fabrics and structural materials,

⁴⁹ Mey, 86.

⁵⁰ Young., 25-31.

material finishes and textures, and colors that were symbolically and materially a part of Native American culture – and married them with modular, multi-purpose components, machined materials and surfaces, and clean, modern lines. The end products, shown in Figure 5.19, consisted of an upholstered lounge chair and an accompanying ottoman, two end tables, a modular couch, a glass-topped coffee table, a combined shelving-desk-dining room table unit with two chairs, a rug, two wall hangings, a fireplace screen, and various pieces of pottery. Of these, the couch and the three-in-one combination unit were the most innovative. The couch actually consisted of three interlocked seats very similar to the square, cushioned ottoman. The three backrests were inserted into wooden slots behind each of the seats. So if a person wanted they could disassemble the couch into a loveseat, individual seats with backrests, or ottoman-style square seats. The combined shelving-desk-dining room table unit could likewise separate into either three or two individual pieces (the latter consisting of the shelves and a table).

Klumb described the composition of elements as a "modern room providing living and dining accommodations, combining both functions yet keeping the unity of the room." The most intricate furniture piece to manufacture was the lounge chair, with its curvilinear edges and almost fully upholstered exterior. The rest of the pieces depended on basic rectilinear forms and modular components for ease of manufacturing and assembly. In the end, Model Room no. 1 was well received both in Tulsa and later in San Francisco. It was also a source of great pride for the organizers in Tulsa, and the school officials and students who had a hand in the project.

Although Model Room no. 1 was the first project that Klumb turned his attention to for the San Francisco exposition and for the Indian Arts and Crafts Board, very soon after Klumb was hired, d'Harnoncourt directed him to design a similar room for an exhibit in Gallup, New

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⁵¹ Klumb, "Modern Room #1, Indian Products Adapted for Use."

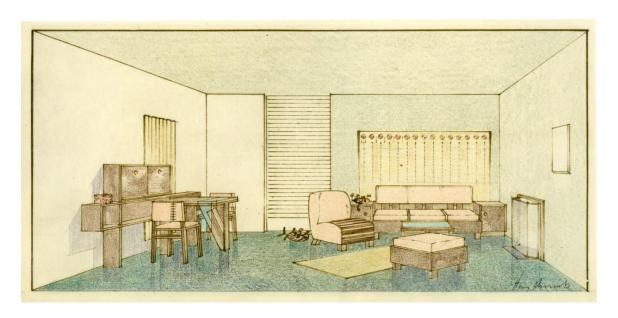


Figure 5.19. Model Room Number 1. Drawing by Henry Klumb, courtesy of the AACUPR.

Mexico scheduled for August of 1938.⁵⁴ Thus the exhibition of this project, subsequently named Model Room no. 2, would actually predate Model Room no. 1 by two months. Fortunately, Klumb was already in the mindset to design the room in Tulsa, and this new assignment merely required him to consider a new set of project details. Among these details was that, whereas the room in Tulsa was to be more broadly representative of Native American arts and crafts, the room in Gallup was to specifically feature and promote arts and crafts associated with the Pueblo Indian tribes of New Mexico. Also, the Gallup room, shown in Figure 5.20, was meant to resemble a living room only as opposed to the combined living-dining room in Tulsa. Similar to the Tulsa room, the furniture was to be made by students from the Indian Schools of Santa Fe and Albuquerque. This necessitated that Klumb travel to Albuquerque to coordinate the production of the furniture. As for the room itself, the shelving and cabinetry retained the basic rectangular shapes already seen in Model Room no. 1. On the other hand, other pieces borrowed from the curvilinear pottery bowls and oversize jugs of the Pueblo Indians. Among these were the sofa

⁵⁴ d'Harnoncourt to Klumb, letter dated 21 March 1938.

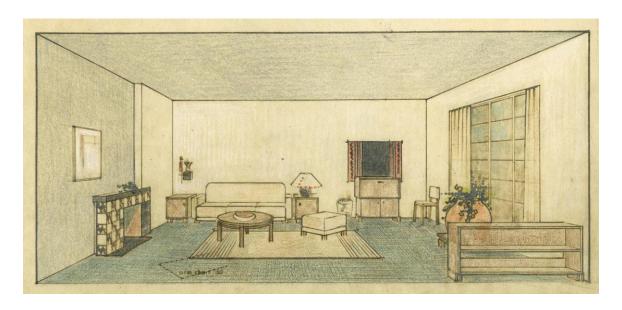


Figure 5.20. Model Room Number 2. Drawing by Henry Klumb, courtesy of the AACUPR.

and an ottoman-style square seat, which utilized more upholstery and had softer, more rounded edges and corners than the square wood frames and top cushions seen in Tulsa. A round coffee table and a table lamp were also evocative of the Pueblo pottery. And lastly, the simple fireplace screen in Tulsa was replaced by a full fireplace and mantle faced with decorative clay tiles from the Zia Pueblo.

A significant aspect of these two early projects was that they marked the beginning of Klumb's education on Native Americans and vernacular building traditions. This education began with gaining an understanding of the geography of the various tribes, their names, and their various regional associations. One map in Klumb's possession listed one hundred eleven distinct tribes spread out across North America and beyond, from Mexico to the Aleutian Islands, Canada, and Greenland. Another map listed a staggering number of tribes and Eskimo clans – over three hundred fifty. Among the mapped regional groups around the United States were the Woodsmen of the East, the Hunters of the West, the Desert Dwellers, the Fishermen of the Northwest Coast, and the Plains, Navajo, and Pueblo Indians. A map of New Mexico was

equally instructive on the many Pueblo Indian tribes within the state, which was useful for the work of Model Room no. 2 and the two later exhibits in Albuquerque and Santa Fe. Publications from the Department of the Interior were also informative about Native American silver arts and crafts, and hand-woven textiles. There was also a three page information paper from the Department's Bureau of Indian Affairs on adobe construction. This would turn out to be valuable to Klumb later when he was designing and building the Papago Tribal Community House in Sells, Arizona. Among the many bits of useful information that Klumb was amassing, he noted the different house types of the Native American groups with whom he was becoming familiar:

> "Snow & ice igloos – Eskimo Elaborate, highly developed wood structures – Northwest tribes Cliff dwellings and adobes – Pueblo Tipis of skin and matting [illegible] – Plains Bark long house – Iroquois Grass lodges – Wichita Mat houses – Southern tribes, Kickapoo, etc."55

All of this information was crucial for Klumb to support the biggest project of this commission, the San Francisco Exposition. The overall organization of the exhibit depended on it, as did the display of the many cultural objects, and the signage and graphics depended on it, such as those shown in Figure 5.21. All the while, as Klumb was systematically assimilating valuable information about various peoples and lands, he was also investing himself in these foreign cultures and their places. Klumb's activities during this learning process are worth noting. In studying the literature and maps, and familiarizing himself with the various cultural objects and works of art, he was approaching numerous groups of people and their various places through secondhand sources or media, often from a distance. As he worked more closely with

⁵⁵ Klumb, "Handwritten note listing seven Native American house types."



Figure 5.21. Native American displays, the 1939 Golden Gate Expo. Image courtesy of the AACUPR.

Native American artisans and craftsmen in the production of the model rooms, and as he witnessed the sights, the rituals, the customs and traditions on display in Gallup's Intertribal Indian Ceremonial, the evidence shows his growing, general concern for different people and their places. Then later, as he took those impressions from the people he met and worked with, and the places he visited and experienced, he was able to create representations of those people and places through the San Francisco, MoMA, Albuquerque, and Santa Fe exhibits, and he even engaged in place making through the Papago Tribe's Community House in Sells, Arizona. These

were all seminal experiences that had a bearing on Klumb's evolving appreciation for places in both immediate and long lasting ways, in the case of the latter as we have seen with Klumb in Puerto Rico in the mid to late 1940s. His experiences also demonstrated a marked contrast to the respect for Native Americans and their cultures that Wright granted so begrudgingly in "Arizona" and "To Arizona."

* * *

Returning to the narrative of the key events, people, places, and experiences, after the model rooms in Gallup and Tulsa, Klumb turned his full attention to the San Francisco Exposition. Throughout this time Klumb had been doubly busy designing model rooms alongside the main exhibit's display cases, room floor plans and wall layouts, signage and raised lettering for the exhibit walls, exhibition seating, and the cabinets and furniture for an exhibit sales shop. In the end, the exhibit was a highlight of the much broader Golden Gate International Exposition. D'Harnoncourt reported that 1,500,000 people had visited the Native American exhibit.⁵⁶ Visitors came from throughout the United States, and included museum directors and staff members, foreign dignitaries and royalty, senators, governors, academics, anthropologists, architects, magazine publishers, the head of the Mormon Church, the U.S. Postmaster General, the Hollywood stars Douglas Fairbanks, Jr. and Mary Pickford, New York City Mayor Fiorello LaGuardia, and even First Lady Eleanor Roosevelt. The public's praise for the exhibit was effusive. Many of these visitors took special note not only of the objects under display but also of their manner of presentation and the arrangement of the entire exhibit. In other words, they had taken notice specifically of Klumb's work.⁵⁷

⁵⁶ d'Harnoncourt, "Activities of the Indian Arts and Crafts Board since its Organization in 1936," 35.

⁵⁷ "Comments by Distinguished Visitors," "Comments Made by Museum People," "Signatures of Distinguished Visitors," and Eleanor Roosevelt, White House Statement.

Klumb in Sells, Arizona

In the months following the San Francisco Exposition, as part of the ongoing work of the Indian Arts and Crafts Board, d'Harnoncourt secured a building commission for a community center for the Papago Indian tribe of southern Arizona. While it was one building in a very remote part of the country for a relatively small and little-known group of Native Americans, d'Harnoncourt saw this project as an important symbol of the cooperation possible between the Department of the Interior and the various Native American tribes. Once d'Harnoncourt secured the commission, the project moved at a highly accelerated rate, primarily because of budgetary and time constraints. The project lasted from late March through June 1940, with Klumb being brought into the project in the second week of April, and the official dedication of the building conducted on November 9, 1940.⁵⁸

Already in place before Klumb proceeded to design the building, the Papagos had recently built new baseball and football fields, and a rodeo arena. From the outside, Klumb's design, shown in perspective in Figure 5.22, resembled a traditional Southwestern dwelling in many ways, due to its adobe brick walls, small square windows, simple geometrical forms, and its low profile. The site plan depicted in Figure 5.23 shows that the building sat on a long plot of land that was oriented along an east-west axis and on the north side of the main road that runs through Sells, Arizona. It was one of the few roads in town. A long, six foot high adobe wall ran along the entire property behind the building. Fences made from the branches of ocotillo plants extended east and west from the building before turning south and connecting with the front property wall that was made of mesquite wood, thus creating a large courtyard in front of the

⁵⁸ Vigeant to Hall, letters dated 30 March and 1 April 1940; d'Harnoncourt to Klumb, letter dated 9 April 1940; and Klumb to d'Harnoncourt, letter dated 5 June 1940.

⁵⁹ "Papago, the Desert People, Cling to their Ancient Ways but Adapt Themselves to Modern Methods Too," 3.

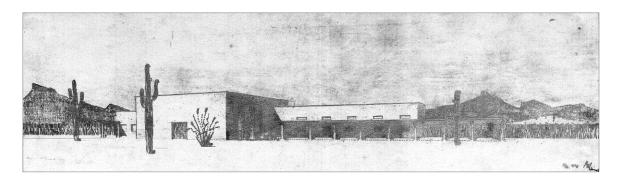


Figure 5.22. Perspective, the Papago Tribe Community House, Sells, Arizona, 1940. Drawing by Henry Klumb, courtesy of the AACUPR.

building. In the courtyard and around the building there were various native plants. All of these elements pointed to a design that cherished tradition, nature, and context. Indeed, it mattered to Klumb a great deal that the building was suitable to its people and the place where it was to sit. As the building was nearing construction, Klumb remarked to d'Harnoncourt, "I am convinced that we are going to have an excellent building. It looks well, extremely well already, the way it sits, unpretentiously part of the country."

Upon closer inspection of the building, shown in plan in Figure 5.24, one begins to see both Klumb's modern sensibilities and Wright's influence. The centerpiece of the community house was its central auditorium. Measuring 38'6" in width and 56' in length, this communal meeting space dwarfed most rooms of comparable adobe brick wall construction. Only the old Mission-style churches of the Pueblo Indians were able to approach such proportions, but only at higher ceiling heights, slightly narrower main halls, and with roofs of a thin membrane made of light-wood construction. Klumb was able to preserve the low profile of traditional adobe brick walled dwellings through the use of four large girders, which can be seen in the auditorium perspective in Figure 5.25. These girders were built-up wooden structural members that were far more intricate, stronger, and able to span longer distances than could the *vigas*, or large wooden

⁶⁰ Klumb to d'Harnoncourt, letter dated 5 June 1940.

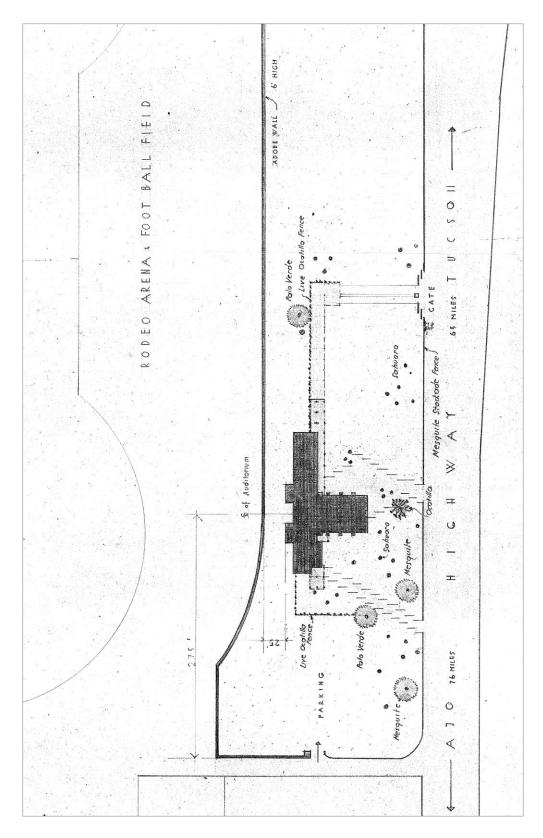


Figure 5.23. Site plan, the Papago Tribe Community House. Drawing by Henry Klumb, courtesy of the AACUPR.

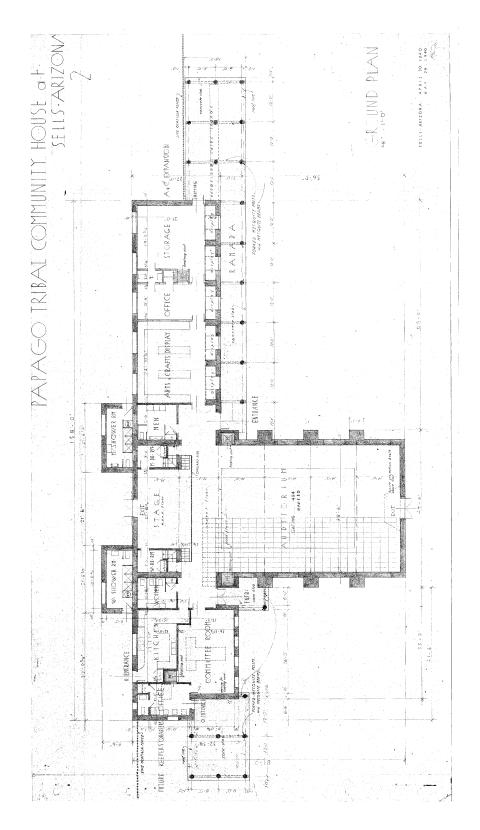


Figure 5.24. Floor plan, the Papago Tribe Community House. Drawing by Henry Klumb, courtesy of the AACUPR.

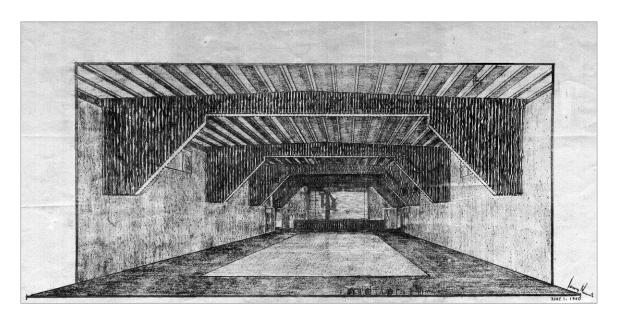


Figure 5.25. Perspective, the Papago Tribe Community House Auditorium. Drawing by Henry Klumb, courtesy of the AACUPR.

logs, used in traditional adobe construction. The girders rested on eight external buttresses sheathed in adobe bricks, which almost seamlessly integrated them with the adobe exterior of the building. Though the building met the Papago's "need for a general meeting place, an office for tribal records, and a social center," the auditorium itself facilitated "school plays, large tribal meetings, movies, and dancing." In addition to these amenities, the building also included men's and women's showers, a room to display Papago arts and crafts, and a conference room. The Sells community house reflects a number of lessons that harken back to Klumb's time with Wright, particularly lessons related to desert colors, surfaces, textures, forms, and vegetation. Wright's influence on the design was also evident in the building's T-shape, which echoed Wright's pinwheel arrangements of his Prairie Style houses from the turn of the century. Likewise, the manner in which Klumb inserted the auditorium's heating units in two of the structural buttresses was reminiscent of Wright's revolutionary (for the time) integrated building design of the Larkin Administration Building in 1908. Klumb's extensive knowledge of Wright's

⁶³ "Papago," 4, 5.

works – knowledge gained both firsthand and through numerous publications – made him thoroughly familiar with these aspects of his buildings. These design elements in Wright's buildings were well documented, especially in Wright's 1910 *Wasmuth Portfolio* and in his later "In the Cause of Architecture" magazine articles. But it was the auditorium as a clear spatial centerpiece that harkened back to Wright in the most direct way.

In many of his buildings throughout his career Wright had given special emphasis to one central space. Wright referred to this approach as indicative of the idea of "the room itself," which meant that a room or principal interior space could and should act as a singular force directing the architecture throughout a building. ⁶⁵ In the Larkin Building it was the central work space, a brick and concrete cathedral-like hall with windows high overhead and that was filled with managers, secretaries, clerks, and other office workers. At the Unity Temple it was the concrete, plaster, and stained glass main worship hall. At the Robie House it was the living room, which was enclosed in brick, concrete, plaster and wood trim, and a long series of casement windows. Many years later, in his Guggenheim Museum, almost the entire building would be composed of one space, that is, the central atrium enclosed by the spiraling, cantilevered concrete ramp, and the thick, white, angled walls where both the art hangs on the building's interior and also forms the exterior building envelope.

The idea of "the room itself" was an overt and recurring act of place making on the part of Wright. In thinking of a room as a meaningful center of activity and daily life (i.e., a place), he could then extend the same design decisions made for that room to the rest of the building, thus making the building a true "entity," or an integrated whole. ⁶⁶ In the community house's auditorium, Klumb followed suit. The auditorium was the quintessential, simple adobe dwelling on the

⁶⁶ Wright, The Future of Architecture, 12.

⁶⁵ Wright, An Autobiography, 154; and Wright, The Future of Architecture, 195-196.

outside, an impressive open, communal space on the inside. From the auditorium flowed its two wings of subordinate rooms, hallways, long covered porticos, and finally the Sonoran desert.

The Papago's themselves were pleased with the results of their new community house. A contemporary account of its opening ceremonies – which was attended by the U.S.

Commissioner of Indian Affairs – described the building as follows,

"One of the most attractive examples of native construction in the Southwest, it is almost entirely Papago and yet is representative of some of the best trends in modern architecture. The needs of the Papago guided the architect in his plans, so that the finished building is simple, functional and beautiful. The Community House is a long flat one-story building, blending with the semi-desert surroundings. The ocatilla, mesquite, sahuaro cactus, and the dry sands of the desert are all part of its construction."

For d'Harnoncourt, the building was a triumph both for Klumb and for his own Indian Arts and Crafts Board. Two years after completing the community house, d'Harnoncourt saw the completed building similarly to the ways the Papagos did. Looking back upon the project with great fondness, he wrote to Klumb,

"The community house on the Papago Reservation, at Sells, that you designed, is not only the first building on any reservation that combines the utilization of local material, local tradition, and twentieth century technique, but it is also a brilliant solution of the problems of creating a large building in the desert that fits its natural surroundings. We realize it is quite an achievement to design a building that fulfills all the demands of a modern community center, with exhibition space, auditorium, and office facilities, and that, at the same time, fits its natural surroundings.

To me personally, your most important achievement at Sells was that you did not choose the easy way of erecting a run-of-the-mill modern structure and

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⁶⁷ "Papago," 5.

disguise it with a few native elements – a method which is used so frequently and always looks artificial and inefficient. Your approach, in studying the actual opportunities offered by native material and native tradition, and incorporating them into a modern building, is the only one I know that is efficient and has artistic integrity."

Following the completion of the community house in Sells, d'Harnoncourt, Klumb, and the staff of Indian Arts and Crafts Board turned their attention to an exhibit at the Museum of Modern Art in New York City. The exhibit ran from January to April of 1941 and featured many of the same items previously displayed in San Francisco. The opening of the exhibit was attended once again by First Lady Eleanor Roosevelt, as well as the Secretary of the Interior and the Commissioner of Indian Affairs. The exhibit was another leap forward in the Board's efforts to promote Native American products. Art that traced its roots to millennia ago took center stage at one of the premier, up-and-coming art museums in the country, and in the largest city in the United States. For a brief time the old and the new, the traditional and the modern, were reconciled in a highly successful way. Finally, Klumb's involvement with the various Native American projects ended with scaled-down exhibits in Santa Fe and Albuquerque in May and June of 1941, immediately following the MoMA exhibit.

Lasting Impressions of the American Southwest and Klumb's Experiences There

Next to the years that Klumb spent with Wright and the lasting influences that time had on him, Klumb's work in support of the various Native American exhibits and the design and construction of the community house in Sells contributed the most to date to the process of impressing a sense of place on him. More than just another paying commission, over time these projects challenged Klumb, first, to learn rather quickly about the history, culture, geography, and artistic

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⁶⁸ d'Harnoncourt to Klumb, letter dated 14 March 1942.

⁶⁹ "Native American Indian Arts Hold the Spotlight in New York," 11-12.

and building traditions of many various but loosely related groups of people that were heretofore quite foreign to him. Second, the projects challenged Klumb to turn that vast amount of knowledge into representations of those peoples and places in the forms of exhibits, cultural objects and furniture, and finally a building design suitable for a people and their unique place. He could not have done this, of course, without the close cooperation of the local construction trades and artisans. As such, this was Klumb's first immersion, and it was a profound immersion, into vernacular cultures, landscapes, and architecture.

Specifically in terms of architecture, Klumb demonstrated an uncanny ability to consider and integrate into his designs aspects that spoke directly to an appreciation of a place's qualities. Among these were, to borrow some of d'Harnoncourt's words from the 14 March 1942 letter above, native materials and building traditions, natural and built surrounding environments, and functionality suited to a specific cultural group. And yet, it was not lost on both visitors and locals that in terms of place making the real triumph of these designs by Klumb was due in large part to the merging of traditional and modern approaches to furniture and building design. These things Klumb would carry with him and later incorporate into his architecture practice once in Puerto Rico.

Just as crucial in impressing a sense of place on Klumb was d'Harnoncourt's role as a guide into this new world of new people and new places, much as Wright had done earlier in introducing Klumb to the natural (or perhaps more fittingly, rustic) worlds of Taliesin and Camp Ocotillo. Indeed, the places and the peoples to which Wright and d'Harnoncourt introduced Klumb left lasting memories and feelings in him. This was especially true of the American desert Southwest, a region where the interrelationships between people and places were evident in their buildings, art, everyday use-objects, and the way that the people had been able to "live in

harmony with their desert surroundings."⁷⁰

In exchanges of letters with friends over the years, Klumb's strong feelings of affection toward this region were clear. In those letters, it is his characterizations of the special qualities of those places that really stand out. When another architect whom Klumb had met in Puerto Rico decided to relocate to Santa Fe, New Mexico, Klumb was sure that he would love that part of the country. Upon settling in Santa Fe, his friend wrote back to Klumb,

"I am most enthusiastic about everything here, the friendly people, the cold, clear, invigorating climate, the smallness and consequently the intimacy that's possible, business prospects and I hardly need tell <u>you</u>, the magnificent mountains, the skies and the great distances. It is all very thrilling."⁷¹

Klumb responded, "I knew you would like the place, the climate, and the people, and work will complete the picture."⁷²

Klumb's fondness for the American Southwest was also understood by his good friend from his days in Taliesin, Steve Arneson. In 1947, as Arneson was traversing the United States searching for suitable employment, he asked Klumb for his opinion on a number of locations. Thinking of Arizona and New Mexico, Arneson said in a letter, "I remember your enthusiasm for that part of the country." Klumb sent along several names for Arneson to contact in Denver, Colorado Springs, and Santa Fe, adding, "I wish I could go along with you on this trip." After visiting the region, Arneson did not share Klumb's love of it. The area was beautiful, sure, but there were too many architects enamored with the place and not enough work to go around. ⁷³ Nevertheless, the draw of the rugged, untrammeled, natural beauty of the Southwest was strong

 $^{^{70}}$ John Collier (U.S. Commissioner of Indian Affairs), quoted in "Papago," p. 3.

⁷¹ Cordner to Klumb, letter dated 11 November, 1947. The underlined emphasis was by Cordner.

⁷² Klumb to Cordner, letter dated 19 December 1947.

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⁷³ Arneson to Klumb, undated letter (c. 25 November 1948, the letter was written around Thanksgiving), Klumb to Arneson, letter dated 1 December 1948, and Arneson to Klumb, letter dated 29 March 1949.

enough in Klumb that on at least two occasions he contemplated a move to Albuquerque. The first such instance was in 1940, while he was in the midst of the various Native American projects and about the time his youngest son Richard was born. Klumb imagined his family spending time in Albuquerque so much so that he produced a preliminary drawing set for a house for him and his family to build there. He named the project "The House for Else Klumb of Sandoval, New Mexico." It was only a paper exercise, but even then Klumb very carefully considered elements of place when designing it. The house would have sat low in the Rio Grande Valley, its front façade facing the famous river just to the west, with its living room and bedrooms arrayed along a lazy arc facing east towards the imposing, sandy-pink Sandia Mountains. The second instance came after an August 1947 trip from Puerto Rico to New Mexico and Colorado, a trip that included a return visit to Gallup, New Mexico's annual Intertribal Indian Ceremonial (for which he had designed Model Room No. 2 in 1938). After his trip, Klumb contacted real estate agents with the intent of buying property in Albuquerque. Although Klumb inquired and visited several properties, nothing else ever came of these inquiries.

It is not entirely clear exactly what Klumb's intentions were in the late 1940s with regard to Albuquerque, whether he meant to leave his new home of Puerto Rico and permanently relocate to New Mexico or simply establish a second home. More than likely it was the latter. In a letter from this time period where Klumb tells another friend about his 1947 trips to Albuquerque and Gallup, he wrote that "I was offered work in Puerto Rico to do planning with a promise that plans would be carried out," adding that "I have had the promised chance here in Puerto Rico to do planning and actual building and have done a considerable amount of work in

⁷⁴ Klumb included the house drawings in his pamphlet *The Office of Henry Klumb: Architecture of Social Concern,* 1933-1944.

the last four years and am still in the middle of it."⁷⁵ By this point in Klumb's life, then, having lived in Puerto Rico for three years, the combination of the people and the place of Puerto Rico were already fulfilling Klumb's need for place dependence. Indeed, at this time Klumb's practice in Puerto Rico had only begun to flourish. With the New York Department Store behind him, the first of many university buildings just getting under way, a steady stream of residences coming his way, and many other religious, private, and government commissions in the works, it is difficult to imagine Klumb turning his back on the most success he had experienced in his professional life so far, successes that far exceeded his time with d'Harnoncourt and the Arts and Crafts Board. Not to mention a real personal affinity that he had just begun to cultivate for the Caribbean island and its people, and his recent move into his five-acre property in Rio Piedras.

* * *

Sometime between the Golden Gate Exposition in the winter and spring of 1939 and the Sells, Arizona project in the spring and summer of 1940, Klumb opened an office in Los Angeles. The move was quite likely precipitated by his new business contacts on the West Coast and the American Southwest resulting from Klumb's Native American projects. From Los Angeles he continued to support projects in the Washington, D.C. area as well as the remaining projects associated with the Indian Arts and Crafts Board. These years in California led to mixed results professionally. He did design and build four houses in Burbank and Los Angeles. Many other jobs, unfortunately, did not proceed beyond the drawing board, proposal, or feasibility study phase, particularly a number of master plans for the Los Angeles City Planning Commission. Klumb summed up these projects by saying, "Everything that was done in Los Angeles was

⁷⁵ Klumb to Disher, letter dated 26 January 1948.

theoretical and ultimately ended in the file. I have no regret leaving Los Angeles." When he did leave Southern California for Puerto Rico in February 1944, Klumb took with him an already well-seasoned sense of place. So far this sense of place had been shaped by a disparate set of places, peoples, and experiences. It had been nurtured and facilitated by Wright and d'Harnon-court. It had its roots in Camp Ocotillo, Taliesin, the American desert Southwest region, and Native American lands and cultures throughout the United States. It grew in the company of various groups and communities, among them the Taliesin Men, the Papago Indians of southern Arizona, and the Pueblo Indians of New Mexico. Later it also found a strong focal point in Puerto Rico, its people, and its distinctive architectural challenges.

⁷⁶ Ibid.

CHAPTER 6: OPEN AIR ROOMS

"A proper surrounding – aesthetically well balanced – can be had in the most humble and under poor economic conditions. It can be had in the open even – under a mango tree."

- Henry Klumb¹

In Klumb's Teacher's Farms and Low Cost Rural Houses projects for Puerto Rico's Committee on Design of Public Works in 1944 and 1946, a key pattern of his houses was emergent in addition to his adaptation of the *Jibaro* hut type. In the several variants of those two CDPW projects we began to see his ongoing experimentations with open air rooms. In the Teacher's Farms in concrete, for example, Klumb incorporated three key outdoor spaces – a covered porch, a terrace, and an animal pen – into one all-encompassing design. The oversized wooden louvers, or pivoted windows, of the Teacher's Farms in native materials ensured total privacy when closed, and allowed expansive views and cooling breezes when open. The Low Cost Rural Houses also advanced the simple *Jibaro* hut to include covered porches and breezeways, and stone-paved, fenced-in patios. To further relate the Low Cost Rural Houses with their surroundings, their stone-paved outdoor spaces linked together each house's patio and entryway with the adjoining public path.

The projects above were merely precursors to what was to become emblematic of Klumb's brand of tropical architecture and specifically the hallmark of his houses in Puerto Rico. While the interplay of the grid and the landscape, and the adherence to a local vernacular in remote mountainous settings were both highly contextual, each of Klumb's houses discussed thus far included at least one of a variety of open air rooms. Oftentimes multiple such places acted in concert with one another. I refer to these areas as open air rooms rather than outdoor rooms for two reasons. First, these areas were responsive to the prevailing breezes at their sites.

¹ Klumb, "Writings," 312.

As such, air is an important element to acknowledge as consequential to these spaces. Second, many of these places were not separate and external to the houses themselves but rather wholly within the building footprint. They were often under overhead cover, and occasionally they consisted of entire floors with few or no walls. They were in every sense of the word rooms and integral parts of their houses.

In this chapter I analyze Klumb's various open air rooms and discuss how they supported a tacit belief in Klumb, expressed very succinctly by the Klumb scholar Rosa Otero, that as much as possible life in Puerto Rico's climate should be lived outdoors.² I precede the analyses of these spaces with the fourth historical episode, where I examine the house that Klumb and his family lived in for almost the entire time they lived in Puerto Rico. In terms of this house, Figueroa and Vivoni have written that it "is probably the most adequate symbol of Klumb's vision of the relationship between man, architecture, and his environment." I will argue that beyond this symbolic role the import of the house lies in two reasons. The first is the tripartite set of elements that comprise my definition of a sense of place – Klumb's beliefs, actions, and feelings toward the house. Second is that the house served for Klumb and for others as an almost wholly unimpeded demonstration of how people can live in places that are free of barriers, both physically and visually, between themselves and the outdoors.

Historical Episode Number Four: 1947-1984 The Klumb House – "An Oasis in a Concrete Jungle"

Klumb's relationship to the house in which he and his family lived in Puerto Rico from 1947 to 1984 is filled with seeming contradictions. It is not a house that he designed, although he made

² Otero, *Permeable Walls and Place Recognition*, 223.

³ Figueroa and Vivoni, *Henry Klumb: Principios para una arquitectura de integración*, 18.

many changes to it to suit his tastes. Unlike his many residential designs, the house was not a modern house. It was a light-wood frame farmhouse that is generally believed to date back to the nineteenth century. As such, at first glance the house bore no immediate resemblance to any one designed by any of architecture's modern masters — Wright, Le Corbusier, or any of the Bauhaus architects — or even Klumb himself. Yet even today in Puerto Rico Klumb is associated with his house just as much as with any church, hotel, university building, or other house that he designed and built. Next, as much as Klumb treasured the house and it became for him a refuge from the pressures of everyday life, sometimes even the tranquility and repose of his house and garden was not enough. On frequent occasions Klumb and his family and friends felt the need to get even farther away from the island paradise of Puerto Rico and retreat and recharge in nearby Caneel Bay, in St. John in the U.S. Virgin Islands. Finally, Klumb's reasons for moving into his house were on the surface purely economic. Indeed, on numerous occasions during his later years, Klumb considered profiting from the site by designing and building high-rise housing units on the property.

Despite the many unusual circumstances associated with it, Klumb's house is the one place that ties him to the island the longest. His tenure there spans almost the entire time that he lived in Puerto Rico. And as old age and declining health slowed him down, as tropical vacations to Caneel Bay became more difficult and rarer, and as fewer commissions trickled into the office, the house was always there to provide comfort, a measure of physical activity walking the grounds and tending to the garden, moments of quiet reflection, and a chance to commune with the property's rich natural environment.

How did this come to be? What was it specifically about the house and its surroundings

⁴ Cassanova and Jensen, "National Register of Historic Places Registration Form" (Narrative Statement of Significance), 3.

that engendered feelings of attachment and belonging within Klumb? In this historical episode I explore how and why the Klumb House evolved from an immediately affordable and potentially valuable investment property to a source of great significance in the world of Henry Klumb. In doing so, we will add to our understanding of Klumb's notions of living in harmony with the world around us and some of the architectural ramifications of those notions.

By way of introduction I will begin with some impressions of the house by some of its visitors and by Klumb himself. Next, I will return to the origins of Klumb's habitation of the house and provide an orientation to the key spaces of the property and the house. Finally, I will relate the Klumb House to the architect's naturalistic worldview.

Impressions of the Klumb House

The Klumb House and the land around it were a showcase dwelling and property. Klumb and his wife regularly entertained friends and on occasion hosted important visitors there. The reactions of their friends and new acquaintances when they recalled the grounds and the building were telling in terms of the effect of the place. One recurring group of visitors was reporters who came to write profiles of the architect. A local reporter described the Klumb House thus,

"He lives in Sabana Llana, in the midst of five acres of trees, plants and flowers. You can hardly see the house. When we get close, we notice that it does not have any windows, almost no walls. The Klumbs live "completely in the open"."

A Progressive Architecture reporter described the house and its environment,

"One is not aware of its [the house's] presence until the very doorstep is reached. There is no exterior in the usual sense of the word – the luxuriant vegetation is the only façade. [...] There is a certain reapproachment, closeness to nature, integrity,

⁵ "Excerpts from an interview given to Julio Marrero," 1. The size of the property varies in several accounts. In my narrative I will adhere to 6.5 acres, as per Cassanova and Jensen. See Cassanova and Jensen, "National Register of Historic Places Registration Form" (Narrative Description), 1.

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and almost naïve rightness about this approach to living that seems the perfect description of both the man and his architecture."

Another group, members of the AIA Chapter of Puerto Rico, enjoyed a chapter meeting at the house, reporting on it in the next organizational bulletin,

"The house nestled among acres of trees, plants, and gardens has been for years the admiration of those who have visited them. [...] Henry's sincere, informal words to a standing circle of guests, in an open garden, was the climax of the evening. For those who had never been there, or had met Henry before, it was a "myth" come true and the musical background of the *coquí* was the final touch, for it made us feel closer to nature, and that was what our host wanted to point out to us."

One last observation came from Klumb himself, who remarked on a variety of subjects to an *Architectural Forum* reporter. Klumb said,

"I enjoy my own porch when the rain blows in. I just move a little. This is part of the constant change of nature, its vitality. This is proper human experience...the longer you live, the more that you want to enjoy the natural phenomena that surround you. Before I arrived at Frank Lloyd Wright's, I was a little soft myself, too. I had been brought up in a city, and a raindrop would alarm me. But a gradual acceptance of nature becomes in the end a *need* for nature. Without that I couldn't live any longer."

I cite the last passage for the third time in this dissertation, although the first time in full, because in it Klumb makes clear what others saw as the defining qualities of the house. These are the house's openness and its close association with specific natural elements. These associations are quite overt, of course, but they become even more meaningful as we delve further into the history of Klumb and this house, and into the details of the house itself.

⁶ "From the Office of Henry Klumb," 111.

⁷ The Puerto Rico Chapter of the AIA, "Bulletin No. 2," 2.

⁸ "Klumb of Puerto Rico," 88.

An Early Personal Transition for Klumb in Puerto Rico

Klumb and his family moved into this eventual longtime family home on Saturday October 18, 1947, almost two years and nine months after he arrived on the island. Prior to moving into the house, since May 22, 1944 Klumb had rented a house in south central Santurce, at 455 Calle Sagrado Corazon. The move from one house to another was precipitated by simple, practical matters. The owners of the house they were renting in Santurce decided to sell it. Their new home, known as the Fog Cody Ranch, was available at a good price relative to other properties around San Juan. Thus, Klumb initially thought, if the cost of the house and land ever became a burden, Klumb was sure that the house would at least be a valuable investment. 10

It is not entirely clear how Klumb came to know of the property and its availability. It is possible that a current tenant at the property, the Dutch artist Adrian Dornbush, alerted Klumb to it. Dornbush and Klumb knew each other in Puerto Rico and occasionally even collaborated on design and architecture projects. At the time that Klumb and his family first moved into the ranch, there were two houses at the site, a small house and the main house. Each house had an attached carport. And per an agreement between Klumb, Dornbush, and the former owners of the property, Dornbush continued to rent the smaller house for a short time after the Klumbs moved into the main house. This smaller house is no longer standing today. Regardless of how Klumb learned of the property or the mundane reasons for the move, the change of environments from the house in Santurce to the Fog Cody Ranch could not have been more striking.

The Santurce house was designed by Antonin Nechodoma (1877-1928). 11 Nechodoma was an earlier immigrant to Puerto Rico, a Czechoslovakian architect who very closely emulated

⁹ Klumb to Arneson, letter dated 23 October 1947; and Klumb to Reiner, letter dated 24 October 1947.

¹⁰ Klumb related to his friend Steve Arneson his need to move out of Santurce, his plans to buy the Fog Cody Ranch, and the details related to the purchase of the property. See Klumb to Arneso, letters dated 23 October 1947, 16 December 1947, and 28 September 1948.

¹¹ Otero, 191; and Curbelo, "The Design of Progress," 273.

Frank Lloyd Wright's Prairie Style houses. ¹² He especially favored Wright's massing of rectilinear forms, low profile roofs and overhanging eaves, shallow yet wide-brimmed flower pots that sat atop concrete pedestals, his generous use of planter boxes, and his material preferences of masonry and plaster. The context for this particular house was the city of Santurce, shown on the map in Figure 6.1. Santurce is one of Puerto Rico's oldest, most densely populated, and built up of Puerto Rico's urban areas. Lying just east of the rocky island outcropping that is the old city of San Juan, over the course of the Spanish colonial era and the subsequent American occupation Santurce became a natural extension of the capital city's population, with its tight city grid, and low and mid-rise buildings in the Spanish colonial style.

Klumb's new home at the Fog Cody Ranch was not far from Santurce, overland approximately four miles south. Still, the house at the ranch resided in a decidedly different context than the Nechodoma house. Klumb once described his ranch house property as "an oasis in a concrete jungle." This was no doubt because the house sat at the center of a verdant 6.5 acre property,



Figure 6.1. Close-up view of Old San Juan and Santurce, c. 1947. San Juan is in the map's upper left, and Santurce is in the map's center. Map courtesy of the HTMC/USGS.

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¹² Caranza and Lara, *Modern Architecture in Latin America*, 21-22.

¹³ Klumb to Kohr, letter dated 7 September 1971.

which can be seen in figures 6.2 and 6.3. Yet beyond the site's boundaries lay pockets of old, established habitats and communities with their various low-rise, wooden, concrete block, and plaster buildings. Just beyond these lay the many new, larger tracts of residential developments that were giving shape to the vast, burgeoning suburbia that was rising south of Old San Juan and Santurce. This new suburbia would serve as the setting for many of Klumb's residences over the next thirty years. Also, just two miles to the west of Klumb's new property lay the UPR-Rio Piedras campus. Between 1945 and 1965 Klumb would also greatly transform the campus' established, Spanish colonial architectural character through a series of master plans and almost twenty modern university buildings. Lastly, the vast expanse of vegetation inside Klumb's property was contrasted by the ring of small residential plots and their even smaller, humble houses encircling the property on almost all of its sides. So while Klumb may have been hemmed in by a concrete jungle at the Fog Cody Ranch, this new jungle did not resemble the densely packed, tight city grids and larger mid-rise buildings of Old San Juan and Santurce. It





Figure 6.2. Current satellite imagery of the verdant Klumb House property (with the house in the center of the property visible through the trees). Image © UPR, courtesy of ESRI.

Figure 6.3. Topographic map of the Fog Ranch property, c. 1947. Image courtesy of the HTMC/USGS.

was a different part of Puerto Rico than the inheritors of the earliest and most well-developed Spanish colonial establishments. It was a mixture of small, old, and humble communities along with the new, vibrant, growing, and more expansive and modern Puerto Rican suburbia.

To think of the Klumb House and its surrounding property as an oasis – as an unexpected and pleasant respite of greenery – was easy to do. The property was akin to a private natural preserve teeming with tall trees, majestic plants, and exotic flowers. The vegetation was so dense, the trees so tall and their canopies so expansive that there were precious few spots on the property lacking in overhead cover and shade. Even the house itself sits in a part of the property just barely and seemingly perfectly exposed to the air and sunlight from above. Yet, walking through the property and around the house, one gets the sense that the vegetation does not envelop or overwhelm the key elements that comprise the Klumb House – the approach, the house itself, and a clearing just south of the house. There is a fine balance, a light embrace, between the built elements and the "magnificent jungle exuberance" of its surroundings. ¹⁴

Access into the ranch property is through a metal gate at the south end of the property, and then along a road that leads to the house. The gate and road are shown in figures 6.4 and 6.5. The road proceeds north for approximately 150 feet under a canopy of trees that allows patches and pinpricks of sunlight to shine down. The road then gradually turns to the northwest for a short distance before putting a person almost immediately before the house itself. As alluded to by the comments by the *Progressive Architecture* reporter cited above, for a first time visitor anticipating their first glimpse of the house, the building suddenly and surprisingly appears before them. This is because, although sitting in a small clearing, the house is still shielded by an additional screen of tall bamboo stalks planted beside the house. Mindful of just such an effect,

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¹⁴ Kohr to Klumb, letter dated 13 July 1971.



Figure 6.4. The front gate at the Klumb House. Photography by the author.



Figure 6.5. The road inside the Klumb property. Photograph by the author.

Klumb wrote of the experience, "Before I see the house I see the trees." One visitor called the house "a plantation hideaway" and described the experience of a visit there by saying, "Through a rosy mist I seem to recall a winding path through a tropical forest and then a pleasant visit with

¹⁵ Klumb, "Miscellaneous Handwritten Notes."

aperitifs and the most delicious lunch of our whole stay on the island."16

Since the rectangular house sits on the site on a roughly southwest-to-northeast axis, the first things that a person sees through the trees and the line of bamboo clusters next to the house are the roof and southeast corner of the structure, as can be seen in Figure 6.6. Continuing along the south side of the house, a visitor will encounter a clearing that sits between a lily pond to the south and the house directly to the north. This area is shown in Figure 6.7. If a visitor spent a significant amount of time at the house, they would just as likely have spent it in this informal outdoor sitting area next to the lily pond as they would have in the living room at the south end of the house, a space illustrated in the photographs in figures 6.8, 6.9, and 6.10.

The living room is just a short set of steps to the north of the clearing, and due to its openness and orientation it was experientially part of a larger composition that encompassed the



Figure 6.6. Approach to the Klumb House. Photograph by the author.

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¹⁶ Pickens to Klumb, letter dated 16 September 1959.

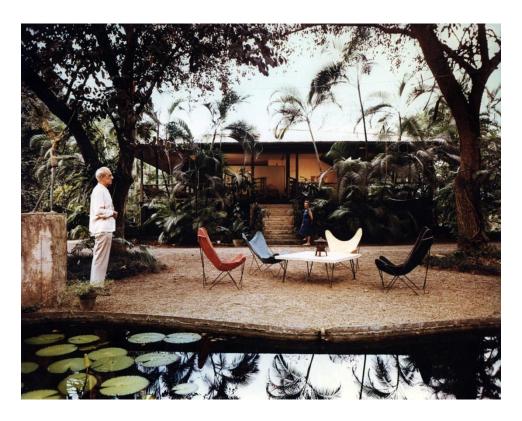


Figure 6.7. The clearing between the lily pond and the main house at the Klumb ranch property. Image courtesy of the AACUPR.

clearing, the lily pond below, and the surrounding vegetation beyond both of them. Klumb worked to ensure just such an interrelation between these spaces beginning one year after occupying the house. Writing to the previous owner to coordinate some of their financial arrangements regarding the house, Klumb said,

"We are still enjoying your place and are very happy there. The garden is still as beautiful as ever. Before Christmas we remodeled the house by taking out a few walls along the front to make one large open room which worked out beautifully. Now we can sit on the porch and see and overlook the entire garden, which makes us more and more appreciate your masterful hand in landscaping and planting."¹⁷

Prior to these modifications, the house was a large, rectangular, wooden farmhouse with a veranda along its perimeter and a gabled roof overhead. Subsequent to the changes, the new

¹⁷ Klumb to Fog, letter dated 14 January 1949.



Figure 6.8. The outdoor sitting area and lily pond at the Klumb House. Image courtesy of the AACUPR.

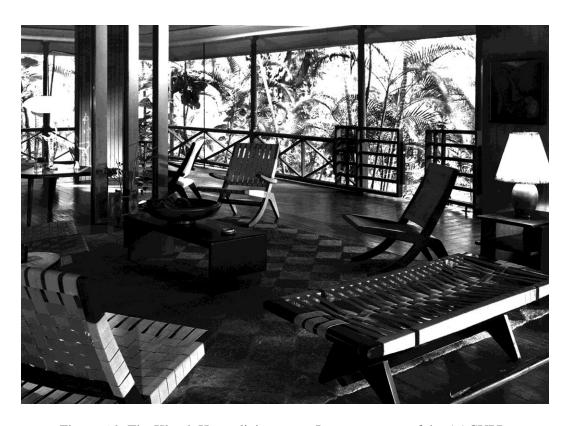


Figure 6.9. The Klumb House living room. Image courtesy of the AACUPR.



Figure 6.10. Klumb in the outdoor seating area beside the lily pond. Image courtesy of the AACUPR.

living room resembled a room in a glass house, except without the glass. The mild tropical climate and the surrounding plants and trees rendered obsolete the walls separating the living room from the adjacent veranda. In place of walls, the roughly six acres of lush tropical vegetation formed a ready-made barrier that acted as a privacy screen between the house and the outside world.

But the effectiveness of the living room's openness was not limited to visually and spatially linking it to the clearing and lily pond directly across from it. With the barriers of the walls removed, the living room joined with the veranda to form a free flowing space along the south,

west, and east sides of the house, as is evident by the sketch floor plan in Figure 6.11. To take advantage of these newly liberated and conjoined spaces, Klumb set up areas of repose along the periphery of the house. At the southwest corner Klumb hung a hammock. At the southeast corner he set up a sitting area for his wife and himself. From this southeast corner a person could continue on a long and spacious veranda on the east side. This part of the veranda not only accommodated additional seating for relaxation, it also led to a smaller room at the northeast corner of the house. This last room had walls only on two sides, and so it was open to the north and east. The two corners, veranda, and open room are illustrated in photographs in figures 6.12, 6.13, and 6.14.

The Klumb House, of course, was not merely a showcase house and property. It was the home to Klumb, his wife, and their two children, Peter (b. 1936) and Richard (b. 1940). Later, following the creation of the Klumb Foundation in 1968, the house was also the setting for the organization's monthly (later bimonthly) meetings and periodic informal gatherings of associates and friends of the foundation. But the house was not just the foundation's meeting place, it was also central to their work.

Among the objectives of the foundation, some of which I highlighted previously, was the stated purpose "To preserve the house and garden of Architect Henry Klumb in the property known as 'Fog Cody Ranch,' as a prime example of the natural harmony which can be attained in an integrated living environment." In support of this effort, the foundation was to establish a center that was to "concern itself with environmental problems within Puerto Rico and the Caribbean region and endeavor to provide practical solutions in their regard which are compatible with human dignity." Surprisingly, it was also during the foundation's early years that

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¹⁹ Ibid.

¹⁸ Klumb, "Certificate of Incorporation of Klumb Foundation."

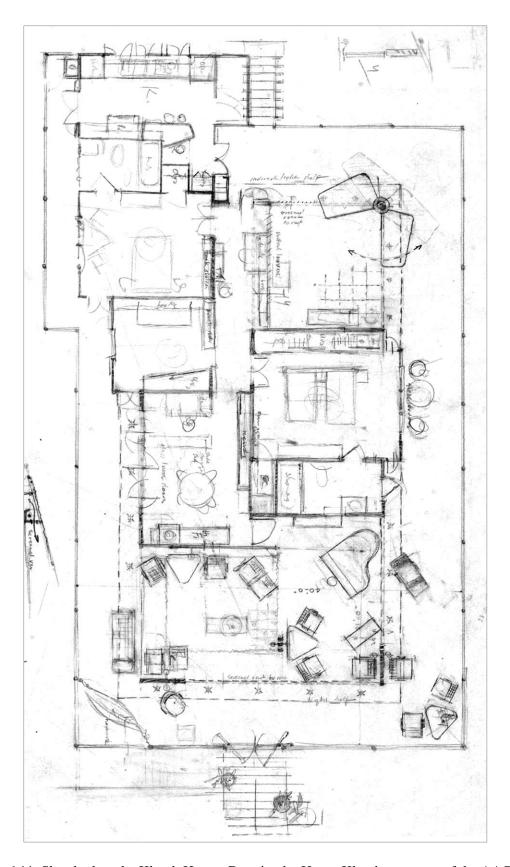


Figure 6.11. Sketch plan, the Klumb House. Drawing by Henry Klumb, courtesy of the AACUPR.



Figure 6.12. Sitting area in the southeast corner of the house. Image courtesy of the AACUPR.



Figure 6.13. The hammock in the southwest corner of the house. Image courtesy of the AACUPR.



Figure 6.14. The east side veranda, the Klumb House. Photograph by Alexandre Georges, from *Progressive Architecture*, August 1959.

Klumb and the other foundation board members discussed on several occasions the possibility of raising funds for the organization by developing the property or selling it outright. Fortunately, nothing ever came of those discussions.

In Klumb's twilight years, he offered glimpses of his thoughts as they related to his house. As part of his ongoing work on his pamphlets, to cite one key example, Klumb began to compile an addendum to one of the last of these autobiographical manuscripts. He labeled this addendum "7 include in 6," as its contents were supposed to augment the pamphlet The Office of Henry Klumb 6: Architecture of Social Concern, 1961-1974. Inside this addendum Klumb arranged twenty-eight photocopied photographs depicting the house and property. In these photographs Klumb chronicled the house within and without. This included views of the exterior of the building from different angles, the living room, the various sitting areas dispersed along the corners of the house and the veranda, the clearing between the living room and the pond, the clusters of bamboo along the side of the house, exotic plants and trees within the property, and the road leading to the house. Some of the photographs show Klumb, his wife, and friends relaxing in many of both the indoor and outdoor sitting areas. Others show Klumb reading while sitting in his hammock or on one of the chairs he designed and produced in the late 1940s, part of his earlier business ventures with his friend Steve Arneson. Other photographs show Klumb walking the grounds and inspecting the building with the family dog at his side.

This collection of photographs suggests that after chronicling a lifetime in architecture – forty-seven years of personal experiences and work accomplishments that took him from Cologne, Germany to Rio Piedras, Puerto Rico – he had just one more project to document. That was to record the ways that he altered his physical environment to better suit his needs and desires, and to fit his architectural ideology. In other words, it was to document his acts of place

making in his own home.

Although there was no text associated with any of the photographs in this addendum to his pamphlets, Klumb's comment to a friend in 1982 represents an appropriate summation to his efforts in chronicling his house and property. Klumb wrote, "Our garden is our delight and rejuvenation aside from providing organized physical diversions." ²⁰

Viewing the Klumb House through Klumb's Naturalistic Worldview

It follows from the many comments about the Klumb House by Klumb and by others, and from a detailed understanding of the makeup of the building and its grounds that the great effect of the Klumb House is largely due to its close proximity to an abundance of natural elements at the site. In other words, the Klumb House and its property were teeming with life whereas the environment outside of it was characterized by a dearth of life in the concrete jungle. But it is not enough to say that the Klumb House was a success because it resided in a highly natural environment and thus it sheltered its inhabitants and visitors in an ideal natural setting.

Another, more nuanced reading of the significance of the Klumb House is that Klumb broke down unnecessary barriers to the kind of lives he thought people should live, especially in a place as evocative, rich in natural resources, and possessing a mild climate as Puerto Rico. In terms of the ways in which that vision related generally to nature, Klumb wrote, "Man cannot sustain his creative energy to achieve the better life if his body is deprived of nature's life sustaining sources." More specifically in regard to the profession of architecture, he wrote,

"Architecture in its reality of space created, freely flowing from the outside in – from inside out, it fuses man with his environment, it frees man's mind so he may – if he chooses – live in free association with other men and if receptive – in

²⁰ Klumb to Kohr, letter dated 11 December 1982.

²¹ Klumb, "Klumb Foundation Statement," 1.

conscious harmony with the varied moods of nature."²²

In both of the statements above, a close contact with the natural world is a necessary aid to "achieve the better life." But, there were impediments to this life.

In his views on the subject of nature Klumb repeatedly took the stand that for the sake of progress people have been, are, and will continue to be put in a schism with nature. Consistent with Klumb's adherence to the aphorism "man is the measure of all things" in his architectural ideology, any progress that was not measured "in human terms" and that did not "result in the creation of a world of human dignity and beauty" was no progress at all.²³

According to Klumb, the sources of such false progress were many. From his early days with Puerto Rico's Committee on Design of Public Works, Klumb tried to obviate an overreliance on industrialization and standardized solutions. He instead promoted local building practices, materials, and resources, all of which he felt would instead lead to greater socio-economic benefits to large segments of Puerto Rico's population. Another example of a false progress was the overcrowding and runaway skyscraper construction inherent in modern cities. Klumb witnessed this phenomenon firsthand when he first immigrated to the United States in 1927 and in his travels around the country before joining Frank Lloyd Wright in 1929. One final example was the unbridled emergence of residential communities and mass housing projects. In these examples of the built context Klumb surmised that the principal concerns were property developers' return on investment rather than viable infrastructure and ample "parks, playgrounds, and [a] community center." This was foremost in Klumb's mind when he worked on cooperative housing plans with Louis Kahn in the mid-1930s, and on mass housing projects

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²² Klumb, "Writings," 322.

²³ Klumb, "Skyscraper Architecture," 1.

²⁴ "Excerpts from an Interview given to Julio Marrero," 4.

with the CDPW and Puerto Rico's Housing Authority in the mid to late 1940s.

Each one of the examples in the preceding paragraph can be characterized as the continued encroachment of the built environment into natural space. Recall Klumb's remark previously cited in the discussion of his architectural ideology – "Man's work on earth, done by man for man and in harmony with nature is all but lost. This is the basic problem facing us, the man-made dilemma." So, in Klumb's view the schism between people and nature had been perpetuated by, among other things, rampant building construction, urbanization, and technological advancements.

Turning once again to the specifics of the Klumb House, if the modern world engendered divisions between people and nature, Klumb's greatest contribution to tropical architecture through his own dwelling was to tear down the partitions that separated people from their invigorating surroundings. In doing so he depended on the enveloping plants and trees to supply the requisite privacy, shade, and level of spatial intimacy rather than continue living in an enclosure in the middle of what was akin to a natural preserve. He refused to compartmentalize his family's life into a series of small, single function rooms. Instead, a covered domestic space with three sides open to the elements allowed them to commune with spaces on the grounds immediately next to the building. He relied on the abundant free flow of air, source of daylight, and variety of natural sensations just beyond the structure's edges rather than ensconce himself indoors. And it was precisely these choices, precisely the experiences of living in that house and on that land, that led Klumb to propose the bare building necessities for Puerto Rico. Among the bare necessities were "just four walls and a roof – and in this climate – just a roof," adding that "a proper surrounding – aesthetically well balanced – can be had in the most humble and under

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²⁵ Klumb, "Writings," 313.

poor economic conditions. It can be had in the open even – under a mango tree."²⁶

Architectural Analyses: Klumb's Initial Open Air Rooms in Puerto Rico – the Patio

One of Klumb's earliest open air rooms in his Puerto Rican residential design practice was the patio bounded by a low stone wall. In previous chapters we glimpsed examples of this motif. The Haeussler Residence (1945) included such a patio, which projected from the house's front portico towards a street corner that bordered the lot. Klumb planned for a similar patio at the Benitez Mountain Cottage (1961). That patio was to be adjacent to both one of the bedrooms and the kitchen at the back of the house. To illustrate the salient points of these early open air rooms, however, I will rely upon a third example, the Emilio Rodriguez House (1951).

The Emilio Rodriguez House was a one story, suburban home that sat on a corner lot less than one mile north to the UPR-Rio Piedras campus. The house, shown in figures 6.15 and 6.16, was L-shaped, although not strictly so, thus the two wings of the house generally paralleled the two cross streets. The primary façade contained the garage and main entry, and it faced a secondary street. The secondary façade fronted a line of three bedrooms and two bathrooms, and faced a smaller residential street.

The patio began at the corner of the L, projected towards the secondary street, and extended to the street corner. A stone wall, four feet tall, enclosed the patio. The wall was curvilinear at its most visible point from the outside (the part closest to the street corner), with sharp corners and straight segments close to the driveway and next to the house. The patio's ground surface was a well-manicured lawn. While these were the physical configurations of the patio, a deeper understanding of the rationale behind these elements is indicative both of

²⁶ Ibid., 310 and 312.

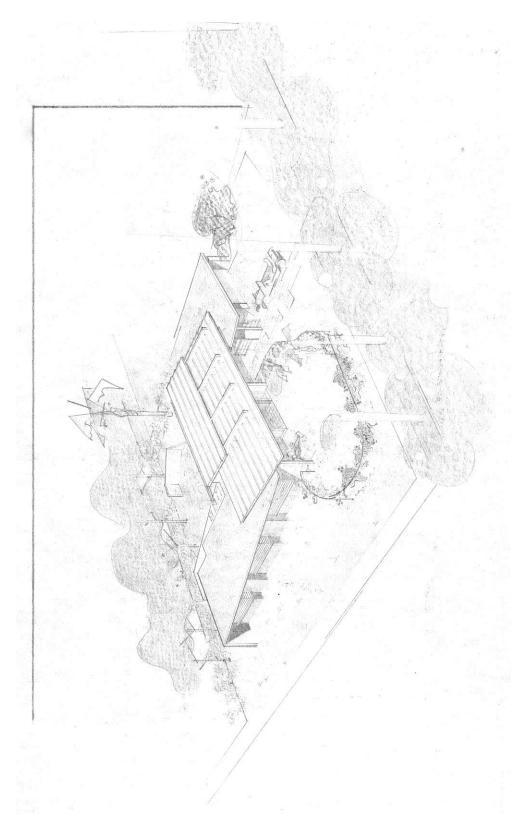


Figure 6.15. Aerial perspective, the Emilo Rodriguez House. The patio is the oval at the front of the house. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

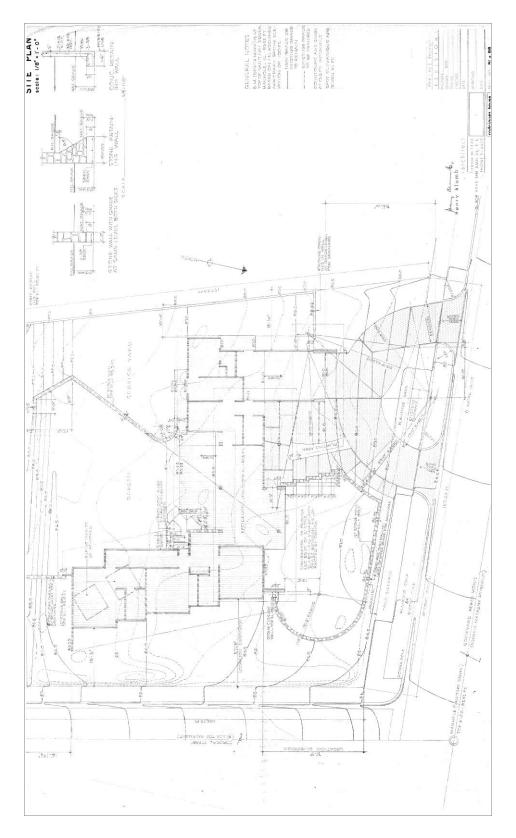


Figure 6.16. Site plan, the Emilio Rodriguez House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

Klumb's ability to appraise the forces at play at his building sites and of his motivations for including this space in the house design.

The position of the patio in relation to the site and the building on the site is significant. Klumb placed the patio so as to meet the prevailing breezes coming into the site. This was a tactic Klumb repeated so often that it became almost formulaic and a staple of his open air rooms. In other words, with the knowledge of the prevailing breezes on a site, Klumb invariably met those breezes first with an open air room. In this case the patio was thrust forward of the house even though the house's L-shape allowed for a garden at the back of the property. But, to be sure, Klumb also enclosed that garden behind the house with another stone wall.

Also in terms of placement, Klumb put this forward projecting, stone-walled patio immediately adjacent to the living room. Only a set of sliding glass doors separated the two spaces. And if we refer to the aerial perspective drawing of the house, we see that this patio was meant as an outdoor seating and relaxation area. Collocated and accessible to each other, an interrelationship existed between the patio and the living room, both of which were meant for congregation. So, although one space was fully indoors and another outdoors, with the sliding panels pushed aside both spaces more directly related to one another, and both spaces benefitted from the fresh outside air.

The patio's size and shape are also noteworthy. If Klumb wished to provide his clients with a habitable green space outside the house, the simplest approach would have been to enclose the entire property with a fence or wall. That way he would have maximized the outdoor space between the edge of the property and the building itself. But that would have been contrary to the purpose of the space Klumb intended. The patio was not to have been a wide open space but rather a room of its own accord. "Architecture is the creation of spaces and space interrela-

tions – closed or open, horizontal or vertical," Klumb once said, adding that

"Space is determined by the use to be given it. Space requirements for a church, a restaurant, a school, or a hotel are different. I would say that the reason for creating space is to provide for the needs it is to serve in its most logical use."²⁷

As a purposeful and logically conceived space interrelated to the outdoors and the interior living room, Klumb's design of the patio had to balance matters of openness (that is, access to the outdoors) against both privacy concerns and a desired level of group interaction. So, just as any room inside a house is bounded to support a particular function, Klumb similarly and thoughtfully bounded patios such as this one and the one at the Haeussler Residence.

Other similarities between the patios at the Haeussler Residence and the Emilio Rodriguez House are also instructive. The patios at both houses projected forward of the buildings toward the main streets in front of them. Both patios were similar in material composition, physical dimensions, and shape (alternatingly curvilinear and rectilinear). Not coincidentally, the houses were designed and built within six years of one another. Yet despite the many similarities between the two, Haeussler contained one item that Rodriguez does not. Inside the patio at Haeussler was a small pool of water. The small pool enhanced its open air room's role by acting as a visual and physical centerpiece around which to gather. The pool was also, like the patio itself, predominantly curvilinear with a few rectilinear edges. In this sense we can understand the pool as reinforcing elements of the larger patio around it.

Despite the fact that the walled-in patio is one of several different kinds of open air rooms Klumb designed and that each open air room exhibited a unique configuration at each house, some preliminary conclusions are possible from the two early examples of the Emilio Rodriguez House and the Haeussler Residence. One of the most important things that can be pointed out is

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 $^{^{\}rm 27}$ "Excerpts from an interview given to Julio Marrero," 2.

the importance of these spaces within Klumb's design process.

As we saw in terms of Klumb and the grid and the landscape, one of the first influences upon Klumb during the design of a house was an important example of phenomenological thinking. That was an awareness and appreciation of the macro-micro environments that converged at a building site. The macro encapsulated distant vistas of both natural and built landmarks and features. The micro included immediate concerns revolving principally around the topography but also including significant and desirable vegetation (plants and trees) at the site. The resulting spatial-structural planning grid overlaid on the ground was in direct response to these macro-micro environmental factors. That grid then guided a house's orientation and building footprint. In doing so, Klumb's grids were fundamental to his place making process. His grids were the figurative foundations of his houses.

Alongside these several concrete macro-micro considerations, the more ambient factor of the prevailing breezes can be added as an equally governing influence. In other words, the prevailing breezes and the macro-micro environmental factors that engendered the spatial-structural planning grid came together in another important example of phenomenological thinking – a holistic design through which Klumb imparted to his houses their shape, orientation, and organization of spaces both within the building envelope and on the site.

To note the general influence of the prevailing breezes in Klumb's design repertoire is not novel. Others have noted the correlation between these breezes and Klumb's *brise-soleils*, his building orientations, and the positioning of balconies and covered terraces. What is novel is to elucidate Klumb's phenomenological thinking through the correlation of three key factors: the prevailing breezes, a holistic design that encompasses both the building and the landscape design, and a room that while it is not within the boundaries of the building envelope is still an

integral part of a house's overall lived space. What is further novel is to trace the genesis of these factors in the process of impressing a sense of place that had an effect upon Klumb.

The first occurrence in Klumb's recorded personal life and professional experience of an architectural response to breezes is in the cabins at Camp Ocotillo. Side panels under the wood and canvas roofs could be opened to allow cooling breezes to pass by. In the later Low Cost Rural Houses of the CDPW, each of the seven schemes included a recommended building orientation based on the prevailing breezes at a site. These recommended orientations worked in concert with the simple structures' breezeways, verandas, and porches. In terms of holistic designs that encompassed both the building and its surrounding natural elements (whether these natural elements were already in place or added later), there were clear precedents in Camp Ocotillo, Taliesin, the Papago Tribal Community House in southern Arizona, and, as noted at the beginning of this chapter, both the Teacher's Farms and yet again the fenced-in and stone-paved patios of the Low Cost Rural Houses. Finally, in terms of dual interrelated spaces, one indoor and another outdoors, there was the living room and garden combination at the Klumb House.

Other conclusions that can be made from the early examples of the walled-in patios at the Emilio Rodriguez House and the Haeussler Residence are related to their use of and references to natural elements. The most explicit use of natural materials in the patios is in their low stone walls. Klumb actually included stonework in his houses in four ways: to bound spaces such as patios, terraces, and gardens; in full height walls that marked the entrances to his houses; in footpaths that led to either a house's entryway, or to a side or backside service yard; and in stone-paved terraces. In the first case, Klumb relied on an overtly natural material, stone, to establish the patio as a natural space. This notion was reinforced through other patio elements. The patios are of course open to the sky above and only partially covered by shade trees either

nearby or inside the patios themselves. The ground surfaces inside the patios are well-trimmed grass lawns. Lastly, the patio's predominantly curvilinear outline is echoed at Haeussler in the likewise curvilinear pool, which emulates a natural water feature such as a pond, or a microcosmic representation of a lake or lagoon.

In terms of this last point regarding the natural curvilinear shape of the pool at Haeussler, it is worth noting that the first instance of this type of pool in Klumb's Puerto Rican houses was at the Bosch House in Cataño, as can be seen in Figure 6.17. If these pools were reproductions of natural bodies of water or were microcosmic representations, then it is telling that the Bosch House was situated next to a much larger body of water, San Juan Bay. Additionally, these pools at Bosch and Haeussler also echoed the pond at the Klumb House.

Despite how much the Haeussler and Emilio Rodriguez patios reveal regarding Klumb's open air rooms, they are only a subset of such sub-places designed and built by Klumb. A fuller subset of open air rooms follows in the next section.

The Varied Moods of Nature at Klumb's Terraces, Verandas, Cross-ventilated Spaces, and Breezeways

A second recurring type of open air room came in multiple configurations of verandas, and open and covered terraces. This motif was present in past examples such as the Teacher's Farms, the Low Cost Rural Houses, the Ewing, Evans, and Fullana residences, the Benitez and Tugwell mountain cottages, and the Foreman Mountain Retreat. Many other houses not previously mentioned also included various examples of this type of open air room. Given the many different houses and their open air rooms of this kind, an excellent representative example is an exception to the houses I have previously highlighted, which is the unrealized design of the Duchow Residence.

The Duchow Residence (detailed design completed in 1958) was to have been a two-

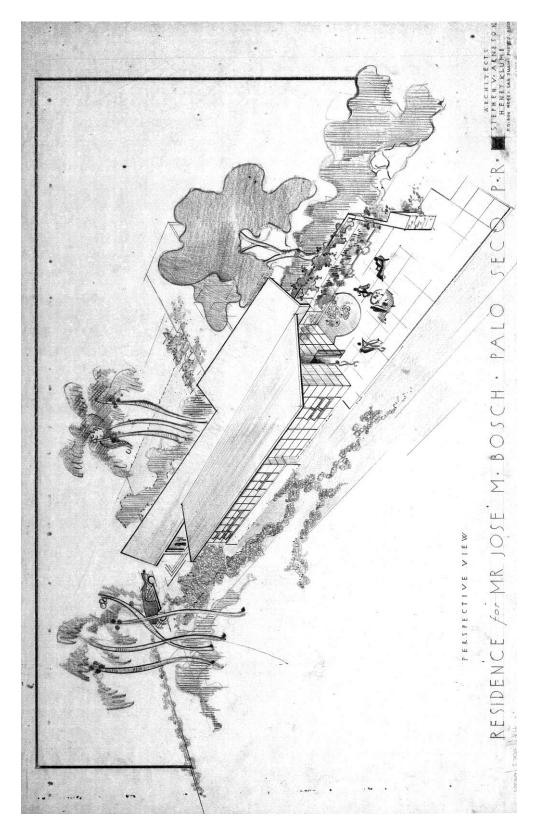


Figure 6.17. Aerial perspective, the Bosch House. Note the small pool of water in the terrace. Drawing by Steven V. Arneson / Henry Klumb Architects, courtesy of the AACUPR.

story house (with storage/service rooms on a ground floor underneath) situated on the edge of a sloping site in the southern coastal city of Ponce. Preliminary floor and site plans, two perspective drawings, and the final floor plans are shown in figures 6.18, 6.19, 6.20, 6.21, and 6.22. The house design included several features we have seen in earlier analyses. As with the cases of the grid and the landscape, Klumb utilized a 4' square grid to anchor the house so that the driveway was nearly transverse to the contour lines at the highest point on the site. The overall combination of the planning grid and the topography's contour lines were so well integrated that a diagonal axis connecting five supporting *pilotis* at the back of the house fell on grid at a 1:3 slope. In the fashion of Klumb's vernacular influences, the house was to be a modern stilt house over a sloping site that faced the Caribbean coastline. Finally, as alluded to earlier in Klumb's stone-walled patios, the entry to the house was marked with a low stone wall.

In terms of open air rooms, at the back of the house on both the first and second floors there was approximately 785 square feet of covered terraces. The greatest proportion, almost 500 square feet, was on the first floor next to three spaces – the living and dining rooms, and a hallway connecting these two rooms. The long outside edges of these two terraces, that is, the terrace edges closest to the sea side, were parallel to both the axis of *pilotis* and the overhead roofline. As is shown in the preliminary design's first floor plan, this line was nearly parallel to the direction of the daytime prevailing breezes that passed over the terraces. Next, on both floors there was a great deal of visual and physical interplay between the indoor rooms and the terraces. On the first floor, pivoted doors with glass louvers allowed access from the living and dining rooms to the terrace. Also, sliding metal grilles lined the terrace side of the long hallway between the living and dining rooms. On the second floor, similar pivoted doors opened into the terrace from each of the three bedrooms and the study. Each upstairs room had three such doors.

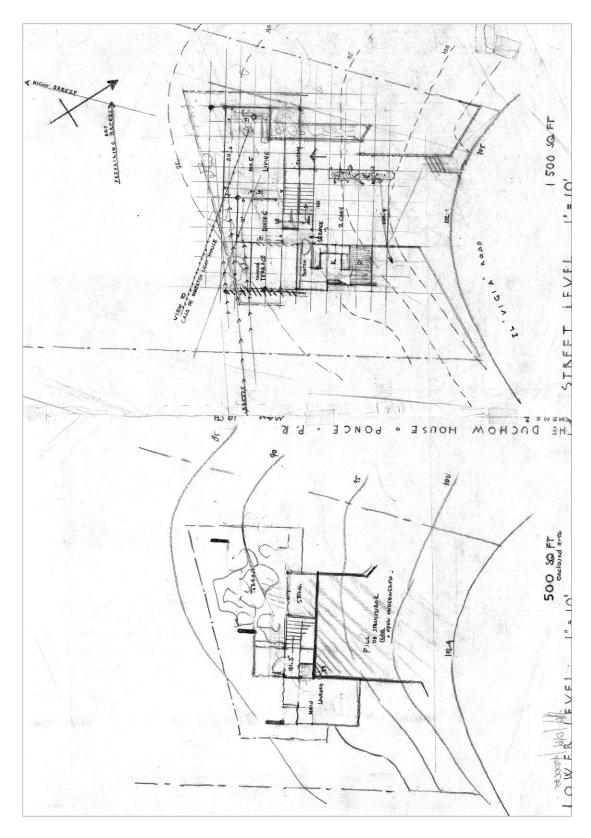


Figure 6.18. Preliminary site, ground, and first floor plans, the Duchow Residence. Drawings by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

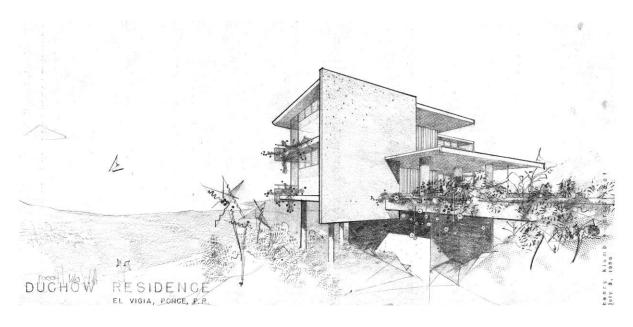


Figure 6.19. Street side perspective, the Duchow Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

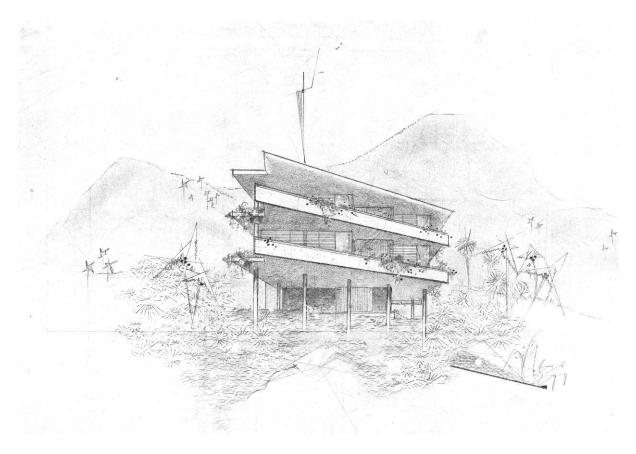


Figure 6.20. Terrace side perspective, the Duchow Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

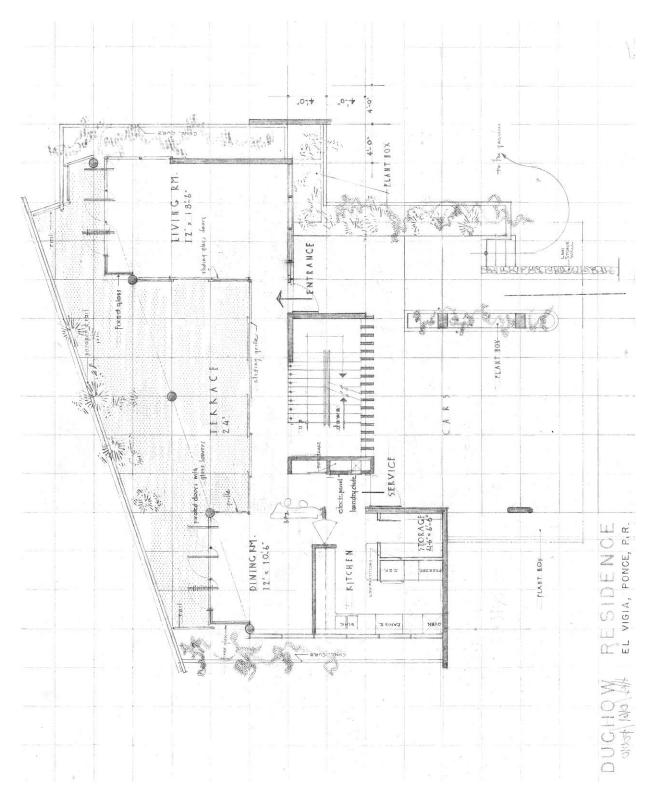


Figure 6.21. First floor plan, the Duchow Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

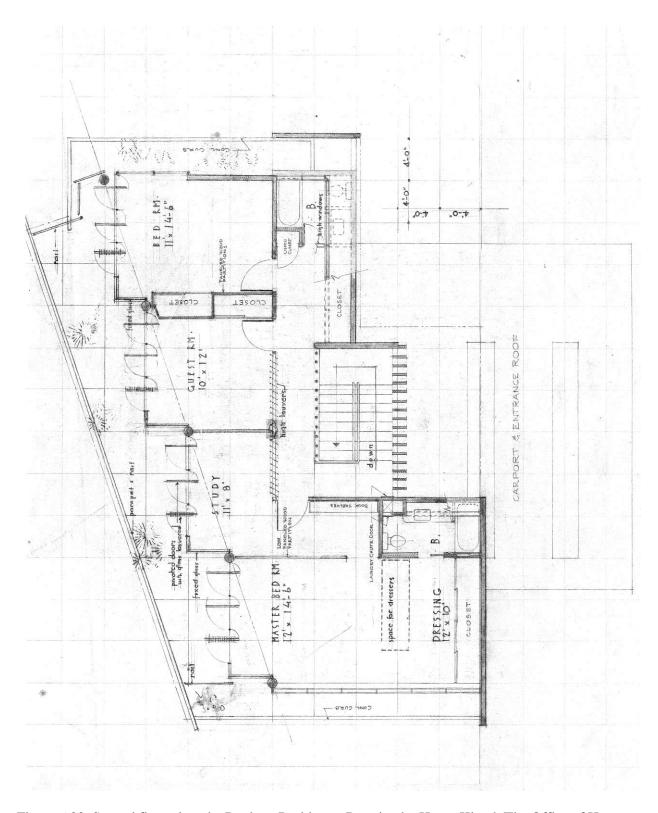


Figure 6.22. Second floor plan, the Duchow Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

In addition to the house's numerous indoor-outdoor relationships between the terraces and their adjacent rooms, the lengths to which Klumb delicately balanced various aspects of privacy, openness, transparency, and the free flow of air throughout the entire house was remarkable, but especially at the first floor. In addition to the pivoted doors, glass louvers, and metal grilles at the living room, dining room, and central hallway, another contributing element to the openness at Duchow was the house's central staircase. At the front of the house, the wall between the open staircase and the carport consisted of a series of concrete fins. These closely spaced fins allowed light to enter into the center of the house and air to flow all the way from the back of the house, through the metal grilles lining the hallway, through the staircase space, and then through the concrete fins. While open, the spacing between the fins still afforded the interior privacy from the street. When all these elements – the pivoted doors, sliding grilles, and fins – were put into use, the level of openness at Duchow would have rivaled the Klumb House's living room with no walls. There were still barriers at Duchow between the indoors and the outdoors, but the barriers had been dematerialized to a point that, with the right openings activated, life at the house could be lived in full concert with the outdoors.

What we see in the Duchow Residence terraces, and have seen in the design of every previous house by Klumb that has been analyzed so far in this study, is the importance of connecting their inhabitants to the macro-micro worlds outside the building envelope. A space such as a covered terrace directly "fuses man with his environment." From the living room at the Duchow Residence a person could see the coastline and Ponce's Casa de los Muertos Lighthouse. But it is not enough to apprehend the outdoors from the seclusion of the indoors. In addition to making crucial indoor-outdoor connections, Klumb meant for his clients to go out beyond the confines of enclosed spaces and spend the bulk of their time out of doors. Only then

²⁸ Klumb, "Writings," 322.

could a person truly connect "with the varied moods of nature." That is what he did at his house – in his living room, in the hammock in one corner of the house's veranda, in the sitting area in the opposite corner of the veranda, and in the sitting area next to the lily pond. Recall once again his statement about his house,

"I enjoy my own porch when the rain blows in. I just move a little. This is part of the constant change of nature, its vitality. This is proper human experience...the longer you live, the more that you want to enjoy the natural phenomena that surround you."

This same sentiment led him to propose "in this climate – just a roof" as appropriate for a school, then suggesting that even less would suffice, having class "in the open even – under a mango tree." In terms of a school, these were of course hyperboles, but hyperboles that he lived out at his home and promoted in his designs.

A further indication of the hierarchy of Klumb's open air rooms such as the Duchow terraces in relation to the entire design of the house can be seen in a small part of Duchow's circulation plan. Upon entering the Duchow Residence a person can immediately see and quickly access the large terrace on the first floor. This visual and physical proximity both pulls and ushers that person towards the terrace. This effect was repeated in other designs. At the Evans' beach house in Dorado (Figure 4.13, page 85), daylight, ocean breezes, and views beckoned a visitor forward from the front door via a short hallway to the large terrace at the back of the house. A similar situation existed at both the Ewing Residence, shown in Figure 6.23, and the Benitez Mountain Cottage (figures 5.16 and 5.18, pages 156 and 158), where from the front door a person was instantly aware of the light filtering in and the views from the terrace on the far side

³⁰ "Klumb of Puerto Rico," 88.

²⁹ Ibid.

³¹ Klumb, "Writings," 310, 312.

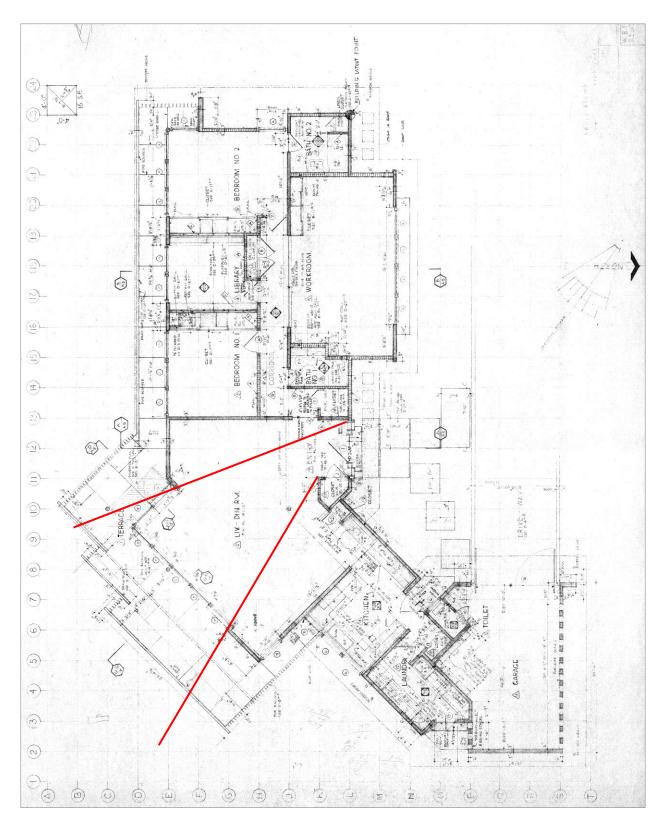


Figure 6.23. Floor plan, the Ewing Residence, showing the left and right limits of the view from the entryway. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

of each of their living rooms. Also, at the Fullana Residence, a person arriving at the second floor by way of the central stairs (Figure 4.16, page 90) was immediately met to their left by an expansive terrace and the equally expansive views from the house's lofty site.

The end result of this posturing of spaces by Klumb was in establishing the open air rooms to be of primary consideration to him as a designer and for his clients as inhabitants. He conceived the open air rooms as the desired destinations in the overall design of each house.

Other spaces – the approaches, entrances, passageways, and corridors – played a supporting role, with those other spaces being oriented towards the arrival at an open air room. Other rooms – including bedrooms, bathrooms, and kitchens – were for very specific uses and consequently of secondary importance. Time was meant to be spent in the open air rooms.

Klumb's need for nature, demonstrated in his walled-in patios and covered terraces, was reinforced by a list of other open air rooms in his design repertoire. Verandas were often extensions of already substantial terraces. Such was the case at several houses – Evans, Ewing, Fullana, Tugwell, and the Benitez Mountain Cottage. Klumb's verandas generally afforded their house's inhabitants additional views around corners from the terraces and along multiple sides of their houses. They also linked the terraces to indoor rooms only short distances away. Occasionally, the verandas brought natural elements even closer with planter boxes.

Breezeways, like those Klumb implemented in his reimagined *Jibaro* huts through the Low Cost Rural Houses, are evident in the Eloy Rodriguez House (1950), whose site plan is illustrated in Figure 6.24. Sitting on a small rise at the end of the Santa Maria Development, a set of louvered, folding wooden doors at the front of the house allows air to pass through and exit through two vertical windows at the back. A similar condition existed at the Emilio Rodriguez House profiled at the beginning of this section. The house's centrally located living room

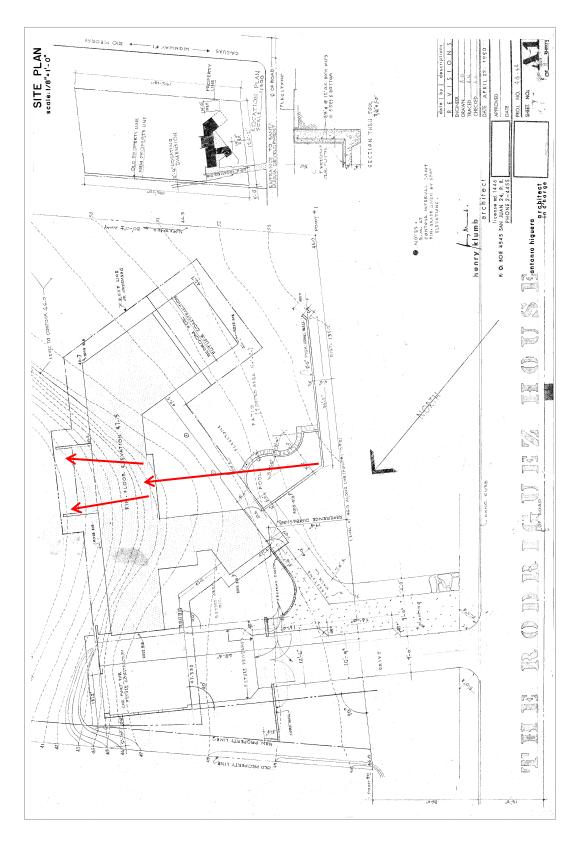


Figure 6.24. Site plan, the Eloy Rodriguez House, showing the central breezeway. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

included sliding glass doors in the front (facing the stone-walled patio) and sliding metal grills at the rear of the room.

Cross ventilation across those parts of houses only the width of one room were evident in the Delej House (1960) and Timm Residence (1960). The Delej House sits across the street from Dorado Beach, so Klumb's proposed second floor plan, shown in Figure 6.25, would have benefitted from a large terrace facing the ocean and a generously cross-ventilated "drawing room" when its windows and folding doors were open. The Timm Residence was a linear, two story house tucked into a narrow ravine beside a creek. As the house was originally envisioned in the preliminary site plan shown in Figure 6.26, the building orientation, narrow profile, and a large upstairs living room/covered terrace arose out of a desire to cross ventilate the entire structure.

The elements present in Klumb's breezeways and larger cross-ventilated spaces found their fullest expression in the first floor of the Fullana Residence, as shown in figures 6.27 and 6.28. The first floor consists of a large hall that is almost entirely a covered terrace. One side of this hall is screened in by a long metal grill. The opposite side of the hall transitioned into an open terrace between the house and the pool that was planned at the site (the pool at the house today is at a different location than the one in the original drawings). Privacy and security was maintained through numerous walls, gates, and doors that controlled entry into the covered terrace and the property interior.

This first floor and the second floor covered terraces at the Fullana Residence are a fitting final testament to Klumb's open air rooms. Together they amount to over 1,900 square feet of space open to the outdoors. As we will see in the next chapter on Klumb's houses set in urban contexts, open air rooms proposed for inclusion in a house often had the possibility of being phased out of a project. The Haeussler Residence was a rarity among all of Klumb's houses

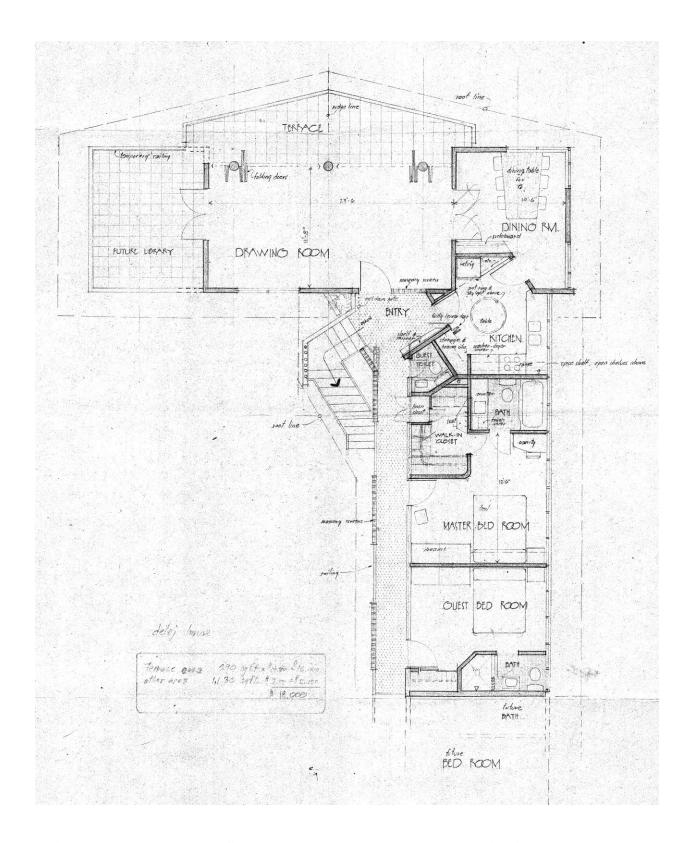


Figure 6.25. Proposed second floor plan, the Delej House. The terrace and drawing room are at the top, facing Dorado Beach. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

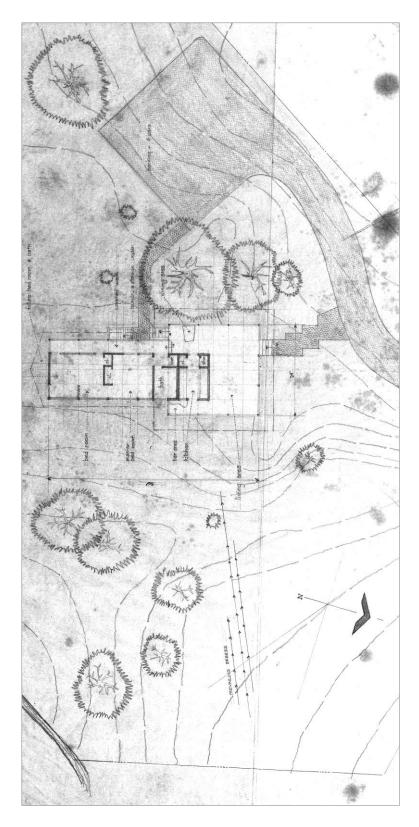


Figure 6.26. Preliminary site plan, the Timm House. The prevailing breezes are indicated from east-northeast to west-southwest. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

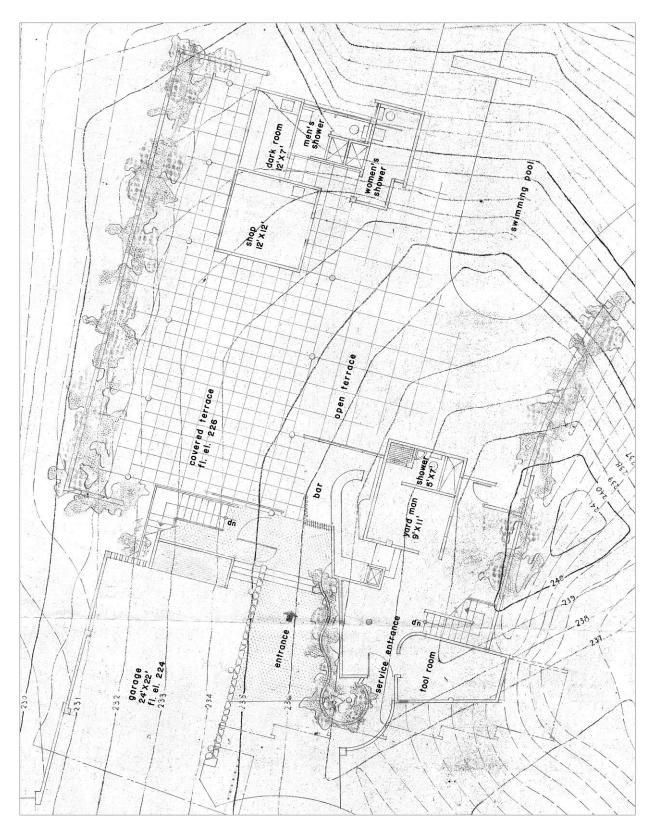


Figure 6.27. First floor plan, the Fullana Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.



Figure 6.28. The Fullana Residence's ground floor covered terrace. Image courtesy of the AACUPR.

because its principal open air room, its stone-walled patio, grew in size from the preliminary design phase to the final construction documents. As we have seen, the Fullana Residence also retained a surprising total amount of open air rooms. While much has been said here and by others regarding the radical level of openness at the Klumb House, that same kind of openness translated in both small and large ways to many of Klumb's residences. In implementing open air rooms in every house he designed, and in beckoning and ushering a house's inhabitants out to those rooms, he made a statement at each house on the need to reduce barriers between people and the natural world and the importance of living life outdoors.

CHAPTER 7: DENSE URBAN SPACES

"The way was shown [by Louis Sullivan] a quarter of a century ago to escape from the oppressive wreckage which was the city and to eliminate an insulting degradation and achieve for man his appropriate right to space, to air and freedom."

- Henry Klumb¹

In the previous three chapters we have seen numerous examples of Klumb's works in a wide range of contexts. These have included the suburbs of the San Juan metropolitan area, the beachfront resort and weekend getaway community of Dorado, and Puerto Rico's remote mountainous countryside. In each of these cases we witnessed Klumb harnessing, at both the micro and macro scales, elements from the natural surroundings around his building sites. Across these diverse contexts, Klumb's residential design solutions found great overlaps. In other words, elements he experimented with in one context were readily adaptable to others.

For Klumb, the urban context posed special problems for which his design solutions in other environments did not translate as easily. Building plots were smaller and more homogeneous in shape, and so buildings were closely spaced together. Historically, with the greater demand for urban space in places like the old city of Santurce and its northern beachside precinct of El Condado, more and more natural space (small farms, wooded lots, and residential gardens and yards) gave way to the built environment, which is to say that it gave way to mid and high rise buildings, and an increasing amount of concrete and steel over plants, trees, and vistas.

In this chapter I investigate an important aspect in Klumb's place making repertoire, that is, the ways that he attempted to stem the twin tides of the receding natural world and the resulting encroaching of the built environment. Then in this chapter's historical episode I highlight a time period that had a profound influence upon Klumb's views on the city, and so stands as an additional phase in the process of impressing a sense of place on him. That period

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 $^{^{\}rm 1}$ Klumb, "Prepared for the Opening of 'Skyscraper Architecture'," 10.

was the time between when he left his native city of Cologne in June 1927 and when he joined Wright at Taliesin in January 1929. While much has been written about two of the most influential periods in Klumb's life (his tenure with Wright and his early experiences with Puerto Rico's Committee on Design of Public Works), relatively little has been written about this short but important time. In Klumb's recollections of this period not only do we see his evolving views on the city but also his views on some of the most influential architectural movements and people of the late 1920s.

Architecture Analyses: Balancing Nature with the Burgeoning Modern City

For Klumb, it was a struggle at times to interject open air rooms and natural elements into his residential designs. When he presented preliminary house drawings to his clients at early planning meetings, those plans often included many of the staples in his inventory of design elements. In the case of the suburban Fernandez Garcia House (1950), for example, at two different points in the design process Klumb planned for between 550 and 650 square feet of outdoor spaces into the 4/5 acre lot. As can be seen in figures 7.1 and 7.2, among these were multiple stone-paved terraces, a generous stone-walled planting area, a small pool of water, and a play and service yard. Yet over the course of the design process leading to two sets of construction documents, all but a small terrace, a service yard, and an indoor patio small enough to fit under a skylight fell away.

The Kogan House

Nowhere was Klumb's struggle to include open air rooms and natural elements more apparent than in his houses set in dense urban areas. An early example was the Kogan House (1949) in the oceanside community and popular tourist destination of El Condado. The Kogan House, shown

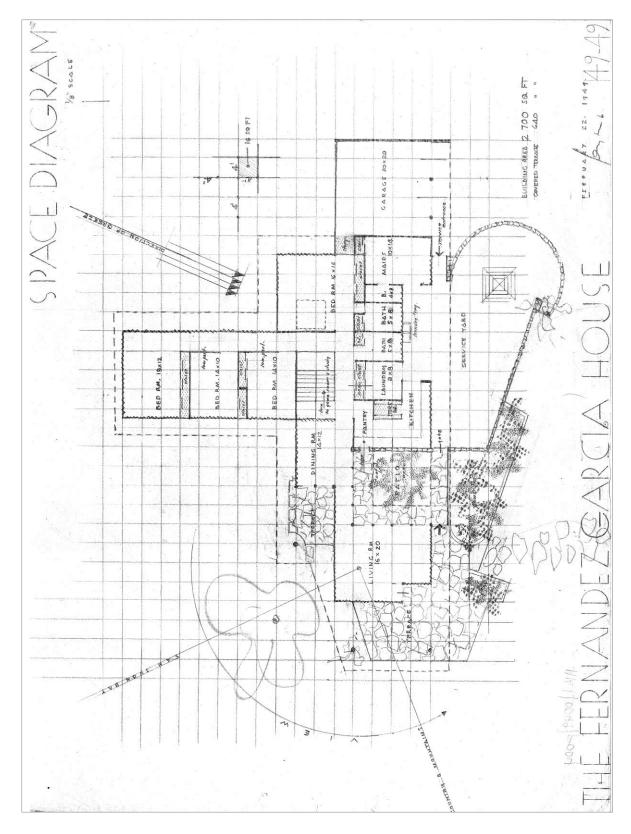


Figure 7.1. Preliminary floor plan, the Fernandez Garcia House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

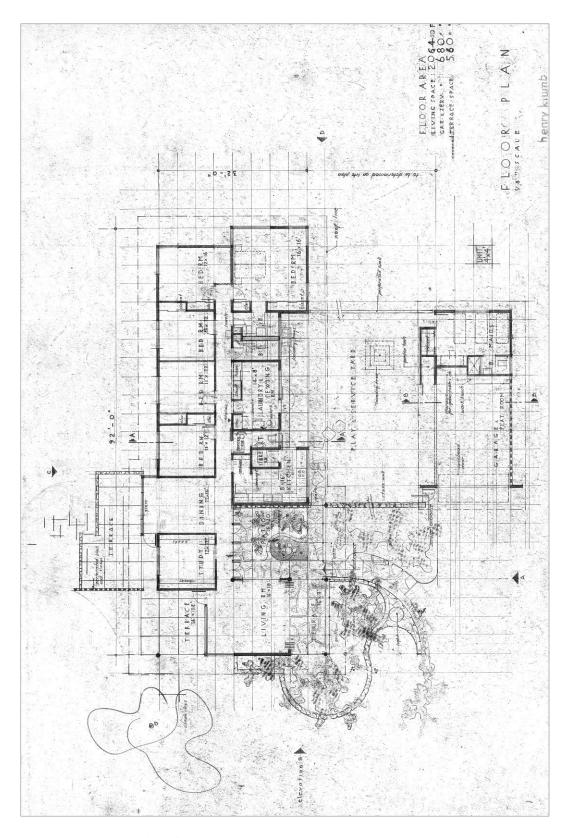


Figure 7.2. Presentation drawing, floor plan, the Fernandez Garcia House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

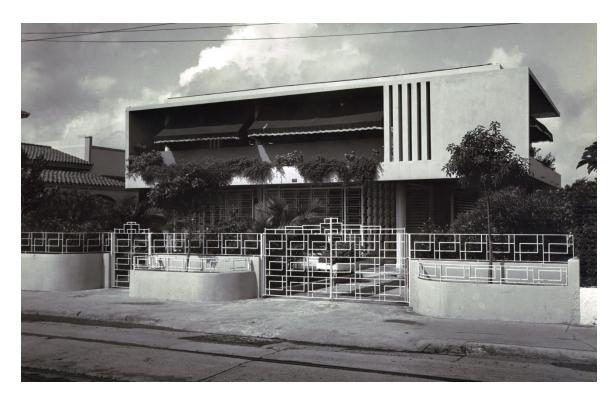


Figure 7.3. The Kogan House. Image courtesy of the AACUPR.

in Figure 7.3, is one of Klumb's most well-known residences among Klumb scholars, informed local architects, and interested laypersons. One of its main points of interest is its resemblance, at least on the surface, to Le Corbusier's Villa Savoye. Because of this similarity it has been presented as a building in the spirit of architecture's International Style in vogue in Europe and the United States between the 1920s and 60s.² Of greater interest for our purposes are Klumb's intentions for the Kogan House before it became a local symbol of Puerto Rican modernism.

In an early floor plan of the Kogan House, shown in Figure 7.4, Klumb planned for extensive outdoor spaces on the grounds of the 1/4 acre lot. These included an area at the front of the house with a combined stone-paved terrace and a large, stone-walled patio. At the back of the house he planned for another stone-paved terrace, a curvilinear pool of water similar to but larger than the one at Haeussler, and a garden covering roughly one fourth of the property. Between

² Figueroa and Vivoni, *Henry Klumb*, 12-13; and Fuster and Crichfield, "The Klumb House," 52.

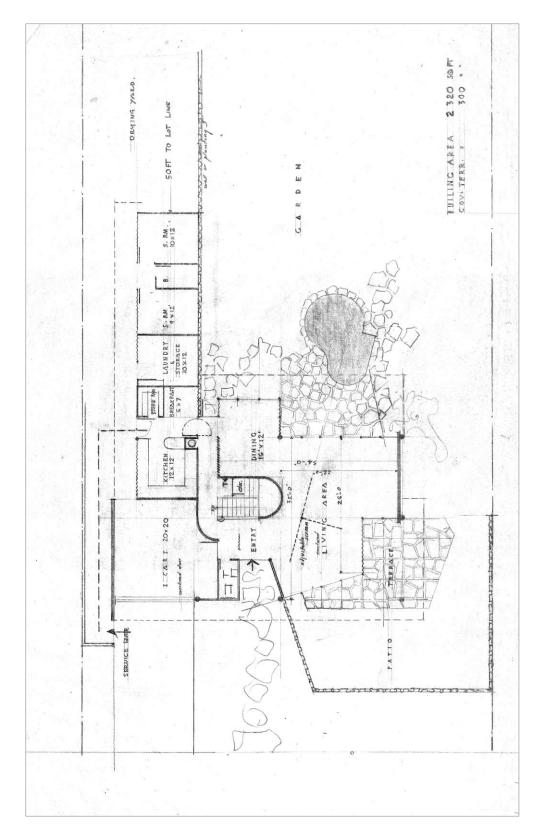


Figure 7.4. Preliminary floor plan, the Kogan House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

these two areas of open air rooms Klumb also inserted a glazed living room that allowed visibility into both of these important front and rear areas. Despite these many spaces already planned for the ground floor, Klumb found the room to include a carport, a kitchen and dining room, servants quarters, and yet another open air room in the form of a service yard.

The reasons for putting these open air rooms on the ground floor and in both the front and back of the property were many. First, the house was on the west end of El Condado, where that part of town begins to narrow into an isthmus. Thus, as can be seen in figures 7.5 and 7.6, the property was ideally located to benefit from cool breezes from Condado Lagoon 450 feet to the west-southwest and from the Atlantic Ocean 700 feet to the north-northwest. Second, by putting these spaces on the ground, the living spaces that were supported overhead by *pilotis* turned the terraces into covered terraces, and thus provided those spaces below with cooling shade. Also, as the composition of these open air rooms included a pool of water akin to the Klumb House's pond and similar pools in other designs, it was reasonable to combine these elements on the ground rather than on the second floor or a roof terrace. Over time, these many outdoor spaces



Figure 7.5. Satellite imagery of the Kogan House. Image © UPR, courtesy ESRI, modified by the author.



Figure 7.6. The Kogan House site (indicated by the circle). Image © UPR, courtesy ESRI, modified by the author.

that Klumb intended for the ground floor at the Kogan House were reduced to a stone-paved entryway and several nondescript planting areas designated "N.I.C." (Not in Contract).

The Marrero and Velez Houses

If the resulting absence of the multiple open air rooms and their constituent elements that were originally intended for the Kogan House would seem to point to the inevitable demise of such spaces in the confined quarters of an urban building site, the Marrero (1957) and Velez (1962) houses indicated otherwise. I will begin with the former.

Even though the Marrero House was located on a plot of land that was even more restricted in size than the Kogan House property – the area of the Marrero House lot measured approximately 3,650 square feet – in the ground floor Klumb was able to interject an open air room and numerous natural elements as shown in Figure 7.7. First he placed a small planting area at the front of the house. Next, at the back of the house he also placed a covered terrace under the projected structure of the second floor. Not surprisingly, early floor plans of the house indicate that the prevailing winds on the site were directed towards the back of the house. One vertical support for the second floor was a long, slender concrete pier (measuring 6" in width and 4'4" in length) that stood in one corner of the terrace. This pier was unusual not only due to its dimensions but also because Klumb surrounded the base of the pier with a small pool of water that was both curvilinear and polygonal. Also, at the very back edge of the property Klumb preserved an existing mango tree. This entire rear area at the back of the house was screened from the street by a stone wall.

In designing the Velez House in the southwestern town of San German, Klumb contended with two challenging conditions – a constricted urban site and a sloping topography. The latter is shown in Figure 7.8. Despite these seeming obstacles, several plants and trees

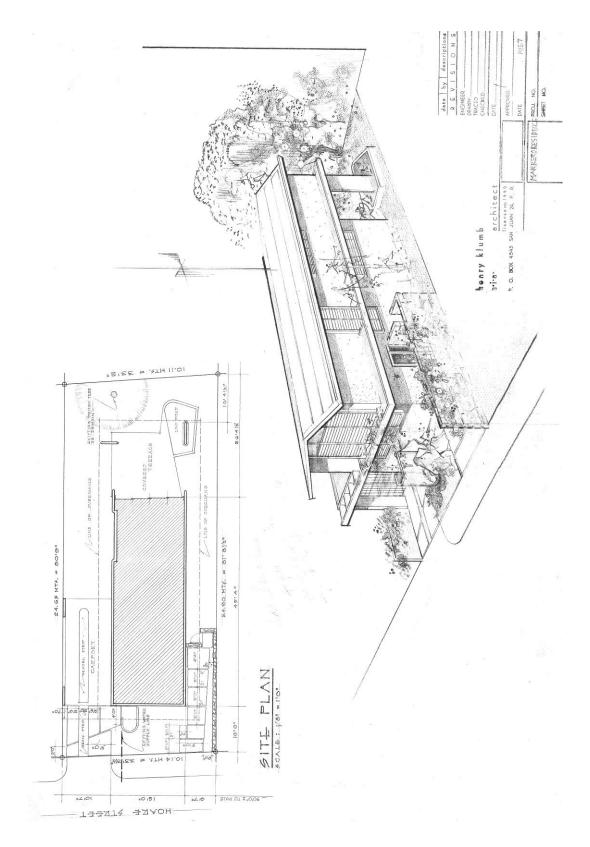


Figure 7.7. Aerial perspective and site plan, the Marrero House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

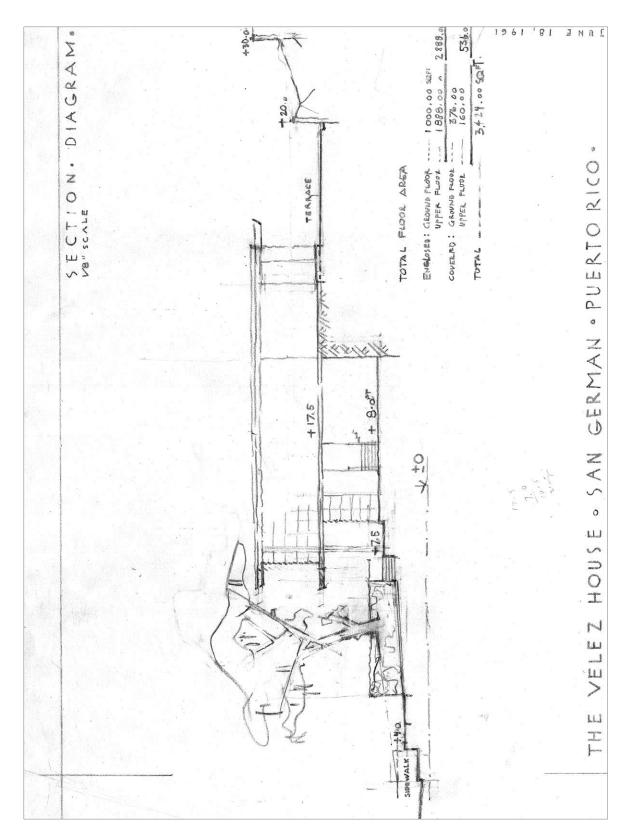


Figure 7.8. Initial site and house section, the Velez House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

already on the site were to Klumb's advantage if he wished to incorporate open air rooms and natural elements into this urban residential design. These things he did, as is shown in Figure 7.9.

The principal outdoor space is at the rear of the Velez House. There Klumb designed a covered, concrete-paved terrace. In the little amount of space remaining on the lot and beyond the terrace to the north Klumb incorporated many preexisting plants and trees into a planting area. Along the side of the house there was also a linear planting area. Finally, at the front of the house Klumb preserved a prominent natural element – a large shade tree around which he preserved other plants.

Interestingly, although the Velez House is situated orthogonal to the street and to the property boundaries, both the paving pattern and the back edge of the terrace are angled as a concession to the contour lines at the rear of the property. Klumb must have given considerable thought to this concession to the landform because in one scheme for the house he rotated the entire floor plan 15° counterclockwise so as to align it with the site's contour lines. To have accomplished this Klumb intended to rely on a rhomboidal planning grid. This would have been yet another significant concession to the site's preexisting conditions and one more vivid example of Klumb's merging of the grid and the landscaping. Nevertheless, the only remaining diagonal elements in the plan were at the terrace.

Planting areas, covered terraces, trees and other vegetation, a small pool of water, and a stone wall – these were not many concessions to the outdoors and to a lack of a natural environment, but their inclusions in the Marrero and Velez houses were remarkable nevertheless. The Marrero House sits on the smallest site of all of the houses investigated in the course of this dissertation, yet Klumb went to great lengths from the outset of the project to complement one necessity for life (the physical shelter) with another similar necessity (a microenvironment of

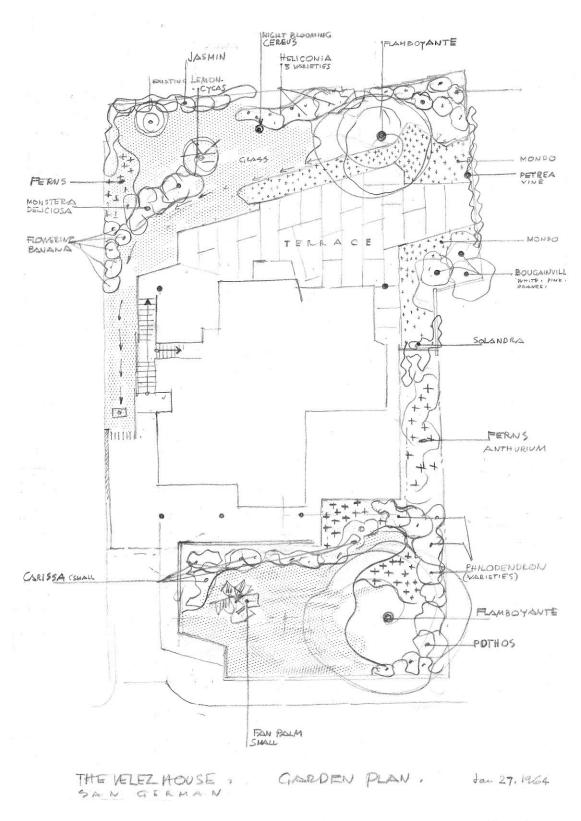


Figure 7.9. Garden plan, the Velez House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

natural elements). The terrace and many green spaces at the Velez House were a triumph for Klumb. Given the uncertain future of such proposed spaces generally in some of Klumb's proposed house plans and especially his highly restricted urban houses, the amount of natural elements and the size of the terrace are extraordinary. The result is that the Velez House is defined as much by its outdoor spaces, natural elements, and conformity to its site's topography as it is by its compact urban form.

The Marrero and Velez houses, then, were small examples of what the Kogan House could not be. What we began to see in the case of the Kogan House is that even where space was extremely limited, as it invariably is in the city, Klumb's intentions were always clear: every design project could and should accommodate a great many natural elements. Klumb always saw opportunities to open a house to the outdoors and interject natural elements into it, even if his planned open air rooms and their constituent natural elements happen to recede in the planning, design, and construction phases of houses, as they did in the Fernandez Garcia and Kogan houses. These natural effects of which Klumb was such a strong a proponent, however, were only possible if an architect's innovative abilities were given free rein, with the understanding that such design elements were not merely products of the architect's fancy but rather enhancements in pursuit of, in Klumb's terms, a more humane architecture.

The careful balancing of natural elements and open air rooms with the restricted confines of urban sites was integral to that part in Klumb's core architectural principles that revolved around the aphorism that man is the measure of all things. The balance was to the betterment of his building's inhabitants, as we have seen in the cases of the Klumb House and the open air rooms in the previous chapter.

Klumb's balancing act within an urban context was also an extension of both his

experiences with Frank Lloyd Wright in Arizona and Taliesin, and with his thorough grounding and espousing of Wright's theory of Organic Architecture. In terms of the latter, a specific aspect bears mentioning, and it was a part that Wright explained in his 1908 essay "In the Cause of Architecture."

"A building should appear to grow easily from its site and be shaped to harmonize with its surroundings if Nature is manifest there, and if not try to make it as quiet, substantial and organic as She would have been were the opportunity Hers."

Klumb's approach to urban residential design adheres to the second part of this statement: where natural environments and elements are not manifest, it is an architect's duty to make them manifest. The reason why, espoused by Wright throughout his writings, was summarized by Klumb when he wrote,

"Every word written, every building built by Frank Lloyd Wright, expresses the surge for creative truth to bring to earthly efforts spiritual values and an awareness that man belongs to and is an inseparable part of nature."

Klumb's urban houses such as Marrero and Velez likewise reflected the lesson that he said he derived from studying Louis Sullivan's buildings. That lesson, expressed in the quote cited at the top of this chapter, was that despite the unintended consequences of the modern city, a visionary architect could "achieve for man his appropriate right to space, to air and freedom." 5

In the final analysis of Klumb's houses in dense urban spaces, these houses comprised a small part of his overall residential practice in Puerto Rico. Most of the houses that Klumb designed and built on the island were slated for generous suburban plots. On many such occasions these same suburban houses were some of the first to go into new residential developments.

³ Wright, *In the Cause of Architecture*, 55.

⁴ Klumb, "Wright, the Man," 12.

⁵ Klumb, "Prepared for the Opening of 'Skyscraper Architecture'," 10.

Roughly of equal or greater number to Klumb's houses in dense urban spaces were his houses in Puerto Rico's remote, mountainous countryside. And last were his vacation or weekend getaway houses in or near coastal towns. Yet, though small in number, Klumb's urban houses were a sort of culmination to the more spacious and evocative structures that exemplified the themes of the grid and the landscape, vernacular influences, and open air rooms. Lastly, as these houses were inheritors of lessons about the city derived in part from Sullivan and Wright, in the subsequent section, the final historical episode, we will see how Klumb's transition from Germany to America shaped some of his views on the urban context.

Historical Episode Number Five: 1927 – 1929 From Cologne, Germany to the American Metropolises of the late 1920s

As was noted in the dissertation's introduction, we know very little of Klumb's early years in Germany and how he felt about his homeland. That is because until his later years, when he was becoming more conscious of his legacy, Klumb was not one to reminisce a great deal about his past in his voluminous collection of correspondence. And strangely enough, when he did look back upon his life he had very little to say about his earlier life in Germany. As an example, when Klumb returned to Germany in 1931 in order to oversee the Wright exhibit's European tour he did not record any joyous recollections of homecoming. His correspondence at that time and his later recollections of that time period were strictly and always focused on his duties as they pertained to the exhibit tour, his encounter with Philip Johnson in Berlin, and the tour's important mission to promote once again Wright's works and ideas to a European audience.

Also, the 1930s government of Nazi Germany and the events of the Second World War during the early and mid-1940s went almost altogether unremarked by Klumb throughout his life. And

as a final example, on one occasion, even when prodded by a close friend to be more forthcoming on the influence of his German youth, Klumb balked. Amidst a series of letters in 1980 and 1981 between two old friends from Taliesin, Elizabeth Kassler wrote to Klumb, "Germany of the twenties was formative in your experiences, surely" adding later, "Why not put the separate pieces together in writing even as you have assimilated them in architecture? An autobiography is what I suggest." Tellingly, there is no record in the Klumb archives where he offered a response to her on the subject of Germany, although he did provide her with a great deal of information on many other areas of interest between them.

In order to examine this key phase of Klumb's life, I will use as a point of departure his autobiographical pamphlet, *Henry Klumb 1: Architecture in Search of Higher Values, 1929-1933* (hereafter *Henry Klumb 1*). This unpublished manuscript is useful for our purposes because it is filled with Klumb's impressions of when he emigrated from Germany and of his arrival in the United States. These impressions are captured primarily through Klumb's many photographs, newspaper and magazine clippings, drawings, and aphorisms derived from his later speeches and public statements. Other key documents that touch upon this early part of his life will also bolster the information found in this pamphlet.

It is a very curious fact that out of the sixty-five pages inside *Henry Klumb 1*, Klumb dedicated only two pages and a total of five images to represent his early life in Germany, or rather, to represent the entirety of the first twenty-two years of his life. Of those two pages and five images, the first page includes three images that deal with him leaving his native homeland. The three images are a snapshot of Klumb before boarding his ship, a newspaper or magazine illustration (a drawing) of a modern ocean liner docked next to one of Columbus' ships, and a

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⁶ Kassler to Klumb, letter dated 16 September 1980. The context of the letters between Kassler and Klumb at the time was Kassler's ongoing work in compiling her listing of architects and artists who had been with Wright at Taliesin and Taliesin West. She published her directory in the fall of 1981, and a supplement the next summer.

short satirical piece written by Arno P. Mowitz, one of Klumb's friends. This last piece is titled "Klumbumbus, or the Discovery of America" (*Klumbumbus*, *oder Die Entdeckung des Amerikas*). On the next page, what is left for us to consider are a small color map from 1910 of the Cologne city center and a photograph depicting the Cologne Cathedral as seen from the far side of the Rhine River. The map is roughly the size of a business card. On the other hand, the photograph of the cathedral, shown in Figure 7.10, supersedes in size and placement all of the other images of this German period. This photograph is the largest of the five images – it measures over eight inches square and takes up most of its 8½" x 11" page of the pamphlet – and it is the last thing we see before Klumb transitions to his arrival in the United States.

Klumb, it would appear, was quite fond of the great Cologne Cathedral. Not only did he choose to give it a position of great prominence in *Henry Klumb 1* (he picked it to stand out among such a small number of images to depict over two decades of experiences and memories in his native city and homeland), he also collected over his lifetime a small number of publications that harkened back to his time in Cologne. In each of these items the cathedral was either the sole focus of the publication or the cathedral was prominently featured in them. The Cologne Cathedral was and still is the symbol of the city. But in what ways was the cathedral important to Klumb, and what might it have said in relation to this time in his life? Perhaps the cathedral was the last thing he saw, or wanted to remember seeing, as he was leaving home. Or perhaps it was symbolic of something else. My contention is that this image of Klumb's past life in Germany stood in sharp contrast to what came next when he immigrated to the United States.

In the photograph of the Cologne Cathedral, the building itself does make for an imposing image. Rising 516' (157 m) and sitting approximately 885' (270 m) west of the bend in the

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⁷ Among these items is a 1950 reprint of a newspaper from 1880 that commemorated the official dedication ceremony of the Cologne Cathedral. Two others are a 1960 picture book on Cologne and a city guide published in 1979 by the Cologne Tourist Office, both of which showcased the cathedral.



Figure 7.10. The Cologne Cathedral, from an original photograph in the Klumb pamphlet *Henry Klumb 1: Architect in Search of Higher Values, 1929-1933*.

Rhine River that defines the city center, its twin Gothic towers and tall stained-glass windows dominate the old city's skyline. The photograph also portrays a genteel image. All other buildings are subservient to the grand old cathedral. Birds are gracefully gliding in the breeze, and there are old fishing boats traversing the river.

When Klumb immigrated to the United States, his earliest impressions (which filled nine

pages of *Henry Klumb 1*) were dominated by city scenes that were quite different from the image of the Cologne Cathedral. The principal themes evident in Klumb's collection of images from New York, Chicago, and Detroit are, first, the character of the city as shaped by a great number of skyscrapers, and second, the frenetic pace of urban life. Multiple images in *Henry Klumb 1* portrayed what Klumb's eyes (and camera lens) saw. Skyscrapers overshadowed the modern American city. The skyline was palpably different than Cologne or any of the quaint European cities of that same era, the late 1920s. Whereas in Europe a single cathedral dating all the way back to medieval times could dominate a city's skyline, in the United States the many different tall buildings competing for aerial supremacy were astounding. Klumb described "the endless maze of endless rows of skyscrapers" as "dazzling to the casual visitor and to him who need not leave the boulevard and the luxuries along the city's glistening façade." Office buildings rose so high that their ground and top floors were lost in sight to the public. All that was visible were the seemingly endless stacks of floors encased in the checkerboard façades that resulted from the hundreds of small, rectangular windows and the smooth terra cotta cladding on the outside of the buildings. To this urban explosion there seemed no end in sight. At every corner the canyon-like city streets were being augmented by the skeletal steel frames of yet more tall buildings under construction. Down on the ground, a person was equally affected by the many cars and the volume of pedestrian traffic, the billboards and neon signs, a tangle of subway lines diverging in different directions, or the noise coming from subway platforms high overhead. Such were the sights that Klumb encountered, and photographed, upon arriving in the United States.

These sights were no doubt impressive and exciting, but not without room for criticism.

On the pages of *Henry Klumb 1*, beside some of the images of skyscrapers, Klumb borrowed from Frank Lloyd Wright and wrote "The realization" and "The integrity." But next to a picture

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 $^{^{9}}$ Klumb, "Prepared for the Opening of 'Skyscraper Architecture'," 3.

of Bowling Green Park in Downtown Manhattan – a small patch of fenced-in grass with five gaunt trees – he sounded a critical note when he wrote, "The village green. Progress?" And as a further commentary, among the many images of the city in *Henry Klumb 1* there were also a number of direct counter examples to the image of the Cologne Cathedral. In a series of photographs of New York City, including the photograph of the New York harbor in Figure 7.11, large modern cargo ships, packed with shipping containers, are crisscrossing the waterways. Walls of skyscrapers seem to come all the way to the waterline. There are no birds in sight, and hardly any people are evident.

One view of the significance of this transition period for Klumb, which has been alluded to by the Klumb scholar Enrique Vivoni, revolves around the dichotomy between the old and the new. 10 This dichotomy is brought into focus in the small amount of text inside *Henry Klumb 1*. This text, a sort of running commentary composed of aphorisms and recollections, comes primarily from "My Architectural Design Philosophy," a paper akin to a manifesto that Klumb presented at the 1979 AIA national conference.

In "My Architectural Design Philosophy" Klumb recalled that in the infancy of the twentieth century the world of architecture, as well as the world at large, was at a crossroads. "A general reassessment of the past was badly needed," he wrote. In the realm of architecture a way forward was made available through the visionary work of Frank Lloyd Wright, who had just published in Germany his now famous 1910 Wasmuth Portfolio. But, Klumb wrote, "Before its full impact could be felt war intervened. The catastrophic upheaval that followed did not allow evolutionary processes to take their course. The old was buried and the new imposed," adding later in the paper, "I grew up in this unsettled era of post war Europe." 11

 ¹⁰ Vivoni, "Modern Puerto Rico and Henry Klumb," 32-33.
 ¹¹ Klumb, "Writings," 320-322.

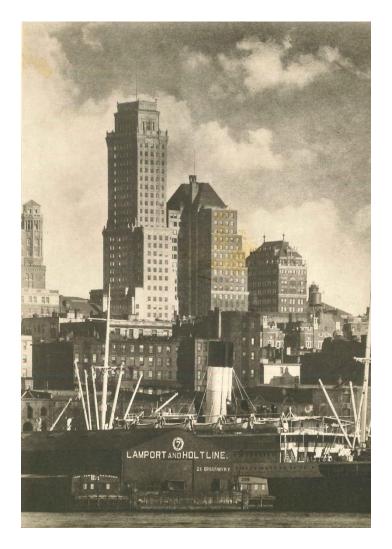


Figure 7.11. New York Harbor, from an original photograph in the Klumb pamphlet *Henry Klumb 1*.

In this context, the city of Cologne that we glimpse in *Henry Klumb 1* can be read to stand for the old, that is, not only old world architecture and thinking, but also Klumb's origins, his traditional past, and his cultural heritage. Klumb recalled these parts of his life only in exceedingly rare instances, and when he did it was with little judgment, prejudice, or relatively much comment. So whether Klumb was nostalgic or in any way personally indebted to his German past, he left almost no indication of it. America, its skyscrapers, and its metropolises, on the other hand, can be read to stand for the new, yet not necessarily an altogether good or favorable new. And that was because the past was discarded, unheeded, as Klumb put it, buried.

What came to replace it was not necessarily appropriate or organic to society's problems at hand but rather, again, as he put it, imposed.

But imposed by whom? Although Klumb did not mention them by name, in "My Architectural Philosophy" he alluded to some of the most influential figures in modern architecture, particularly the proponents of the International Style. In one such charge he alluded in one fell swoop to Le Corbusier, Adolf Loos, and Hannes Meyer when he contemptuously wrote, "Houses were to become machines for living, pitched roofs became a heresy and ornament a crime. Architecture was reduced to a formula adhered to with intellectual vengeance." Also, to single out Philip Johnson and Henry-Russell Hitchcock, he wrote, "The new – called 'the modern style' was later imported by Americans for Americans when it was proclaimed the 'international style'." 16

Conspicuously absent from "My Architectural Design Philosophy" was the Bauhaus, a group that by virtue of its proximity to Cologne was an even more personally felt presence. But to Klumb, the accomplishments and ideology of the Bauhaus were for naught. Spurred on years later by Ada Louise Huxtable's essay "Is Modern Architecture Dead?" and Thomas Wolfe's book excerpt "From Bauhaus to Our House" in *Harper's Magazine* (both published in 1981), Klumb responded with letters to friends and to Ms. Huxtable herself. In those letters he derisively called the Bauhaus movement "the Bauhaus indoctrination," and further characterized the European architectural scene of the late 1920s as "alive alright with intellectual vengeance, but void of spirit and man's inner needs – my reason for leaving Germany and the Bauhaus

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¹⁵ Klumb, "Writings," 320. The remark that "Architecture was reduced to a formula" may very well have been a reference to Hannes Meyer's famous edict that "all things in this world are a product of the formula: (function times economy)." This, Meyer went on to say, was especially true of building design and construction. See Meyer, "Building," 117.

¹⁶ Klumb, "Writings," 320.

influence to be with Wright." On another occasion, he similarly said of his fellow architects and himself working with Wright at Taliesin in 1929, "We were trying to escape from the sterile concepts of an international style." According to Klumb, the rising influence of people and institutions such as Le Corbusier, the Bauhaus, and Johnson and Hitchcock at the Museum of Modern Art led to a failure within the American architectural scene to see what was already native and promising in the architecture of Frank Lloyd Wright. This was made all the more evident in 1932 by Johnson and Hitchcock when they facilitated what Klumb called "the wholesale importation of hollowed values from abroad." 19 Klumb would also think later, imagine how it all could have turned out so differently. In reminiscing about this time period Klumb recalled a chance encounter with Johnson in Berlin in 1931. At this time Klumb was already in Wright's service and at the moment shepherding an exhibit of Wright's work through Europe. Johnson visited the exhibit and expressed an interest in having it shown at the MoMA. As Klumb later explained,

"However, something must have happened on the way to Mr. Wright. The Museum got the International Architecture [exhibit] first. If Johnson had seen the light at that time, which he apparently tried to do recently, but did not succeed in, the History of Architecture would have to be written differently."20

Klumb's statement above in reference to the International Style in particular was made in 1974, long after that term came into vogue following MoMA's International Style exhibit in 1932. In writing about the International Style as it manifested itself around him in the 1920s, Klumb was referring to the formal and aesthetic style choices sweeping through Europe before the term was actually coined in the United States. Nevertheless, Klumb's clearly disparaging

 $^{^{17}}$ Klumb to Tafel, letter dated 17 June 1981; and Klumb to Moscoso, Jr., letter dated 10 July 1981.

¹⁸ Klumb, "Wright, the Man," 13.

¹⁹ Klumb to Huxtable, letter dated 6 August 1981. Both Klumb and Ms. Huxtable shared a friendship with the AIA award winning architectural critic Frederick Gutheim. ²⁰ Klumb to Tafel, letter 17 June 1981.

views on the Bauhaus and the International Style are noteworthy because they represent one side of a sharply divided dichotomy. On the one hand, many of Klumb's buildings in Puerto Rico did owe a great debt to elements common in many Bauhaus and International Style buildings. As we have seen in this and previous chapters, Klumb's debt to these movements is particularly the case in Klumb's use of *pilotis*, free plans, and building forms and aesthetics predicated upon modern building materials and construction techniques. On the other hand, it cannot be understated the extent to which Klumb was highly critical of what he saw as the soulless ideologies behind the Bauhaus, the International Style, and some of the leading figures of early modern architecture.

The evidence and analyses that I have marshaled throughout this dissertation indicates that the synthesis between Klumb's two seemingly contradictory positions (between either antipathy towards or adopting the International Style) was that Klumb found elements of the International Style useful only so far as he could adapt them to Puerto Rico's living conditions, particularly the island's natural environments and socioeconomic context. In other words, Klumb looked to the International Style and other architectural movements only to leverage those parts of them which were befitting life in his new home of Puerto Rico. This he would have seemed to have affirmed, in addition to the comments on the Bauhaus and the International Style cited above, when he said, "I do not believe in styles or preconceived ideas. Ideas are born of our efforts to solve problems. That is why I cannot say beforehand what a building is going to look like without first having worked a problem."²¹ As such, the demands of this particular island place and its people were far more important to him than any ideological constrictions or aesthetic practices he may have inherited from the International Style or any other prevailing architectural trend. If he adopted certain aspects of the most revered Modern Architecture movements, he did not do so slavishly, which is to say without an understanding and critical

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 $^{^{\}rm 21}$ "Excerpts from an interview given to Julio Marerro," 2.

evaluation of their essential principles.

But returning to Klumb circa 1927 to 1929, Cologne lay in the past. The city, like so much of the Western World, was only beginning to feel the ever increasing pressures of modernism – from the *Deutcher Werkbund*, from the Bauhaus, from the onslaught of progress. Having grown disillusioned with his options on the European continent, he set out, as he would say on several occasions (and as noted by Enrique Vivoni) in search of higher values.²² Neither the modern American city nor the soaring architecture of its skyscrapers, however, nourished this appetite for something of greater value. Years later at the University of Puerto Rico, in an untitled speech (hereafter "Skyscraper Architecture") that was heavily influenced by Wright's own general antipathy towards urbanization and skyscrapers, Klumb spoke very clearly and directly on the subject of skyscrapers and the impressions that these buildings made on him upon arriving in the United States. It should be noted that Wright's dislike of rapid, modern urbanization and to skyscraper architecture in general was quite ironic, as he had designed several tall buildings, and later designed a mile-high skyscraper to house the entire population of Chicago.

The advent of skyscrapers was a modern eventuality, Klumb thought, but their resulting chokehold on humanity was not. In "Skyscraper Architecture" he explained that the way for a humane high-rise architecture had been presaged by Louis Sullivan, particularly through his Wainwright Building in St. Louis. Unfortunately, architects, developers, and financiers did not heed Sullivan's example. Profits and density overruled and have dominated ever since. The result being an undignified, unhealthy, overcrowded, chaotic, oppressive, and inhumane urban built environment. But, like the International Style that was foisted on the architectural community in the 1930s, it did not have to be that way. Apart from Sullivan's example, Wright, Mies van der Rohe, and even Le Corbusier proposed skyscraper designs in the 1920s that

²² Vivoni, "Henry Klumb and Poetic Exuberance in Architecture," 7.

challenged what Klumb saw as the prevailing negative trends in skyscraper architecture and the resulting urban fabric.²³ Klumb even pointed to SOM's Lever House in New York City as a fine example of a skyscraper whose ground floor entrance offered a pleasing open space to its visitors. Regardless, these were the exceptions rather than the rule. For the most part, Klumb thought, a humane skyscraper architecture had long ago eluded architects. Only architects who were attuned to how to meet the needs of people rather than those of investors could reverse the broken relationship between humankind, skyscraper architecture, and the city.

In "Skyscraper Architecture" Klumb hinted at something else that can help us to understand the significance of Cologne and the various cities that he visited early on while in the United States. It was something that would be very much at the heart of Klumb's sense of place. That was that Klumb leaving Germany, his reactions to some of America's largest cities, and his pursuit of Wright can be characterized as a flight from the city and towards nature. This is a pattern that was repeated at other times in his life, most notably at the times he contemplated living in the American Southwest and later on the two occasions when he moved first his home and later his office from the bustling and densely packed streets of Santurce, Puerto Rico to the less developed and less hectic surroundings (at the time) of the growing neighborhoods of Rio Piedras. In the case of his home, he specifically chose a 6.5 acre, secluded, verdant property on the edge of Rio Piedras. This flight from the city and towards nature is illustrated in "Skyscraper Architecture," when Klumb said, "This endless maze of endless rows of skyscrapers may be dazzling to the casual visitor [...] but how long can man survive as man in defiance of the renewing power of nature?" On another, earlier occasion Klumb's friend Steve Arneson had asked Klumb for recommendations on places to live and work in the United States. Klumb

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²³ The Wright, Mies van der Rohe, and Le Corbusier's designs Klumb was referring to were the St. Marks towers, the *Friedrichstraße* skyscraper, and the towers in the garden in the "City for Three Million People" project.

demurred on Chicago, due to "my dislike for big cities."²⁴ On a lighter note, Klumb thought enough of a quote about the city by the then Soviet Premier Nikita Khrushchev to jot it down and save it in his personal papers. The quote, attributed to Khrushchev while on a visit to New York City in October 1960, read, "There is not greenery. It is enough to make a stone sad."²⁵ Overall, as we have seen, more natural settings – such as the American desert Southwest, the tropical refuge of his Rio Piedras home, or the vacation getaway of Caneel Bay in the U.S. Virgin Islands – suited him better throughout his life.

Although the message of "Skyscraper Architecture" was overly heavy-handed for effect, Klumb should not be misunderstood as a proponent of anti-urbanism. As we have seen in his core architectural principles, the many different houses in this dissertation, and the previous historical episodes, he was merely a proponent for more humane built environments – whether in cities, suburbs, or the country – and the ethical duty of architects to provide them.

In the end the significance of Cologne and the American metropolises lay in part in that in the transition from one to the other the experience still left Klumb with a longing or searching for something more than an architecture that was the product of crass commercialism and surface level aesthetics. So, travelling to New York, Detroit, and Chicago, where he took in the sights of Louis Sullivan and Frank Lloyd Wright's buildings, he was still not satisfied. The goal was always to contact and work for Wright. For a brief time he worked as a draftsman in St. Louis. After reaching Wright through a letter in the summer of 1928 he joined Wright at Taliesin early the next year. The stage was set for new places and a new series of experiences that would have the longest lasting and most significant impressions on Klumb and his sense of place.

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²⁴ Arneson to Klumb, undated letter (c. 25 November 1948, the letter was written around Thanksgiving), and Klumb to Arneson, letter dated 1 December 1948.

²⁵ Klumb, handwritten note with Khrushchev quote.

²⁶ Klumb chronicled his movements from one city to another in the prepared comments for "Skyscraper Architecture."

CHAPTER 8: CONCLUSIONS

In this dissertation I set out to determine two key aspects related to the German-Puerto Rican architect Henrich "Henry" Klumb. The first aspect was the evolution of Klumb's beliefs, actions, and feelings towards those locations that through time, tradition, experience, personal investment, or immediate appreciation became important or meaningful to him. This I defined in the introduction as an individual case of a person's sense of place. The second key aspect related to Klumb was in what ways, if any, were his recollections and views towards those important and meaningful places both influential and demonstrated in his residential architecture practice in Puerto Rico from 1944 to 1975. The research question that encompassed both of these objectives was simply as follows: How did Henry Klumb's life experiences shape his sense of place, and consequently his houses?

The issue of whether Klumb possessed a sense of place at all, especially as it related to Puerto Rico, was not a principal objective of the research presented here. As discussed in the introduction, that issue is already a part of the present scholarship on Klumb. Nevertheless, an important contribution of this dissertation to the field of Klumb research in particular and architectural history and theory in general was insights into the specific makeup of Klumb's sense of place as understood through the lens of architectural phenomenology.

In this chapter I will delineate in three parts the results of the dissertation. Those three parts are as follows:

- 1. Major findings of the research.
- 2. Contributions to scholarly research on Klumb, and to architectural history and theory.
- 3. Areas of limitations of the study and areas of further investigation.

Major Findings

In this dissertation I posit five major points in response to my research question. The first such point is as follows:

1. Klumb's life was punctuated by personal and professional experiences that were instructive to him in how and what to value from particular places.

Klumb's life can be seen as a series of relocations. And each of these relocations left impressions upon him that he recalled and carefully reflected upon for many years after those experiences. He then incorporated his interpretations of those experiences into firmly held views on the built and natural environments.

Klumb associated his leaving Germany in 1927 with leaving behind unsatisfying and ultimately failed ideologies related mainly to the Bauhaus and the then emerging International Style. In arriving in the United States he faced with great wonder the skyscraper building booms in New York, Detroit, Chicago, and St. Louis. Although these modern contributions to the built environment held great promise towards addressing real needs arising from large scale urbanization, the driving motivations of developers – the continued dense packing of people and spaces in a never ending pursuit of higher profits – ultimately led to urban solutions that served businesses' desires rather than the real needs of people. Then, in allying himself with Wright in 1929, Klumb encountered two new locations that demonstrated a harmonious bridging of built and natural environments. In Klumb's mind, and as expressed both contemporaneously and many years after the fact, his experiences at these two locations, Taliesin in rural Wisconsin and Camp Ocotillo in the Arizona desert, quenched a longing for a truly viable architectural worldview. This worldview was Wright's Organic Architecture.

During the next eleven years after leaving Wright, from 1933 to 1944, the one experience

that came to mold Klumb's evolving sense of place the most was his series of Native American projects. The most noteworthy place from this period was the American desert Southwest region. In the Papago Tribal Community House project in particular, Klumb was able to apply Wright's Organic Architecture into a building that was in full concert with regional construction techniques and materials, the surrounding natural environment, and cultural sensibilities and requirements.

Lastly, Klumb's experience in the cities, suburbs, coastal resort towns, and mountainous countryside of Puerto Rico both crystalized those earlier experiences at various locations, and set the stage for additional lessons in environmentally, socially, and culturally conscious tropical architecture design. Through all of these experiences from 1927 to 1984 Klumb learned to read the many forces that influenced a design project and its site. These included natural and built environments, vegetation, topography, distant yet important landmarks, local building traditions and use of native materials, and environmental factors such as light, shade, and cooling breezes. Klumb's life, professional practice, and works benefitted greatly from these insights into the lived world.

2. Both the specific characteristics of those places listed above and select people associated with those places were instrumental in shaping Klumb's sense of place.

Each of the critical stops along Klumb's many relocations exhibited unique characteristics that influenced his perceptions of those places, and hence shaped his sense of place. Also, an important aspect related to each of those stops was a guide or mentor who directed Klumb to see the unique characteristics of those many places. Wright, of course, stands out as a guide at various points in Klumb's journey. At Camp Ocotillo he brought to Klumb's consciousness natural landforms, cooling breezes and shade, an array of natural colors and textures, and the

desert's scant but wildly varied vegetation. A similar orientation by Wright continued at Taliesin. There Wright's Organic Architecture came to full fruition in the stone walls, rolling hills, wood structures, green fields, shingled roofs, wintry icicles and snow banks, and sheltering interior spaces. But Wright's influence was not limited to experiences at Camp Ocotillo and Taliesin. Prior to Klumb joining him, Wright's published works and writings had challenged Klumb in Germany to imagine a different trajectory to the ever changing modern world, especially as that world was being imagined by avant-garde architects. Knowledge of the writings and built works of the historical figures of Friedrich Schinkel and Louis Sullivan, and of the contemporary figure of Wright himself, shaped Klumb's outlook on the modern city. Wright's guidance, then, was the most pervasive and longest lasting throughout Klumb's career. He recalled it fervently and with tremendous reverence until the end of his life.

In relation to Klumb's immersion in Native American cultures, it was an Austrian immigrant – the local expert, advocate, and public administrator René d'Harnoncourt – who served as Klumb's second principal guide. He facilitated Klumb's wide ranging education revolving around Native American geography, building traditions, native materials, rituals, art, and everyday use objects. Thus d'Harnoncourt enabled Klumb's efforts in understanding, representing, and then designing for an altogether new population and their unique contexts.

The role of the guide when Klumb arrived in Puerto Rico is not as clear as it is with Wright and d'Harnoncourt. By then Klumb was almost forty years old, a skilled architect, and in possession of many experiences conducive to having a general sense of place. Nevertheless, we may point to an organization, a number of individuals, or some other unknown influence as potential guides. The organization would be the Committee on Design of Public Works, which channeled most of Klumb's early efforts in Puerto Rico into projects of socio-economic benefit

to the local population. The CDPW also exposed Klumb to local working conditions, building materials readily available on the island, many public works projects, and the various contexts that a new architect would have faced throughout Puerto Rico.

A second possible candidate for the role of guide to Klumb in Puerto Rico is Steve Arneson. By the time that Klumb arrived on the island, Arneson had already been working with the CDPW, had married a Puerto Rican woman, and his wife had given birth to their daughter. It was Arneson, after all, who also alerted Klumb of the work opportunities in Puerto Rico, then facilitated his transition into the CDPW, and worked jointly with him for the brief time he had remaining on the island. Klumb and Arneson even resigned from the CDPW together. As such, it would be conceivable that Klumb could rely on his longtime friend and native English speaker to orient him to this new land.

The last person or group that could have acted as a guide to Klumb in Puerto Rico is a figure or organization unknown to us because of a lack of surviving evidence. But since Klumb's earliest work experiences in Puerto Rico were seen to translate to many later designs on the island, it is reasonable to think that either the CDPW, Arneson, or both were helpful mentors to Klumb at this time and place.

The importance of the guide in the development of a person's sense of place refers to Relph's notion that developing an affinity specific to a special place or generally in regards to places is a transferable skill or ability. So, as discussed earlier in the theoretical framework, a sense of place can be taught, learned, refined, or strengthened, both individually person-to-person and collectively through community norms or beliefs. The actions of a guide, then, are mechanisms that are important in understanding a person's acquisition of a sense of place.

3. Klumb's residential practice in Puerto Rico demonstrated his abilities to read and adapt to local environmental conditions and domestic building practices, while simulta-

neously infusing modern materials and design sensibilities into the island's evolving built environment.

Looking at each of Klumb's houses as a synchronic and discrete object, a set of common themes arise. Furthermore, those themes are a fusion between local, contextual influences and larger issues related to modernity and modern architecture. The theme of the grid and the landscape was shown to combine the longstanding and common practice of a spatial-structural planning grid with a project site's more idiosyncratic topography, vegetation, and landmarks. Second, Klumb adopted local building traditions from Puerto Rico's rural working poor in order to build homes of modern materials and internal spatial configurations on terrain that was shaped by the island's interior mountain range. Third, every house designed by Klumb for a Puerto Rican setting utilized the site's topography and environmental factors so as to meet, channel, or allow the free movement of the incoming breezes at a building site. Fourth, based on his observations and critiques of the city as a product of the Modern Architecture movement, Klumb reinterpreted the modern urban dwelling in Puerto Rico's densely packed and growing metropolitan areas to balance the requisite built structures and site conditions with spaces that were inclined towards the outdoors and a multitude of preexisting or transplanted natural elements. These four themes of Klumb's houses were not mutually exclusive, but rather existed in combinations with one another so that each house provided its inhabitants with a harmonious blend of the local and the modern, as well as built and natural environments.

The four themes evident in Klumb's houses were presented in the dissertation in a cumulative manner from simplest to most complex and inclusive. In doing so, these four themes constitute not only discrete design strategies but also a design process. This design process proceeds from the basic step of reading the site's topography and projecting a building onto the site through the use of a planning grid. The planning grid is not rigid but instead is adaptable to

the particular conditions to the site. Next in this design process, the architect imparts a form onto the building. In key cases this is a form predicated upon vernacular precedents. Then the architect begins to give shape to the individual spaces of that house. With a site's environmental forces in mind, the designer begins with the outdoor space, which in Klumb's conception of a tropical architecture for Puerto Rico means beginning with the open air rooms. Lastly there is the special case of all of these design elements coming together in the urban context, where a carefully crafted balance between human products and natural elements are weighed against the highly restrictive constraints of a city lot.

4. There were strong links between these residential design themes or skills on the part of Klumb and those experiences that were seminal to his sense of place.

Of central importance to this dissertation was whether there existed direct links between, first, Klumb's personal and professional experiences, and his sense of place; and second, between these same experiences and his resulting residential designs. My iterative research cycles at the Henry Klumb archives were designed to test whether there were matches between Klumb's designs and his biography as it was possible to reconstruct his biography through the abundant documentary evidence. The result of my research indicated that there were connections to be made between Klumb's biography and his house designs. These connections were woven into the narrative through the following pairing of analytical sections and historical episodes:

- Klumb's planning grids Wright's lessons in place making at Camp Ocotillo and Taliesin
- Klumb's houses in hilly/mountainous terrain Klumb's adaptations of vernacular types
- Klumb's varieties of open air rooms Klumb's acts of place making at the Klumb House
- Klumb's residential designs in dense urban contexts Klumb's observations and critiques of America's modern metropolises

These associations between design themes and historical episodes/biographical sections

were not firmly confined to the four pairings above. Each of the historical episodes was evident in themes other than their chapter pairing. Klumb's experiences with Wright at Camp Ocotillo and Taliesin, for example, were also related to his predisposition for open air rooms. Klumb's innovative use of planning grids can be seen as a reaction to the rigid adherence and disregard of natural elements in the modern city. In the end, the import of these pairings and of the historical episodes in particular is in showing a sense of place as a temporal process through the example of an individual historical figure.

5. Klumb's sensitivity to places transcended the instances of individual design projects, as it also extended to a worldview of environmental stewardship compatible with the building needs of people, communities, regions, and nations.

Looking beyond the individual houses and towards a general sense of place on the part of Klumb, it is evident from the historical evidence that he possessed a personal philosophy that revolved around genuine care and concern for places at different scales. There are many instances we can draw from his speeches, public statements, or correspondences to corroborate his general sense of place, but one of the strongest indications of it in Klumb was in establishing the Klumb Foundation in 1968. Although the foundation was marginally successful, its aims nevertheless demonstrated a desire to leave a lasting legacy beyond just built work. Klumb sought to promote the sort of place thinking that engendered close ties between people and the world around them. This he hoped to do not only in the context of Puerto Rico but also the broader Caribbean region.

Contributions to the Scholarly Research on Klumb, and Architectural History and Theory

This dissertation contributes to a range of subjects from a very narrowly defined subset of

Klumb's works to insights into the formulation of a person's sense of place. In terms of the

scholarly research on Klumb, this dissertation takes a new look at Klumb's relationships with consequential places. I then used those relationships to explain one of the major influences in his personal life and career, his core architectural principles, and his ecologically sound and socially conscious worldview. Although the emphasis here was on Klumb's relationships with various locations throughout Puerto Rico, other significant places from his past and his experiences there were analyzed and shown to be interrelated with his later and more lasting Puerto Rican legacy.

Another equally important contribution was the largest and most comprehensive study of Klumb's houses in Puerto Rico. Other than serving as products of his sense of place, these houses, and his own house in particular, serve as examples of innovative, sometimes radical, mid-century modern, ecologically sensitive, and locally influenced structures. They have also been of continuing interest to local scholars, architects, and artists. To accomplish this portion of the research, I scrutinized the architectural drawings and affiliated documents (building permits and correspondence with clients) of forty-eight of his houses in Puerto Rico and the mainland United States. Six of his Puerto Rican houses eventually fell out of the study due to a lack of useful evidence or they were additions and remodels rather than new home designs and constructions (see Appendix C for a more detailed accounting of the houses studied).

A final contribution related to Klumb was my bringing to light and relying upon large amounts of evidence that had received little or no attention in previously published research on the architect. Among these were Klumb's essay "Taliesin" from 1931 (which was originally in German), his comments on the city and skyscraper architecture from 1954, and the many letters that he exchanged with professional acquaintances and friends such as Steven Arneson, Leopold Kohr, Elizabeth Kassler, Edgar Tafel, and many others. Also included in this group of key evidence were copies, transcribed by Klumb's hand, of Wright's "Arizona" and "To Arizona."

Lastly there were Klumb's pamphlets. The one pamphlet that had received the most attention in the past had been *Henry Klumb 1: Architect in Search of Higher Values, 1929-1933*. In this one pamphlet Klumb chronicled his immigration to the United States and his experiences with Wright. The pamphlet also featured many of Klumb's biographical comments and professional opinions made at the 1979 American Institute of Architects National Conference. In the research presented here I not only relied upon the pamphlets as important sources of information, I also situated the entire pamphlets project within the larger historical narrative and expounded on their genesis, purposes, and contents. The importance of all of these many pieces of documentary evidence will be in pointing future Klumb researchers back to the archives in order to better understand this historically, culturally, and architecturally relevant figure. The questions demand to be asked, however, how relevant a figure is Henry Klumb, and what contributions were made here to the field of architectural history?

Klumb's relevancy and thus other contributions by this dissertation extend to many areas of ongoing interest and applicability today. My depictions of Klumb with Wright have advanced an understanding of Wright's apprentices, Wright in Arizona, and recollections of and experiences gained while at Taliesin. While research and publications related to Wright continue unimpeded today (especially as the Museum of Modern Art and Columbia University recently acquired the contents of the Wright archives) a recent example of work that encompasses all of these Wright topics in ways similar to this dissertation is Jane Hession's 2015 book on another Taliesin apprentice and Klumb's contemporary, *John H. Howe, Architect*. Next, the actions of Klumb and the U.S. Department of the Interior's Indian Arts and Crafts Board showed a remarkable level of concern and advocacy toward Native American populations and products. Thus they played a consequential part in a recent and telling period in Southwest American

cultural history. Both those Native American projects and Klumb's early Puerto Rican period showed the extraordinary efforts that some modern architects undertook to learn from and adapt vernacular practices. Recent examples of work from architectural history along these lines include Jean-Francois Lejeune's *Modern Architecture and the Mediterranean* and Umbach and Hüppauf's *Vernacular Modernism*. Lastly, this dissertation fits alongside recent works – both museum exhibits and books – that have prominently featured Latin American modern architecture. These include the 2015 MoMA exhibit *Latin America in Construction: 1955-1980* and its accompanying book, and Carranza and Luiz Lara's *Modern Architecture in Latin America*, all of which included brief profiles on Klumb and small examples of his works. This dissertation, then, will serve as an additional, exhaustive treatment on a prominent figure that helped to shape tropical modernism in Latin America.

In the area of theory, in this dissertation I leveraged the temporal aspects of a sense of place as a lens with which to view, analyze, and understand an architect's life, career, and works. In architectural studies, these temporal aspects are customarily supporting elements to broader elucidations on notions of place. (Exceptions to these practices include several works by Christian Norberg-Schulz, and Jorge Otero-Pailos' 2010 book *Architecture's Historical Turn*.) Here these temporal aspects are central to the research, and in the future they may be foundational in other architectural histories and biographies.

The final contributions in the area of theory are my efforts to add clarity and specificity to the place meta-concept. To these ends I formulated definitions for place, sense of place, place thinking, place making, and impressing a sense of place. Also relevant was the delineation of the role of the guide in the impressing process. Each of these definitions refined concepts that can often be bewildering to readers.

Areas of Limitations and of Further Study

The main area of limitation of this dissertation was its study of a subset of Klumb's built works. By any measure, Klumb's design career was diverse and highly prolific. Although his residential practice was itself extensive, when we consider all of his buildings with respect to differing scales, functions, clients, and further contexts (e.g., a university campus as opposed to a residential development), the many lessons that a researcher can derive from Klumb's career will depend on which of the many areas they choose as a focus. A researcher may choose to study Klumb as a master planner, university architect, cooperative housing developer and designer, or as a public housing, church, industrial facility, and corporate building architect. An in-depth understanding of him in each of these spheres would require a multi-volume project. Yet the lessons applicable to any one area could be beneficial to each of those fields. At the other end of the spectrum, there is sufficient documentary evidence – drawings, photographs, written documents, and the buildings themselves – to concentrate on a single chosen building from among hundreds. So, a researcher's choice of type of architectural project and scale at which to study immediately conditions what knowledge they will be able to uncover. Those areas that I believe are most conducive for further study are his cooperative housing plans, master plans, and industrial and technical facilities.

Along the line of inquiry set forth in this dissertation, if a researcher were to seek new insights into Klumb's sense of place from his many areas of design expertise they would be able to discover nuances not apparent in his houses. As such, it would be instructive to see how the lessons derived from the scales and contexts of his houses translate to projects that, for example, are larger in size, serve different functions, and accommodate more people.

In the end, Henry Klumb is far from an anachronism. Historically, as a part of Wright's

legacy, an environmentally and socially conscious architect, a talented designer across multiple building types, someone who respects diverse local cultures, and a proponent of high-minded ideals that benefit individuals and communities of people, his design practice still fits well with today's architecture profession.

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Part II: Klumb's Archived Speeches, Essays, and Other Assorted Documents and Writings

Note: Archive location numbers refer to the boxes and folders in the Henry Klumb Collection at

- the AACUPR. For example, archive location 83.4 refers to Box 83, Folder 4.
- "Comments by Distinguished Visitors" [to the 1939 Golden Gate International Exposition].

 1939. Archive location number 2.20.
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- Klumb, Henry. Untitled document Klumb Foundation brochure. Undated. Archive location number 87.3.
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- Klumb, Henry. Untitled document Committee on Design of Public Works internal memorandum. 16 August 1944. Archive location number 3.3.
- Klumb, Henry. Untitled document miscellaneous handwritten notes. Undated. Archive location number 84.9.
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 Archive location number 2.20
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Part III: Klumb's Archived Personal and Professional Correspondence

Note: Archive location numbers refer to the boxes and folders in the Henry Klumb Collection at the AACUPR. For example, archive location 99.28 refers to Box 99, Folder 28; and location 3.3.1 to Box 3, Folder 3.1.

Steven Arneson to Henry Klumb. 14 January 1944. Archive location number 3.3.1.

Steven Arneson to Henry Klumb. 10 September 1945. Archive location number 83.3.

Steven Arneson to Henry Klumb. Undated letter (c. 25 November 1948, the letter was written in 1948 around Thanksgiving). Archive location number 83.4.

Steven Arneson to Henry Klumb. 29 March 1949. Archive location number 83.4.

Steven Arneson and Henry Klumb to Luis Guillermety, Jr. 30 September 1944. Archive location number 3.1.

Frank Cordner to Henry Klumb. 11 November 1947. Archive location number 2.57.

Ruth Hampton to Harry (sic) Klumb. 4 February 1944. Archive location number 3.1.

René d'Harnoncourt to Henry Klumb. 21 March 1938. Archive location number 2.19.

René d'Harnoncourt to Henry Klumb. 9 April 1940. Archive location number 2.19.

René d'Harnoncourt to Henry Klumb. 14 March 1942. Archive location number 83.13.

Janos Delej to Henry Klumb. 9 February 1974. Archive location number 34.11.

Luis Guillermety, Jr. to Draft Board No. 182. 14 July 1944. Archive location number 3.3.1.

Elizabeth Kassler to Henry Klumb. 16 September 1980. Archive location number 83.24.

George Kastner to Henry Klumb. Undated letter (c. fall 1933). Archive location 2.57.

Henry Klumb to Steve Arneson, 23 October 1947. Archive location number 83.3.

Henry Klumb to Steve Arneson. 16 December 1947. Archive location number 83.4.

Henry Klumb to Steve Arneson. 28 September 1948. Archive location number 83.4.

Henry Klumb to Steven Arneson. 1 December 1948. Archive location number 83.4.

Henry Klumb to Frank Cordner. 19 December 1947. Archive location number 2.57.

Henry Klumb to René d'Harnoncourt. 5 June 1940. Archive location number 2.19.

Henry Klumb to Kenneth Disher. 26 January 1948. Archive location number 2.57.

Henry Klumb to Draft Board No. 182. 5 January 1944. Archive location number 3.3.1.

Henry Klumb to Jacinto Galib. 5 October 1944. Archive location number 3.1.

Henry Klumb to Luis Guillermety, Jr. 10 August 1944. Archive location number 3.1.

Henry Klumb to Luis Guillermety, Jr. 13 November 1944. Archive location number 3.1.

Henry Klumb to Paula Elkind Echeverria. 24 March 1949. Archive location number 2.59.

Henry Klumb to Holger Fog. 14 January 1949. Archive location number 84.31(I).

Henry Klumb to Frederick Gutheim. 25 September 1970. Archive location number 83.23.

Henry Klumb to Frederick Gutheim. 5 February 1980. Archive location number 83.22.

Henry Klumb to Ada Louise Huxtable. 6 August 1981. Archive location number 84.22.

Henry Klumb to Elizabeth Kassler. 8 April 1980. Archive location number 1.13.

Henry Klumb to Elizabeth Kassler. 16 September 1980. Archive location number 83.24.

Henry Klumb to George Kastner. Undated letter (c. fall 1933). Archive location number 2.57.

Henry Klumb to Leopold Kohr. 13 July 1971. Archive location number 83.2.

Henry Klumb to Leopold Kohr. 7 September 1971. Archive location number 83.2.

Henry Klumb to Leopold Kohr. 14 April 1982. Archive location number 84.39.

Henry Klumb to Leopold Kohr. 11 December 1982. Archive location number 83.2.

Henry Klumb to Theodore Moscoso, Jr. 10 July 1981. Archive location number 84.22.

Henry Klumb to Anthony S. Reiner, 24 October 1947. Archive location number 83.12.

Henry Klumb to Edgar Tafel. 12 December 1980. Archive location number 83.24.

Henry Klumb to Edgar Tafel. 25 March 1981. Archive location number 83.24.

Henry Klumb to Edgar Tafel. 17 June 1981. Archive location number 83.24.

Leopold Kohr to Henry Klumb. 13 July 1971. Archive location number 83.2.

Buford L. Pickens to Henry Klumb. 16 September 1959. Archive location number 83.29.

Xavier Vigeant to T.B. Hall. 30 March 1940. Archive location number 2.19.

Xavier Vigeant to T.B. Hall. 1 April 1940. Archive location number 2.19.

APPENDIX A: KLUMB'S PAMPHLET SERIES

Klumb's pamphlets offer a privileged look into his professional and personal life. Although they have been cited by scholars and writers who have studied Klumb, a detailed accounting of their contents, background, purpose, and overall scope remain largely a mystery to anyone who has not had the privilege to view them in person. In their totality the pamphlets represent the most thorough accounting of Klumb's life in architecture and are as close to an autobiography as we have from him. Given the wealth of historically significant material in them, the pamphlets themselves deserve an in-depth look. So, due to their usefulness to past and present researchers, and to anyone in the future interested in Klumb's life and career, in this appendix I will discuss the history of the pamphlets and provide a very brief overview of the ones I have relied upon in writing this dissertation.

Introduction to the Pamphlets

To begin with, the term of "pamphlets" for these documents is something of a misnomer, as these planned publications were not simple, one-sheet pamphlets or brochures. The pamphlets consist of a series of spiral bound books filled with mostly photocopies of his architectural drawings, photographs of his buildings, personal snapshots, some of his public speeches and aphorisms, magazine clippings, and excerpts from government reports he composed. Klumb's intention was to produce a multi-volume retrospective featuring his vast oeuvre. Tobias Guggenheimer, in his book *A Taliesin Legacy: The Architecture of Frank Lloyd Wright's Apprentices*, called them Klumb's "memoirs" and "unpublished diaries." Rosa Otero called them his "unpublished pamphlets" his "self-reflections and explanations of his works," and his "unpublished diaries." Enrique Vivoni used what is probably the most apt description of them,

"unpublished manuscript[s]," a description I have relied upon throughout this dissertation.¹ These pamphlets are all of those things and much more. In fact, the pamphlets served many purposes, among them design portfolio, photo album, scrapbook, manifesto, collage, and marketing literature for his architectural office.

Most of the pamphlets deal with different stages of Klumb's career, but some are focused on individual projects. Fifteen distinct pamphlets reside today in their various stages of development at the Architecture and Construction Archives of the University of Puerto Rico in Rio Piedras. There are multiple copies of only three of the fifteen distinct pamphlets. The archive's Henry Klumb Collection includes the following completed pamphlets, listed in what I believe is the order that they were created:

- Committee on Design of Public Works: 1944, 1946-1948.
- Henry Klumb 1: Architect in Search of Higher Values, 1929-1933.
- The Office of Henry Klumb 2: Architecture of Social Concern, 1933-1944.
- The Office of Henry Klumb 3: Architecture of Social Concern, 1944-1947.
- The Office of Henry Klumb 4: Architecture of Social Concern, 1947-1955.
- The Office of Henry Klumb 5: Architecture of Social Concern, 1955-1961.
- The Office of Henry Klumb 6: Architecture of Social Concern, 1961-1974.
- The Office of Henry Klumb (2 copies, with slight variations)
- Indian Arts and Craft Exhibition: The Museum of Modern Art New York, N.Y., 1941.
- The Office of Henry Klumb: San Martin De Porres Church, 1949.
- *The Office of Henry Klumb: Student's Dormitories U.P.R*, 1955.
- The Office of Henry Klumb: Elsa and Rene Aponte House, 1963.
- Henry Klumb: Eight Architectural Concerns (2 copies. This pamphlet is actually untitled, but it begins with one of eight design concerns, "Concern: To put Natural Ventilation to Work.")

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¹ Guggenheimer, *A Taliesin Legacy*, 21, 23, 174; Otero, *Permeable Walls*, 5, 304; and Vivoni, "Modern Puerto Rico and Henry Klumb," 11.

- "7 Include in 6" (This includes material to add to *Henry Klumb 6*, mostly later photographs of the Klumb House, and the many flowers and plants on its five-acre property.)
- Ciba Geigy (3 copies, various versions).

History of the Pamphlets

Klumb may have begun working on the pamphlets as early as 1974, although this is unlikely.² The year 1974 is significant, however, because it marked in Klumb's mind the last year his office engaged in any meaningful work until the UPR Law School building addition/re-model in 1980 and the Ciba-Geigy industrial park project in 1981. This time period between 1974 and 1980, then, was not only at the twilight of Klumb's career, it was also a time when fewer commissions were flowing into his office. In terms of when exactly did Klumb put together his pamphlets, it is more likely that the bulk of the pamphlets were produced between October 1979 and April 1982. These dates coincide with Klumb's speech at the 1979 AIA conference in Florida and the April 1982 symposium in Salzburg, Austria in honor of his close friend, the economist Leopold Kohr. This timeline pertains to the six numbered pamphlets *Henry Klumb 1* through *The Office of Henry Klumb* 6, the two simply titled *The Office of Henry Klumb*, the four project-specific pamphlets, and *Henry Klumb: Eight Architectural Concerns*.³

Other data that puts the pamphlets in the timeframe between 1979 and 1982 are some of the dated material in the two pamphlets titled *The Office of Henry Klumb*. These include project lists,

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² In early 1974 one of Klumb's former clients, Janos Delej, mentioned in a letter, "Will you let me know whether your book has been published?" It is not clear to what book he is referring. He was more than likely referring to Frederick Gutheim's *In the Cause of Architecture*, published in 1975. On the other hand, Delej may have been referring to the genesis of the pamphlet series. See Delej to Klumb, letter dated 9 February 1974.

3 Klumb relied on the text of his 1979 speech to provide a running narration in *Henry Klumb 1*. This firmly places this pamphlet in late 1979 or early 1980. At the other end of this period, in 1982, a handwritten note by Klumb on the cover of one copy of *Henry Klumb: Eight Architectural Concerns* states that he took four pamphlets with him to the Kohr symposium in Salzburg. The four were (1) *Henry Klumb 1: Architect in Search of Higher Values, 1929-1933*, (2) *The Office of Henry Klumb: San Martin De Porres Church, 1949*, (3) *Henry Klumb: Eight Architectural Concerns*, and (4) excerpts from *The Office of Henry Klumb 6: Architecture of Social Concern, 1961-1974*.

awards and recognitions, etc. There is also a letter in March 1981 from Klumb to a friend and past colleague where Klumb wrote, "It may be of interest to you that I am compiling my work done after the FLW interlude extending, so far, to 1974. I enclose a few samples for you."

A Partial Overview of the Pamphlet Contents

In researching Klumb's life and residential practice, his pamphlets were invaluable repositories of historical evidence. The evidence included architectural drawings and photographs of his houses, select work documents and project briefs (especially of the CDPW projects), newspaper and magazine clippings chronicling Klumb's many travels and work experiences, and family photographs. This evidence was useful in compiling Klumb's biography, providing photographic views of his houses, and locating some of his houses through their site plans. Below I offer information on those pamphlets with which I became most familiar and which were most useful in my research.

- In Committee on Design of Public Works, Klumb begins with a copy of the August 10, 1944 memorandum of the planned organization, function, purpose, as well as the work completed and in progress of the Design Section of the Committee on Design of Public Works. As the committee's architect, he was the head of the office. At its peak, the section was to employ twenty-eight people. At the time of the memorandum, the office held eight. Following the memorandum, the pamphlet contains various drawings and photographs related to several studies, proposals, and projects undertaken by the Design Section. These include the office building for the CDPW, furniture designs for their executive offices, rural schools, teacher's farms, school cafeterias, local libraries, community centers, health clinics, the "Zero Plus Housing" project, local government buildings, and rural single-family homes.
- In Henry KLumb 1: Architecture in Search of Higher Values, 1929-1933, Klumb chronicles a journey that begins in Cologne, Germany and ends as he leaves Wright's office in 1933.
 Interspersed among excerpts of his October 1979 AIA speech are images representative of

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⁴ Klumb to Tafel, letter dated 25 March 1981.

- the International Style, of which he was critical. His time with Wright includes the first letters between the two men, original photos of Taliesin and Camp Ocotillo, and various images and document excerpts related to the Wright projects Klumb participated in. These include San Marcos in the Desert, the Princeton Lectures, the Wright European traveling exhibit, and the Taliesin Fellowship.
- Almost all of *Henry Klumb 2* (1933-1944) is graphical in nature (showing drawings and photographs with little accompanying text). The bulk of the pamphlet is dedicated to Klumb's Modern House exhibit in Washington, D.C, the Native American projects for the Department of the Interior, his American homes in the Washington, D.C. area and southern California, and his planning work in Los Angeles. There are also some personal touches, such as "The House for Else Klumb of Sandoval, New Mexico" and some family pictures.
- Henry Klumb 5 (1955-1961) includes architectural drawings of the Benitez Mountain Cottage, and the Collazo Salazar, Delej, Duchow, Evans, Gonzalez Correa, Marrero, Reyes, David Rodriguez, Timm, and Velez houses. Klumb designed the Collazo Salazar and Gonzalez Correa houses in the University Gardens area as a combined pair of houses. The clients later asked Klumb to design an extensive garden, and basketball and tennis courts to be shared by both houses. This plan, though never executed, would have been an impressive green space in a dense suburban neighborhood. The David Rodriguez design featured a circular plan with an open center that included a garden, pool, and terrace.
- Henry Klumb 6 (1961-1974) includes architectural drawings of the Alegria, Alfaro, Aponte, Dreyfuss, Ewing, Garrido, Russell, and Slavin houses. The Tugwell Cottage and Foreman Mountain Retreat are featured in architectural drawings and photographs. The Ruiz Alegria House utilized a triangular spatial-structural planning grid that engendered hexagonal rooms similar to the ones at the Evans Residence (see Chapter 4). The pamphlet closes with drawings of the Gonzalez Correa and Collazo Salazar houses in the Santa Maria development. These two residences were the second pair of houses for these clients and quite likely the last that Klumb designed and built in Puerto Rico.
- The addendum labeled "7 include in 6" is comprised of a collection of photocopied photographs of the Klumb House, and the flowers and plants at the property. Many of these images are only in this pamphlet and are not included in the Henry Klumb Collection photographs.

- The pamphlet Henry Klumb / Concern: To Put Natural Ventilation to Work is actually a series of "concerns." These are as follows:
 - 1. Concern: To Put Natural Ventilation to Work
 - Concern: To Make Available the Mechanical Necessities a standardized, shopfabricated service core around which can freely evolve the desired living accommodations, with great variety this can be achieved by using locally available materials and regionally developed construction methods. / 1936
 - 3. Concern: Economy & Privacy in Subdivision Planning and House Design / 1937
 - 4. Concern: Social & Economic Integration of Housing / 1943
 - 5. Concern: Providing the Mere Necessities / Zero-Plus Housing / 1944
 - 6. Concern: Contour Planning 1945
 - 7. Concern: Diversification of Public Housing to Prevent the Building of Economic Ghettos

 / 1945
 - 8. Concern: Social & Economic Integrated Housing / 1955
 - 9. Sun Shading Breeze-Deflection Security & Visual Screening

These various concerns are illustrated principally by master planning, public works, and university projects from his years in the United States and Puerto Rico.

Conclusion

While Klumb's pamphlets are great sources of documentary evidence, they also pose special challenges. The principal challenge is to uncover what links may tie the dozens of discrete drawings, photographs, or aphorisms contained in the pamphlets. The many individual pieces of evidence, densely packed into patchwork manuscripts, can defy attempts at unifying narratives. But, surprisingly, pamphlets such as *Committee on Design of Public Works*, *Henry Klumb 1* and 2, and the addendum "7 include in 6" exhibit strong unifying themes and autobiographical details beyond the mere periodization of projects. Once a researcher is able to surmise crucial links between works and across time periods, the pamphlets are rife with interpretative potential.

APPENDIX B: HENRY KLUMB'S "TALIESIN"

While working with Frank Lloyd Wright, Klumb wrote a four-page essay on Taliesin. The original draft of the typed essay is dated "1930/1931" in pencil, suggesting that the date may have been appended after the fact, maybe even years later. Some aspects of the essay indicate that he wrote it very early during the years he was with Wright, if not in 1930/1931 then in all likelihood as early as 1929. These indications include the fact that he wrote the essay in German, which was very rare for Klumb to have done after he arrived in the United States and started working with Wright. Klumb also signed the essay "Heinrich Klumb" instead of "Henry Klumb." Again, this is also very rare for Klumb to have done once in the United States and working with Wright. Lastly, in a 1934 letter from George Kastner to Klumb, Kastner mentions the Taliesin essay, indicating that he (Kastner) was familiar with it. Kastner was another German-born architect who was with Wright from 1928 to 1929. Both were part of the group of "Taliesin Men" who accompanied Wright to Arizona in 1929, this year being the only period of overlap between the two men at either Taliesin or Camp Ocotillo, although Kastner lived in Milwaukee and was a regular visitor to Taliesin thereafter. (Klumb and Kastner became good friends and corresponded for years after Klumb left Wright's employment.)

The text of "Taliesin" begins on the next page. The translation from German to English is mine own. Copies of the essay in its original German are located in the Henry Klumb Collection, archive location numbers 1.3 and 1.8.2, the Architecture and Construction Archives of the University of Puerto Rico at Rio Piedras.

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¹ Levine, *The Architecture of Frank Lloyd Wright*, 464.

TALIESIN

Forty miles west of the university town of Madison, the capital of Wisconsin, a visitor will find Taliesin, the home of the American architect Frank Lloyd Wright.

In the middle of a valley, on a low hill that allows it to overlook the wide plain of the Wisconsin River, it lies, pleasantly and tranquil, in its captivating beauty.

Taliesin – Shining Brow – is the name of a Welsh bard who sang the praises of the arts. The building that now occupies the crest of the hill has been named after him. Ominous clouds hang over it. Twice Taliesin was destroyed by fire, but each time it rose out of the ashes to achieve new heights of beauty, to become an even greater and better realization of an idea inspired by confidence and awash by the genius of humanity.

And thus Taliesin stands today on the crown of the hill, completely fused with it, living and breathing proudly. It is a part of the characteristically southwestern Wisconsin landscape, a part of the tranquil rocky outcropping with its dark cedars and white birch trees. A living architecture!

Taliesin has a 350 acre farm, which is maintained and provides fresh, healthy, and invigorating nourishment. At the bottom of the hill a dam contains a small creek. This provides the power necessary for the production of electricity.

Four different courtyards, which are connected together, are arrayed around the crown of the hill. Long, low-slung buildings lay in close proximity to the steep hillside. Flower gardens surround everything. Rising, splashing jets of water fill the basin of a fountain with gurgling water.

Out of a neighboring quarry comes the yellow-brown limestone out of which the walls

and the great masses of chimneys have been erected in layers of rock. On these walls, which serve as the foundations, sit the lightly plastered wooden structures of the top walls. The roof pitches conform to the lines of the hills. The plastered surfaces of the light, wooden structures that make up the walls and on which the shadows of the deep overhanging roofs fall, resemble the color and the surfaces of the sandy banks of the wide, outstretched river plain. The outer woodwork has the color of a gray flower stem illuminated in a violet light. The shingles that cover the roofs have been left exposed without protection from the weather. They are silvery grey in color and resemble the boughs of the flowers that project their crowns from the slopes of the hill. The stone chimneys emerge from the ground in quiet, rectangular masses. They mark the places in the inside where the great, open fireplaces are, where during the long winter months and after a strenuous day's work a person will find the company to engage in small talk or to play music around the warming wood fire.

The large surfaces of naturally exposed, lightly polished built-in wooden cabinets, applied moldings, and paneled walls and shelves warm the interior with a noble authenticity. They compete in colorful charm with the brown masses of limestone, which were built the same on the outside of the building as the inside and which provide the impression of security and protection. The plaster, which was a Siena-colored mixture, was left to dry naturally without any added paint, and gave the plastered surfaces a golden tan coloring. Every material speaks its own language. The totality is a great harmony in colors, masses, proportions, soothing and reassuring to the eyes, the way that a symphony in harmony and tone satisfies the ear.

The floors are partially covered with darkly striated cedar planks, but also to a large extent with the same stones of which the walls are made, the same stones which are lying outside in the garden. In a diminished scale, this same stonework then proceeds in all directions in the

form of the continuous garden walls that embrace all of the courtyards and the hilltops.

The construction of the buildings is highly natural. It is natural how the stone walls rise from the ground, how the plastered wooden walls lightly settle on these and bear the roof. The slopes of the roof are recognizable even when inside the rooms, since there is no dead space due to the lack of suspended ceilings.

Long rows of windows and terraces everywhere provide an uninterrupted view of the magnificent landscape. In color and in form, ever changing nature is a living, delightful gift. [Illegible handwriting.] In the winter they [the windows] are closed due to the cold, in the summer they stay open to the gentle breezes that carry refreshment to the indoors.

And in winter, when the snow has accumulated in the courtyards, having come down from the hilltops and roofs where they lie, icicles a meter long hang from the gutter-less, towering ledges of the gently sloping roofs. They are suspended in midair between the landscape and one's line of sight. During this time, Taliesin looks like an ice palace.

The studio, a group of three small and one large room, where over the course of the day young men gather around the Maser for the purpose of working together, harbors in a stony, fireproof cabinet valuable collections of Japanese embroidery and woodcuts from a great Japanese master, while collections of Chinese pottery art and Japanese screens adorn the spaces at Taliesin. They are witnesses to an ancient culture that is more than a thousand years old.

They bear the spirit of joy and good will, and conform well in the image of that very same new spirit that they have created, supported, and engendered.

APPENDIX C: NOTES ON KLUMB'S HOUSES

This appendix consists of two lists. The first list includes the thirty-three houses that I studied in detail for this study. From these houses I created the four-part taxonomy of Klumb's houses: the grid and the landscape, vernacular influences, open air rooms, and dense urban spaces. The second list includes six other houses that I studied but ultimately chose not to include in the dissertation research either because of a lack of evidence or because they fell out of the scope of the study. I also very briefly looked at eight other houses – three in Puerto Rico and five in the United States – but also chose to exclude them from further study for the same reasons. The only house in the United States that I included in the dissertation was the House for Else Klumb of Sandoval, New Mexico, mentioned in Chapter 5.

In the first list, the year given for each house corresponds with the last known date from the following stages of the project:

- detailed design
- construction documents
- construction completion

The project number for each house corresponds with the project identifier from the AACUPR.

Below each house name I include which of the four themes that house supported in the dissertation research. I also include the best known location information. For each house I include background information that may be useful to researchers or interested architects.

Finally, I have included additional photographs and architectural drawings for five of the houses.

A. Houses Analyzed

1. 455 Sagrado Corazón (date unknown, project number N/A) Location: No. 455 Calle Sagrado Corazon, Santurce.

The Klumb Family lived in this house during their first three years in Puerto Rico. They rented the house from 22 May 1944 to 20 October 1947. The house was designed by Antonin Nechodoma, who was a Czechoslovakian architect and Frank Lloyd Wright devotee. Klumb indicated the location of the house to be at the cross streets of Calle Sagrado Corazon and Calle Magnolia.

2. The Benitez House (1950/HKl/0079, Figure C.1)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms Location: Barrio Cepero, Rio Piedras.

3. The Benitez Mountain Cottage (1961, HKI/0194)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms Location: Along Public Road No. 741, southeast of Cayey.

Klumb designed both of these houses for Jaime and Lulu Benitez. Dr. Benitez was the longtime chancellor of UPR-RP. He and Klumb had a close working relationship while Klumb served as the unofficial university architect from 1945 to 1965.

Since I was unable to find the exact location of either of these houses, I was not able to determine whether or not they were ever built. Correspondence between Mrs. Benitez and Klumb does indicate, however, that she arranged for a local contractor to begin work on the driveway before construction began on the house. Regardless, both house designs are a good cross-section of several of Klumb's residential design strategies. In the case of the Benitez House this is due to its cantilevered terrace, main bedroom porch, flagstone terrace, stone wall, and gently sloping site.

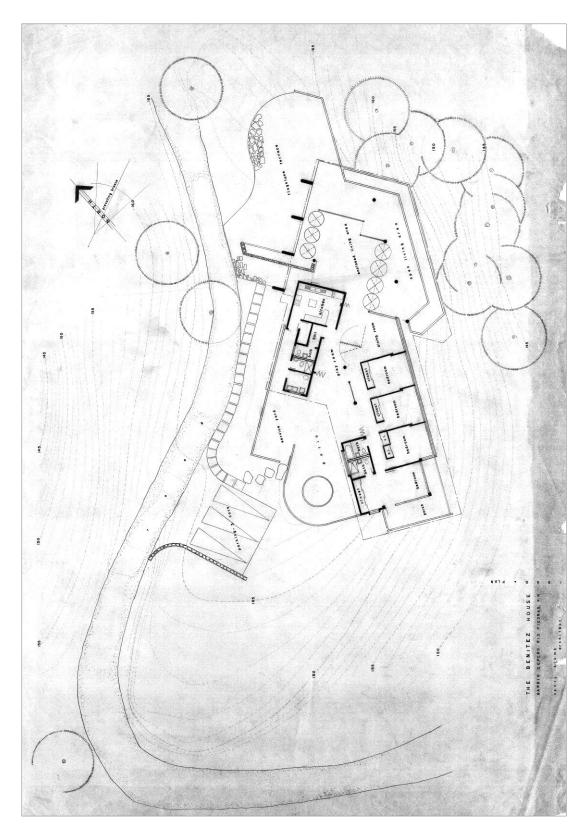


Figure C.1. Site plan, the Benitez House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

4. The Benus House (1949, HKI/0043, Figure C.2)

Open Air Rooms, Dense Urban Spaces

Location: On the north side of Ashford Avenue (east of the *Dos Muertos* Bridge), El Condado.

The owner of the Benus House, Simon Benus, also commissioned the New York Department Store in Santurce, which was another notable Klumb building. The house was one of at least three that was built contemporaneously (in the late 1940s and early 1950s) and in close proximity to one another in El Condado. The other two were the Kogan and Levin houses. All three clients were members of the Jewish Community Center of Puerto Rico. A possible third house in the area was the Dubner House, though its exact location remains unknown.

Before the Benus House was demolished, it sat in a prestigious part of El Condado. Immediately to the north and behind the house was the Atlantic Ocean. Between the house and Condado Lagoon to the south lay only Ashford Avenue and a single row of houses.



Figure C.2. The Benus House. Photograph courtesy of the AACUPR.

5. The Bosch House (1944, HKI/3057, figures C.3 and C.4)

The Grid and the Landscape, Open Air Rooms

Location: On the north end of the Bacardi Corporation property, Palo Seco, Cataño.

Klumb collaborated with his friend Steve Arneson in the design of this house. It was the first house that Klumb designed and built on the island. Although the house sits unoccupied today, it is still maintained by the Bacardi Corporation's building maintenance department. At one time the house served as the quality control lab for the company's rum manufacturing plant in Puerto Rico. Consequently, the house has undergone interior modifications. On the outside, however, it still closely resembles the original plans. I conducted a site visit of the house in February 2016.

6. The Collazo Salazar House (I) (1961, HKI/0217)

Open Air Rooms, Dense Urban Spaces

Location: On the southeast corner of Calle Georgetown and Calle Salamanca, University Gardens, Rio Piedras.

7. The Gonzalez Correa House (I) (1961, HKI/0217)

Open Air Rooms, Dense Urban Areas

Location: On the east side of Calle Georgetown (adjacent and to the south of the Collazo Salazar House), University Gardens, Rio Piedras.

Klumb designed these two houses for two lawyers, Baldomero Collazo Salazar and Luis F. Gonzalez Correa. The two houses were designed as a joint project, on adjacent sites, and with no barrier between the two properties. Today there is a fence and planting that separates the two houses. Also, as the main axis of the Collazo Salazar House (a north-south axis) was perpendicular to that of the Gonzalez Correa House (which had a main east-west axis), each house's ground floor terraces and second floor balconies faced each other. In 1968, the clients commissioned Klumb to design an expansive garden and exercise area on the lot behind (to the east) of the Collazo Salazar House. This design was never physically realized. I conducted a site visit of these houses in February 2016.

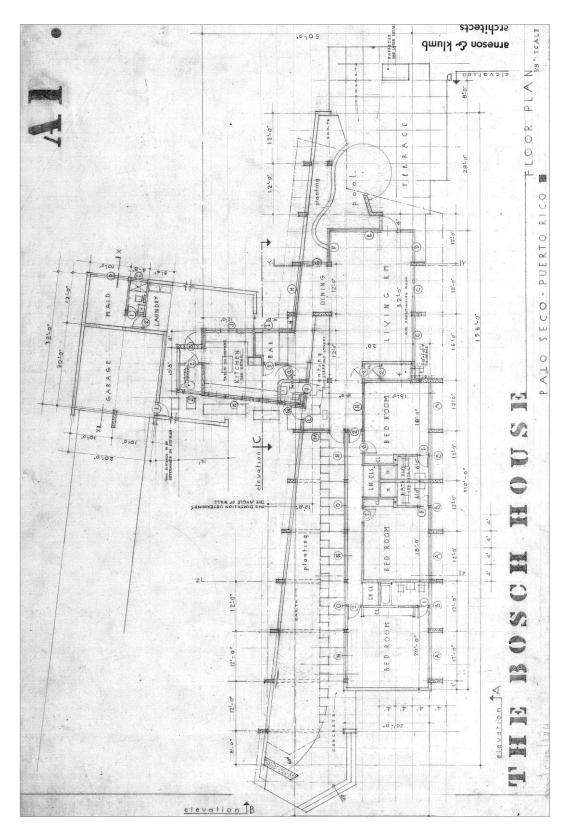


Figure C.3. Floor plan, the Bosch House. Drawing by Steven V. Arneson / Henry Klumb Architects, courtesy of the AACUPR.

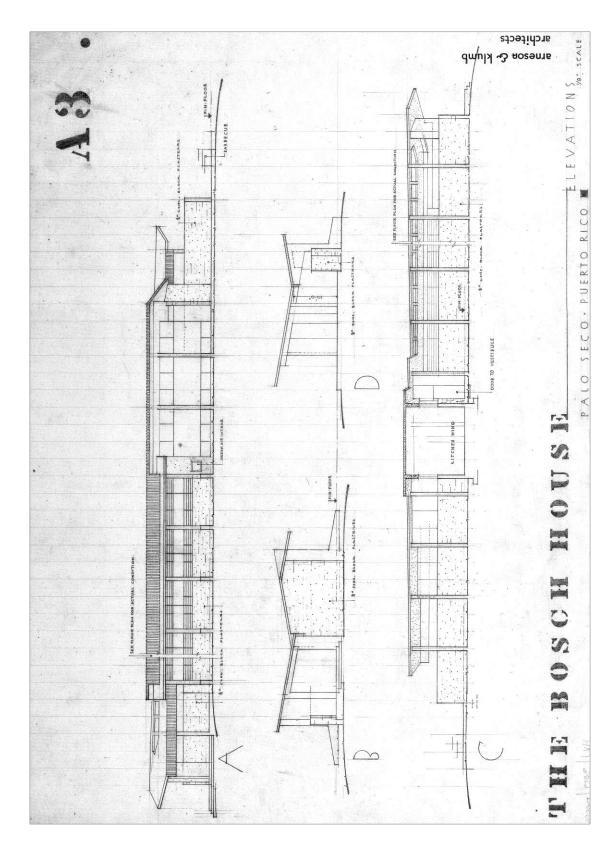


Figure C.4. Elevations, the Bosch House. Drawings by Steven V. Arneson / Henry Klumb Architects, courtesy of the AACUPR.

8. The Collazo Salazar House (II) (1975, HKI/0292)

The Grid and the Landscape, Open Air Rooms

Location: On the northwest side of Calle Petunia (the third house south of Calle Pasionaria), The Santa Maria Development, Rio Piedras.

9. The Gonzalez Correa House (II) (1974, HKI/0290)

Open Air Rooms

Location: On the south side of Calle Orquidea (the fourth house west of Calle Petunia), The Santa Maria Development, Rio Piedras.

Thirteen years after designing the twin houses of Collazo Salazar and Gonzalez Correa in the University Gardens neighborhood, Klumb designed two new houses for the same clients. This time the houses were in the Santa Maria Residential Development. Unlike the previous two houses, these were not adjacent to one another but rather two streets apart. The Collazo Salazar House in Santa Maria is likely the last house that Klumb built in Puerto Rico. I conducted site visits of these houses in February 2016.

10. The Delej House (1960, HKI/0209)

Open Air Rooms

Location: On the southwest corner of Calle A and Calle D, Urbanizacion Costa de Oro, Dorado.

The Delej House was a two-story, beach weekend getaway. The first floor consisted of a laundry room, a carport, and an access space to go to and from the beach. The second floor contained the bedrooms, living room, dining room, kitchen, and a library. As property was large enough to accommodate all of the house's spaces on the ground floor, I believe that a second floor was desired so as to provide the best views and cooling breezes, particularly to the living and dining room, and the library. A number of additions and remodels were planned in 1970.

Today, the house still occupies a privileged position across the street from Dorado Beach. The house was also a close contemporary of the Evans Residence, also in Dorado. Both houses were featured together in the pamphlet *Henry Klumb 5*.

11. The Diaz-Osborne Residence (1983, HKI/3370, Figure C.5)

The Grid and the Landscape, Open Air Rooms

Location: Las Marias, Mayaguez.

The Diaz-Osborne Residence is possibly the last house that Klumb had a hand in designing but

did not build. The house does not appear to have been built because the only surviving piece of

documentary evidence is a single floor plan drawing. The house was to have been a joint project

with the office of K.S.K. and Associates. As the back of the house would have faced west toward

Mayaguez and the ocean, Klumb incorporated two grid shifts and several open air rooms to

accommodate the views and the prevailing breezes.

12. The Dreyfuss House (1972, HKI/0245)

The Grid and the Landscape, Open Air Rooms

Location: The house's planned location (the house was never built) was the southwest corner

of Calle Crisantemo and Calle Gardenia, Urbanizacion San Francisco, Rio Piedras.

Designed to occupy a corner lot, the house was to have two wings on the far side of the property

away from the street corner. The two wings formed an obtuse angle of approximately 135°.

Between the house and the street corner, Klumb included a walled-in patio. As the house sat on a

small rise on the property, an inhabitant could enjoy distant views of Santurce and El Yunque.

The various views were classified as "impaired," "partly impaired," and "clear, non-impaired,"

depending on nearby trees and the surrounding houses. The prevailing breezes coming into the

site flowed over the walled-in garden and into the house.

Although the client was pleased with the design, he balked at the construction cost and

eventually purchased an existing home in the same residential community. The house design

nevertheless is one of Klumb's best examples of his unusual grid shifts, balancing of its macro-

micro surroundings, and open air rooms.

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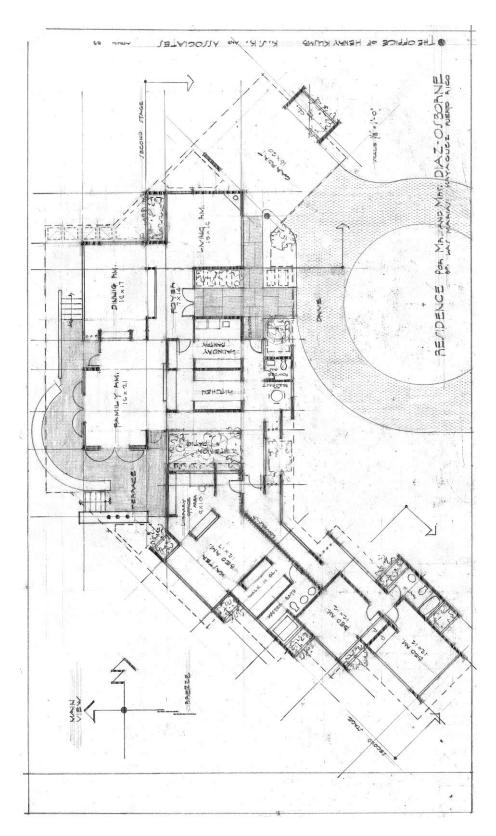


Figure C.5. Floor plan, the Diaz-Osborne Residence. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

13. The Dubner House (1950, HKI/0054)

Dense Urban Spaces

Location: Unknown.

The Dubner House resembled a simple and unadorned version of the Benus, Kogan, and Levin

houses. Given the similarities in overall dimensions and organization of spaces between the four

houses, it is very possible that the Dubner House may have also been built in El Condado or

Santurce. Early floor plans included a lily pond (later changed to a circular planter box) and a

stone-paved terrace. Seventeen years after the original design, Klumb drew another set of plans

to convert the two-story house into two apartment units.

14. The Duchow Residence (1958, HKI/0161)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms

Location: The house's planned location (the house was never built) was in Sector El Vigia,

Ponce.

For information on the Duchow Residence, see Chapter 6.

15. The Evans Residence (1961, HKI/0208)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms

Location: Urbanizacion Dordao Beach, Dorado.

Current satellite imagery suggests that the house has either been modified or is no longer

standing. For additional information on the Evans Residence, see Chapter 4.

16. The Ewing Residence (1965, HKI/0241)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms

Location: Calle Himalaya, Urbanizacion Monterrey, Rio Piedras.

For information on the Ewing Residence, see chapters 4, 5, and 6. I conducted a site visit of the

house in March 2015.

17. The Fernandez Garcia House (1950, HKI/0049)

The Grid and the Landscape, Open Air Rooms

Location: On the southeast corner of Calle Orquidea and Calle Begonia, the Santa Maria

Development, Rio Piedras.

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The design of the Fernandez Garcia House generated two full sets of construction documents due to continued changes requested by the client. At different times during its design process, the house included multiple stone-paved terraces, a low stone wall, an indoor patio and small pool of water, a planting bed, and a play and service yard.

It is not clear whether or not the house was built. Two site visits to the Santa Maria Development, on March 2015 and February 2016, proved inconclusive because of restricted access due to a fence and low wall around the property (not in the original design). For additional information on the Fernandez Garcia House, including drawings, see Chapter 7.

18. The Foreman Mountain Retreat (1974, HKI/0256)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms Location: Carretera Los Foreman, off PR-123, southeast of Adjuntas.

The Foreman Mountain Retreat was partly inspired by the Tugwell Cottage. Like Rexford Tugwell, Klumb's relationship with the client, Clark Foreman, dated to when they collaborated on a cooperative housing project in Maryland in the mid-1930s.

The house consisted of four short wings at 60° and 120° to one another. Klumb utilized a diamond grid composed of two 4' equilateral triangles. Similarly to the Benitez House planned for Rio Piedras, this spatial-structural planning grid engendered hexagonal rooms, and it may have also helped to integrate the house into its difficult, mountainous terrain. For additional information on this house, including an aerial perspective, see Chapter 4.

19. The Fullana Residence (1954, HKI/0108)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms Location: Rio Piedras.

For information on the Fullana Residence, see chapters 4 and 6. I conducted a site visit of the house in February 2016.

20. The Haeussler Residence (1945, HKI/0002)

The Grid and the Landscape, Open Air Rooms

Location: The northwest corner of Calle Manuel Rivera Ferrer and Calle Nogal,

Urbanizacion San Patricio, Guaynabo.

For information on the Haeussler House, see Chapter 4. I conducted two site visits of the house in February 2015 and 2016.

21. The Klumb House (late nineteenth century, HKl/3107)

Vernacular Influences, Open Air Rooms

Location: At the intersection of Avenida Ramon B. Lopez and Calle Jose de Diego, Rio Piedras.

Today, the University of Puerto Rico in Rio Piedras is the caretaker of the Klumb House property. For additional information on the Klumb House, see Chapter 6. I conducted a site visit of the house in June 2014.

22. The Kogan House (1950, HKI/0053)

Open Air Rooms, Dense Urban Areas

Location: On the south side of Calle Magdalena (between Avenida Ashford and Calle Luisa), El Condado.

I conducted site visits of the house in February 2015 and 2016. Although the building is still standing today, it has been converted into storefronts, including a U.S. Post Office. For additional information on the Kogan House, see Chapter 7.

23. The Dr. Mario Julia Beach Cottage (1955, HKI/0137)

Open Air Rooms

Location: Breñas Beach, Dorado.

This house was to be a one-story, beach weekend getaway. The intended site was a narrow lot facing the ocean. On the ocean side of the house design there was a porch and a covered terrace. At the side of the house design there was a combined bathroom-shower-changing room, and a short path that led directly to the water's edge.

The archived documentary evidence at the AACURP and current satellite imagery are

inconclusive in regards to whether or not the house was ever built.

24. The Levin (sometimes Levine) House (1951, HKI/0086, Figure C.6)

Open Air Rooms, Dense Urban Areas

Location: On the south side of Ashford Avenue (between Calle Vendig and Calle Earl), El Condado.

In many ways, the Levin House emulated its recent predecessors and community neighbors of the Benus and Kogan houses. Generally, the three houses were two-story, concrete houses with similar floor and site plans, and occupying similar sized urban lots in El Condado. The Levin House, however, was in the heart of El Condado and situated along its busiest street. Also, one of several early design schemes for the house included a 1240 sqft. covered terrace on the second floor. The house is no longer standing.



Figure C.6. Perspective, the Levin House. Drawing by Henry Klumb/The Office of Henry Klumb, courtesy of the AACUPR.

25. The Marrero House (1957, HKI/0003)

Open Air Rooms, Dense Urban Spaces

Location: On the east side of Hoare Street (between Calle Jose Marti and Avenida Manuel Fernandez Juncos), Miramar, Santurce.

For information on the Marrero House, see Chapter 7. I conducted a site visit of the house in February 2016.

26. The Eloy Rodriguez House (1951, HKI/0088)

The Grid and the Landscape, Open Air Rooms

Location: On the southwest corner of Calle Mayaguez and Calle Corozal (north of the UPR-RP campus), Rio Piedras.

I conducted three site visits of the house in June 2014, February 2015, and February 2016. The house is abandoned and in a dilapidated state. Except for graffiti, the structure and patio's stone wall remain physically undamaged. For additional information on the Eloy Rodriguez house, see Chapter 6.

29. The Russell House (1972, HKI/0284)

The Grid and the Landscape, Open Air Rooms

Location: Calle 6, Barrio Mata de Platano Neighborhood, Colinas de Luquillo (between Sabana and Luquillo).

Along with the Tugwell and Foreman mountain homes, the Russell House ranks as one of Klumb's most unusual houses. The house is a fourteen sided structure divided into equal sized wedges. At the center of the house was an oculus over a curvilinear pond and planter area. Today the oculus is covered. Over the fourteen sided structure is a heptagonal roof.

31. The Timm Residence (1960, HKI/0193)

The Grid and the Landscape, Open Air Rooms

Location: Camino Las Lomas Capuccino, Rio Piedras.

The clients for this house were the daughter and son-in-law of the governor of Puerto Rico. The house design went through at least two major iterations before settling on a two-story, narrow, linearly-arranged house on a sloping site. Select spaces on the second floor – the master bedroom

and the living room – benefitted from good cross-ventilation. The second bedroom, kitchen and bathroom did not. The first proposed scheme for the house allowed for cross-ventilation across all of the second floor spaces.

I visited the site in February 2016 but was unable to determine whether or not the house was built, or whether the house presently on the site is the remodeled Timm Residence. For additional information on the Timm Residence, see Chapter 6.

32. The Tugwell Cottage (1964, HKI/0244)

The Grid and the Landscape, Vernacular Influences, Open Air Rooms Location: *El Yunque* National Forest (near Monte Sereno), Rio Grande.

As previously mentioned, this house was designed and built for the family of the former federally-appointed governor of Puerto Rico, Rexford Tugwell. While the original house design called for a Buckminster Fuller decahedron dome over the master bedroom, a later addition requested by Mr. Tugwell's daughter called for the removal of the dome and the addition of three bedrooms. For additional information on the Tugwell Cottage, see chapters 1 and 4.

33. The Velez House (1962, HKI/0216)

The Grid and the Landscape, Open Air Rooms, Dense Urban Spaces Location: On the north side of Calle Dr. Santiago Veve (between Calle Victoria and Calle Esperanza), San German.

For information on the Velez House, see Chapter 7.

B. Houses Studied but Ultimately Not Included in the Dissertation Research

- **1. The Alfaro House** (HKI/0240) This house does not appear to have been built. Its drawing set included only preliminary sketch drawings on trace paper. The proposed location was Urbanizacion San Francisco, Rio Piedras. It is worth noting, however, that the house bears a resemblance to the Teacher's Farms in Concrete project.
- 2. The Barasorda Residence (HKI/0125) This house it did not significantly contribute to the

dissertation's four-part taxonomy of Klumb's houses beyond those houses I had already studied in my first two research trips (in June 2014 and February 2015). But as the house was planned for the Santa Maria Residential Development, it would be at least the fifth house in that neighborhood. Thus it would be worthwhile to find its exact location and to study the house in detail.

- **3. The Bueno Residence** (HKI/0026) This residential design project consisted of a series of remodels and additions to an existing house (the Simons House) originally designed and built by Antonin Nechodoma. The original house blueprints that Klumb worked from were dated July 1926. The house was located on Calle Almendro. I did not attempt to determine if the house was still standing today.
- **4. The Clapp House** (HKI/0203) This residential design project consisted of a series of additions to an existing house.
- **5. The Ellsworth House** (HKI/0034) It is not clear whether or not this house was built. There is no topographic survey, site plan, or official set of construction documents. The proposed location was the town of Cidra, which is between San Juan and Cayey. It should be noted, however, that during Klumb's career houses that were to be built beyond a certain distance from the city limits did not require building permits, and hence did not require official construction documents. This was the case for both the Tugwell Cottage and Foreman Mountain Retreat.
- **6. The Slavin House** (HKI/0291) It is unlikely that this house was ever built due to the small number of extant drawings. It is possible, however, that the house's drawings were preliminary sketches for another house or design project.